



# MISSISSIPPI STATE UNIVERSITY<sup>TM</sup>

## *UNIVERSITY COMMITTEE ON COURSES AND CURRICULA*

### **A MEMORANDUM**

DATE: November 23, 2019

TO: UCCC Members

FROM: Dr. Dana Pomykal Franz, Chair

SUBJECT: December 5, 2019 Meeting

The agenda and proposals for the meeting on **Thursday, December 5, 2019 beginning at 1:30 p.m.** are enclosed. The meeting will be held in **Room 324 of the Student Union**. Please contact the UCCC office if you are unable to attend.

The minutes from the November 15, 2019 UCCC meeting will be forwarded in a separate email.

Thank you.

Enclosures: Course/Curriculum Proposals

**AGENDA**  
**UNIVERSITY COMMITTEE ON COURSES AND CURRICULA**  
**December 5, 2019**

1. Welcome
2. Approval of minutes
3. Course proposals by college/school:

**ACADEMIC AFFAIRS**

Modification	<a href="#">EAP 5323</a>	Academic Research and Writing
Modification	<a href="#">LSK 1101</a>	Freshman Success Strategies I

**AGRICULTURE AND LIFE SCIENCES**

Modification +Online/Distance	<a href="#">ADS 2313</a>	Animal Behavior and Training
Addition +Online/Distance	<a href="#">ADS 3413</a>	Companion Animal Nutrition
Addition +Online/Distance	<a href="#">ADS 4713</a> /6713	Human-Animal Bond/Shelter Management
Modification +Online/Distance	<a href="#">AELC 4503</a> /6503	International Agricultural Education
+Online/Distance	<a href="#">FNH 6293</a> (split level with FNH 4293)	Micronutrients: Human Metabolism
Addition +Online/Distance	<a href="#">FNH 8773</a>	The Human Microbiota and Optimal Health
Addition	<a href="#">GA 4101</a>	MANRRS Leadership Development
+Online/Distance	<a href="#">HS 1701</a>	Survey of Human Sciences

**ARCHITECTURE, ART & DESIGN**

+Online/Distance	<a href="#">ART 3163</a>	History of Graphic Design
------------------	--------------------------	---------------------------

**ARTS & SCIENCES**

Addition	<a href="#">AN 4333</a>	Anthropology of Violence
Modification +Online/Distance	<a href="#">CO 4233</a>	Gender and Media

**BUSINESS**

+Online/Distance	<a href="#">MKT 4143</a> /6143	Sales Management
+Online/Distance	<a href="#">MKT 4533</a>	Marketing Research

**EDUCATION**

Addition +Online/Distance	<a href="#">RDG 8723</a>	Seminar in Literacy Education
------------------------------	--------------------------	-------------------------------

4. Degree proposals by college/school

**BUSINESS**

Modification	BBA Minor	Marketing
--------------	--------------	-----------

## FORESTRY RESOURCES

Modification	BS	Forestry
--------------	----	----------

## VETERINARY SCIENCE

Name Change	PhD	Veterinary Medical Science <b>to</b> Veterinary and Biomedical Sciences
Name Change	MS	Veterinary Medical Science <b>to</b> Veterinary and Biomedical Sciences

APPROVAL FORM FOR

# DEGREE PROGRAMS

MISSISSIPPI STATE UNIVERSITY

**NOTE:** This form is a cover sheet that must accompany the degree program change proposal. The actual proposal should be prepared in accordance with format requirements provided in the *Guide and Format for Curriculum Proposals* published by the UCCC. Both cover sheet and proposal should be submitted to UCCC Mail Stop 9702 (281 Garner Hall), Phone: 325-9410.

**College:** College of Business

**Department:** Department of Marketing,  
Quantitative Analysis & Business Law

**Contact Person:** Melissa Moore

**Mail Stop:** 9582

**E-mail:** MLM145@msstate.edu

**Nature of Change:** Modify

**Date Initiated:**

**Effective Date:**

Add previously approved ...

course to Major Electives

Nov 2019

Upon Approval

course to SCM Concentration

Nov 2019

Upon Approval

courses to Minor Elective

Nov 2019

Upon Approval

**Summary of Proposed Changes:**

Add course to Marketing Major curriculum that was previously approved.

MKT 3513 Marketing Internship

Add course to SCM Concentration curriculum that was previously approved.

MKT 3513 Marketing Internship

Add courses to Minor curriculum that were previously approved.

MKT 4223 Social Media Marketing

MKT 3513 Marketing Internship

Approved:

Date:



11-15-19

Department Head



11-19-19

Chair, College or School Curriculum Committee



11/19/19

Dean of College or School

Chair, University Committee on Courses and Curricula

Chair, Graduate Council(if applicable)

Chair, Deans Council



## Current

### Degree Description

This department offers one major (Marketing), two minors (Marketing and Business Analytics), and three concentrations (PGA Golf Management, Supply Chain Management and Integrated Digital Marketing). In addition, the department offers marketing, quantitative analysis and business law courses to support other programs in the college and across campus.

### Marketing Major (MKT)

Marketing consists of three significant interlocking activities:

1. understanding consumers along with their wants and unfilled needs;
2. developing improved products and services that meet the identified needs of consumers; and
3. communicating the benefits of the improved products and services through advertising, public relations, promotion and effective salesmanship.

Courses offered within this unit prepare students to provide marketing leadership and assume a variety of career paths, including field sales, brand management, marketing communications, store management, procurement, logistics, and small business.

### PGA Golf Management Concentration (PGM)

Director: Jeffrey W. Adkerson, PGA

Office: 309 McCool Hall; Phone: (662) 325-3161

The PGA Golf Management Program is the second oldest PGA Golf Management Program program accredited by the Professional Golfers' Association of America (PGA). The Program prepares graduates for careers as Class A PGA Professionals at golf courses and other industry businesses. A PGA Professional must have a broad assortment of marketing, management and other business-related skills to be effective in the golf profession today. The PGA Golf Management Program is a demanding four and one half year curriculum.

The 4 ½ year program leads to a bachelor's degree in business administration with a major in marketing. In addition to the requirements for a degree in marketing, students must complete courses in turf management, food management, landscape architecture, human resource management; and all PGA Golf Management requirements. Students must also complete a minimum of 16 months of co-op under the guidance of the MSU Cooperative Education Program. These work experiences are under the tutelage of Class A PGA Professionals throughout the country. Students are required to be continuously enrolled at MSU as full-time

## PROPOSED Degree Description

This department offers one major (Marketing), two minors (Marketing and Business Analytics), and three concentrations (PGA Golf Management, Supply Chain Management and Integrated Digital Marketing). In addition, the department offers marketing, quantitative analysis and business law courses to support other programs in the college and across campus.

### Marketing Major (MKT)

Marketing consists of three significant interlocking activities:

1. understanding consumers along with their wants and unfilled needs;
2. developing improved products and services that meet the identified needs of consumers; and
3. communicating the benefits of the improved products and services through advertising, public relations, promotion and effective salesmanship.

Courses offered within this unit prepare students to provide marketing leadership and assume a variety of career paths, including field sales, brand management, marketing communications, store management, procurement, logistics, and small business.

### PGA Golf Management Concentration (PGM)

Director: Jeffrey W. Adkerson, PGA

Office: 309 McCool Hall; Phone: (662) 325-3161

The PGA Golf Management Program is the second oldest PGA Golf Management Program program accredited by the Professional Golfers' Association of America (PGA). The Program prepares graduates for careers as Class A PGA Professionals at golf courses and other industry businesses. A PGA Professional must have a broad assortment of marketing, management and other business-related skills to be effective in the golf profession today. The PGA Golf Management Program is a demanding four and one half year curriculum.

The 4 ½ year program leads to a bachelor's degree in business administration with a major in marketing. In addition to the requirements for a degree in marketing, students must complete courses in turf management, food management, landscape architecture, human resource management; and all PGA Golf Management requirements. Students must also complete a minimum of 16 months of co-op under the guidance of the MSU Cooperative Education Program. These work experiences are under the tutelage of Class A PGA Professionals throughout the country. Students are required to be continuously enrolled at MSU as full-time

students or in the MSU Cooperative Education Program according to their co-op schedule. Those who complete the program thus earn a prestigious degree, and upon eligible employment, membership in the PGA of America.

PGA Membership. Please see PGA Golf Management staff to discuss PGA Membership Requirements. PGA Golf Management Graduation Requirements. Students must complete the last semester in school (not on co-op). They must also pass the PGA Playing Ability Test, complete 16 months of co-op, and complete all levels of the PGA Golf Management Program.

PGA Golf Management Admission Procedures. The PGA Golf Management Program has a limited enrollment. The current enrollment limit is 200; however, this number is subject to change based on the placement outlook and PGA Golf Management and Co-op budget constraints. The number of students admitted each year is determined by graduation and attrition of the previous year. Students are admitted once per year for entrance in the fall semester. The deadline for completed applications is May 1 each year.

Entrance Requirements

Freshmen:

- Meet MSU regular admission requirements
- Have a USGA Handicap of 8 or less

Transfer Students:

- Meet MSU admission requirements
- 2.5 GPA with maximum of 62 applied semester hours
- Have a USGA Handicap of 8 or less

Non-Citizen:

- The MSU PGA Golf Management Program is sanctioned by PGA of America to educate and train graduates to become PGA Members. International students must complete and sign a non-citizen form as required by the PGA of America.

## Supply Chain Management Concentration (SCM)

Supply chain management continues to play a major role in the national and international economy. As businesses continue to focus on logistics and transportation improvements, job opportunities for graduates in the supply chain management concentration increase. The curriculum in the supply chain management concentration will acquaint the student with the issues, perspectives, and techniques associated with transportation and logistics theory and practice. It offers in-depth treatment of distribution, supply, warehousing, inventory control, and operations in the modes of transportation.

students or in the MSU Cooperative Education Program according to their co-op schedule. Those who complete the program thus earn a prestigious degree, and upon eligible employment, membership in the PGA of America.

PGA Membership. Please see PGA Golf Management staff to discuss PGA Membership Requirements. PGA Golf Management Graduation Requirements. Students must complete the last semester in school (not on co-op). They must also pass the PGA Playing Ability Test, complete 16 months of co-op, and complete all levels of the PGA Golf Management Program.

PGA Golf Management Admission Procedures. The PGA Golf Management Program has a limited enrollment. The current enrollment limit is 200; however, this number is subject to change based on the placement outlook and PGA Golf Management and Co-op budget constraints. The number of students admitted each year is determined by graduation and attrition of the previous year. Students are admitted once per year for entrance in the fall semester. The deadline for completed applications is May 1 each year.

Entrance Requirements

Freshmen:

- Meet MSU regular admission requirements
- Have a USGA Handicap of 8 or less

Transfer Students:

- Meet MSU admission requirements
- 2.5 GPA with maximum of 62 applied semester hours
- Have a USGA Handicap of 8 or less

Non-Citizen:

- The MSU PGA Golf Management Program is sanctioned by PGA of America to educate and train graduates to become PGA Members. International students must complete and sign a non-citizen form as required by the PGA of America.

## Supply Chain Management Concentration (SCM)

Supply chain management continues to play a major role in the national and international economy. As businesses continue to focus on logistics and transportation improvements, job opportunities for graduates in the supply chain management concentration increase. The curriculum in the supply chain management concentration will acquaint the student with the issues, perspectives, and techniques associated with transportation and logistics theory and practice. It offers in-depth treatment of distribution, supply, warehousing, inventory control, and operations in the modes of transportation.

### Integrated Digital Marketing Concentration (IDM)

The internet and digital marketing have grown to become an important resource for organizations and consumers. As firms and individuals continue to focus on utilizing digital tools and applications for all aspects of marketing from product development, consumer behavior and customer touch points, job opportunities for graduates in the integrated digital marketing concentration increase. The curriculum in the integrated digital marketing concentration will provide the student with the strategic application skills needed in the digital world. Students will be exposed to industry standard tools and techniques through the analyses and assessment of leading firm practices and the development of comprehensive applied projects.

Degree: Bachelor of Business Administration  
Major: Marketing  
Concentration:  
Supply Chain Management (SCM)  
Professional Golf Management (PGM)  
Integrated Digital Marketing (IDM)

#### CURRENT CURRICULUM OUTLINE

##### English Composition

EN 1103	English Composition I	3
or EN 1163	Accelerated Composition I	
EN 1113	English Composition II	3
or EN 1173	Accelerated Composition II	

##### Mathematics

MA 1313	College Algebra	3
MA 1613	Calculus for Business and Life Sciences I	3
BQA 2113	Business Statistical Methods I	3

##### Science

2 Lab Sciences from General Education courses	6
---	---

##### Humanities

See General Education courses	6
-------------------------------	---

### Integrated Digital Marketing Concentration (IDM)

The internet and digital marketing have grown to become an important resource for organizations and consumers. As firms and individuals continue to focus on utilizing digital tools and applications for all aspects of marketing from product development, consumer behavior and customer touch points, job opportunities for graduates in the integrated digital marketing concentration increase. The curriculum in the integrated digital marketing concentration will provide the student with the strategic application skills needed in the digital world. Students will be exposed to industry standard tools and techniques through the analyses and assessment of leading firm practices and the development of comprehensive applied projects.

Degree: Bachelor of Business Administration  
Major: Marketing  
Concentration:  
Supply Chain Management (SCM)  
Professional Golf Management (PGM)  
Integrated Digital Marketing (IDM)

#### CURRENT CURRICULUM OUTLINE

##### English Composition

EN 1103	English Composition I	3
or EN 1163	Accelerated Composition I	
EN 1113	English Composition II	3
or EN 1173	Accelerated Composition II	

##### Mathematics

MA 1313	College Algebra	3
MA 1613	Calculus for Business and Life Sciences I	3
BQA 2113	Business Statistical Methods I	3

##### Science

2 Lab Sciences from General Education courses	6
---	---

##### Humanities

See General Education courses	6
-------------------------------	---

Fine Arts			Fine Arts		
See General Education courses		3	See General Education courses		3
Social Sciences			Social Sciences		
PS 1113	American Government	3	PS 1113	American Government	3
Introductory course in AN, PSY or SO		3	Introductory course in AN, PSY or SO		3
College Core			College Core		
BQA 3123	Business Statistical Methods II	3	BQA 3123	Business Statistical Methods II	3
ACC 2013	Principles of Financial Accounting	3	ACC 2013	Principles of Financial Accounting	3
ACC 2023	Principles of Managerial Accounting	3	ACC 2023	Principles of Managerial Accounting	3
EC 2113	Principles of Macroeconomics	3	EC 2113	Principles of Macroeconomics	3
EC 2123	Principles of Microeconomics	3	EC 2123	Principles of Microeconomics	3
BL 2413	The Legal Environment of Business	3	BL 2413	The Legal Environment of Business	3
BIS 3233	Management Information Systems	3	BIS 3233	Management Information Systems	3
FIN 3123	Financial Management	3	FIN 3123	Financial Management	3
MKT 3013	Principles of Marketing	3	MKT 3013	Principles of Marketing	3
MKT 3323	International Logistics	3	MKT 3323	International Logistics	3
MGT 3113	Principles of Management and Production	3	MGT 3113	Principles of Management and Production	3
BUS 4853	Business Policy	3	BUS 4853	Business Policy	3
Oral Communication Requirement			Oral Communication Requirement		
CO 1003	Fundamentals of Public Speaking	3	CO 1003	Fundamentals of Public Speaking	3
or CO 1013	Introduction to Communication		or CO 1013	Introduction to Communication	
Computer Literacy Requirement			Computer Literacy Requirement		
BIS 1012	Introduction to Business Information Systems	2	BIS 1012	Introduction to Business Information Systems	2

Writing Requirement			Writing Requirement		
MGT 3213	Organizational Communications	3	MGT 3213	Organizational Communications	3
Major Core			Major Core		
International Elective (see advisor for options)		3	International Elective (see advisor for options)		3
MKT 4413	Consumer Behavior	3	MKT 4413	Consumer Behavior	3
MKT 4533	Marketing Research	3	MKT 4533	Marketing Research	3
MKT 4813	Marketing Management	3	MKT 4813	Marketing Management	3
Choose four of the following:		12	Choose four of the following:		12
MKT 3213	Retailing		MKT 3213	Retailing	
			<b>MKT 3513</b>	<b>Marketing Internship (with prior approval)</b>	
MKT 4113	Personal Selling		MKT 4113	Personal Selling	
MKT 4123	Advertising		MKT 4123	Advertising	
MKT 4213	Internet Marketing		MKT 4213	Internet Marketing	
MKT 4223	Social Media Marketing		MKT 4223	Social Media Marketing	
MKT 4423	Strategic Brand Management		MKT 4423	Strategic Brand Management	
MKT 4613	Services Marketing		MKT 4613	Services Marketing	
MKT 4143	Sales Management		MKT 4143	Sales Management	
MKT 3933	International Marketing		MKT 3933	International Marketing	
MKT 4033	International Transportation		MKT 4033	International Transportation	
MKT 4313	Physical Distribution Management		MKT 4313	Physical Distribution Management	
MKT 4333	International Supply Chain Management		MKT 4333	International Supply Chain Management	
Non-business electives (see advisor for options) <sup>1</sup>		13	Non-business electives (see advisor for options) <sup>1</sup>		13
Free electives (see advisor for options) <sup>1</sup>		6	Free electives (see advisor for options) <sup>1</sup>		6
Total Hours		123	Total Hours		123
<sup>1</sup> To be selected with the advice and approval of advisor			<sup>1</sup> To be selected with the advice and approval of advisor		

## PGA Golf Management Concentration (PGM)

Director: Jeffrey W. Adkerson, PGA  
Office: 309 McCool Hall; Phone: (662) 325-3161  
Concentration Course Requirements

PGA Golf Management students are required to take all courses listed under the General Education and College requirements for Marketing in addition to the following courses:

MKT 2211	PGM Level I Seminar	1
MKT 2213	PGA Golf Facility Management I	3
MKT 2223	Introduction to Golf Swing Instruction	3
MKT 2233	Intermediate Golf Instruction	3
MKT 2243	PGA Golf Facility Management II	3
MKT 2252	Advanced Golf Instruction	2
MKT 3213	Retailing	3
MKT 4234	Golf Operations Management	4
MKT 4413	Consumer Behavior	3
MKT 4533	Marketing Research	3
MGT 3513	Introduction to Human Resource Management	3
International Elective (see advisor for options)		3
Choose three of the following:		9

MKT 3933	International Marketing	
MKT 4113	Personal Selling	
MKT 4123	Advertising	
MKT 4143	Sales Management	
MKT 4213	Internet Marketing	
MKT 4223	Social Media Marketing	
MKT 4423	Strategic Brand Management	
MKT 4613	Services Marketing	

Total Hours 123

Co-op Work

## PGA Golf Management Concentration (PGM)

Director: Jeffrey W. Adkerson, PGA  
Office: 309 McCool Hall; Phone: (662) 325-3161  
Concentration Course Requirements

PGA Golf Management students are required to take all courses listed under the General Education and College requirements for Marketing in addition to the following courses:

MKT 2211	PGM Level I Seminar	1
MKT 2213	PGA Golf Facility Management I	3
MKT 2223	Introduction to Golf Swing Instruction	3
MKT 2233	Intermediate Golf Instruction	3
MKT 2243	PGA Golf Facility Management II	3
MKT 2252	Advanced Golf Instruction	2
MKT 3213	Retailing	3
MKT 4234	Golf Operations Management	4
MKT 4413	Consumer Behavior	3
MKT 4533	Marketing Research	3
MGT 3513	Introduction to Human Resource Management	3
International Elective (see advisor for options)		3
Choose three of the following:		9

MKT 3933	International Marketing	
MKT 4113	Personal Selling	
MKT 4123	Advertising	
MKT 4143	Sales Management	
MKT 4213	Internet Marketing	
MKT 4223	Social Media Marketing	
MKT 4423	Strategic Brand Management	
MKT 4613	Services Marketing	

Total Hours 123

Co-op Work

PGA Golf Management students must complete a minimum of 16 months of co-op work with Class A PGA professionals at country clubs, public golf courses, golf resorts, or other golf facilities. A 2.25 cumulative GPA on all work at MSU is required to earn credit for a specific work experience.

#### PGA Golf Management

PGA Golf Management students will complete all PGA Golf Management requirements including testing, which will be conducted on the Mississippi State University campus by officials of the PGA. An initial lab fee and a semester lab fee is charged to students each semester on campus to cover the PGA Golf Management seminars, tests, workshops and playing privileges at the MSU Golf Course. A typical schedule of classes and co-ops are as follows:

Freshman Year	
Fall School	16
Spring School	16
Summer Co-op	
Sophomore Year	
Fall School	16
Spring School	16
Summer Co-op	
Junior Year	
Fall Co-op	
Spring School	16
Summer School	12
Senior Year	
Fall School	16
Spring Co-op	
Summer Co-op	
Fall School (Graduation)	16

#### Supply Chain Management Concentration (SCM)

##### Concentration Course Requirements

Supply Chain Management students are required to take all courses listed under the General Education and College requirements for Marketing in addition to the following courses:

International Elective (see advisor for options)	3
--	---

PGA Golf Management students must complete a minimum of 16 months of co-op work with Class A PGA professionals at country clubs, public golf courses, golf resorts, or other golf facilities. A 2.25 cumulative GPA on all work at MSU is required to earn credit for a specific work experience.

#### PGA Golf Management

PGA Golf Management students will complete all PGA Golf Management requirements including testing, which will be conducted on the Mississippi State University campus by officials of the PGA. An initial lab fee and a semester lab fee is charged to students each semester on campus to cover the PGA Golf Management seminars, tests, workshops and playing privileges at the MSU Golf Course. A typical schedule of classes and co-ops are as follows:

Freshman Year	
Fall School	16
Spring School	16
Summer Co-op	
Sophomore Year	
Fall School	16
Spring School	16
Summer Co-op	
Junior Year	
Fall Co-op	
Spring School	16
Summer School	12
Senior Year	
Fall School	16
Spring Co-op	
Summer Co-op	
Fall School (Graduation)	16

#### Supply Chain Management Concentration (SCM)

##### Concentration Course Requirements

Supply Chain Management students are required to take all courses listed under the General Education and College requirements for Marketing in addition to the following courses:

International Elective (see advisor for options)	3
--	---

MKT 3323	International Logistics	3	MKT 3323	International Logistics	3
			<b>MKT 3513</b>	<b>Marketing Internship (with prior approval)</b>	3
MKT 4033	International Transportation	3	MKT 4033	International Transportation	3
MKT 4313	Physical Distribution Management	3	MKT 4313	Physical Distribution Management	3
MKT 4333	International Supply Chain Management	3	MKT 4333	International Supply Chain Management	3
MKT 4413	Consumer Behavior	3	MKT 4413	Consumer Behavior	3
MKT 4533	Marketing Research	3	MKT 4533	Marketing Research	3
MKT 4813	Marketing Management	3	MKT 4813	Marketing Management	3
Non-business electives (see advisor for options)		13	Non-business electives (see advisor for options)		13
Free electives		6	Free electives		6
Total Hours		123	Total Hours		123
<b>Integrated Digital Marketing Concentration (IDM)</b> Concentration Course Requirements IDM students are required to take all courses listed under the General Education and College requirements for Marketing in addition to the following courses:			<b>Integrated Digital Marketing Concentration (IDM)</b> Concentration Course Requirements IDM students are required to take all courses listed under the General Education and College requirements for Marketing in addition to the following courses:		
MKT 4213	Internet Marketing	3	MKT 4213	Internet Marketing	3
MKT 4223	Social Media Marketing	3	MKT 4223	Social Media Marketing	3
Choose two of the following:		6	Choose two of the following:		6
MKT 4123	Advertising		MKT 4123	Advertising	
MKT 4423	Strategic Brand Management		MKT 4423	Strategic Brand Management	
MKT 3513	Marketing Internship (with prior approval)		MKT 3513	Marketing Internship (with prior approval)	
MKT 3213	Retailing		MKT 3213	Retailing	
Total Hours		123	Total Hours		123



## MARKETING MINOR

<b>CURRENT Degree Description</b>	<b>PROPOSED Degree Description</b>
A Marketing minor is offered to both Business and Non-Business students. A minor in Marketing is attained by taking the following courses:	A Marketing minor is offered to both Business and Non-Business students. A minor in Marketing is attained by taking the following courses:
MKT 3013 Principles of Marketing 3	MKT 3013 Principles of Marketing 3
MKT 4413 Consumer Behavior 3	MKT 4413 Consumer Behavior 3
Choose four of the following: 12	Choose four of the following: 12
MKT 3213 Retailing	MKT 3213 Retailing
MKT 3323 International Logistics	MKT 3323 International Logistics
MKT 3933 International Marketing	<b>MKT 3513 Marketing Internship</b>
MKT 4033 International Transportation	<del>MKT 3933 International Marketing</del>
MKT 4113 Personal Selling	MKT 4033 International Transportation
MKT 4123 Advertising	MKT 4113 Personal Selling
MKT 4143 Sales Management	MKT 4123 Advertising
MKT 4213 Internet Marketing	MKT 4143 Sales Management
MKT 4333 International Supply Chain Management	<b>MKT 4213 Internet Marketing</b>
MKT 4423 Strategic Brand Management	<b>MKT 4223 Social Media Marketing</b>
MKT 4533 Marketing Research	<del>MKT 4333 International Supply Chain Management</del>
MKT 4613 Services Marketing	MKT 4423 Strategic Brand Management
MKT 4313 Physical Distribution Management	MKT 4533 Marketing Research
	MKT 4613 Services Marketing
	MKT 4313 Physical Distribution Management

Students interested in this minor should contact a Marketing advisor.	Students interested in this minor should contact a Marketing advisor.
---	---

### 3. JUSTIFICATION AND STUDENT LEARNING OUTCOMES:

#### A. Degree Modification Justification.

MKT 4223 was approved and added to the major in 2019. This reflects this addition for the minor.

MKT 3513, an existing class, is being added to the minor's, concentrations and the major's electives.

#### LEARNING OBJECTIVES

- **Critical Thinking:** Students will be able to analyze and integrate information to solve problems and make business decisions.
- **Information Technology:** Students will demonstrate proficiency in the in the use of information technology tools and concepts vital to productivity
- **Communication:** Students will demonstrate proficiency in written and spoken communication skills.
- **Ethics:** Students will demonstrate an understanding of the legal and ethical ramifications of business decisions.
- **Teamwork:** Students will exhibit an understanding of interpersonal and team dynamics.
- **Diversity:** Students will understand the impact of a demographically and culturally diverse business environment.

#### **Additional questions:**

##### **1. Will this program change meet local, state, regional, and national educational and cultural needs?**

Yes, with the growth and widespread use of social media by firms, students need a foundational understanding of online communication principles having these courses for a minor will result in graduates that have the necessary skills and knowledge for their positions.

##### **2. Will this program change result in duplication in the System?**

No

##### **3. Will this program change/advance student diversity within the discipline?**

The revised curriculum will make the overall program more competitive to prospective students. This should increase the program's ability to recruit a diverse population of students.

##### **4. Will this program change result in an increase in the potential placement of graduates in MS, the Southeast, and the U.S.?**

The addition of these electives will provide students with a critical diverse skill set. Our

graduates need this exposure to be competitive in their career endeavors.

**5. Will this program change result in an increase in the potential salaries of graduates in MS, the Southeast, and the U.S.?**

With the additional technology skills gained, this may increase salaries. It is possible that students may more readily communicate their skill sets and potentially negotiate higher salaries.

**4. SUPPORT** Letters of support are included with the proposal.

**5. PROPOSED 4-LETTER ABBREVIATION**

N/A

**6. EFFECTIVE DATE:** Upon Approval.

**MEMO:**

College of Business  
 Dr. Marler  
 Chair, College Committee on Courses & Curriculum  
 McCool Hall



From: Robert Moore, Chair, Departmental Curriculum Committee

Date: November 6, 2019

Re: Letter of Support for Marketing Degree Changes

The Marketing faculty have reviewed the proposed addition of **MKT 3513 Marketing Internship** as an elective for the major, minor and the SCM concentration. Additionally the Marketing faculty have reviewed the proposed addition of **MKT 4223 Social Media Marketing** as an elective for the minor.  
 (Please next 2 pages as well.)

Support for **MKT 3513 Marketing Internship** as an elective for the Marketing Major.

Faculty	Support	Do Not Support	Signature	Date
Dr. Frank Adams <a href="mailto:fadams@business.msstate.edu">fadams@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Chris Boone <a href="mailto:cboonee@business.msstate.edu">cboonee@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		12 Nov 19
Dr. Mike Breazeale <a href="mailto:mbreazeale@business.msstate.edu">mbreazeale@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Joel Collier <a href="mailto:jcollier@business.msstate.edu">jcollier@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Adam Farmer <a href="mailto:afarmer@business.msstate.edu">afarmer@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Jason Lueg <a href="mailto:jlueg@business.msstate.edu">jlueg@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Robert Moore <a href="mailto:rmoore@business.msstate.edu">rmoore@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Melissa Moore <a href="mailto:mmoore@business.msstate.edu">mmoore@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-11-19
Dr. Nicole Ponder <a href="mailto:nponder@business.msstate.edu">nponder@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-15-19
Dr. Kevin Shanahan <a href="mailto:kshanahan@business.msstate.edu">kshanahan@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-15-19











Support for **MKT 3513 Marketing Internship** as an elective for the Marketing minor.

Faculty	Support	Do Not Support	Signature	Date
Dr. Frank Adams fadams@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/10/19
Dr. Chris Boone cboonee@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		12 Nov 19
Dr. Mike Breazeale mbreazeale@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		12 Nov 19
Dr. Joel Collier jcollier@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Adam Farmer afarmer@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Jason Lueg jlueg@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Robert Moore rmoore@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Melissa Moore mmoore@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-11-19
Dr. Nicole Ponder nponder@business.msstate.edu	<input type="checkbox"/>	<input type="checkbox"/>	Nicole Ponder	11-15-19
Dr. Kevin Shanahan kshanahan@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-15-19

Support for **MKT 3513 Marketing Internship** as an elective for the Marketing SCM concentration

Faculty	Support	Do Not Support	Signature	Date
Dr. Frank Adams fadams@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/10/19
Dr. Chris Boone cboonee@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		12 Nov 19
Dr. Mike Breazeale mbreazeale@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Joel Collier jcollier@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Adam Farmer afarmer@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Jason Lueg jlueg@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Robert Moore rmoore@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Melissa Moore mmoore@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-11-19
Dr. Nicole Ponder nponder@business.msstate.edu	<input type="checkbox"/>	<input type="checkbox"/>	Nicole Ponder	11-15-19
Dr. Kevin Shanahan kshanahan@business.msstate.edu	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-15-19

Support for **MKT 4223 Social Media Marketing** as an elective for the Marketing minor.

Faculty	Support	Do Not Support	Signature	Date
Dr. Frank Adams <a href="mailto:fadams@business.msstate.edu">fadams@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11 Nov 15
Dr. Chris Boone <a href="mailto:cboonee@business.msstate.edu">cboonee@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		12 Nov 15
Dr. Mike Breazeale <a href="mailto:mbreazeale@business.msstate.edu">mbreazeale@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Joel Collier <a href="mailto:jcollier@business.msstate.edu">jcollier@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Adam Farmer <a href="mailto:afarmer@business.msstate.edu">afarmer@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Jason Lueg <a href="mailto:jlueg@business.msstate.edu">jlueg@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Robert Moore <a href="mailto:rmoore@business.msstate.edu">rmoore@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11/11/19
Dr. Melissa Moore <a href="mailto:mmoore@business.msstate.edu">mmoore@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-11-19
Dr. Nicole Ponder <a href="mailto:nponder@business.msstate.edu">nponder@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	 Nicole Ponder	11-15-19
Dr. Kevin Shanahan <a href="mailto:kshanahan@business.msstate.edu">kshanahan@business.msstate.edu</a>	<input checked="" type="checkbox"/>	<input type="checkbox"/>		11-15-19

APPROVAL FORM FOR

# DEGREE PROGRAMS

MISSISSIPPI STATE UNIVERSITY

**NOTE:** This form is a cover sheet that must accompany the degree program change proposal. The actual proposal should be prepared in accordance with format requirements provided in the *Guide and Format for Curriculum Proposals* published by the UCCC. Both cover sheet and proposal should be submitted to UCCC Mail Stop 9702 (281 Garner Hall), Phone: 325-9410.

**College:** Forest Resources

**Contact Person:** Dr. Robert K. Grala

**Nature of Change:** Add new concentration

**Department:** Forestry

**Mail Stop:** 9681 **E-mail:** r.grala@msstate.edu

**Date Initiated:** 10/07/19 **Effective Date:** 01/02/2020

**Current Degree Program Name:** Bachelor of Science

**Major:** Forestry

**Concentration:** 5 = FO/ENCO, FO/FOMG, FO/FP, FO/URBN, and FO/WFMG

**New Degree Program Name:** no change

**Major:** no change

**Concentration:** 6 = FO/ENCO, FO/FOMG, FO/FP, FO/URBN, FO/WFMG, and (new) FO/BUSN

**Summary of Proposed Changes:**

Addition of a new concentration called “Forest Business Concentration” addresses the growing need of the forest products industry to hire graduates well-versed in traditional forestry and concurrently having strong business, timber procurement, communication, and analytical skills. The proposed concentration will enable students to attain business skills that will help them be more competitive in the job market and open new career opportunities in forest business. The concentration consists of core courses in forestry curriculum (57 credit hours), concentration-specific courses (27 credit hours), and general courses (47 credit hours). Concentration-specific courses include forest business electives (up to 9 credit hours), professional electives (up to 3 credit hours), and elective courses from the College of Business (15 to 21 credit hours depending on a selected business minor). The total number of credit hours in a forest business concentration will be 128 [FO 4113 (Forest Resource Economics) is listed both as a social/behavioral sciences course and a forestry curriculum core course], consistent with other concentrations in the undergraduate forestry program. Upon program completion, students will qualify for one of 11 minors offered by the College of Business. Recently developed FO 4253 (Timber Procurement) will serve as a forest business elective. Two additional forest business courses will be developed to support the proposed concentration: FO 4XX3 (Timberland Investment) and FO 4XX3 (Computer Applications for Forest Resources II). As individual business minors differ in the number of required credits hours (from 15 to 21), the difference in credit hours will be supplemented with forest business and professional electives.

**Approved:**

**Date:**

\_\_\_\_\_  
Department Head

\_\_\_\_\_  
Chair, College or School Curriculum Committee

\_\_\_\_\_  
Dean of College or School

\_\_\_\_\_  
Chair, University Committee on Courses and Curricula

\_\_\_\_\_  
Chair, Graduate Council (if applicable)

\_\_\_\_\_  
Chair, Deans Council



## DEGREE MODIFICATION OUTLINE FORM

All deleted courses and information are in *italics* and all new courses and information in **bold**.

CURRENT Degree Description	PROPOSED Degree Description
Degree: Bachelor of Science Major: Forestry Concentration: Environmental Concentration, Forest Management, Forest Products, Urban Forestry, Wildlife Management	Degree: Bachelor of Science Major: Forestry Concentration: Environmental Concentration; Forest Management, Forest Products, Urban Forestry, Wildlife Management, <b>Forest Business</b>
Old degree description:  The forestry major is a science-based program leading to a Bachelor of Science degree in Forestry and consists of five concentrations: Environmental Conservation, Forest Management, Forest Products, Urban Forestry, and Wildlife Management Concentration. All concentrations are accredited by the Society of American Foresters (SAF). The Forest Products concentration is also accredited by the Society of Wood Science and Technology (SWST). By combining a general education with specialized professional courses, the curriculum is designed to produce graduates who have skills in interpersonal communications, written and oral communications, and cultural understanding. Graduates of the major are qualified to become a Registered Forester in Mississippi after successfully completing an examination for this purpose with the Board of Registration for Foresters (BORF) in Mississippi. Graduates are also qualified to become Society of American Forester Certified Foresters if successfully completing an exam.  Graduates are fully qualified as entry-level professionals and prepared for career advancement into positions of responsibility, while serving the current and future needs of society. The forestry major also prepares students for graduate school in any natural resource-related field.	New degree description:  The forestry major is a science-based program leading to a Bachelor of Science degree in Forestry and consists of <i>five</i> <b>six</b> concentrations: Environmental Conservation, Forest Management, Forest Products, Urban Forestry, <i>and</i> Wildlife Management, <b>and Forest Business</b> Concentration. <i>All concentrations are</i> <b>The Bachelor of Science degree in Forestry</b> is accredited by the Society of American Foresters (SAF). The Forest Products concentration is also accredited by the Society of Wood Science and Technology (SWST). By combining a general education with specialized professional courses, the curriculum is designed to produce graduates who have skills in interpersonal communications, written and oral communications, and cultural understanding. Graduates of the major are qualified to become a Registered Forester in Mississippi after successfully completing an examination for this purpose with the Board of Registration for Foresters (BORF) in Mississippi. Graduates are also qualified to become Society of American Forester Certified Foresters if successfully completing an exam.  Graduates are fully qualified as entry-level professionals and prepared for career advancement into positions of responsibility, while serving the current and future needs of society. The forestry major also prepares students for graduate school in any natural resource-related field.
Old concentration description:  <u>Environmental Concentration (FO/ENCO)</u> Advisor: Dr. Heidi Renninger, Thompson Hall, room 313  Today's forestry professionals strive to balance commodity production with environmental conservation. This concentration is designed for students interested in focusing on complex environmental issues in the realm of natural resource management. While being educated as foresters, students concentrate on contemporary environmental concerns within three emphasis areas: social, land, and science.	New concentration description:  <u>Environmental Concentration (FO/ENCO)</u> Advisor: Dr. Heidi Renninger, Thompson Hall, room 313  Today's forestry professionals strive to balance commodity production with environmental conservation. This concentration is designed for students interested in focusing on complex environmental issues in the realm of natural resource management. While being educated as foresters, students concentrate on contemporary environmental concerns within three emphasis areas: social, land, and science.



**Forest Management Concentration (FO/FOMG)**

Advisor: Dr. Krishna Poudel, Thompson Hall, room 315

Designed for students who intend to pursue professional careers in forest land and timber management and use in both the public and private sectors. Students may select from a wide range of electives to meet specific career objectives; for example, emphasis in areas such as business, communications, and geographical information systems in forestry and related sciences.

**Forest Products Concentration (FO/FP)**

Advisor: Dr. Joshua Granger, Thompson Hall, room 321

The use of wood as a material requires a fundamental understanding of wood properties, manufacturing processes, and the marketing of wood products. Students are prepared for positions in wood manufacturing, marketing, and research. Employers include lumber, pulp and paper mills, furniture manufacturers, and retail marketers of wood materials.

**Urban Forestry Concentration (FO/URBN)**

Advisor: Dr. Stephen C. Grado, Thompson Hall, room 357

Addresses an emerging need for the management of trees in towns and cities, and the urban/wildland interface. Urban and community foresters manage trees along city streets, in municipal parks, private woodlots, and utility right-of-ways. Employers include federal, state, and municipal governments, private consultants, and industry.

**Wildlife Management Conservation (FO/WFMG)**

Advisor: Dr. Heather D. Alexander, Thompson Hall, room 327

Designed for students interested in careers that emphasize wildlife management within the context of multiple-use management of forest land. The concentration fulfills course requirements for certification as wildlife biologists by The Wildlife Society. Many graduates of this concentration undertake graduate studies in wildlife biology and related areas to qualify for entry-level positions as wildlife biologists.

**Forest Management Concentration (FO/FOMG)**

Advisor: Dr. Krishna Poudel, Thompson Hall, room 315

Designed for students who intend to pursue professional careers in forest land and timber management and use in both the public and private sectors. Students may select from a wide range of electives to meet specific career objectives; for example, emphasis in areas such as business, communications, and geographical information systems in forestry and related sciences.

**Forest Products Concentration (FO/FP)**

Advisor: Dr. Joshua Granger, Thompson Hall, room 321

The use of wood as a material requires a fundamental understanding of wood properties, manufacturing processes, and the marketing of wood products. Students are prepared for positions in wood manufacturing, marketing, and research. Employers include lumber, pulp and paper mills, furniture manufacturers, and retail marketers of wood materials.

**Urban Forestry Concentration (FO/URBN)**

Advisor: Dr. Stephen C. Grado, Thompson Hall, room 357

Addresses an emerging need for the management of trees in towns and cities, and the urban/wildland interface. Urban and community foresters manage trees along city streets, in municipal parks, private woodlots, and utility right-of-ways. Employers include federal, state, and municipal governments, private consultants, and industry.

**Wildlife Management Conservation (FO/WFMG)**

Advisor: Dr. Heather D. Alexander, Thompson Hall, room 327

Designed for students interested in careers that emphasize wildlife management within the context of multiple-use management of forest land. The concentration fulfills course requirements for certification as wildlife biologists by The Wildlife Society. Many graduates of this concentration undertake graduate studies in wildlife biology and related areas to qualify for entry-level positions as wildlife biologists.

		<b>Forest Business Concentration (FO/BUSN)</b> <b>Advisor: Dr. Robert K. Grala, Thompson Hall, room 343</b>  <b>Designed for students interested in careers that emphasize business aspects of forestry such as timber markets, timber trade, timberland investment and insurance, forest real estate planning and investment, and timber procurement. Students may select from a wide range of electives to meet specific career objectives. Depending on career objectives and learning interests, student will follow a carefully designed set of core courses and electives, and upon coursework completion will qualify for one of the following College of Business minors: accounting, business administration, business information systems, insurance, economics, entrepreneurship, finance, management, marketing, real estate, or business analytics.</b>	
<b>CURRENT CURRICULUM OUTLINE</b>	<b>Required Hours</b>	<b>PROPOSED CURRICULUM OUTLINE</b>	<b>Required Hours</b>
<u>English:</u> EN 1103 English Composition I EN 1113 English Composition II	6	<u>English:</u> EN 1103 English Composition I EN 1113 English Composition II	6
<u>Fine Arts (General Education):</u> Any General Education Course	3	<u>Fine Arts (General Education):</u> Any General Education Course	3
<u>Natural Sciences (2 labs required from Gen Ed):</u> BIO 1134 Biology I BIO 1144 Biology II  See concentrations for additional requirements.	8	<u>Natural Sciences (2 labs required from Gen Ed):</u> BIO 1134 Biology I BIO 1144 Biology II  See concentrations for additional requirements.	8
<u>Extra Science (Chemistry):</u> CH 1043 Survey of Chemistry PH 1113 General Physics or Physical Science Elective (3) depending on a concentration	6	<u>Extra Science (Chemistry):</u> CH 1043 Survey of Chemistry PH 1113 General Physics or Physical Science Elective (3) depending on a concentration	6
<u>Math (General Education):</u> MA 1313 College Algebra ST 2113 Intro to Statistics	6	<u>Math (General Education):</u> MA 1313 College Algebra ST 2113 <i>Intro to Statistics</i> <b>or BQA 2113 (Business Statistical Methods)<sup>1</sup></b>  <sup>1</sup> Applies only to students who select the Forest Business Concentration and whose business minor includes a business statistics course. In other cases, students will take ST 2113.	6
<u>Humanities (General Education):</u> Any General Education course.	6	<u>Humanities (General Education):</u> Any General Education course.	6

<u>Social/Behavioral Sciences (Gen Ed):</u> AEC 2713 Intro to Food and Resource Econ FO 4113 Forest Resource Economics	6	<u>Social/Behavioral Sciences (Gen Ed):</u> AEC 2713 Intro to Food and Resource Econ <b>Business Elective (3) – (BL 2414 Legal Environment of Business)<sup>2</sup></b> FO 4113 Forest Resource Economics  <sup>2</sup> Applies only to students who select the Forest Business Concentration and whose business minor includes a course qualifying as a substitute for AEC 2713. In other cases, students will take AEC 2713.	6
<u>Oral Communication:</u> CO 1003 Fund. Of Public Speaking	3	<u>Social/Behavioral Sciences (Gen Ed):</u> CO 1003 Fund. Of Public Speaking	3
<u>Writing:</u> AELC 3203 Prof. Wri in Ag, NR & Hu Sci	3	<u>Writing:</u> AELC 3203 Prof. Wri in Ag, NR & Hu Sci	3
<u>Subtotal</u>	47	<u>Subtotal</u>	47
Major Core Courses <sup>3</sup> :  FO 1101 Forest Resource Survey 1 FO 2113 Dendrology 3 FO 2213 Forest Measurements 3 FO 3012 Intro to Forest Communities 2 FO 3015 Forest Descript. and Analysis 5 FO 3103 Computer Appl. For. Res. 3 FO 4113 Forest Resource Economics <sup>4</sup> 3 FO 4123 Forest Ecology 3 FO 4213 Forest Biometrics 3 FO 4221 Practice of Silviculture Lab 1 FO 4223 Practice of Silviculture 3 FO 4231 Intro to Wood Supply Systems 1 FO 4233 For. Op. and Harv. 3 FO 4313 Spatial Tech. in Nat. Res. 3 FO 4323 For. Res. Mgt. 3 FO 4413 Natural Res. Policy 3 FO 4423 Prof. Practice 3 WFA 3031 Intro to Wild. and Fish. Prac. 1 WFA 4153 Prin. Wildlife Cons. and Mgt. 3 PSS 3303 Soils 3 EPP 3124 Forest Pest Management 4  <u>Subtotal</u> 57  <sup>3</sup> Pre-requisites and co-requisites are strictly enforced in the College of Forest Resources. It is the student's responsibility to be aware of pre-requisites and co-requisites identified in the Course Description section of the Bulletin.  <sup>4</sup> FO 4113 is also used concurrently to meet university social/behavioral sciences requirement.		Major Core Courses <sup>3</sup> :  FO 1101 Forest Resource Survey 1 FO 2113 Dendrology 3 FO 2213 Forest Measurements 3 FO 3012 Intro to Forest Communities 2 FO 3015 Forest Descript. and Analysis 5 FO 3103 Computer Appl. For. Res. 3 FO 4113 Forest Resource Economics <sup>4</sup> 3 FO 4123 Forest Ecology 3 FO 4213 Forest Biometrics 3 FO 4221 Practice of Silviculture Lab 1 FO 4223 Practice of Silviculture 3 FO 4231 Intro to Wood Supply Systems 1 FO 4233 For. Op. and Harv. 3 FO 4313 Spatial Tech. in Nat. Res. 3 FO 4323 For. Res. Mgt. 3 FO 4413 Natural Res. Policy 3 FO 4423 Prof. Practice 3 WFA 3031 Intro to Wild. and Fish. Prac. 1 WFA 4153 Prin. Wildlife Cons. and Mgt. 3 PSS 3303 Soils 3 EPP 3124 Forest Pest Management 4  <u>Subtotal</u> 57  <sup>3</sup> Pre-requisites and co-requisites are strictly enforced in the College of Forest Resources. It is the student's responsibility to be aware of pre-requisites and co-requisites identified in the Course Description section of the Bulletin.  <sup>4</sup> FO 4113 is also used concurrently to meet university social/behavioral sciences requirement.	

<p>Concentration Courses:</p> <p>Courses to be taken in addition to forestry major core curriculum include:</p> <p><u>Environmental Concentration (FO/ENCO)</u> Advisor: Dr. Heidi Renninger, Thompson Hall, room 313</p> <p>FO 3113 Forest Recreation Mgt. 3 WFA 3133 App Aqua. &amp; Terr. Eco. 3 FO 4453 Remote Sensing Appl. 3 FO 4463 Forest Hydro &amp; Watershed Mgt. 3 Emphasis Elective (14)<sup>4</sup> 14</p> <p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p> <p style="text-align: right;"><u>Subtotal</u> 26 <u>Curriculum Total</u> 127</p> <p><u>Forest Management Concentration (FO/FOMG)</u> Advisor: Dr. Krishna Poudel, Thompson Hall, room 315</p> <p>SBP 1103 Intro to Sustainable Bioproducts 3 FO 3113 Forest Recreation Mgt. 3 Business/Science Elective (9)<sup>4</sup> 9 Professional Elective (9)<sup>4</sup> 9 Free Elective (3)<sup>4</sup> 3</p> <p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p> <p style="text-align: right;"><u>Subtotal</u> 27 <u>Curriculum Total</u> 128</p> <p><u>Forest Products Concentration (FO/FP)</u> Advisor: Dr. Joshua Granger, Thompson Hall, room 321</p> <p>SBP 1103 Intro to Sustainable Bioproducts 3 CH 1053 Survey of Chemistry II 3 FP 4013 Wood Anatomy 3 FP Processing Elective (3)<sup>4</sup> 3 FP Elective (12)<sup>4</sup> 12 SBP 3113 Biomaterial Phy. and Mechanics 3</p>		<p>Concentration Courses:</p> <p>Courses to be taken in addition to forestry major core curriculum include:</p> <p><u>Environmental Concentration (FO/ENCO)</u> Advisor: Dr. Heidi Renninger, Thompson Hall, room 313</p> <p>FO 3113 Forest Recreation Mgt. 3 WFA 3133 App Aqua. &amp; Terr. Eco. 3 FO 4453 Remote Sensing Appl. 3 FO 4463 Forest Hydro &amp; Watershed Mgt. 3 Emphasis Elective (14)<sup>4</sup> 14</p> <p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p> <p style="text-align: right;"><u>Subtotal</u> 26 <u>Curriculum Total</u> 127</p> <p><u>Forest Management Concentration (FO/FOMG)</u> Advisor: Dr. Krishna Poudel, Thompson Hall, room 315</p> <p>SBP 1103 Intro to Sustainable Bioproducts 3 FO 3113 Forest Recreation Mgt. 3 Business/Science Elective (9)<sup>4</sup> 9 Professional Elective (9)<sup>4</sup> 9 Free Elective (3)<sup>4</sup> 3</p> <p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p> <p style="text-align: right;"><u>Subtotal</u> 27 <u>Curriculum Total</u> 128</p> <p><u>Forest Products Concentration (FO/FP)</u> Advisor: Dr. Joshua Granger, Thompson Hall, room 321</p> <p>SBP 1103 Intro to Sustainable Bioproducts 3 CH 1053 Survey of Chemistry II 3 FP 4013 Wood Anatomy 3 FP Processing Elective (3)<sup>4</sup> 3 FP Elective (12)<sup>4</sup> 12 SBP 3113 Biomaterial Phy. and Mechanics 3</p>	
--	--	--	--

<p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p>		<p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p>	
<p style="text-align: right;"><u>Subtotal</u> <u>Curriculum Total</u></p>	<p>27 128</p>	<p style="text-align: right;"><u>Subtotal</u> <u>Curriculum Total</u></p>	<p>27 128</p>
<p><u>Urban Forestry Concentration (FO/URBN)</u></p>		<p><u>Urban Forestry Concentration (FO/URBN)</u></p>	
<p>Advisor: Dr. Stephen C. Grado, Thompson Hall, room 357</p>		<p>Advisor: Dr. Stephen C. Grado, Thompson Hall, room 357</p>	
<p>PS 1113 American Government PSS 2423 Plant Materials I LA 3623 Urban Planning REF 3333 Principles of Real Estate PSS 3473 Plant Material II FO 3113 Forest Recreation Mgt. PSS 4353 Arboricul. and Landsc. Mainten. FO 4472/4471 GIS Nat. Res. Mgt. + Lab FO 4683 Intro Urban Community Forestry</p>	<p>3 3 3 3 3 3 3 3 3</p>	<p>PS 1113 American Government PSS 2423 Plant Materials I LA 3623 Urban Planning REF 3333 Principles of Real Estate PSS 3473 Plant Material II FO 3113 Forest Recreation Mgt. PSS 4353 Arboricul. and Landsc. Mainten. FO 4472/4471 GIS Nat. Res. Mgt. + Lab FO 4683 Intro Urban Community Forestry</p>	<p>3 3 3 3 3 3 3 3 3</p>
<p style="text-align: right;"><u>Subtotal</u> <u>Curriculum Total</u></p>	<p>27 128</p>	<p style="text-align: right;"><u>Subtotal</u> <u>Curriculum Total</u></p>	<p>27 128</p>
<p><u>Wildlife Management Conservation (FO/WFMG)</u></p>		<p><u>Wildlife Management Conservation (FO/WFMG)</u></p>	
<p>Advisor: Dr. Heather D. Alexander, Thompson Hall, room 327</p>		<p>Advisor: Dr. Heather D. Alexander, Thompson Hall, room 327</p>	
<p>Physical Science Elective (3)<sup>4</sup> WFA 3133 Appl. Aqua. &amp; Terr. Ecol. Professional Elective (3)<sup>2</sup> BIO 3524 Biology of Vertebrates WFA 4433 Mammalogy WFA 4443 Ornithology FO 4353 Natural Resource Law WFA 4243 Wildlife Techniques</p>	<p>3 3 3 4 3 3 3 3</p>	<p>Physical Science Elective (3)<sup>4</sup> WFA 3133 Appl. Aqua. &amp; Terr. Ecol. Professional Elective (3)<sup>2</sup> BIO 3524 Biology of Vertebrates WFA 4433 Mammalogy WFA 4443 Ornithology FO 4353 Natural Resource Law WFA 4243 Wildlife Techniques</p>	<p>3 3 3 4 3 3 3 3</p>
<p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p>		<p><sup>4</sup>Electives are selected from the list of electives approved by the Department of Forestry faculty.</p>	
<p style="text-align: right;"><u>Subtotal</u> <u>Curriculum Total</u></p>	<p>25 126</p>	<p style="text-align: right;"><u>Subtotal</u> <u>Curriculum Total</u></p>	<p>25 126</p>

		<b>Forest Business Concentration (FO/BUSN)</b> <b>Advisor: Dr. Robert K. Grala, Thompson Hall, room 343</b>	
		<b>SBP 1103 Intro to Sustainable Bioproducts</b> <b>FO 3113 Forest Recreation Mgt.</b> <b>Forest Business Elective<sup>5</sup></b> <b>Forest elective</b> <b>Business Elective from the College of Business (from 15 to 21 credit hours depending on a selected business minor)</b>	3 3 0-6 0- 15-21
		<sup>5</sup> If a business minor has a course load less than 21 credit hours required by a minor in business administration (e.g. 18 credit hours required by a minor in finance), a student will substitute the difference in credit hours by enrolling in an additional forest business elective. If a business minor requires less than 18 credit hours (e.g. 15 credit hours required by a minor in real estate), a student will substitute the difference in credit hours by enrolling in an additional forest business elective first and then enrolling in professional electives to maintain the program total of 128 credits hours.	
		Subtotal Curriculum Total	27 128

## JUSTIFICATION AND STUDENT LEARNING OUTCOMES

The U.S. forest sector has been undergoing numerous structural changes as it has been facing an increasing international competition. For example, many forest products companies have divested their forest lands and these lands are currently being managed by Timber Investment Management Organizations (TIMOs) and Real Estate Investment Trusts (REITs). As a result, forestry companies have been operating in increasingly global and more competitive business environment.

Privately- and publicly-owned forestry companies have been increasingly interested in hiring forestry graduates that are not only well-educated in terms of traditional forestry but also who have strong business, timber procurement, communication, and analytical skills. This is aimed to help these companies operate their businesses more efficiently and be able to more effectively adapt to changing market conditions by better understanding existing and future timber markets, optimizing supply chains, and identifying new business opportunities. Thus, it is important that graduates from Mississippi State University's forestry program attain these skills to meet forest industry needs and remain competitive in the job market.

Most of forest land in Mississippi and the southern United States is privately owned and forest industry has a heavy footprint in the region. As a result, majority of graduates from our program find employment in a private forestry sector. While our program has been offering individual courses related to timber procurement and timber harvesting, it does not offer a comprehensive suite of courses related to forest business that would enable our students to become more competitive when compared to graduates from peer institutions. Moreover, our program graduates, industry stakeholders and Forestry Advisory Board members indicated that while the program provides a strong traditional forestry education, our students would be more competitive if they attained more forest business skills.

Offering a dedicated Forest Business Concentration will also help our program to attract additional students who

otherwise might select forestry programs at other institutions due to perceived more formal and more comprehensive forest business course offerings. The proposed forest business concentration will offer a unique and tailored education path in forest business where students will complete program core courses and supplement them with elective forest business courses and elective courses from the College of Business to develop new skills that are necessary to become competitive in the forestry job market. Upon completion of the program and depending on completed elective courses, students will be eligible for one of 11 minors currently offered by the College of Business.

## **SUPPORT**

The proposed new Forest Business Concentration has been unanimously approved by the Department of Forestry Undergraduate Curriculum Committee and faculty (see attached letters). Additional letters of support from the departments and colleges that potentially might be impacted by the creation of the new concentration have been attached and include Department of Sustainable Bioproducts, College of Business, and external stakeholders: Georgia-Pacific (GP), Resource Management Service, LLC. (RMS), and Westervelt Company.

## **PROPOSED 4-LETTER ABBREVIATION**

FO/BUSN

## **EFFECTIVE DATE**

January 2, 2020

**Example of Forest Business concentration curriculum with  
a minor in Business Administration (21 credit hours).**

**2019-2020 Forestry Major  
Forest Business Concentration  
(FO/BUSN) Total Hours = 128**

**Freshman Year**

<b>Fall Semester</b>		<b>Spring Semester</b>	
BIO 1134	Biological Sciences I	BL 2413***	Legal Environment of Business
CH 1043	Survey of Chemistry I	BIO 1144	Biological Sciences II
EN 1103	English Comp I (ACT English subscore 17)	CO 1003	Fund. of Public Speaking
<b>FO 1101</b>	<b>Forest Resource Survey</b>	EN 1113	English Composition II (EN 1103)
MA 1313	College Algebra (ACT math subscore 19)	ACC 2013***	Financial Accounting

**Sophomore Year**

<b>Fall Semester</b>		<b>Spring Semester</b>	
<b>FO 2113</b>	<b>Dendrology</b> (BIO 1144 or 2113)	<b>FO 3103</b>	<b>Computer Appl. For. Resources</b>
FO 3113	Forest Recreation Mgt.	<b>FO 2213</b>	<b>Forest Measurements</b> (ST 2113)
PH 1113	General Physics I (MA 1323 or ACT math subscore 26)	EC 2113***	Macroeconomics
PSS 3303	Soils (CH 1043)		Fine Arts Elective (3)
BQA 2113***	Business Statistical Methods (MA 1613 or MA 1713 and BIS 1012 or equivalent)		Humanities Elective (3)
SBP 1103	Intro to Sustainable Bioproducts		

**Summer Field Program**

<b>FO 3012</b>	<b>Introduction to Forest Communities</b> (PSS 3303, FO 2113)
<b>FO 3015</b>	<b>Forest Description and Analysis</b> (FO 2213, ST 2113)
<b>FO 4231</b>	<b>Introduction to Wood Supply Systems</b> (co-req FO 3015)
<b>WFA 3031</b>	<b>Introduction to Wildlife and Fisheries Practices</b> (JR)

**Junior Year**

<b>Fall Semester</b>		<b>Spring Semester</b>	
AELC 3203	Prof. Writing in AG, NR & Human Sci (JR) (EN 1103, EN 1113)	<b>FO 4113</b>	<b>Forest Res. Econ.</b> (AEC 2713)
EPP 3124	Forest Pest Management	<b>FO 4213</b>	<b>Forest Biometrics</b> (ST 2113 or equivalent)
<b>FO 4123</b>	<b>Forest Ecology</b> (FO 3012)	<b>FO 4223</b>	<b>Practice of Silviculture</b> (FO 4123)
<b>FO 4233</b>	<b>For. Op. and Harv.</b> (FO 3015, FO 4231)	<b>FO 4221</b>	<b>Practice of Silviculture Lab</b> (FO 4123)
Humanities Elective (3)			Forest Business Elective (3)**
		EC 2123***	Microeconomics

**Senior Year**

<b>Fall Semester</b>		<b>Spring Semester</b>	
<b>FO 4313</b>	<b>Spatial Tech. in Nat. Res.</b> (FO 3015)	<b>FO 4413</b>	<b>Natural Res. Policy</b> (SR)
<b>FO 4323</b>	<b>For. Res. Mgt.</b> (FO 4113, FO 4213, FO 4223, FO 4233)	<b>FO 4423</b>	<b>Prof. Practice</b> (FO 4323)
<b>WFA 4153</b>	<b>Prin. Wildlife Cons. and Mgt.</b> (SO)(WFA 3133 or FO 4123)		Forest Business Elective (3)
MGT 3113***	Principles of Management & Production	BIS 3233***	Management Information Systems

**\*Major core courses are bolded. Grades of C or better are required in these courses.**

**\*\*Forest business elective courses required for Forest Business Concentration.**

**\*\*\* Business courses required for Forest Business Concentration. These courses qualify for a business minor from College of Business. Only one D is allowed. No course substitutions are allowed beyond those specified in minor requirements.**



**Students in Forest Business Concentration are eligible for a one the following minors from College of Business by completing the specified courses:**

**Minor in Business Administration**

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **6 hours** are forest business electives and **21 hours** are business courses.*

Forest business electives:

FO 4253 Timber Procurement  
FO 4XX3 Timberland Investment  
FO 4XX3 Computer Applications for Forest Resources II

Select any 7 of the following business courses:

BL 2413 Legal Environment of Business  
ACC 2013\* Financial Accounting  
ACC 2023 Managerial Accounting  
EC 2113 Macroeconomics  
EC 2123 Microeconomics  
FIN 3123\* Financial Management  
MKT 3013 Principles of Marketing  
MGT 3113\* Principles of Management & Production  
BIS 3233 Management Information Systems  
BQA 2113\* Business Statistical Methods I  
BQA 3123\* Business Statistical Methods II

\*Indicates a pre-requisite for the MBA program.

**Minor in Economics**

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives, **3 hours** are professional electives, and **15 hours** are business courses.*

Forest business electives:

FO 4253 Timber Procurement  
FO 4XX3 Timberland Investment  
FO 4XX3 Computer Applications for Forest Resources II

Required business courses\*\*:

EC 2113 Principles of Macroeconomics  
EC 2123 Principles of Microeconomics

Select any 3 of the following business courses\*\*:

EC 3113 Intermediate Macroeconomics\*  
EC 3123 Intermediate Microeconomics\*  
EC 3333 Managerial Economics  
EC 3423 Economics of Regulation & Antitrust  
EC 3513 Comparative Economic Policy  
EC 4000 Directed Individual Study  
EC 4183 US Economic History  
EC 4213 Personnel Economics

**Minor in Management**

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **8 hours** are forest business electives and **19 hours** are business courses.*

Forest business electives:

FO 4253 Timber Procurement  
FO 4XX3 Timberland Investment  
FO 4XX3 Computer Applications for Forest Resources II

Required business courses:

MGT 3113 Principles of Management & Production  
MGT 3513 Intro Human Resource Management  
MGT 3813 Organizational Behavior

Select any 3 of the following business courses:

MGT 3323 Entrepreneurship  
MGT 3333 Field Studies/Entrepreneurship  
MGT 3823 Responsible Leadership  
MGT 4153 Management Seminar  
MGT 4533 Advanced Human Resource Management  
MGT 4543 Compensation Management  
MGT 4563 Staffing in Organizations  
MGT 4613 Cross-Cultural Management  
MGT 4713 Quality in Organizations

**Minor in Marketing**

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives and **18 hours** are business courses.*

Forest business electives:

FO 4253 Timber Procurement  
FO 4XX3 Timberland Investment  
FO 4XX3 Computer Applications for Forest Resources II

Required business courses:

MKT 3013 Principles of Marketing  
MKT 4413 Consumer Behavior

Select any 4 of the following business courses:

MKT 3323 International Logistics  
MKT 3213 Retailing  
MKT 3933 International Marketing  
MKT 4033 International Transportation  
MKT 4113 Personal Selling  
MKT 4123 Advertising  
MKT 4143 Sales Management  
MKT 4213 Internet Marketing

EC 4223 Labor Law & Employment Policy  
 EC 4233 Labor Economics  
 EC 4303 International Economic Development  
 EC 4323 International Economics  
 EC 4423 Public Finance  
 EC 4433 State & Local Finance  
 EC 4523 History of Economic Thought  
 EC 4643 Economic Forecasting & Analysis  
 EC 4713 Industrial Organization  
 EC 4990 Special Topics in Economics

MKT 4313 Physical Distribution Management  
 MKT 4333 International Supply Chain Management  
 MKT 4423 Branding  
 MKT 4533 Marketing Research  
 MKT 4613 Services Marketing

\*Indicates courses offered fall and spring and once during the summer.

\*\* ECON minors must have grades of C in all upper level (3000-4000 level) ECON courses.

### Minor in Real Estate

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives, **3 hours** are professional electives, and **15 hours** are business courses.*

#### Forest business electives:

FO 4253 Timber Procurement  
 FO 4XX3 Timberland Investment  
 FO 4XX3 Computer Applications for Forest Resources II

#### Required business courses:

REF 3333 Principles of Real Estate  
 REF 3433 Real Property Evaluation  
 REF 4333 Real Estate Law

#### Select any 2 of the following business courses:

REF 4153 Real Estate Investments  
 REF 4253 Mortgage Financing  
 EC 4313 Intro to Regional Economic Development

### Minor in Entrepreneurship

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives, **2 hours** are professional electives, and **16 hours** are business courses.*

#### Forest business electives:

FO 4253 Timber Procurement  
 FO 4XX3 Timberland Investment  
 FO 4XX3 Computer Applications for Forest Resources II

#### Required business courses:

MGT 3323 Entrepreneurship  
 MGT 3333 Field Studies in Entrepreneurship  
 BL 4243 Legal Aspects of Entrepreneurship  
 FIN 4323 Entrepreneurial Finance  
 MKT 4423 Strategic Brand Management

### Minor in Insurance

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives, **3 hours** are professional electives, and **15 hours** are business courses.*

#### Forest business electives:

FO 4253 Timber Procurement  
 FO 4XX3 Timberland Investment  
 FO 4XX3 Computer Applications for Forest Resources II

#### Required insurance courses:

INS 3103 Principles of Insurance (Jr standing)  
 INS 3203 Property and Casualty Insurance  
 INS 3303 Life and Health Insurance  
 INS 4503 Enterprise Risk Management (INS 3103) (Only in Spring)

#### Select any 1 of the following insurance courses:

INS 3403 Financial Planning (FIN 3123)  
 INS 3503 Employee Benefits

### Minor in Finance

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives and **18 hours** are business courses.*

#### Forest business electives:

FO 4253 Timber Procurement  
 FO 4XX3 Timberland Investment  
 FO 4XX3 Computer Applications for Forest Resources II

#### Required finance courses:

FIN 3113 Financial Systems  
 FIN 3123 Financial Management  
 FIN 3723 Financial Markets & Institutions  
 FIN 4223 Intermediate Financial Management  
 FIN 4423 Investments

**Minor in Business Analytics**

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives, **3 hours** are professional electives, and **15 hours** are business courses.*

Forest business electives:

FO 4253 Timber Procurement  
FO 4XX3 Timberland Investment  
FO 4XX3 Computer Applications for Forest Resources II

Select a 3 of the following analytics skill courses:

BQA 4413/6413 Business Forecasting & Predictive Analytics  
BQA 4423/6423 Business Decision Analytics  
ECON 4443/6643 Econ Forecasting & Analysis  
BIS 3753 Business Database Systems

Select any 2 of the following analytics application courses:

ACC 3003 Accounting Systems I  
ACC 3053 Accounting Systems II  
BIS 4533 Decision Support Systems  
MKT 4333 International Supply Chain Management  
MKT 4533 Marketing Research  
MKT 4033 International Transportation

**Minor in Accounting**

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives, **3 hours** are professional electives, and **15 hours** are business courses.*

Forest business electives:

FO 4253 Timber Procurement  
FO 4XX3 Timberland Investment  
FO 4XX3 Computer Applications for Forest Resources II

Required accounting courses\*:

ACC 3023 Intermediate Accounting I  
ACC 3033 Intermediate Accounting II

Select any 3 of the following accounting courses\*:

ACC 3003 Accounting Info Systems I  
ACC 3013 Cost Accounting  
ACC 3053 Accounting Info Systems II  
ACC 4013 Income Tax I  
ACC 4063 Income Tax II  
ACC 4033 Auditing

**Minor in Business Information Systems**

*A student satisfies the requirements of Forest Business Concentration and concurrently qualifies for this minor if she/he takes **27 concentration-specific credit hours** of which **9 hours** are forest business electives, **3 hours** are professional electives, and **15 hours** are business courses.*

Forest business electives:

FO 4253 Timber Procurement  
FO 4XX3 Timberland Investment  
FO 4XX3 Computer Applications for Forest Resources II

Required business courses\*:

BIS 1523 Web Development I  
BIS 2523 Web Development II

Select any 3 of the following business courses\*:

BIS 3523 Advanced Languages I  
BIS 3753 Business Database Systems  
BIS 4113 BIS Security Management  
BIS 4513 Microcomputers and Networks  
BIS 4523 Business Programming w/ COBOL (repl. Adv Lang II)  
BIS 4533 Decision Support Systems  
BIS 4753 Structured Systems Analysis & Design  
BIS 4763 BIS Senior Seminar

\*A minimum GPA of 3.00 is required in the 15 hours.

ACC 4023 Advanced Accounting  
ACC 4043 Municipal & Gov Accounting  
ACC 4053 International Accounting

\*Courses are offered through the School of Accountancy

## Elective List

### Forestry - Forest Business Concentration

#### Professional Electives (Can be applied as Business/Science electives)

ABE 2873	Land Surveying (MA 1323)
BIO 3103	Genetics (MA 1313, BIO 1134, or BIO 2113)
BIO 3104	Ecology (BIO 1134)
BIO 4203	Taxon. of Spermatophyte (BIO 2113 & 2213)
BIO 4213	Plant Ecology
EPP 4154	General Entomology
EPP 4263	Prin. Insect Pest Mgt.
FO	ANY UPPER LEVEL FO COURSE 3000 or higher*
GR 2313	Maps Remote
NREC	ANY UPPER LEVEL NREC COURSE 3000 or higher*
SBP	ANY UPPER LEVEL SBP COURSE 3000 or higher*
ST 4213	Nonparametric Methods (ST 2113)
WFA	ANY UPPER LEVEL WFA COURSE 3000 or higher*

\*CFR courses not otherwise specified on our curricula may be applied through the substitution process.

#### Humanities (6 hours)

ARC 2313/3313	History of Architecture
EN 2203	Intro. to Literature (EN 1103, EN1113)
EN 2213/2223	English Literature (EN 1103, EN1113)
EN 2243/2253	American Literature I (EN 1103, EN1113)
EN 2273/2283	World Literature I (EN 1103, EN1113)
FL 1113/1123	Elem. Foreign Language <sup>1</sup>
HI 1063/1073	Early or Modern US History
HI 1163/1173	World History I or II
HI 1213/1223	Early or Modern Western World
HI 1313/1323	East Asian Civilizations I or II
PHI 1103	Intro. to Philosophy
PHI 1123	Intro. to Ethics
REL 1103	Intro. to Religion
REL 3213	World Religions I
REL 3223	World Religions II

<sup>1</sup> French, German, Greek, Japanese, Latin, Russian and Spanish

#### Business/Science (Upper level courses can be applied as PE)

ACC 2013+	Prin. Financial Accounting
ACC 2023+	Prin. Managerial Acc. (ACC 2013)
BIS 3233+	Mgt. Information Systems
BL 2413+	Legal Environ. Business
BQA 3123+	Bus. Stat. Meth. II (BQA 2113)
CH 1053	Survey of Chemistry II (CH 1043)
EC 2113+	Prin. Macroeconomics (SO)
EC 2123+	Prin. Microeconomics (EC 2113)
FIN 3123+	Fin. Mgt. (ACC 2013, EC 2123, BQA 2113)
GG 1113	Survey of Earth Science I
GG 4503	Geomorphology (consent of instructor)
GR 1114	Elements of Physical Geography
GR 3113	Conservation of Natural Resources
GR 4603	Climatology (GR 1114 or GR 1123)
INS 3103	Principles of Insurance (JR)
MGT 3114+	Prin. of Mgt. Prod. (JR)(EC 2113, BQA 2113)
MGT 3323	Entrepreneurship (EC 2123)
MGT 3513	Intro. Human Resource Mgt.
PH 1013	Physical Sci. Survey (MA 0103 or ACT math subscore 19)
PH 1063	Descriptive Astronomy
PHI 3013	Business Ethics
PSS 4313	Soil Fertility and Fertilizers (JR)(PSS 3303)
PSS 4323	Soil Classification (PSS 3303)
PSS 4333	Soil Conservation and Land Use (PSS 3303)
REF 3333	Principles of Real Estate (JR)
REF 3433	Real Property Evaluation (REF 3333)

<sup>+</sup>Courses can apply to the General Business Minor

Courses accepted for the GIS minor may be applied as Professional or Business/Science Electives.

#### Fine Arts (3 hours)

ARC 1013	Architectural Appreciation
ART 1013	Art History I
ART 1023	Art History II
ART 1113	Art Appreciation
CO 1503	Intro. to Theater
LA 1803	Landscape Architecture Appr.
MU 1103/AAS 1103	African American Music
MU 1113	History and Appr. of Music
PE 1323	History and Appr. of Dance
PSS 2343	Floral Design
TKI 2413	Hist. and Appr. of the Arts

Approved Substitutions List for Forest Management Concentration	
Required Courses	Approved Substitutions
AEC 2713 Intr. Food & Resource Eco	EC 2113 Macroeconomics (SO) or EC 2123 Microeconomics (SO)(EC 2113)
AELC 3203 Prof Writing in Ag, NR & Human Sci	EN 3313 Writ. for the Workplace (EN 1113) or MGT 3213 Organ. Comm. (JR)(EN 1113)
PH 1113 General Physics	CH 1053 Survey of Chem II, GR 1114 Physical Geography, or PH 2213 Physics I (MA 1713), CH 1223 (CH 1213)
ST 2113 Intro to Statistics	MA 2113 Intro to Statistics, MA 3123 or ST 3123 Statistics Inf. (All require C in MA 1313 or ACT math subscore 24)
CH 1043 Survey of Chemistry I	Any higher level chemistry course.



MEMO TO: Dr. Dana Franz, Chair, University Committee on Courses and Curricula (UCCC)

FROM: Dr. Stephen C. Grado<sup>SCG</sup>, Chair, Department of Forestry Undergraduate Committee (UC)

DATE: October 30, 2019

SUBJECT: Forest Business Concentration, Forestry Major

As per UCCC policy, I am providing documentation that the Department of Forestry's UC (and the entire faculty) has reviewed and approved the Forest Business Concentration in the Forestry Major as proposed by Dr. Robert Grala, Professor.

The UC members have indicated below their approval (or disapproval) relative to this new addition. All Committee members approved the documents that were developed and submitted. All faculty voted to support these changes.

Approve

Disapprove

Print Name

Signature

Print Name

Signature

Stephen C. Grado 

Krishna P. Poudel 

Jia Yang 

Changyou Sun 

Heidi Renninger 

Yashua Grange 

Courtney Siegert 

Heather Alexander 

Donna L. Gebauer 



**MISSISSIPPI STATE**  
**UNIVERSITY**

*Department of Sustainable Bioproducts*

October 28, 2019

Dr. Donald Grebner  
Professor and Department Head  
Forestry  
College of Forest Resources  
Mississippi State, MS 39762

Dear Dr. Grebner:

On behalf of the Department of Sustainable Bioproducts please find this letter in support of the Forestry Department's newly proposed "Forest Business Concentration" within the undergraduate forestry curriculum. On 10/16/2019 I received your email that contained information about the proposed new degree program. After you emailed me that information on I forwarded the information to our Sustainable Bioproducts Department faculty for review and comment. Then, at my request, you came over to visit with a couple Sustainable Bioproducts faculty members (Frank Owens and Beth Stokes) and I about the curriculum to be sure that it does not duplicate other activity at Sustainable Bioproducts. We very much appreciated your time and reassurance in this regard and are thus supportive. As a peer department head in the College of Forest Resources, I am pleased that you are making these tangible efforts to grow our collegiate enrollment and I look forward to the favorable outcome. With that I am,

Respectfully yours,

Rubin Shmulsky  
Professor and Department Head



**MISSISSIPPI STATE**  
UNIVERSITY™

**COLLEGE OF BUSINESS**

Office of the Dean

P.O. Box 5288

114 McCool Hall

Mississippi State, MS 39762

P. 662.325.2580

F. 662.325.2410

[www.business.msstate.edu](http://www.business.msstate.edu)

October 23, 2019

Donald Grebner  
Head  
Department of Forestry

Re: Forest Business Concentration

Dear Dr. Grebner:

I have reviewed your proposal to add a Forest Business Concentration and shared it with Dean Oswald. We both support adding this concentration that will help forestry students earn one of the minors offered by the College of Business. We are in favor of the proposal to add a Forest Business Concentration and support its approval.

Regards,

Kevin Rogers  
Associate Dean  
[kevin.rogers@msstate.edu](mailto:kevin.rogers@msstate.edu)  
662-325-1982





133 Peachtree Street  
Atlanta, GA 30303  
601-320-1291  
[jvrushin@gapac.com](mailto:jvrushin@gapac.com)

**John V. Rushing**  
**Region Manager**

October 24, 2019

Dr. Don Grebner  
George L Switzer Professor of Forestry and Head  
Department of Forestry  
Box 9681  
Mississippi State, MS 39762

**RE: Proposed Forest Business Area of Concentration**

Dear Dr. Grebner,

Georgia-Pacific WFS LLC is an industry-leading wood and fiber procurement organization responsible for providing our manufacturing facilities with the raw materials to produce lumber, plywood, OSB, and paper products. As a procurement organization, our employees deal with various aspects of the supply chain and are required to analyze opportunities and make sound business decisions daily.

Our procurement model has evolved over the years from being on the ground, cruising and buying stumpage tracts every day, to more of a trading model - utilizing analytics and technology as part of our trading efforts. As a result, the foresters that we are seeking to hire today are much different than those we have hired in the past. Someone who has a strong knowledge of both forestry and business will generally be preferred to fill open roles in our organization.

Georgia-Pacific WFS LLC is proud to endorse the new Forest Business Concentration that the Mississippi State University College of Forest Resources is proposing as a means of producing graduates who have a strong background in both forestry and business.

Sincerely,

*John V. Rushing*

John V. Rushing  
Region Manager  
Georgia-Pacific WFS LLC

Donald L. Grebner  
George L. Switzer Professor of Forestry and Head  
Department of Forestry  
Re: creation of a Forest Business Concentration in the Department of Forestry

Dear Dr. Grebner:

We at Resource Management Service, LLC (<https://resourcemgt.com/>) fully support the creation of a Forest Business Concentration in the Department of Forestry at Mississippi State University.

Resource Management Service (RMS) is a Timberland Investment Management Organization (TIMO) and as such we manage timberland businesses across the world. As you can see from our website, we manage over 2.4 million acres of timberland valued at \$4.4 billion. This timberland is in the US, Brazil, New Zealand, and Australia.

The entire value chain of timberland is big business and whether a student goes into the private sector with a company like ours or they go to work for a non-government organization or anywhere else in the global timberland space; they must understand basic business principles like budgeting, the time value of money, and many more.

I am the Delta Region Manager for RMS. My team and I manage approximately 200,000 acres of timberland in Mississippi and 240,000 acres of timberland in Louisiana.

RMS invests strongly in forestry students. In Mississippi we hire 1 or 2 summer interns from Mississippi State a year. Companywide RMS hired 4 interns from MSU in 2019. Also, in Mississippi this year, we hired a recent graduate of Mississippi State as a full-time forester. And, for 2018/2019, in 8 southern forestry schools; RMS has 8 students on scholarship.

Not all southern forestry schools have access to the RMS scholarship. Our granting of the scholarship is based on our judgement of how well a school prepares forestry students for the work world. I am proud to say that we think Mississippi State does an excellent job of preparing their forestry students. Adding the Forestry Business Concentration strengthens this preparation.

From all of this, I hope you can see the importance we put on supporting your department's creation of a Forest Business Concentration. The business of forestry is a key area of development that a graduating forester needs to understand. And a forestry graduate with a concentration in forest business will be prepared to work in the world I work in and any other aspect of forest/timberland management.

Let me know if you need anything else from me.

Robby



November 8, 2019  
Dr. Donald L. Grebner  
George L. Switzer Professor of Forestry and Head  
Department of Forestry  
Box 9681  
Mississippi State University, MS 39762

Dear Dr. Grebner,

I am writing in reference to the proposed addition of a Forest Business Concentration within the College of Forest Resources at Mississippi State University. The Westervelt Company is in full support of this enhancement to the College. We feel strongly that providing this option for students seeking a career in the industrial sector is beneficial not only for the students, but also companies providing employment and for the reputation of the College.

Forestry land and manufacturing organizations are looking for employment candidates that exhibit strong fundamentals in traditional forestry as well as business acumen. Regardless of which forestry school we recruit from, we always favor students that demonstrate exceptional communication and forest finance skills. We value our relationship with Mississippi State University and believe having the business minor option will enrich our interactions.

I would also add that I appreciate the Advisory Board process. It is apparent that the feedback from board members is genuinely sought and considered. Our company has had a presence on the board for several years and we are glad to have the opportunity to partner with the College in planning for the future.

Sincerely,

Jim King  
Vice President & General Manager, Forest Resources Division

**THE WESTERVELT COMPANY**

P. O. Box 48999 | Tuscaloosa, Alabama 35404 | P: 205.562.5000 | F: 205.562.5012 | [westervelt.com](http://westervelt.com)

APPROVAL FORM FOR  
**DEGREE PROGRAMS**  
MISSISSIPPI STATE UNIVERSITY

**NOTE:** This form is a cover sheet that must accompany the degree program change proposal. The actual proposal should be prepared in accordance with format requirements provided in the *Guide and Format for Curriculum Proposals* published by the UCCC. Both cover sheet and proposal should be submitted to UCCC Mail Stop 9702 (281 Garner Hall), Phone: 325-9410.

**College:** Veterinary Medicine

**Department:** Office of Research & Graduate Studies

**Contact Person:** Stephen B. Pruett/Tia Perkins

**Mail Stop:** 9825

**E-mail:** Pruett@cvm.msstate.edu or tia.perkins@msstate.edu

**Nature of Change:** degree name change   **Date Initiated:** 11/21/19   **Effective Date:** Fall 2020

**Current Degree Program Name:** Veterinary Medical Science

**Major:** Ph.D. Veterinary Medical Science

**Concentration:**

1. Veterinary Medical Research (VMRC)
2. Computational Biology (VCBC)
3. Infectious Diseases (VIDC)
4. Population Medicine Thesis (POPM)

**New Degree Program Name:** Veterinary and Biomedical Sciences

**Major:** Ph.D. Veterinary and Biomedical Science

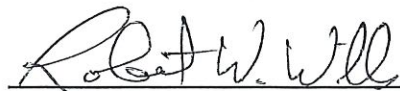
**Concentration:**

1. Veterinary Medical Research (VMRC)
2. Computational Biology (VCBC)
3. Infectious Diseases (VIDC)
4. Population Medicine Thesis (POPM)

**Summary of Proposed Changes:** This program educates Ph.D. students to enable them to contribute to research and compete for positions in various areas of veterinary medical sciences. However, many of the research areas at the College of Veterinary Medicine can also apply to general biomedical research. For example, some focus areas include infectious diseases, bioinformatics, epidemiology, immunology, bacteriology, and virology. Essentially all of these research focus areas can be applied to solving animal disease problems or to solving general biomedical problems that could be applied to many species, and some of both types of research is done here.

Approved:

Date:



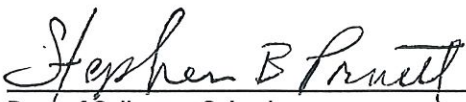
Department Head

11/21/19



Chair, College or School Curriculum Committee

11/21/19



Dean of College or School

11/21/19

Chair, University Committee on Courses and Curricula

Chair, Graduate Council(if applicable)

Chair, Deans Council



**MISSISSIPPI STATE**  
UNIVERSITY™

**COLLEGE OF VETERINARY MEDICINE**

Department of Basic Sciences

P.O. Box 6100

240 Wise Center Drive

Mississippi State, MS 39762

P. 662.325.1130

[www.cvm.msstate.edu](http://www.cvm.msstate.edu)

November 21, 2019

University Committee on Courses and Curricula  
Mississippi State University

Dear UCCC:

The College of Veterinary Medicine Graduate Program Advisory Committee (GPAC) serves as the College's graduate curriculum committee. As such we reviewed the proposal for changing the degree program name for Veterinary Medical Science to Veterinary and Biomedical Sciences. This proposal includes the M.S. and Ph.D. program at CVM but does not affect the Ph.D. in Environmental Toxicology. After some discussion we put this proposal to the entire graduate faculty for a vote. The result was overwhelming in favor of adding this to our program. Therefore, the subsequent GPAC vote was unanimous in favor of this proposal.

Sincerely,

Larry A. Hanson. Ph.D.  
GPAC Chair, VMS Graduate Coordinator  
Professor





**MISSISSIPPI STATE**  
UNIVERSITY™

**COLLEGE OF VETERINARY MEDICINE**

Office of Research and Graduate Studies

P.O. Box 6100  
240 Wise Center Drive  
Mississippi State, MS 39762  
Pruett@cvm.msstate.edu

November 18, 2019

University Committee on Courses and Curricula  
Mississippi State University

Dear UCCC:

I am writing to provide justification for the name change we are requesting for our M.S. and Ph.D. programs in "Veterinary Medical Sciences". Many of the research projects at CVM involve basic or applied projects in animal health, and "Veterinary Medical Sciences" is a good descriptor of such projects. However, a significant percentage of our graduate students have thesis or dissertation research projects that focus on human health and only utilize animals as models for human disease. In addition, there are some projects that utilize human cells or pathogenic organisms and do not involve animal research at all. Many of our peer and peer-plus veterinary colleges in the U.S. have noticed the same issue and have addressed it by including the term "biomedical" in their M.S. and/or Ph.D. program names. For example, the Virginia-Maryland Regional College of Veterinary Medicine uses the name "Biomedical and Veterinary Sciences". Tufts University's Cummings School of Veterinary Medicine, University of Wisconsin School of Veterinary Medicine, North Carolina State University School of Veterinary Medicine, Texas A & M College of Veterinary Medicine, Oklahoma State University College of Veterinary Medicine, and University of Georgia College of Veterinary Medicine use the names "Biomedical Sciences" or "Comparative Biomedical Sciences" for graduate degrees. Including both "Veterinary Medical Sciences" and "Biomedical Sciences" in the name for our M.S. and Ph.D. programs will provide a valid descriptor of the types of research conducted at MSU-CVM. Therefore, we are proposing to change our M.S. and Ph.D. programs in "Veterinary Medical Sciences" to M.S. and Ph.D. programs in "Veterinary and Biomedical Sciences". This proposal was discussed at the Spring 2019 meeting of the Graduate Faculty and approved by vote. No changes in the graduate program description or requirements are requested, and the other graduate program at CVM, the Ph.D. in Environmental Toxicology is not included in this name change request.

Sincerely,

Stephen B. Pruett, Ph.D.  
Professor and Interim Associate Dean for Research and Graduate Studies

## GRADUATE DEGREE MODIFICATION OUTLINE FORM

Use the chart below to make modifications to an existing Graduate Degree. All deleted courses and information should be shown in *italics* and all new courses and information in **bold**. Please include the course prefix, number, and title in both columns. Expand rows as needed.

CURRENT Degree Description	PROPOSED Degree Description
Degree: Ph.D. Major: Veterinary Medical Science Concentrations: Veterinary Medical Research (VMRC), Computational Biology (VCBC), Infectious Diseases (VIDC), Population Medicine (POPM)	Degree: Ph.D. Major: Veterinary and Biomedical Science Concentrations: Veterinary Medical Research (VMRC), Computational Biology (VCBC), Infectious Diseases (VIDC), Population Medicine (POPM)
Old degree catalog description:  Admission Criteria To be admitted to the Veterinary Medical Sciences Graduate Program the applicant must either hold a D.V.M. degree from a recognized college of veterinary medicine or have at least a bachelor's degree from a fully recognized four-year institution of higher learning. The scholastic record for all undergraduate, graduate, and professional school coursework will be reviewed and should exceed a minimum GPA of 3.00 for undergraduate work; GPA of 3.00 for graduate work; GPA of 2.75 for the four years of the veterinary curriculum or 2.75 for the last two years of the veterinary curriculum. Also required are three reference letters, a minimum TOEFL score of 550 PBT (213 CBT or 79 iBT) or IELTS score of 6.5 for international students from countries whose primary language is not English, and if a Graduate Record Examination (GRE) score is available it will be considered.  Provisional Admission In special circumstances a student who does not meet admission criteria may be admitted provisionally if approved by the Graduate Program Advisory Committee (GPAC). See Provisional Admission under Admission in this publication for provisional requirements.  Academic Performance If a student does not show satisfactory progress toward meeting academic, research, and/or thesis requirements, his/her performance will be reviewed in a meeting with the student's	New degree catalog description:  With the proposed degree name change, admission and performance criteria will remain unchanged.



graduate committee. This committee may recommend a change in the student's program or recommend that the student be dismissed from the graduate degree program in the College of Veterinary Medicine Veterinary Medical Science Program. Students must follow all guidelines outlined in the Graduate Catalog.

Old Concentration description:

Doctor of Philosophy in Veterinary Medical Science (VMS) – Veterinary Medical Research Concentration (VMRC) (for students with a master's degree)

Two statistics courses <sup>1,2</sup>	6
Three seminar courses (CVM 8011 or equivalent) <sup>1</sup>	3
Additional graduate-level courses (at least 12 hours of all coursework at 8000-level or higher) or additional CVM 9000 credits <sup>1</sup>	31
CVM 9000 Dissertation Research/Dissertation in Veterinary Medicine	20
Total Hours	60

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate level statistics courses can satisfy this requirement with approval of the student's graduate committee. Transfer of credit for any previously taken courses is subject to the MSU Bulletin of the Graduate School policy. Graduate level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

Doctor of Philosophy in Veterinary Medical Science (VMS) – Veterinary Medical Research Concentration (VMRC)(for students with a bachelor's but no master's degree)

Two statistics courses <sup>1,2</sup>	6
Three seminar courses (CVM 8011 or equivalent) <sup>1</sup>	3
Additional graduate-level courses (at least 12 hours of all coursework at 8000-level or higher)	15
CVM 9000 Dissertation Research/Dissertation in Veterinary Medicine	20
Additional graduate-level coursework and/or CVM 9000 credits <sup>3</sup>	46
Total Hours	90

<sup>1</sup> Equivalency of seminars and coursework is determined

New Concentration description:

With the proposed degree name change, all concentration requirements and curricula will remain unchanged.

by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee. Graduate-level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

<sup>3</sup> Students must have 24 hours of graduate coursework to graduate with a Ph.D. in VMS.

Doctor of Philosophy in Veterinary Medical Science (VMS) – Computational Biology Concentration (VCBC) (for students with a master's degree)

BCH 8653 Genomes and Genomics or PSS 8653 Genomes and Genomics	3
CSE 6613 Bio-computing	3
CSE 6623 Computational Biology	3
Three seminar courses (CVM 8011 or equivalent) <sup>1</sup>	3
Two graduate-level statistics courses <sup>1,2</sup>	6
Additional graduate-level courses (at least 12 hours of all coursework at 8000-level) or additional CVM 9000 credits <sup>1</sup>	22
CVM 9000	20
Total Hours	60

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee. Graduate-level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

Doctor of Philosophy in Veterinary Medical Science (VMS) – Computational Biology Concentration (VCBC) (for students with a bachelor's but no master's degree)

BCH 8653 Genomes and Genomics or PSS 8653 Genomes and Genomics	3
CSE 6613 Bio-computing	3
CSE 6623 Computational Biology	3
Three seminar courses (CVM 8011 or equivalent) <sup>1</sup>	3
Two graduate-level statistics courses <sup>1,2</sup>	6
Additional graduate-level courses (at least 12 hours of all coursework at 8000-level or higher)	6
CVM 9000 Dissertation Research/Dissertation in Veterinary Medicine	20
Graduate-level coursework and/or additional CVM 9000 credits <sup>3</sup>	46
Total Hours	90

<sup>1</sup> Equivalency of seminars and coursework is determined

by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee. Graduate-level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

<sup>3</sup> Students must have 24 hours of graduate coursework to graduate with a Ph.D. in VMS.

Doctor of Philosophy in Veterinary Medical Science (VMS) – Infectious Diseases Concentration (VIDC) (for students with a master's degree)

CVM 8303 Advanced Immunology	3
BCH 6013 Principles of Biochemistry or BCH 6713 Molecular Biology	3
Two statistics courses <sup>1,2</sup>	6
Three seminar courses (CVM 8011 or equivalent) <sup>1</sup>	3
Additional graduate-level courses (at least 12 hours of all coursework at 8000-level or higher)	25
CVM 9000 Dissertation Research/Dissertation in Veterinary Medicine	20
Total Hours	60

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee. Graduate-level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

Doctor of Philosophy in Veterinary Medical Science (VMS) – Infectious Diseases Concentration (VIDC) (for students with a bachelor's but no master's degree)

CVM 8303 Advanced Immunology	3
BCH 6013 Principles of Biochemistry or BCH 6713 Molecular Biology	3
Two statistics courses <sup>1,2</sup>	6
Three seminar courses (CVM 8011 or equivalent) <sup>1</sup>	3
Additional graduate-level courses (at least 12 hours of all coursework must be at 8000-level or higher) <sup>3</sup>	9
CVM 9000 Dissertation Research/Dissertation in Veterinary Medicine	20
Additional graduate-level coursework and/or CVM 9000 credits <sup>3</sup>	46
Total Hours	90

<sup>1</sup> Equivalency of seminars and coursework is determined



by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee. Graduate-level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

<sup>3</sup> Students must have 24 hours of graduate coursework to graduate with a Ph.D. in VMS.

Doctor of Philosophy in Veterinary Medical Science (VMS) –Population Medicine Concentration (POPM)  
(for students with a master's degree)

CVM 8333 Food Safety	3
CVM 8513 Applied Veterinary Epidemiology	3
CVM 8503 Epidemiology and Biostatistics	3
ST 8114 Statistical Methods <sup>1,2</sup>	4
Three seminar courses (CVM 8011, 8091 or equivalent) <sup>1</sup>	3
Additional graduate-level courses (at least 12 hours of all coursework must be at 8000-level or higher) or additional 9000-level credit	24
CVM 9000 Dissertation Research/Dissertation in Veterinary Medicine	20
Total Hours	60

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee. Graduate-level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

Doctor of Philosophy in Veterinary Medical Science (VMS) –Population Medicine Concentration (POPM)  
(for students with a bachelor's but no master's degree)

CVM 8333 Food Safety	3
CVM 8513 Applied Veterinary Epidemiology	3
CVM 8503 Epidemiology and Biostatistics	3
ST 8114 Statistical Methods <sup>1,2</sup>	4
Three seminar courses (CVM 8011, 8091, or equivalent) <sup>1</sup>	3
Additional graduate-level courses (at least 12 hours of all coursework must be at 8000-level or higher) or additional 9000-level credit <sup>3</sup>	54
CVM 9000 Dissertation Research/Dissertation in Veterinary Medicine	20
Total Hours	90

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate

committee. Graduate-level statistics courses that have counted towards a previous degree can satisfy this policy but will not be calculated towards the Ph.D. coursework hours.

<sup>3</sup>Students must have 24 hours of graduate coursework to graduate with a Ph.D. in VMS.

A final examination (oral and/or written) which covers both the major and supportive fields and includes defense of the thesis is required. Students must present an open seminar of the thesis research just prior to oral final examinations. The student must adhere to the University and College regulations regarding his/her graduate program.

**CURRENT CURRICULUM OUTLINE**

\*See above section – Concentration Description and Curriculum Outline/hours are now combined in the Graduate Catalog; therefore, outline is not repeated here.

Required  
Hours

**PROPOSED CURRICULUM OUTLINE**

With the proposed degree name change, all concentration requirements and curricula will remain unchanged.

Required  
Hours

**Appendix 9a: Modifications to Existing Degree Program Proposal  
(Renaming)**

(Submit Appendix 9a in both PDF and Word Document Formats)

**Institution:** Mississippi State University

**Date of Implementation:**

**Present 6-Digit CIP Code(s) & 4-Digit  
Sequence Code(s):**

**New 6-Digit CIP Code:**

Spring Semester 2020

512505

512505

CIP & Sequence codes: [IHL Active Program Inventory](#)

**Present Program Title(s) as Appear(s) on Academic Program  
Inventory, Diploma, and Transcript:**

**New Program Title as will Appear on Academic Program  
Inventory, Diploma, and Transcript:**

Veterinary Medical Sciences

Veterinary and Biomedical Sciences

**Degree(s) to be Awarded:**

**Credit Hour Requirements:**

M.S. and Ph.D.

M.S., 30 hr; Ph.D. 90 hr (or M.S. + 60 hr)

**List any institutions within the state offering similar programs:**

None

**Responsible Academic Unit(s):**

**Institutional Contact:** Stephen B. Pruett

College of Veterinary Medicine

**Phone:** 662-325-6653

**Email:** [Pruett@cvm.msstate.edu](mailto:Pruett@cvm.msstate.edu)

**Number of Students Enrolled in Last Six Years:**

**Number of Graduates Expected in Next Six Years:**

Year One	60
Year Two	68
Year Three	72
Year Four	77
Year Five	79
Year Six	79
Total	454

Year One	18
Year Two	20
Year Three	16
Year Four	11
Year Five	11
Year Six	10
Total	86

**Program Summary:**

This program educates M.S. and Ph.D. students to enable them to contribute to research and compete for positions in various areas of veterinary medical sciences. However, many of the research areas at the College of Veterinary Medicine can also apply to general biomedical research. For example, some focus areas include infectious diseases, bioinformatics, epidemiology, immunology, bacteriology, and virology. Essentially all of these research focus areas can be applied to solving animal disease problems or to solving general biomedical problems that could be applied to many species, and some of both types of research is done here.

\_\_\_\_\_  
Chief Academic Officer Signature

\_\_\_\_\_  
Date

\_\_\_\_\_  
Institutional Executive Officer Signature

\_\_\_\_\_  
Date

**Institution:**

1. Describe how the proposed modification fits within the mission of the institution.

The MSU College of Veterinary Medicine (CVM) is Mississippi's only accredited Veterinary College. Part of the mission of MSU-CVM is training veterinary and graduate students in research.

2. Is this modification unnecessarily duplicative of other programs within the System?

No.

3. Describe the anticipated institutional impact including any research efforts associated with this program.

We anticipate that this change will make our recruiting of graduate students who are interested in biomedical research not necessarily directly applicable to veterinary medicine more effective. In addition, the new title accurately reflects that fact that much of the research at CVM is applicable not only to veterinary medicine but also to the broad field of biomedical sciences.

4. Are there any anticipated budget savings associated with the proposed modification?

No budgetary savings are anticipated.

5. Are there any changes to the educational objectives of the degree program associated with the proposed modification?

There are no changes to the educational objectives associated with the proposed modification.

6. Are there any changes to the curriculum of the degree program associated with the proposed modification?

No curriculum changes will be associated with the proposed modification.



7. Describe how the proposed modification will affect program faculty.

We anticipate that the change will allow our faculty to be more effective in recruiting highly qualified graduate students whose research interests are broader than veterinary medicine alone.

8. Describe the evaluation process which led to the request for the proposed modification.

The evaluation process consists of anecdotal observations over a long period of time in which prospective students have told our faculty members that they are concerned that their degree will indicate veterinary medical sciences, when it is possible that their career will not focus on veterinary medicine. In one particular case, two CVM administrators spent a considerable period of time trying to convince an MSU graduate with a B.S. degree with a 4.0 grade point average that the title of the degree would not be as influential later in his career as he thought, but he was very reluctant to enroll unless the name of the degree indicated that his training included topics relevant to biomedical sciences in general.



APPROVAL FORM FOR

# DEGREE PROGRAMS

MISSISSIPPI STATE UNIVERSITY

**NOTE:** This form is a cover sheet that must accompany the degree program change proposal. The actual proposal should be prepared in accordance with format requirements provided in the *Guide and Format for Curriculum Proposals* published by the UCCC. Both cover sheet and proposal should be submitted to UCCC Mail Stop 9702 (281 Garner Hall), Phone: 325-9410.

**College:** Veterinary Medicine      **Department:** Office of Research & Graduate Studies

**Contact Person:** Stephen B. Pruett/Tia Perkins      **Mail Stop:** 9825

**E-mail:** Pruett@cvm.msstate.edu or tia.perkins@msstate.edu

**Nature of Change:** degree name change    **Date Initiated:** 11/21/19    **Effective Date:** Fall 2020

**Current Degree Program Name:** Veterinary Medical Science

**Major:** M.S. Veterinary Medical Science

**Concentration:**

1. Population Medicine Non-Thesis (PMNT)
2. Veterinary Medical Research (VMRC)
3. Computational Biology (VCBC)
4. Infectious Diseases (VIDC)
5. Toxicology (VTOX)
6. Population Medicine Thesis (POPM)

**New Degree Program Name:** Veterinary and Biomedical Sciences

**Major:** M.S. Veterinary and Biomedical Science

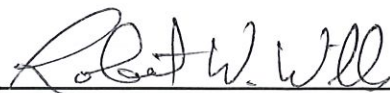
**Concentration:**

1. Population Medicine Non-Thesis (PMNT)
2. Veterinary Medical Research (VMRC)
3. Computational Biology (VCBC)
4. Infectious Diseases (VIDC)
5. Toxicology (VTOX)
6. Population Medicine Thesis (POPM)

**Summary of Proposed Changes:** This program educates M.S. students to enable them to contribute to research and compete for positions in various areas of veterinary medical sciences. However, many of the research areas at the College of Veterinary Medicine can also apply to general biomedical research. For example, some focus areas include infectious diseases, bioinformatics, epidemiology, immunology, bacteriology, and virology. Essentially all of these research focus areas can be applied to solving animal disease problems or to solving general biomedical problems that could be applied to many species, and some of both types of research is done here.

Approved:

Date:



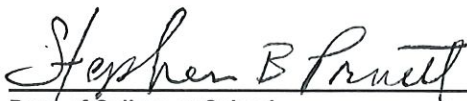
Department Head

11/21/19



Chair, College or School Curriculum Committee

11/21/19



Dean of College or School

11/21/19

Chair, University Committee on Courses and Curricula

Chair, Graduate Council(if applicable)

Chair, Deans Council



**MISSISSIPPI STATE**  
UNIVERSITY™

**COLLEGE OF VETERINARY MEDICINE**

Department of Basic Sciences

P.O. Box 6100  
240 Wise Center Drive  
Mississippi State, MS 39762

P. 662.325.1130  
[www.cvm.msstate.edu](http://www.cvm.msstate.edu)

November 21, 2019

University Committee on Courses and Curricula  
Mississippi State University

Dear UCCC:

The College of Veterinary Medicine Graduate Program Advisory Committee (GPAC) serves as the College's graduate curriculum committee. As such we reviewed the proposal for changing the degree program name for Veterinary Medical Science to Veterinary and Biomedical Sciences. This proposal includes the M.S. and Ph.D. program at CVM but does not affect the Ph.D. in Environmental Toxicology. After some discussion we put this proposal to the entire graduate faculty for a vote. The result was overwhelming in favor of adding this to our program. Therefore, the subsequent GPAC vote was unanimous in favor of this proposal.

Sincerely,

Larry A. Hanson. Ph.D.  
GPAC Chair, VMS Graduate Coordinator  
Professor



**MISSISSIPPI STATE**  
UNIVERSITY™

**COLLEGE OF VETERINARY MEDICINE**  
Office of Research and Graduate Studies

P.O. Box 6100  
240 Wise Center Drive  
Mississippi State, MS 39762  
Pruett@cvm.msstate.edu

November 18, 2019

University Committee on Courses and Curricula  
Mississippi State University

Dear UCCC:

I am writing to provide justification for the name change we are requesting for our M.S. and Ph.D. programs in "Veterinary Medical Sciences". Many of the research projects at CVM involve basic or applied projects in animal health, and "Veterinary Medical Sciences" is a good descriptor of such projects. However, a significant percentage of our graduate students have thesis or dissertation research projects that focus on human health and only utilize animals as models for human disease. In addition, there are some projects that utilize human cells or pathogenic organisms and do not involve animal research at all. Many of our peer and peer-plus veterinary colleges in the U.S. have noticed the same issue and have addressed it by including the term "biomedical" in their M.S. and/or Ph.D. program names. For example, the Virginia-Maryland Regional College of Veterinary Medicine uses the name "Biomedical and Veterinary Sciences". Tufts University's Cummings School of Veterinary Medicine, University of Wisconsin School of Veterinary Medicine, North Carolina State University School of Veterinary Medicine, Texas A & M College of Veterinary Medicine, Oklahoma State University College of Veterinary Medicine, and University of Georgia College of Veterinary Medicine use the names "Biomedical Sciences" or "Comparative Biomedical Sciences" for graduate degrees. Including both "Veterinary Medical Sciences" and "Biomedical Sciences" in the name for our M.S. and Ph.D. programs will provide a valid descriptor of the types of research conducted at MSU-CVM. Therefore, we are proposing to change our M.S. and Ph.D. programs in "Veterinary Medical Sciences" to M.S. and Ph.D. programs in "Veterinary and Biomedical Sciences". This proposal was discussed at the Spring 2019 meeting of the Graduate Faculty and approved by vote. No changes in the graduate program description or requirements are requested, and the other graduate program at CVM, the Ph.D. in Environmental Toxicology is not included in this name change request.

Sincerely,

Stephen B. Pruett, Ph.D.  
Professor and Interim Associate Dean for Research and Graduate Studies



## GRADUATE DEGREE MODIFICATION OUTLINE FORM

Use the chart below to make modifications to an existing Graduate Degree. All deleted courses and information should be shown in *italics* and all new courses and information in **bold**. Please include the course prefix, number, and title in both columns. Expand rows as needed.

CURRENT Degree Description	PROPOSED Degree Description
Degree: M.S. Major: Veterinary Medical Science Concentrations: Population Medicine-Non-thesis (PMNT), Veterinary Medical Research (VMRC), Computational Biology (VCBC), Infectious Diseases (VIDC), Toxicology (VTOX), Population Medicine Thesis (POPM)	Degree: M.S. Major: Veterinary and Biomedical Science Concentrations: Population Medicine-Non-thesis (PMNT), Veterinary Medical Research (VMRC), Computational Biology (VCBC), Infectious Diseases (VIDC), Toxicology (VTOX), Population Medicine Thesis (POPM)
<p>Old degree catalog description:</p> <p>Admission Criteria To be admitted to the Veterinary Medical Sciences Graduate Program the applicant must either hold a D.V.M. degree from a recognized college of veterinary medicine or have at least a bachelor's degree from a fully recognized four-year institution of higher learning. The scholastic record for all undergraduate, graduate, and professional school coursework will be reviewed and should exceed a minimum GPA of 3.00 for undergraduate work; GPA of 3.00 for graduate work; GPA of 2.75 for the four years of the veterinary curriculum or 2.75 for the last two years of the veterinary curriculum. Also required are three reference letters, a minimum TOEFL score of 550 PBT (213 CBT or 79 iBT) or IELTS score of 6.5 for international students from countries whose primary language is not English, and if a Graduate Record Examination (GRE) score is available it will be considered.</p> <p>Provisional Admission In special circumstances a student who does not meet admission criteria may be admitted provisionally if approved by the Graduate Program Advisory Committee (GPAC). See Provisional Admission under Admission in this publication for provisional requirements.</p> <p>Academic Performance If a student does not show satisfactory progress toward meeting academic, research, and/or</p>	<p>New degree catalog description:</p> <p>With the proposed degree name change, admission and performance criteria will remain unchanged.</p>

thesis requirements, his/her performance will be reviewed in a meeting with the student's graduate committee. This committee may recommend a change in the student's program or recommend that the student be dismissed from the graduate degree program in the College of Veterinary Medicine Veterinary Medical Science Program. Students must follow all guidelines outlined in the Graduate Catalog.

Old Concentration description:

Master of Science in Veterinary Medical Science (VMS)  
- Population Medicine Non-Thesis Concentration (PMNT)

Statistics course <sup>1,2</sup>	3
CVM 8011 Seminar or CVM 8091 Current Topics in Production Animal Medicine	1
Additional graduate-level courses (at least 15 hours of all coursework credits must be 8000-level or higher) <sup>1</sup>	31
Total Hours	35

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate level statistics courses can satisfy this requirement with approval of the student's graduate committee. Transfer of credit for any previously taken courses is subject to the MSU Bulletin of the Graduate School policy.

A final examination (oral and/or written) which covers both the major and supportive fields is required. Students must present an open seminar of the thesis research just prior to oral final examinations. The student must adhere to the University and College regulations regarding his/her graduate program.

Master of Science in Veterinary Medical Science (VMS)  
- Veterinary Medical Research Concentration (VMRC)

One statistics course <sup>1,2</sup>	3
One seminar course (CVM 8011 or equivalent) <sup>1</sup>	1
CVM 8000 Thesis Research/Thesis in Veterinary Medicine	6
Additional graduate-level courses (at least 12	20

New Concentration description:

With the proposed degree name change, all concentration requirements and curricula will remain unchanged.

hours of all coursework credits must be 8000-level or higher) <sup>1</sup>	
Total Hours	30

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee.

A final examination (oral and/or written) which covers both the major and supportive fields and includes defense of the thesis is required. Students must present an open seminar of the thesis research just prior to oral final examinations. The student must adhere to the University and College regulations regarding his/her graduate program.

Master of Science in Veterinary Medical Science (VMS)  
- Computational Biology Concentration (VCBC)

BCH 8653 Genomes and Genomics or PSS 8653 Genomes and Genomics	3
CSE 6613 Bio-computing	3
CSE 6623 Computational Biology	3
One statistics course <sup>1,2</sup>	3
One seminar course (CVM 8011 or equivalent) <sup>1</sup>	1
CVM 8000 Thesis Research/Thesis in Veterinary Medicine	6
Additional graduate-level courses (at least 12 hours of all coursework credits must be 8000-level or higher) <sup>1</sup>	11
Total Hours	30

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee.

A final examination (oral and/or written) which covers both the major and supportive fields and includes defense of the thesis is required. Students must present an open seminar of the thesis research just prior to oral final examinations. The student must adhere to the University and College regulations regarding his/her



graduate program.

Master of Science in Veterinary Medical Science (VMS)  
- Infectious Diseases Concentration (VIDC)

CVM 8303 Advanced Immunology	3
BCH 6013 Principles of Biochemistry or BCH 6713 Molecular Biology	3
One statistics course <sup>1,2</sup>	3
One seminar course (CVM 8011 or equivalent) <sup>1</sup>	1
Additional graduate-level courses (at least 12 hours of all coursework credits must be 8000-level or higher) <sup>1</sup>	14
CVM 8000 Thesis Research/Thesis in Veterinary Medicine	6
Total Hours	30

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee.

A final examination (oral and/or written) which covers both the major and supportive fields and includes defense of the thesis is required. Students must present an open seminar of the thesis research just prior to oral final examinations. The student must adhere to the University and College regulations regarding his/her graduate program.

Master of Science in Veterinary Medical Science (VMS)  
– Toxicology Concentration (TOXI)

CVM 8543 Mechanisms of Toxic Action or CVM 8523 Organ Systems Toxicology I or CVM 8533 Organ Systems Toxicology II	3
CVM 6513 Environmental Toxicology	3
One statistics course <sup>1,2</sup>	3
One seminar course (CVM 8011, 8091 or equivalent) <sup>1</sup>	1
Additional graduate-level courses (at least 12 hours of all coursework credits must be 8000-level or higher) <sup>1</sup>	14
CVM 8000 Thesis Research/Thesis in Veterinary Medicine	6
Total Hours	30



<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee.

A final examination (oral and/or written) which covers both the major and supportive fields and includes defense of the thesis is required. Students must present an open seminar of the thesis research just prior to oral final examinations. The student must adhere to the University and College regulations regarding his/her graduate program.

Master of Science in Veterinary Medical Science (VMS)  
–Population Medicine Thesis Concentration (POPM)

CVM 8333 Food Safety	3
CVM 8513 Applied Veterinary Epidemiology	3
CVM 8503 Epidemiology and Biostatistics	3
ST 8114 Statistical Methods <sup>1,2</sup>	4
One seminar course (CVM 8011, 8091 or equivalent) <sup>1</sup>	1
Additional graduate-level courses (at least 12 hours of all coursework credits must be 8000-level or higher) <sup>1</sup>	10
CVM 8000 Thesis Research/Thesis in Veterinary Medicine	6
Total Hours	30

<sup>1</sup> Equivalency of seminars and coursework is determined by the student's graduate committee.

<sup>2</sup> Previous graduate-level statistics courses can satisfy this requirement with approval of the student's graduate committee.

A final examination (oral and/or written) which covers both the major and supportive fields and includes defense of the thesis is required. Students must present an open seminar of the thesis research just prior to oral final examinations. The student must adhere to the University and College regulations regarding his/her graduate program.

CURRENT CURRICULUM OUTLINE	Required Hours
----------------------------	----------------

\*See above section – Concentration Description and Curriculum Outline/hours are now combined in the Graduate Catalog; therefore, outline is not repeated here.

PROPOSED CURRICULUM OUTLINE
-----------------------------

Required Hours
----------------

With the proposed degree name change, all concentration requirements and curricula will remain unchanged.

**Appendix 9a: Modifications to Existing Degree Program Proposal  
(Renaming)  
(Submit Appendix 9a in both PDF and Word Document Formats)**

**Institution:** Mississippi State University

**Date of Implementation:**

**Present 6-Digit CIP Code(s) & 4-Digit  
Sequence Code(s):**

**New 6-Digit CIP Code:**

Spring Semester 2020

512505

512505

CIP & Sequence codes: [IHL Active Program Inventory](#)

**Present Program Title(s) as Appear(s) on Academic Program  
Inventory, Diploma, and Transcript:**

**New Program Title as will Appear on Academic Program  
Inventory, Diploma, and Transcript:**

Veterinary Medical Sciences

Veterinary and Biomedical Sciences

**Degree(s) to be Awarded:**

**Credit Hour Requirements:**

M.S. and Ph.D.

M.S., 30 hr; Ph.D. 90 hr (or M.S. + 60 hr)

**List any institutions within the state offering similar programs:**

None

**Responsible Academic Unit(s):**

**Institutional Contact:** Stephen B. Pruett

**Phone:** 662-325-6653

College of Veterinary Medicine

**Email:** [Pruett@cvm.msstate.edu](mailto:Pruett@cvm.msstate.edu)

**Number of Students Enrolled in Last Six Years:**

**Number of Graduates Expected in Next Six Years:**

Year One	60
Year Two	68
Year Three	72
Year Four	77
Year Five	79
Year Six	79
<b>Total</b>	<b>454</b>

Year One	18
Year Two	20
Year Three	16
Year Four	11
Year Five	11
Year Six	10
<b>Total</b>	<b>86</b>

**Program Summary:**

This program educates M.S. and Ph.D. students to enable them to contribute to research and compete for positions in various areas of veterinary medical sciences. However, many of the research areas at the College of Veterinary Medicine can also apply to general biomedical research. For example, some focus areas include infectious diseases, bioinformatics, epidemiology, immunology, bacteriology, and virology. Essentially all of these research focus areas can be applied to solving animal disease problems or to solving general biomedical problems that could be applied to many species, and some of both types of research is done here.

\_\_\_\_\_  
Chief Academic Officer Signature

\_\_\_\_\_  
Date

\_\_\_\_\_  
Institutional Executive Officer Signature

\_\_\_\_\_  
Date

**Institution:**

1. Describe how the proposed modification fits within the mission of the institution.

The MSU College of Veterinary Medicine (CVM) is Mississippi's only accredited Veterinary College. Part of the mission of MSU-CVM is training veterinary and graduate students in research.

2. Is this modification unnecessarily duplicative of other programs within the System?

No.

3. Describe the anticipated institutional impact including any research efforts associated with this program.

We anticipate that this change will make our recruiting of graduate students who are interested in biomedical research not necessarily directly applicable to veterinary medicine more effective. In addition, the new title accurately reflects that fact that much of the research at CVM is applicable not only to veterinary medicine but also to the broad field of biomedical sciences.

4. Are there any anticipated budget savings associated with the proposed modification?

No budgetary savings are anticipated.

5. Are there any changes to the educational objectives of the degree program associated with the proposed modification?

There are no changes to the educational objectives associated with the proposed modification.

6. Are there any changes to the curriculum of the degree program associated with the proposed modification?

No curriculum changes will be associated with the proposed modification.



7. Describe how the proposed modification will affect program faculty.

We anticipate that the change will allow our faculty to be more effective in recruiting highly qualified graduate students whose research interests are broader than veterinary medicine alone.

8. Describe the evaluation process which led to the request for the proposed modification.

The evaluation process consists of anecdotal observations over a long period of time in which prospective students have told our faculty members that they are concerned that their degree will indicate veterinary medical sciences, when it is possible that their career will not focus on veterinary medicine. In one particular case, two CVM administrators spent a considerable period of time trying to convince an MSU graduate with a B.S. degree with a 4.0 grade point average that the title of the degree would not be as influential later in his career as he thought, but he was very reluctant to enroll unless the name of the degree indicated that his training included topics relevant to biomedical sciences in general.