

HUN 4446
NUTRITION AND DISEASE - PART 2
FALL 2022



Instructor: Anne E. Mathews, PhD, RDN
Department: Food Science & Human Nutrition (FSHN)
Office: FSHN Building, Room 303
Phone: 352-294-3719
Email: anne.mathews@ufl.edu
Office hours: Thurs 1-2:30pm via Zoom (additional hours as needed)
*If you cannot attend these hours, please email me for individual appointments.

Teaching assistant: Miranda Badolato
Email: mbadolato@ufl.edu
Office hours: Tues 11:45am-12:45pm and Wed 10:30am-12:30pm via Zoom
Location: FSHN Building, Room 303

Class meeting time: MWF: 1:55-2:45pm (7th period)
Attendance: Required
Location: Little Hall, Room 113
Credits: 3

Course Description and Prerequisites: Part 2 of a two-semester sequence that focuses on the biochemical and pathophysiological bases of diseases/conditions that require nutrition support/medical nutrition therapy. Prerequisites: HUN 4445; BCH 3025 or BCH 4024; APK 2105C (formerly PET 2350C) or PCB 4723C.

Course Goals/Competencies: Upon completion of this course, students should be able to:

1. Describe the risk factors, etiology, symptoms, clinical findings, and pathophysiology associated with diseases/conditions covered in this course.
2. Describe the diagnostic tests/procedures and the intervention strategies used in the treatment of diseases/conditions covered in this course.
3. Evaluate the impact of selected food/nutrient-drug interactions on nutritional status/drug efficacy and recommend appropriate intervention strategies.
4. Relate the theoretical bases for nutrition/medical intervention strategies with the anatomical, physiological, and/or biochemical changes that occur in diseases/conditions covered in this course.
5. Identify examples of nutrient-gene interactions, apply concepts related to nutrigenetics/nutrigenomics and epigenetics, and describe the potential impact of genomic and epigenomic research on nutrition and medical practice.
6. Identify appropriate recommendations for the management of patients with diseases/conditions covered in this course.

Required Materials:

- i>clicker© Remote Response Device (“clicker”): Available for purchase at the UF Bookstore (purchase from cashier) OR a Smartphone/iPhone/laptop/iPad/tablet that is compatible with the i>clicker© REEF response system. (See below for more information.)
- Course information and materials posted on Canvas.

Recommended Materials:

- *Nutrition Therapy and Pathophysiology* (4th edition) by Nelms, Sucher, Lacey and Ross, 2016.

How to Access Canvas:

- Access requires a Gatorlink account. If you need to establish a Gatorlink account, go to <http://www.gatorlink.ufl.edu/>.
- Once you have created a Gatorlink account, access e-Learning support services home page at <http://lss.at.ufl.edu>. Select “e-Learning in Canvas”. Log in using your Gatorlink ID. HUN 4446 should be listed under “courses”. If you are unfamiliar with Canvas, information can be found under the “help” tab.

Class Attendance and Demeanor: Students are expected to attend all classes, to bring their i>clicker© “clicker” or Smartphone/iPhone/laptop/iPad/tablet computer to every class, to arrive on time, and to leave when dismissed by the instructor. Students are expected to show courtesy to their classmates and instructor by muting electronic devices and refraining from using a computer or any other type of personal electronic device for any purpose other than taking notes, viewing PowerPoint slides being discussed in class, or using them in place of the clicker device to answer questions. Students also are expected to refrain from engaging in personal conversations during class.

Online due to COVID-19 Message: Our class sessions may be audio visually recorded for students in the class to refer back and for enrolled students who are unable to attend live. Students who participate with their camera engaged or utilize a profile image are agreeing to have their video or image recorded. If you are unwilling to consent to have your profile or video image recorded, be sure to keep your camera off and do not use a profile image. Likewise, students who un-mute during class and participate orally are agreeing to have their voices recorded. If you are not willing to consent to have your voice recorded during class, you will need to keep your mute button activated and communicate exclusively using the "chat" feature, which allows students to type questions and comments live. The chat will not be recorded or shared. As in all courses, unauthorized recording and unauthorized sharing of recorded materials is prohibited.

Attendance and Make-Up Work

Requirements for class attendance and make-up exams, assignments, and other work in this course are consistent with university policies. Click here to read the university attendance policies.

<https://catalog.ufl.edu/UGRD/academic-regulations/attendance-policies/>

Student Evaluation: Three tests, a final exam, two assignments, in class participation, and 6 online quizzes will be used to evaluate student performance. Tests/exams and quizzes must be taken as scheduled. University approved activities that conflict with exams should be brought to the instructor’s attention in advance so that alternative arrangements can be made. An unexcused absence from a test will result in a score of “0” unless there are unavoidable extenuating circumstances (subject to my discretion) that can be documented to my satisfaction. Extenuating circumstances include unavoidable, unplanned situations such as illness (chart note from physician or clinic; vague notes such as “was seen” are not acceptable); family death (dated obituary); accident (police report); etc. Failure to complete a quiz within the time frame allowed will result in a grade of “0”. Extra credit projects will **NOT** be available.

Assignments: Detailed information for completing the assignments for this course will be distributed separately. The assignments **MUST BE COMPLETED INDEPENDENTLY** and are due by 11:59pm on **the dates outlined in the syllabus below**. The assignments must be submitted on the designated due dates to be considered for full credit.

Quizzes: Quizzes will be announced in class and administered through e-Learning/Canvas. You will have **25 minutes to complete each quiz** beginning from the time you open the quiz. Quizzes will be available for you to take for a 24 +-hour period (**from 3:00 PM on day the quiz is announced until 11:59 PM the following day**). The lowest quiz score (or missed quiz) will be dropped.

In-Class Participation: In-class participation will be evaluated using the i>clicker© (“clicker”) or via your Smartphone/iPhone/laptop computer/iPad/tablet. I have selected to use the i>clicker© system for several reasons, all of which I hope will make for a better learning experience for you, as well as provide you with the opportunity to improve your performance in the class. (See separate handout for details.)

- We will practice using the clickers during the first few class periods. I will officially begin recording response card (“clicker”) responses that count toward your final grade **beginning Sept 7th, 2022**.

- Questions asked during class may include material just covered in class, material covered from previous lectures, and opinion questions or other types of “informational” questions.
- Content questions will be graded, with partial credit given for incorrect answers.
- Questions may be asked at any point during the class, and on some days, more than one question may be asked. You will be given a set amount of time to respond, but once the “polling time” has ended, it will not be possible to register your response so you should be sure to get to class on time and to have your “clicker” (or other i>clicker© compatible device) with you and ready to use.
- A total of 45 points for the semester will be considered a perfect “in-class participation” score. To allow for technical problems, failure to bring your response card to class, response card failure (i.e., dead battery; malfunction), unexcused absences, etc, I will offer a minimum of 55 points during the semester (**starting on Wednesday September 9th** forward). Points earned in excess of the number needed for a perfect “in-class participation” score (i.e., 45 points) will count as bonus points toward your final grade. This means that you have the opportunity to earn at least 10 bonus points, in addition to the 2 bonus points I offer in exchange for completing and submitting an electronic version of your student information card (follow directions provided on e-Learning in Canvas). Depending on where you stand in the course, these extra points could improve your final grade.
- **Please note:** You are on your honor (see UF Academic Honesty Policy below) to register responses only for yourself. This means you personally must be in class and use your personal response card to register your answers. **Registering responses for someone else or having someone else register responses for you is a form of cheating.** If you are caught cheating the system, you and the other party(ies) involved will, at a minimum, forfeit all of your points for the semester, and you could be prosecuted through the Student Honor Court. If you are not caught, you will have to deal with your conscience and personal ethics, which may not seem like a big deal now, but may catch up with you some day.

Evaluation of Performance/Grades and Grade Points

For information on current UF policies for assigning grade points, see <https://catalog.ufl.edu/UGRD/academic-regulations/grades-grading-policies/>.

Performance Indicators	Points
Tests 3 @ ~70 points each (this is the average points, some tests will have slightly more or slightly less points)	210
Final Exam (~½ comprehensive, ~½ new material)	120
Assignments (2) 1@20 and 1@55 points	75
Class Participation (out of a minimum of 55 points; points above 45 = bonus pts)	45
Quizzes (online) 6 @ ~10 points each (lowest grade dropped)	50
Total	500

Grading Scale: Grades will be posted on e-Learning in Canvas. Grades are not curved and are not negotiable.

A = 467-500 93.34-100%	A ⁻ = 450-466 90-93.33%	B ⁺ = 433-449 86.68-89.9%	B = 417-432 83.34-86.67%	B ⁻ = 400-416 80-83.33%	C ⁺ = 383-399 76.68-79.9%
C = 367-382 73.34-76.67%	C ⁻ = 350-366 70-73.33%	D ⁺ = 334-349 66.68-69.9%	D = 317-333 63.34-66.67%	D ⁻ = 300-316 60-63.33%	E = <300 <60%

Supplementary Information: Supplementary information, announcements, reminders, sample test questions, and critical thinking exercises will be posted on e-Learning in Canvas or the class listserv.

Online Course Evaluation Process

Students are expected to provide professional and respectful feedback on the quality of instruction in this course by completing course evaluations online via GatorEvals. Guidance on how to give feedback in a professional and respectful manner is available at <https://gatorevals.aa.ufl.edu/students/>. Students will be notified when the evaluation period opens and can complete evaluations through the email they receive from GatorEvals, in their Canvas course menu under GatorEvals, or via <https://ufl.bluera.com/ufl/>. Summaries of course evaluation results are available to students at <https://gatorevals.aa.ufl.edu/public-results/>.

Academic Honesty

As a student at the University of Florida, you have committed yourself to uphold the Honor Code, which includes the following pledge: "We, the members of the University of Florida community, pledge to hold ourselves and our peers to the highest standards of honesty and integrity." You are expected to exhibit behavior consistent with this commitment to the UF academic community, and on all work submitted for credit at the University of Florida, the following pledge is either required or implied: "On my honor, I have neither given nor received unauthorized aid in doing this assignment." It is assumed that you will complete all work independently in each course unless the instructor provides explicit permission for you to collaborate on course tasks (e.g. assignments, papers, quizzes, exams). Furthermore, as part of your obligation to uphold the Honor Code, you should report any condition that facilitates academic misconduct to appropriate personnel. It is your individual responsibility to know and comply with all university policies and procedures regarding academic integrity and the Student Honor Code. Violations of the Honor Code at the University of Florida will not be tolerated. Violations will be reported to the Dean of Students Office for consideration of disciplinary action. For more information regarding the Student Honor Code, please see: <http://www.dso.ufl.edu/sccr/process/student-conduct-honor-code>.

Software Use:

All faculty, staff and students of the university are required and expected to obey the laws and legal agreements governing software use. Failure to do so can lead to monetary damages and/or criminal penalties for the individual violator. Because such violations are also against university policies and rules, disciplinary action will be taken as appropriate

Services for Students with Disabilities

Students with disabilities who experience learning barriers and would like to request academic accommodations should connect with the disability Resource Center. To get started with the Disability Resource Center: <https://disability.ufl.edu/get-started/> It is important for students to share their accommodation letter with their instructor and discuss their access needs, as early as possible in the semester.

Campus Helping Resources

Students experiencing crises or personal problems that interfere with their general wellbeing are encouraged to utilize the university's counseling resources. The Counseling & Wellness Center provides confidential counseling services at no cost for currently enrolled students. Resources are available on campus for students having personal problems or lacking clear career or academic goals, which interfere with their academic performance.

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- **University Counseling & Wellness Center**, 3190 Radio Road, 352-392-1575, <https://counseling.ufl.edu/>

Counseling Services, Groups and Workshops, Outreach and Consultation, Self-Help Library, Wellness Coaching.

- **U Matter We Care**, If you or someone you know is in distress, please contact us at 352-392-1575 or visit www.umatter@ufl.edu to refer or report a concern and a team member will reach out to the student in distress.
- **Career Connections Center**, First Floor JWRU, 392-1601, <https://career.ufl.edu/>
- **Student complaints**, Residential Course: <https://sccr.dso.ufl.edu/policies/student-honor-code-student-conduct-code/>. Online Course: <http://www.distance.ufl.edu/student-complaint-process>
- **Student Health Care Center**, Call 352-392-1161 for 24/7 information to help you find the care you need, or visit www.shcc.ufl.edu/.
- **University Police Department**, Visit www.police.ufl.edu/ or call 352-392-1111 (or 9-1-1 for emergencies).
- **UF Health Shands Emergency Room / Trauma Center**, For immediate medical care call 352-733-0111 or go to the emergency room at 1515 SW Archer Road, Gainesville, FL 32608; www.ufhealth.org/emergency-room-trauma-center.
- **Field and Fork Food Pantry** located behind the FSHN Bldg (520 Newell Dr) is available to assist members of the campus community who experience food insecurity.
- **Student Success Initiative** <http://studentsuccess.ufl.edu>

Instructor-Initiated Recording of Class: If there is a need for our class to be held over Zoom or similar platform, then our class sessions may be audio visually recorded for students in the class to refer back and for enrolled students who are unable to attend live. Students who participate with their camera engaged or utilize a profile image are agreeing to have their video or image recorded. If you are unwilling to consent to have your profile or video image recorded, be sure to keep your camera off and do not use a profile image. Likewise, students who un-mute during class and participate orally are agreeing to have their voices recorded. If you are not willing to consent to have your voice recorded during class, you will need to keep your mute button activated and communicate exclusively using the "chat" feature, which allows students to type questions and comments live. The chat will not be recorded or shared. As in all courses, unauthorized recording and unauthorized sharing of recorded materials is prohibited. Note, this is an in-person class and this is not expected to be applicable.

In-class Recording by Students: Students are allowed to record video or audio of class lectures. However, the purposes for which these recordings may be used are strictly controlled. The only allowable purposes are (1) for personal educational use, (2) in connection with a complaint to the university, or (3) as evidence in, or in preparation for, a criminal or civil proceeding. All other purposes are prohibited. Specifically, students may not publish recorded lectures without the written consent of the instructor. A "class lecture" is an educational presentation intended to inform or teach enrolled students about a particular subject, including any instructor-led discussions that form part of the presentation, and delivered by any instructor hired or appointed by the University, or by a guest instructor, as part of a University of Florida course. A class lecture does not include lab sessions, student presentations, clinical presentations such as patient history, academic exercises involving solely student participation, assessments (quizzes, tests, exams), field trips, private conversations between students in the class or between a student and the faculty or lecturer during a class session.

Publication without permission of the instructor is prohibited. To "publish" means to share, transmit, circulate, distribute, or provide access to a recording, regardless of format or medium, to another person (or persons), including but not limited to another student within the same class section. Additionally, a recording, or transcript of a recording, is considered published if it is posted on or uploaded to, in whole or in part, any media platform, including but not limited to social media, book, magazine, newspaper, leaflet, or third-party note/tutoring services. A student who publishes a recording without written consent may be subject to a civil cause of action instituted by a person injured by the publication and/or discipline under UF Regulation 4.040 Student Honor Code and Student Conduct Code.

In response to COVID-19: The following practices are in place to maintain your learning environment, to enhance the safety of our in-classroom interactions, and to further the health and safety of ourselves, our neighbors, and our loved ones.

- If you are not vaccinated, get vaccinated. Vaccines are readily available at no cost and have been demonstrated to be safe and effective against the COVID-19 virus. Visit this link for details on where to get your shot, including options that do not require an appointment: <https://coronavirus.ufhealth.org/vaccinations/vaccine-availability/>. Students who receive the first dose of the vaccine somewhere off-campus and/or outside of Gainesville can still receive their second dose on campus.
- You are welcome to wear face coverings during class and within buildings even if you are vaccinated. Please continue to follow healthy habits, including best practices like frequent hand washing. Following these practices is our responsibility as Gators.

Other Information: Lecture material and information are the property of the University of Florida and the course instructor and may not be used for any commercial purpose. Students found in violation may be subject to disciplinary action under the University's Student Conduct Code. Only students formally registered for the course are permitted to attend lectures and take quizzes/tests.

Fall 2022 Tentative Class Schedule*

Date			Topic
August	W	24	Course Introduction The Genetic Revolution: New Paradigms for Nutrition and Medical Practice Chap 10†
	F	26	The Genetic Revolution: New Paradigms for Nutrition and Medical Practice (cont'd)
	M	29	The Genetic Revolution: New Paradigms for Nutrition and Medical Practice (cont'd)
	W	31	The Genetic Revolution: New Paradigms for Nutrition and Medical Practice (cont'd)
September	F	2	Diseases/Disorders of the Upper GI Tract (Chap 14†)
	M	5	Labor Day – NO CLASS
	W	7	Diseases/Disorders of the Upper GI Tract (cont'd) INFO Card due on Canvas AND Class participation points (iclicker) start counting
	F	9	Diseases/Disorders of the Upper GI Tract (cont'd)
	M	12	Diseases/Disorders of the Upper GI Tract (cont'd)
	W	14	Diseases/Disorders of the Upper GI Tract (cont'd) Assignment #1 Due
	F	16	Diseases/Disorders of the Upper GI Tract (cont'd)
	M	19	Diseases/Disorders of the Lower GI Tract (Chap 15†)
	W	21	Test 1
	F	23	Diseases/Disorders of the Lower GI Tract (cont'd)
	M	26	Diseases/Disorders of the Lower GI Tract (cont'd)

	W	28	Diseases/Disorders of the Lower GI Tract (cont'd)
	F	30	Assignment #2 Step 1 Due Diseases/Disorders of the Lower GI Tract (cont'd)
October	M	3	Diseases/Disorders of the Lower GI Tract (cont'd)
	W	5	Liver Disease and Alcoholism (Chap 16†)
	F	7	Liver Disease and Alcoholism (cont'd)
	M	10	Liver Disease and Alcoholism (cont'd)
	W	12	Liver Disease and Alcoholism (cont'd)
	F	14	Liver Disease and Alcoholism (cont'd)
	M	17	Assignment #2 Step 2 Due Liver Disease and Alcoholism (cont'd)
	W	19	Diseases of the Gallbladder and Pancreas (Chap 16†)
	F	21	Test 2
	M	24	Diseases of the Gallbladder and Pancreas (cont'd)
	W	26	Diseases of the Gallbladder and Pancreas (cont'd)
	F	28	Diabetes Mellitus (Chap 17†)
	M	31	Diabetes Mellitus (cont'd
November	W	2	Diabetes Mellitus (cont'd)
	F	4	Assignment #2 Step 3 Due Diabetes Mellitus (cont'd)
	M	7	Diabetes Mellitus (cont'd)
	W	9	Diabetes Mellitus (cont'd)
	F	11	Holiday No Cass
	M	14	Diabetes Mellitus (cont'd)
	W	16	Test 3
	F	18	Cardiovascular Disease, Heart Failure & Hypertension (Chap 13†)
	M	21	Cardiovascular Disease, Heart Failure & Hypertension (Chap 13†)
	W	23	THANKSGIVING HOLIDAY - NO CLASS
	F	25	THANKSGIVING HOLIDAY - NO CLASS
	M	28	Cardiovascular Disease, Heart Failure & Hypertension (cont'd)
	W	30	Assignment #2 Step 4 Due Cardiovascular Disease, Heart Failure & Hypertension (cont'd)
December	F	2	Cardiovascular Disease, Heart Failure & Hypertension (cont'd)
	M	5	Cardiovascular Disease, Heart Failure & Hypertension (cont'd)
	W	7	Cardiovascular Disease, Heart Failure & Hypertension (cont'd)
	F	9	No Classes- Reading Day
	W	14	FINAL EXAM 12/14/2022 @ 10:00 AM - 12:00 PM

*Subject to change. TBA = To Be Announced.

†Chapter numbers correspond with related material published in *Nutrition Therapy and Pathophysiology* 4th edition, by Nelms, Sucher, and Roth, 2019. This textbook is recommended as an adjunct to class.