October 26, 2021

To: **Curriculum Committee:**

Scott Delcourt
Qian Xue
Steve Evans
Craig Mason
Grant Miles
Josh Kelley
Deborah Rollins
Lisa Stilley
Dagmar Moravec

Fr: Trish Perry, Administrative Specialist, Grad School

Re: **Curriculum Committee, November 2nd, 2021 Via Zoom**

The following courses will be presented on **Tuesday, November 2nd, 2021, at 3:00 pm**

1. 3:05-3:15 SFR 556 Ling Li

2. 3:20-3:30 FSN 501 Mary Ellen Camire

3. 3:30-3:40 BIO 504 Jared Talbot

No Presentations Required

FSN 506 Nutritional Assessment
FSN 508 Nutrition and Aging
FSN 530 Integrative and Functional Nutrition

THE UNIVERSITY OF MAINE

NEW COURSE PROPOSAL/MODIFICATION/ELIMINATION FORM FOR GRADUATE COURSES

Graduate course proposals, modifications, or eliminations must be submitted to the Graduate School no later than the 3rd of each month. Please refer to the Graduate School website for the Curriculum Committee meetings schedule. Electronic signatures and submission is required.

Please return the completed e-form with appropriate signatures and documentation to the Graduate School by saving the form to your desktop and sending as an attachment to graduate@maine.edu. Please include in the subject line 'Course Proposal' and the course designator and number.

GRADUATE PROGRAM/UNIT Forest Resources

COURSE DESIGNATOR SFR COURSE NUMBER 556 EFFECTIVE SEMESTER Fall 2022

COURSE TITLE Physical and Mechanical Properties of Sustainable Materials

REQUESTED ACTION

NEW COURSE (check all that apply, complete Section 1, and submit a complete syllabus):

- [x] New Course
- [ ] New Course with Electronic Learning
- [ ] Experimental

MODIFICATION (Check all that apply and complete Section 2):

- [ ] Designator Change
- [ ] Number Change
- [ ] Title Change
- [ ] Description Change
- [ ] Prerequisite Change
- [ ] Credit Change
- [x] Cross Listing (must be at least 400-level) **SFR 456**
- [ ] Other (specify) _____

ELIMINATION:

- [ ] Course Elimination

ENDORSEMENTS

Please sign using electronic signatures. If you do not already have a digital signature, please click within the correct box below and follow the on-screen instructions.

Leader, Initiating Department/Unit(s)

Stephen Shaler Digitally signed by Stephen Shaler Date: 2021.02.09 08:55:34 -05'00'

College(s) Curriculum Committee Chair(s) [if applicable]

College Dean(s)

Christopher Gerbi Digitally signed by Christopher Gerbi Date: 2021.06.29 14:42:18 -04'00'

Graduate School [sign and date]

1. Courses cross-listed below 400-level require the permission of the Graduate School.

SECTION 1 (FOR NEW COURSE PROPOSALS)

Proposed Catalog Description (include designator, number, title, prerequisites, credit hours):

SFR 556- Physical and Mechanical Properties of Sustainable Materials

The physical and mechanical properties of plant-based materials, including wood and wood composites, bamboo, as related to basic processing techniques and their use in structural, packaging, and other applications are described. The objectives of the course are to develop a sound understanding of the physical and mechanical properties of the plant-based materials in relation to ultrastructure, environmental effects, and their application to simple structural systems. Topics related to the physical properties of materials include moisture content, moisture sorption, swelling/shrinkage of hygroscopic materials, density, porosity, thermal properties, friction, electrical properties, etc. Topics related to the mechanical properties covered include axial, flexural, shear, and impact performance, the influence of moisture, temperature, biological agents, and time on mechanical properties. Laboratory demonstrations are arranged to conduct the measurement of these properties according to ASTM standards.

SFR 456 and SFR 556 cannot both be taken for degree credit.

Prerequisites: Graduate standing

Credits hours: 4 (3 Lec, 1 Lab)

Components (type of course/used by Student Records for MaineStreet) – *Multiple selections are possible for courses with multiple non-graded components:*

- ☐ Applied Music
- ☐ Clinical
- ☐ Field Experience/Internship
- ☐ Research
- ☐ Studio
- ■ Laboratory
- ■ Lecture/Seminar
- ☐ Recitation
- ☐ Independent Study
- ☐ Thesis

Text(s) planned for use:

Ashby, M.F. 2021. Materials and the Environment: Eco-informed Material Choice. 34d ed. ISBN- 13: 978-0128215210

Forest Products Laboratory. 2010. Wood handbook–Wood as an engineering material. FPL-GTR-190. Madison, WI: U.S. Department of Agriculture, Forest Service, Forest Products Laboratory, 509 p. http://www.fpl.fs.fed.us/products/publications/specific_pub.php?posting_id=18102

Course Instructor (include name, position, teaching load):

Dr. Ling Li, Assistant Professor, 50% teaching load
Dr. Stephen M. Shaler, Professor, 50% teaching load

Reason for new course:

SFR556 will be cross-listed with SFR456 Physical and Mechanical Properties of Sustainable Materials. The SFR456 is a new course for undergraduate students currently enrolled in the Forest Operations, Bioproducts & Bioenergy, which will provide more specific knowledge than other courses covering a broad range of materials. SFR456 will be offered regularly (Fall semester, odd years), which is different from SFR531 Mechanics of Wood and Wood Composites (Spring, even years) and SFR530 Wood Physics (Fall, even years). SFR556 will provide another option for graduate students in forest programs to meet the credit requirements as a cross-listed course.

Does the course addition require additional department or institutional facilities, support and/or resources, e.g. new lab facilities, computer support and services, staffing (including graduate teaching assistants), or library subscriptions and resources?

- ◉ No. The department will not request additional resources for this course.
- ○ Yes. Please list additional resources required and note how they will be funded or supported.

What other departments/programs are affected (e.g. course overlap, prerequisites)? Have affected departments/programs been consulted? Any concerns expressed? Please explain.

The course may positively benefit departments in the College of Engineering if their students are interested in an elective course related to Sustainable Materials. They have not been consulted about this course proposal. When we planed to design SFR 456 course, heads of Civil Engineering, Mechanical Engineering, School of Technology, and the Dean of Engineering were contacted about the Sustainable Materials and Technology curriculum proposal and were positive.

How often will this course be offered? Will offering this course result in overload salary payments, either through the college or CED, either to the instructor of this course or to anyone else as a result of rearranging teaching assignments?

SFR 556 will be offered in Fall semester, odd years.

SFR 456/556 Physical and Mechanical Properties of Sustainable Materials

School of Forest Resources
College of Natural Resources, Forestry, and Agriculture
University of Maine

Lecture:	50 minute period Monday, Wednesday, Friday
Laboratory:	3 hour period either immediately after one of the lecture periods or on Tuesday or Thursday
Credits:	4 (3 for Lecture and 1 for Lab)
Digital Service:	Brightspace
Location:	To Be Determined

INSTRUCTOR:

Dr. Ling Li
119 Nutting Hall
Phone: 207/581-2883
E-Mail: ling.li@maine.edu
Office Hours: By Appointment

Dr. Stephen M. Shaler
201 Nutting Hall
Phone: 207/581-4737
E-Mail: shaler@maine.edu
Office Hours: By Appointment

COURSE DESCRIPTION:

The physical and mechanical properties of plant-based materials, including wood and wood composites, bamboo, as related to basic processing techniques and their use in structural, packaging, and other applications are described. The objectives of the course are to develop a sound understanding of the physical and mechanical properties of the plant-based materials in relation to ultrastructure, environmental effects, and their application to simple structural systems. Topics related to the physical properties of materials include moisture content, moisture sorption, swelling/shrinkage of hygroscopic materials, density, porosity, thermal properties, friction, electrical properties, etc. Topics related to the mechanical properties covered include axial, flexural, shear, and impact performance, the influence of moisture, temperature, biological agents, and time on mechanical properties. Laboratory demonstrations are arranged to conduct the measurement of these properties according to ASTM standards.

SFR 456 and SFR 556 cannot both be taken for degree credit.

PREREQUISITES: Graduate standing

STUDENT LEARNING OUTCOMES:

Upon successful completion of this course, the students should be able to:

1) Define the moisture content of wood at dry basis and wet basis, equilibrium moisture content, fiber saturation point (FSP) of wood.

2) Distinguish the liquid (free) water, bound water, and water vapor in wood (lumens and cell walls) and describe the shrinkage/swelling of wood caused by moisture desorption/adsorption.
3) Define, measure, and calculate the apparent density, specific density, skeletal density, porosity, and describe the relations of these terms.
4) Define, measure, and calculate the thermal, friction, and electrical properties of wood and describe their uses.
5) Define isotropy, anisotropy and orthotropicity as it applies to wood and wood composite materials.
6) Define the definitions of load, deformation, stress, and strain, calculate strength properties of materials, and describe failure modes of wood and wood composite materials under various loading conditions.
7) Describe the influence of the characteristics/defects of biomaterials including bamboo on their strength properties.
8) Explain the importance of environmental factors (temperature, moisture, time, biological agents) on the strength performance (such as degradation, creep, and stress relaxation) of hygroscopic and natural materials.

REQUIRED TEXT:

Ashby, M.F. 2021. Materials and the Environment: Eco-informed Material Choice. 34d ed. ISBN- 13: 978-0128215210

Forest Products Laboratory. 2010. Wood handbook--Wood as an engineering material. FPL-GTR-190. Madison, WI: U.S. Department of Agriculture, Forest Service, Forest Products Laboratory, 509 p. http://www.fpl.fs.fed.us/products/publications/specific_pub.php?posting_id=18102

Attendance and class participation is expected of all students at all times unless special circumstances warrant otherwise.

GRADING AND COURSE EXPECTATIONS:

SFR 456:		**SFR 556:**	
Graded Items:	**Percentage of Final Grade**	**Graded Items:**	**Percentage of Final Grade**
Homework:	25%	Homework:	25%
Laboratory Assignments:	25%	Laboratory Assignments:	25%
Examination 1:	15%	Examination 1:	10%
Examination 2:	15%	Examination 2:	10%
Final Examination:	20%	Final Examination:	20%
		Review Paper:	10%
Total:	**100%**	**Total:**	**100%**

Final course grades will be assigned as follows:

Minimum %	93	90	88	83	80	78	73	70	67	Below 67
Letter grade	A	A-	B+	B	B-	C+	C	C-	D	F

Homework and Laboratory Assignments:

Homework and laboratory assignments will be assigned weekly to reinforce the understanding of content delivered in lectures and gain hands-on experience in measuring the properties of wood and wood composites. Homework will include short answer questions and computational questions, while the laboratory assignments will require generating a lab report comprising introduction, objective, material and method, results, and discussion. An example of homework and a laboratory report example are given in

Appendix-1.

The homework and laboratory assignments will be graded in a points-based system. Homework is due at the beginning of the first lecture in the next week. Laboratory reports, typically due at the beginning of the next laboratory period, will have explicit expectations provided.

Graded Items	# Assigned	Points Each	Total Points	Percentage of Final Grade
Homework	15	40 points each	600	25%
Laboratory Assignments	12	50 points each	600	25%

Points are earned based on the completion of the homework or laboratory report, which will be evaluated based on a clear, concise, or correct solution provided to each problem in the homework. The laboratory report also has expectations of clear technical writing, accurate experimental data analysis, and sysnthesis of the results.

The maximum earned points per assignment will decrease 5% for each day late. No credit is given for work turned in after corrected material is returned to the class.

Group work is encouraged, but copying is unacceptable.

Examinations:

There will be three examinations throughout the semester. Examination #1 in week-8 covers the overview of sustainable materials and the material's physical properties. Examination #2 in week 12 includes the mechanical properties of the materials. The final examination in week 16 is a comprehensive examination, covering all the topics in this course. Three pre-examination review sections will be provided one week ahead of each exam. All review material will come from lectures, homework, laboratories, and assigned portions of the textbook.

Make-up examinations will be available for excused absences only and must be scheduled with the instructor within one week of the original exam date.

Review Paper:

Graduate students who are enrolled in SFR556 will need to submit a review paper addressing one specific topic covered by this course. The topic will be assigned to each student after consulting with the instructor(s). The student is required to review at least five (5) peer-reviewed articles published in the past 5 years. The paper will state the goal and objectives, summarize the methodology and critical results of the articles reviewed, and present a discussion that critically interprets the results. The final paper should follow the format of a review article accepted by Journal of Wood and Fiber Science and will be submitted no later than 5:00 pm on the first day of the final week of in-class instruction.

The review paper will be graded based on the evaluation rubric listed in Appendix-2. The conversion between the grade of the review paper and points in the final grade is given as follows:

Excellent: 10%
Good: 7%
Poor: 4%

PROFESSIONAL GUIDELINES AND EXPECTATIONS:

Students are expected to adhere to the "**Professional Guidelines and Expectations for School of Forest Resources Students**" which may be obtained at the following site:

https://forest.umaine.edu/student-resources

COURSE SCHEDULE (TENTATIVE)

Week	Date	Subject	Laboratory/Homework
1	2 SEP	Lecture 1: Plant-based sustainable materials overview Lecture 2: Origin of biomaterials	Safety & laboratory report formats
2	9 SEP	Lecture 3: Review of cellular structure of biomaterials (wood and bamboo) Lecture 4: Moisture content of hygroscopic materials Lecture 5: Liquid (free) water, bound water, water vapor	Measurement Principles, significant digits & repeatability
3	16 SEP	Lecture 6: MC and fiber saturation point (FSP) Lecture 7: Equilibrium moisture content Lecture 8: Moisture sorption and hysteresis	Moisture
4	23 SEP	Lecture 9: Swelling/shrinkage of wood Lecture 10: Density and specific gravity Lecture 11: Skeletal density and porosity	Density
5	30 SEP	Lecture 12: Thermal conductivity Lecture 13: Specific heat capacity Lecture 14: Thermal diffusivity	Swelling/shrinkage
6	7 OCT	Lecture 15: Thermal expansion/contraction Lecture 16: Friction of wood Lecture 17: Electrical properties of wood	Insulation behavior
7	14 OCT	Lecture 18: Principle of moisture meter of wood Lecture 19: Monitoring & control of moisture in wood Lecture 20: Pre-examination review	Friction
8	21 OCT	Lecture 21: Mechanical Properties - Specific performance - Elastic behavior Lecture 22: Tensile & compressive performance Lecture 23: Shear performance	Examination #1 – Physical properties
9	28 OCT	Lecture 24: Flexural performance Lecture 25: Strength/fracture behavior Lecture 26: Axial strength	Flexural Creep behavior
10	4 NOV	Lecture 27: Flexural strength Lecture 28: Impact Lecture 29: Material defects	Compression behavior
11	11 NOV	Lecture 30: Environmental influence on mechanical performance Lecture 31: Moisture Lecture 32: Pre-Examination Review Moisture	Tension behavior
12	18 NOV	Lecture 33: Temperature Lecture 34: Time Lecture 35: Durability	Examination #2 – Mechanical properties
13	25 NOV	Lecture 36: Biological Activity Thanksgiving holiday - No class	Thanksgiving holiday
14	2 DEC	Lecture 37: Introduction to composite material concepts Lecture 38: Laminates Lecture 39: Natural fiber reinforced polymers	Flexural behavior
15	9 DEC	Lecture 40: Materials specification #1 (Bamboo) Lecture 41: Materials specification #2 Lecture 42: Pre-examination review	Creep analysis
16	13 DEC	Finals week	

Academic Honesty Statement: Academic honesty is very important. It is dishonest to cheat on exams, to copy term papers, to submit papers written by another person, to fake experimental results, or to copy or reword parts of books or articles into your own papers without appropriately citing the source. Students committing or aiding in any of these violations may be given failing grades for an assignment or for an entire course, at the discretion of the instructor. In addition to any academic action taken by an instructor, these violations are also subject to action under the University of Maine Student Conduct Code. The maximum possible sanction under the student conduct code is dismissal from the University.

Please see the University of Maine System's Academic Integrity Policy listed in the Board Policy Manual as Policy 314: https://www.maine.edu/board-of-trustees/policy-manual/section-314/

Students Accessibility Services Statement [This should be customized to include the instructor's name]: If you have a disability for which you may be requesting an accommodation, please contact Student Accessibility Services, 121 East Annex, 581.2319, as early as possible in the term. Students who have already been approved for accommodations by SAS and have a current accommodation letter should meet with me (the instructor of the course) privately as soon as possible.

Course Schedule Disclaimer (Disruption Clause): In the event of an extended disruption of normal classroom activities (due to COVID-19 or other long-term disruptions), the format for this course may be modified to enable its completion within its programmed time frame. In that event, you will be provided an addendum to the syllabus that will supersede this version.

Observance of Religious Holidays/Events: The University of Maine recognizes that when students are observing significant religious holidays, some may be unable to attend classes or labs, study, take tests, or work on other assignments. If they provide adequate notice (at least one week and longer if at all possible), these students are allowed to make up course requirements as long as this effort does not create an unreasonable burden upon the instructor, department or University. At the discretion of the instructor, such coursework could be due before or after the examination or assignment. No adverse or prejudicial effects shall result to a student's grade for the examination, study, or course requirement on the day of religious observance. The student shall not be marked absent from the class due to observing a significant religious holiday. In the case of an internship or clinical, students should refer to the applicable policy in place by the employer or site.

Sexual Discrimination Reporting

The University of Maine is committed to making campus a safe place for students. Because of this commitment, if you tell a teacher about an experience of **sexual assault, sexual harassment, stalking, relationship abuse (dating violence and domestic violence), sexual misconduct or any form of gender discrimination** involving members of the campus, **your teacher is required to report** this information to Title IX Student Services or the Office of Equal Opportunity.

If you want to talk in confidence to someone about an experience of sexual discrimination, please contact these resources:

For *confidential resources on campus*: **Counseling Center: 207-581-1392** or **Cutler Health Center: at 207-581-4000**.

For *confidential resources off campus*: **Rape Response Services:** 1-800-871-7741 or **Partners for Peace**: 1-800-863-9909.

Other resources: The resources listed below can offer support but may have to report the incident to others who can help:

For *support services on campus*: **Title IX Student Services: 207-581-1406, Office of Community Standards: 207-581-1409, University of Maine Police: 207-581-4040 or 911**. Or see the Title IX Student Services website for a complete list of services.

APPENDIX-1:

Example of Homework

1. Briefly describe the levels of the hierarchical structure of wood we can observe.

2. A wood cubic block has a mass of 10 g, and a volume of 20 cm^3, and a moisture content (dry basis) of 30% (Fiber Saturation Point). The volume shrinkage percent of wood from green to an oven-dry condition is 15%. The volume shrinkage percent of wood from green to a moisture content of 12% is 9%.

You are asked to calculate the specific gravity of wood at green basis (SG_{30}), at basic basis (SG_b), at oven-dry basis (SG_0), and at air-dry basis (SG_{12}), respectively.

Example of Laboratory Report

Lab practice: Measurement of apparent density, true density, and porosity of wood samples

1. Materials

Wood slices: Red oak, Bigtooth aspen, and Eastern Hemlock
Note: we don't calculate the specific gravity of wood samples. The influence of moisture content in density is ignored.

2. Methods

2.1 Gas pycnometer for true (skeletal) density

Introduction of gas pycnometer: https://www.youtube.com/watch?v=gk7-5Z46n8E

Volume of cell chamber	111.1778 cm^3
Volume of expansion chamber	74.1425 cm^3

PYCNOMETER							
	Reading cycle	P1, psi	P2, psi	Mass, g	True Volume, cm^3	True Density, g/cm^3	Temp. °C
Red oak	1	19.520	11.678	1.095			25.3
	2	19.475	11.652	1.095			
				Mean			
Aspen	0	19.478	11.667	0.702			27.3
	1	19.481	11.668	0.702			
				Mean			
Hemlock	0	19.471	11.663	0.613			28.3
	1	19.5	11.681	0.613			
				Mean			

P_1: Charge pressure, psi
P_2: Pressure after expansion, psi

2.2 Water displacement method for apparent density

Sample	Test run	Mass of sample, g	Mass of water displaced, g	Apparent (total) volume of sample, cm^3	Apparent Density, g/cm^3
Oak	1	1.095	1.425		
Aspen	1	0.702	1.426		
Hemlock	1	0.613	1.356		

3. Calculate the porosity of three wood species. Give a brief discussion on the results.

APPENDIX-2:

Evaluation Rubric of Review Paper:

Criteria	**Poor**	**Good**	**Excellent**
Introduction/ Problem Statement	Did not reference the topic to be examined.	Presented the topic but did not address the research need.	Clearly defined the topic and context for research provided.
Organized Progression	Did not present a clear direction and subtopics were not connected logically.	Basic flow of ideas was found but not all sections followed a logical order.	It was written from general to specific and the transition was smooth.
Synthesis of Ideas	Did not attempt to synthesize the information or discuss the topic; Results were piled up.	Some analysis and synthesis of ideas; summarized key points in different articles.	Clear analysis and synthesis presented; demonstrated personal insight into problem.
Clarity of writing	Ideas not expressed clearly; misspellings; incorrect grammar and punctuation	Writing was clear but not concise; paragraph or sentence structure repetitive or awkward	Writing was clear and concise; ideas were well developed and coherent.

Course Proposal

Row 26

Created	09/27/21 11:17 AM
Received Date	09/28/21
Syllabus Check	☐
Designator Check	☐
GS Status	Add to GB Agenda
GB Approved Date	
Status	Ready for Graduate Board Review
Course Designator & Number	BIO 504
Academic Unit	Biology & Ecology
Effective Semester	Fall 2022
Course Title	Advanced Developmental Biology
Action	Modify an Existing Course
New Course Type	
Course Modification Type	Prerequisite Change
Proposed Catalog Description	
New Course Title	
New Course Designator & Number	
Prerequisites	BIO 336 or BIO 438 or permission
Credit Hours	

Components	
Other Modification	
Text(s) Planned for Use	
Course Instructor	Jared Talbot, 1/1
Reason for New Course	
Proposed Resources	No. The academic unit will not request additional resources for this course
Additional Resources Required	
Units Affected	
Course Frequency	Even years
Current Catalog Description	
Reason for Course Modification	The listed pre-requisites don't really make sense for a graduate course in developmental biology. This course meets concurrent with Bio336, so Bio336 should not be listed as a pre-req.
Reason for Course Elimination	
Repeated for Credit	
Credits Allowed	
Completions Allowed	
Enroll Multiple Times in Term	
Distance Technology	
Prerequisite Modification	Graduate Standing
Preparer	jared.talbot@maine.edu

Leader	jacquelyn.gill@maine.edu
Leader approval	Approved
Leader approval date	09/27/21
Curriculum Committee Chair 1	
Curriculum Committee Chair 1 approval	
CC Chair 1 Approval Date	
College Dean 1	susan.sullivan@maine.edu
College Dean 1 approval	Approved
Dean 1 Approval Date	09/28/21
DLL Approval	
DLL Approval approval	
DLL Approval Date	
Cross Listed	No
Leader 2	
Leader 2 approval	
Leader 2 approval date	
Curriculum Committee Chair 2	
Curriculum Committee Chair 2 approval	
CC Chair 2	

Approval Date

College Dean 2

College Dean 2 approval

Dean 2 Approval Date

UGRD Cross Listed?

UGRD Cross Listing Course

Course Proposal

Row 24

Created	09/26/21 7:09 AM
Received Date	09/28/21
Syllabus Check	
Designator Check	
GS Status	Hold for Future Meeting
Status	Ready for Curriculum Committee Review
Course Designator & Number	FSN 501
Academic Unit	Food & Agriculture
Effective Semester	Spring 2022
Course Title	Advanced Human Nutrition
Action	Modify an Existing Course
New Course Type	
Course Modification Type	Description Change Prerequisite Change
Proposed Catalog Description	FSN 501 Advanced Human Nutrition Basic nutrition science with emphasis on carbohydrate, lipid, protein, vitamin, mineral functions, and metabolism. Genetic influences on nutrient needs and metabolism. Two courses in chemistry and a nutrition course are recommended. Online class with some synchronous discussions. Prerequisites & Notes: Graduate standing or instructor permission. Credits: 3
New Course Title	
New Course Designator & Number	
Prerequisites	Department Consent

Credit Hours	
Components	
Other Modification	
Text(s) Planned for Use	
Course Instructor	Mary Ellen Camire, Professor of Food Science & Human Nutrition, 25% teaching
Reason for New Course	
Proposed Resources	No. The academic unit will not request additional resources for this course
Additional Resources Required	
Units Affected	
Course Frequency	Currently planned to be offered in the fall of odd years since it is a required class for the online M.S. in Food Science & Human Nutrition. The instructor has been paid an overload salary for this class since she began teaching the class in 2012.
Current Catalog Description	FSN 501 Advanced Human Nutrition Basic nutrition science with emphasis on carbohydrate, lipid, protein, vitamin, mineral functions, and metabolism. Genetic influences on nutrient needs and metabolism. Prerequisites & Notes: Department consent Credits: 3
Reason for Course Modification	The current catalog prerequisite was confusing to students. The proposed prerequisites should enable students to self-register for the class. Students need to know that the class is online but has some synchronous discussion meetings. Students who cannot attend discussions are given an alternate assignment.
Reason for Course Elimination	
Repeated for Credit	
Credits Allowed	
Completions Allowed	
Enroll Multiple Times in Term	
Distance	

Technology	
Prerequisite Modification	Graduate Standing or instructor permission
Preparer	camire@maine.edu
Leader	rcausey@maine.edu
Leader approval	Approved
Leader approval date	09/27/21
Curriculum Committee Chair 1	
Curriculum Committee Chair 1 approval	
CC Chair 1 Approval Date	
College Dean 1	susans@maine.edu
College Dean 1 approval	Approved
Dean 1 Approval Date	09/28/21
DLL Approval	
DLL Approval approval	
DLL Approval Date	
Cross Listed	No
Leader 2	
Leader 2 approval	
Leader 2 approval date	
Curriculum Committee Chair 2	

Curriculum Committee Chair 2 approval

CC Chair 2 Approval Date

College Dean 2

College Dean 2 approval

Dean 2 Approval Date

Course Proposal

Row 28

Created	10/04/21 6:43 AM
Received Date	10/05/21
Syllabus Check	
Designator Check	
GS Status	Add to GB Agenda
GB Approved Date	
Status	Ready for Graduate Board Review
Course Designator & Number	FSN 506
Academic Unit	Food & Agriculture
Effective Semester	Spring 2022
Course Title	Nutritional Assessment
Action	Modify an Existing Course
New Course Type	
Course Modification Type	Prerequisite Change
Proposed Catalog Description	
New Course Title	
New Course Designator & Number	
Prerequisites	FSN 410 and FSN 412, or instructor permission
Credit Hours	

Components	
Other Modification	
Text(s) Planned for Use	
Course Instructor	Mona Therrien, Associate Director SFA, 50 %
Reason for New Course	
Proposed Resources	No. The academic unit will not request additional resources for this course
Additional Resources Required	
Units Affected	
Course Frequency	Every even spring. Course will now be overload
Current Catalog Description	
Reason for Course Modification	Online students can register themselves more easily.
Reason for Course Elimination	
Repeated for Credit	
Credits Allowed	
Completions Allowed	
Enroll Multiple Times in Term	
Distance Technology	
Prerequisite Modification	Graduate level standing in FSN or permission
Preparer	mona.therrien@maine.edu

Leader	rcausey@maine.edu
Leader approval	Approved
Leader approval date	10/04/21
Curriculum Committee Chair 1	reid@maine.edu
Curriculum Committee Chair 1 approval	Approved
CC Chair 1 Approval Date	10/04/21
College Dean 1	susans@maine.edu
College Dean 1 approval	Approved
Dean 1 Approval Date	10/05/21
DLL Approval	
DLL Approval approval	
DLL Approval Date	
Cross Listed	No
Leader 2	
Leader 2 approval	
Leader 2 approval date	
Curriculum Committee Chair 2	
Curriculum Committee Chair 2 approval	
CC Chair 2	

Approval Date

College Dean 2

College Dean 2 approval

Dean 2 Approval Date

UGRD Cross Listed?

UGRD Cross Listing Course

Course Proposal

Row 25

Created	09/26/21 7:26 AM
Received Date	10/28/21
Syllabus Check	
Designator Check	
GS Status	Add to CC Agenda
GB Approved Date	
Status	Ready for Curriculum Committee Review
Course Designator & Number	FSN 508
Academic Unit	Food & Agriculture
Effective Semester	Spring 2022
Course Title	Nutrition and Aging
Action	Modify an Existing Course
New Course Type	
Course Modification Type	Description Change Prerequisite Change
Proposed Catalog Description	FSN 508 Nutrition and Aging Roles of nutrients, foods, and supplements in maintaining health during aging. Online class with some live discussions. FSN 501 recommended. Prerequisites & Notes Graduate standing or instructor permission Credits: 3
New Course Title	
New Course Designator & Number	
Prerequisites	Graduate standing or instructor permission

Credit Hours	
Components	
Other Modification	
Text(s) Planned for Use	
Course Instructor	Mary Ellen Camire, Professor of Food Science and Human Nutrition, 25% teaching
Reason for New Course	
Proposed Resources	No. The academic unit will not request additional resources for this course
Additional Resources Required	
Units Affected	
Course Frequency	This class will be offered in the summers of odd years with overload/summer salary for the instructor through CED.
Current Catalog Description	FSN 508 Nutrition and Aging Roles of nutrients, foods and supplements in maintaining health during aging. Prerequisites & Notes FSN 301 or permission. Credits: 3
Reason for Course Modification	Although the class always has been taught online, the catalog description did not reflect that. Also, students need to know that the class is not completely asynchronous, but students who cannot attend discussion sessions will be offered alternative assignments. Many of our graduate students did not take FSN 301 Life Cycle Nutrition as an undergraduate. Although FSN 501 Advanced Human Nutrition provides a strong foundation for FSN 508, some students who took the class this past summer did well without having taken that class. Adding a suggestion of FSN 501 to the description should make it easier for students and advisors to plan the sequence of classes taken by online students. The proposed prerequisite of graduate standing or instructor permission should facilitate student registration.
Reason for Course Elimination	
Repeated for Credit	
Credits Allowed	
Completions Allowed	

Enroll Multiple Times in Term	
Distance Technology	
Prerequisite Modification	
Preparer	camire@maine.edu
Leader	rcausey@maine.edu
Leader approval	Approved
Leader approval date	10/04/21
Curriculum Committee Chair 1	
Curriculum Committee Chair 1 approval	
CC Chair 1 Approval Date	
College Dean 1	susans@maine.edu
College Dean 1 approval	Approved
Dean 1 Approval Date	10/28/21
DLL Approval	
DLL Approval approval	
DLL Approval Date	
Cross Listed	No
Leader 2	
Leader 2 approval	
Leader 2 approval date	

Curriculum Committee Chair 2

Curriculum Committee Chair 2 approval

CC Chair 2 Approval Date

College Dean 2

College Dean 2 approval

Dean 2 Approval Date

UGRD Cross Listed?

UGRD Cross Listing Course

Course Proposal

Row 10

Created	09/17/21 9:35 AM
Received Date	10/28/21
Syllabus Check	
Designator Check	
GS Status	Add to GB Agenda
GB Approved Date	
Status	Ready for Graduate Board Review
Course Designator & Number	FSN 530
Academic Unit	Food & Agriculture
Effective Semester	Spring 2022
Course Title	Integrative and Functional Nutrition
Action	Modify an Existing Course
New Course Type	
Course Modification Type	Prerequisite Change
Proposed Catalog Description	
New Course Title	
New Course Designator & Number	
Prerequisites	Current: FSN 501 or permission. Prior classes in medical nutrition therapy recommended. Proposed: FSN 410 or FSN 501 or instructor permission. Prior classes in medical nutrition therapy recommended.

Credit Hours	
Components	
Other Modification	
Text(s) Planned for Use	
Course Instructor	Mary Ellen Camire, Professor of Food Science and Human Nutrition, 25% teaching
Reason for New Course	
Proposed Resources	No. The academic unit will not request additional resources for this course
Additional Resources Required	
Units Affected	
Course Frequency	Spring semesters in even years. Not an overload class.
Current Catalog Description	
Reason for Course Modification	Graduate students in the dietetic internship program usually do not take FSN 501, but take a similar undergraduate class, FSN 410, in their senior year. Some of our graduate students, especially those in the online programs, have taken neither FSN 410 or 501, so allowing for faculty permission on an individual basis may best suit those students.
Reason for Course Elimination	
Repeated for Credit	
Credits Allowed	
Completions Allowed	
Enroll Multiple Times in Term	
Distance Technology	

Prerequisite Modification	
Preparer	camire@maine.edu
Leader	rcausey@maine.edu
Leader approval	Approved
Leader approval date	10/04/21
Curriculum Committee Chair 1	
Curriculum Committee Chair 1 approval	
CC Chair 1 Approval Date	
College Dean 1	susans@maine.edu
College Dean 1 approval	Approved
Dean 1 Approval Date	10/28/21
DLL Approval	
DLL Approval approval	
DLL Approval Date	
Cross Listed	No
Leader 2	
Leader 2 approval	
Leader 2 approval date	
Curriculum Committee Chair 2	
Curriculum Committee	

Chair 2 approval

CC Chair 2 Approval Date

College Dean 2

College Dean 2 approval

Dean 2 Approval Date

UGRD Cross Listed?

UGRD Cross Listing Course