

# Division of Earth, Life & Natural Sciences Biology Department

https://www.hccs.edu/programs/areas-of-study/science-technology-engineering--math/biology/

# BIOI 1322: Nutrition and Diet Therapy | Lecture | #16588

Fall 2020 | 12 Weeks (09.21.2020-12.13.2020)

Online Anytime | hccs.edu/online

3 Credit Hours | 48 hours per semester

#### **Instructor Contact Information**

Instructor: Renu Jain, Ph.D. Office Phone: 713-718-2537

Office: Central College, LHSB, Room 321 Office Hours: online by appointment

HCC Email: <a href="mailto:renu.jain@hccs.edu">renu.jain@hccs.edu</a> Office Location: Central College

Please feel free to contact me concerning any problems that you are experiencing in this course. Your performance in my class is very important to me. I am available to hear the concerns and just to discuss course topics.

#### **Instructor's Preferred Method of Contact**

The quickest way to get a response is to email me THROUGH Eagle Online CANVAS (click on the inbox icon in the left menu followed by the write icon) as opposed to sending an email directly to renu.jain@ hccs.edu. I will respond to emails within 24-48 hours Monday through Friday; I will reply to weekend messages during the following week.

# **What's Exciting About This Course**

This is a basic 3 hour course introducing general nutritional concepts in health and disease and includes practical application of that knowledge. Special emphasis is given to nutrients and nutritional processes including function, food sources, digestion, absorption, and metabolism. Food safety, availability, and nutritional information including food labels, advertising, and nationally established guidelines are addressed.

## **My Personal Welcome**

Welcome to Nutrition and Diet Therapy—I'm delighted that you have chosen this course! I will present the information in the most exciting way I know, so that you can grasp the concepts and apply them now and hopefully throughout your life.

As you read and wrestle with new ideas and facts that may challenge you, I am available to support you. The fastest way to reach me is by my HCC email. My goal is for you to walk out of the course with a better understanding of yourself and of human behavior. So please visit me or contact me by email whenever you have a question.

# **Prerequisites and/or Co-Requisites**

BIOL 1322 requires math 0409 or higher placement by testing. Must be placed in college level reading and writing. If you have enrolled in this course having satisfied these prerequisites, you have a higher chance of success than students who have not done so. Please carefully read the repeater policy in the HCCS Student Handbook.

# **Canvas Learning Management System**

All Biology sections utilize <u>Canvas</u> (<u>https://eagleonline.hccs.edu</u>) to supplement in-class assignments, exams, and activities.

### **Open Lab Locations**

HCCS Open Computer Lab locations may be used to access the Internet and Canvas. **USE**FIREFOX OR CHROME AS THE INTERNET BROWSER.

#### **HCC Online Information and Policies**

As an online student, you are responsible for all information/requirements provided by the online college. Here is the link to information about HCC Online classes <a href="http://www.hccs.edu/online/">http://www.hccs.edu/online/</a>. This includes the mandatory online course prior to start of class.

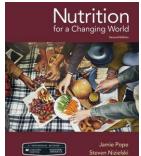
# **Scoring Rubrics, Sample Assignments, etc.**

When applicable, look in Canvas for the scoring rubrics for assignments, samples of class assignments, and other information to assist you in the course. <a href="https://eagleonline.hccs.edu/login/ldap">https://eagleonline.hccs.edu/login/ldap</a>

### **Instructional Materials**

# **Required Resources**

The textbook listed below is *required* for this course.



**Textbook**: Nutrition for a Changing World, by Jamie Pope, 2nd Edition, Macmillan Learning. LaunchPad access is required to get credits for homework assignments.

Please don't buy a LaunchPad access code. You have paid the LaunchPad access at a discounted price when registering for this course (inclusive access). You can access homework and the e-textbook on the first day of class. Please follow instruction posted in Canvas to activate your LaunchPad account there. If you prefer to use a hard copy of the textbook, you can purchase or rent a printed book separately. Please check more purchase options listed in Canvas https://eagleonline.hccs.edu.

#### **Other Instructional Resources**

### **Tutoring**

HCC provides free, confidential, and convenient academic support, including writing critiques, to HCC students in an online environment and on campus. Tutoring is provided by HCC personnel in order to ensure that it is contextual and appropriate. Visit the <a href="https://example.com/hCC Tutoring">HCC Tutoring</a> Services website for services provided.

#### **Libraries**

The HCC Library System consists of 9 libraries and 6 Electronic Resource Centers (ERCs) that are inviting places to study and collaborate on projects. Librarians are available both at the libraries and online to show you how to locate and use the resources you need. The libraries maintain a large selection of electronic resources as well as collections of books, magazines, newspapers, and audiovisual materials. The portal to all libraries' resources and services is the HCCS library web page at <a href="http://library.hccs.edu">http://library.hccs.edu</a>.

#### **Supplementary Instruction**

Supplemental Instruction is an academic enrichment and support program that uses peer-assisted study sessions to improve student retention and success in historically difficult courses. Peer Support is provided by students who have already succeeded in completion of the specified course, and who earned a grade of A or B. Find details at <a href="http://www.hccs.edu/resources-for/current-students/supplemental-instruction/">http://www.hccs.edu/resources-for/current-students/supplemental-instruction/</a>.

#### **Course Overview**

BIOL 1322 introduces general nutritional concepts in health and disease and includes practical applications of that knowledge. Special emphasis is given to nutrients and nutritional processes including functions, food sources, digestion, absorption, and metabolism. Food safety, availability, and nutritional information including food labels, advertising, and nationally established guidelines are addressed.

### **Core Curriculum Objectives (CCOs)**

BIOL 1322 satisfies the Natural Science requirement in the HCCS core curriculum. The HCCS Biology Discipline Committee has specified that the course address the following core objectives:

- **Critical Thinking**: Students will demonstrate the ability to engage in inquiry and analysis, evaluation and synthesis of information, and creative thinking by completing a written assignment such as a book report, research paper, or essay.
- **Communication Skills**: Students will demonstrate effective development, interpretation and expression of ideas through written, oral, and visual communication by completing a written assignment such as a book report, research paper, or essay.
- Quantitative and Empirical Literacy: Students will demonstrate the ability to draw
  conclusions based on the systematic analysis of topics using observation, experiment,
  and/or numerical skills by completing textbook reading assignments, completing
  assignments, and answering questions on quizzes and exams that pertain to Course
  Student Learning Outcomes below.
- **Team Work** Students will demonstrate the ability to consider different points of view and work effectively with others to support a shared purpose or goal. The students may work collaboratively through written, oral or visual communication such as research papers and presentations.
- **Social Responsibility**: Students will demonstrate cultural self-awareness, intercultural competency, civil knowledge, and the ability to engage effectively in regional, national, and global communities by completing textbook reading assignments, completing assignments, and answering questions on quizzes and exams that pertain to Course Student Learning Outcome #4 below.
- **Personal Responsibility** The students will demonstrate the ability to connect choices, actions and consequences to decision making through analyzing behavior and completing a written report or presentation.

# **Program Student Learning Outcomes (PSLOs)**

### Upon completion of the Biology Program, the student will be able to:

- 1. Display an understanding of biological systems and evolutionary processes spanning all ranges of biological complexity, including atoms, molecules, genes, cells, and organisms.
- 2. Demonstrate the ability to think critically and to integrate factual and conceptual information into an understanding of scientific data by written, oral and/or visual communication; this may include successful completion of a course-- specific research project or a case study module.
- 3. Demonstrate proficiency and safe practices in the use of laboratory equipment and laboratory techniques.
  - 4. Apply principles of the scientific method to problems in biology in the collection,

recording, quantitative measurement, analysis and reporting of scientific data.

# **Course Student Learning Outcomes (CSLOs)**

### Upon completion of BIOL 1322, the student will be able to:

- 1. Apply nutritional knowledge to analyze personal dietary intake, to plan nutritional meals using nationally established criteria to meet recommended goals, and to evaluate food labels and the validity of nutritional claims
- 2. Trace the pathways and processes that occur in the body to handle nutrients and alcohol through consumption, digestion, absorption, transport, metabolism, storage and waste excretion.
- 3. Discuss function, sources, deficiencies, and toxicities of macro and micronutrients, including carbohydrates, lipids, proteins, water, vitamins and minerals.
- 4. Apply the concept of energy balance and its influences at the physical, emotional, societal, and cellular level to evaluate advantages and disadvantages of various methods used to correct energy imbalance
- 5. Utilize concepts of aerobic and anaerobic systems, and knowledge about macronutrients, vitamins, minerals, ergogenics, and supplements and relate them to fitness and health.
- 6. Describe health and disease issues related to nutrition throughout the life-cycle, including food safety, corrective dietary modifications, and the influence of specific nutrients on disease

# **Learning Objectives**

Learning Objectives for each CSLO can be found at Learning Objectives for BIOL 1322.

### **Student Success**

Academic standards require a minimum of 3 study hours for every contact hour; meaning for a class that meets 3 hours per week, you need to budget and set aside a minimum of 9 hours each week to study and prep for your course success. Expect to spend at least twice as many hours per week outside of class as you do in class studying the course content. Additional time will be required for written assignments. The assignments provided will help you use your study hours wisely. Successful completion of this course requires a combination of the following:

- Reading the textbook
- Attending class in person and/or online
- Timely completion of assignments
- Participating in class activities
- Successful exam performance, including the mandatory final

There is no short cut for success in this course; it requires reading and studying the material using the course objectives as a guide.

# **Instructor and Student Responsibilities**

#### As your Instructor, it is my responsibility to:

- Provide the grading scale and detailed grading formula explaining how student grades are to be derived
- Facilitate an effective learning environment through learner-centered instructional techniques
- Provide a description of any special projects or assignments
- Inform students of policies such as attendance, withdrawal, tardiness, and making up assignments
- Provide the course outline and class calendar that will include a description of any special projects or assignments
- Arrange to meet with individual students before and after class as required

#### As a student, it is your responsibility to:

- Attend class in person and/or online
- Participate actively by reviewing course material, interacting with classmates, and responding promptly in your communication with me
- Read and comprehend the textbook
- Complete the required assignments and exams
- Ask for help when there is a question or problem
- Keep copies of all paperwork, including this syllabus, handouts, and all assignments
- Attain a raw score of at least 50% on the departmental final exam
- Be aware of and comply with academic honesty policies in the <u>HCCS Student Handbook</u>

# Assignments, Exams, and Activities

- Lecture exams (59% of the grade Online using Respondus and Webcam):

  There will be a total of four lecture exams. The questions will be primarily multiple choice, along with some true or false, fill in the blank, picture identification, and short essay questions. Each exam has equal weight-age with other exams. Make up exams will be given only in case of emergency and at the discretion of the instructor. The instructor reserves the right NOT to give make-up exams. You will be asked to provide documentation for an emergency that causes you to miss an exam.

  All Lecture exams will be online through Canvas using the respondus lockdown browser and webcam. A link to download the software will be active when you start the exam. Students with disabilities who need special help taking tests as part of reasonable accommodation should contact the Office for Students with Disabilities for information regarding testing.
- <u>Learning Curve Assignments</u> (10% of the total grade Online) Adaptive online assessments. These assignments are meant to help you understand chapter content.
- AnalyzeMyDiet Assignment (10% of the total grade Online) There are a total seven assignments, six will be counted towards the final grade computation. If you complete all seven, your lowest score will be dropped, if you miss one, it becomes your dropped grade.
- Chapter Summative Quizzes (10% of the grade Online): One homework assignment per module will be administered through canvas to help better understand the content.
- <u>Syllabus Quiz</u> (1% of the total grade Online) Required. The syllabus quiz will also count as your attendance. Failure to complete this quiz will result in an automatic drop from the course for non-attendance.
- **Final Exam (10% of the grade In Person)**: Final exam is a comprehensive departmental final exam which is to be taken in person at the DE testing centers. This is a required component of the grade. Final exam will be administered online **December 8 using lockdown browser and webcam.**

# **Grading Formula**

Your course grade will be calculated as follows:

- 59%: 4 Lecture Exams (no drops)
- 1%: Syllabus Quiz
- 10%: Online Learning Curve assignment (drop 2 lowest Grade)
- 10%: Summative Quizzes (drop 2 lowest Grade)
- 10%: Best 6 out of 7 Online AnalyzeMyDiet Project Activities (drop 1 lowest grade)
- 10%: Comprehensive Final Exam

The grading scale and curving policy is as follows:

- A = 90% and up (4 GPA points/semester hour)
- B = 80-89% (3 GPA points/semester hour)
- C = 70-79% (2 GPA points/semester hour)
- D = 60-69% (1 GPA points/semester hour)
- F = 59% and below (0 GPA points/semester hour)
- W (Withdrawn) (does not affect GPA; YOU must initiate)
- I (Incomplete) (does not affect GPA; must be in good standing late in semester)

Course % grades ending in 0.50 or more will be rounded up; course % grades ending in 0.49 or less will NOT be rounded up. It is YOUR responsibility to KEEP AN EYE ON YOUR GRADE and do everything you can to AVOID BEING BORDERLINE.

NO EXCEPTIONS.

#### **Incomplete Policy:**

In this course, the purposes of the "I" (incomplete) grade is for students who are caught up and passing at the student withdrawal deadline, and then have a medical or other problem that prevents them from completing the course. If you are not passing at the student withdrawal deadline, <u>you should drop yourself</u> from the course, or you will likely earn an "F." An incomplete "I" grade will be given only if all of the following conditions are met:

- ✓ You have earned at least 85% of the available points by the date that the "I" grade is requested.
- ✓ You can provide documentation showing why you should earn an incomplete, such as a doctor's note, etc.
- ✓ You must be passing with a grade of "C" or better.
- ✓ You must request the incomplete in writing BEFORE December 1<sup>st</sup>, 2020
- ✓ In all cases, the instructor reserves the right to decline a student's request to receive a grade of Incomplete.

HCC Grading Scale can be found on this site under Academic Information: <a href="http://www.hccs.edu/resources-for/current-students/student-handbook/">http://www.hccs.edu/resources-for/current-students/student-handbook/</a>

# **Course Calendar**

Week	Ch	Reading Schedule	Testing Schedule
9/21	1 2	Syllabus/ORIENTATION The Science and Scope of Nutrition Healthy Diets	
9/28	3	Digestion	September 28: Learning Curve Ch 1 and 2 September 30 midnight: Syllabus Quiz
10/5	4	Carbohydrates	October 4: Learning Curve Ch 3 October 9: Summative Quizzes Ch1-3 October 10: Exam 1 from ch 1-3
10/12	5 6	The Lipids Proteins	October 15: Learning Curve Ch 4, Spotlight A
10/19			October 20: Learning Curve Ch 5, Spotlight B October 25: Learning Curve Ch 6, Spotlight C
10/26			October 30: Summative Quizzes Ch 4-6, Spotlight Summative Quizzes A-C October 31: Exam 2 from ch 4-6, Spotlights A-C
11/2	7 8	Fat Soluble Vitamins Water Soluble Vitamins	November 5: Learning Curves 7 and 8
11/9	9 10	Major Minerals and Water Trace Elements	Last day to withdraw (November 9, 2020) November 15: Learning Curves 9 & 10, Spotlight D
11/16			November 20: Summative Quizzes Ch7-10, Spotlight Summative Quiz D November 21: Exam 3 from ch 7-10
11/23	11 12	Energy Balance & Obesity Nutrition & Fitness	November 25: Learning Curve Ch 11 and 12
11/30	13 14	Nutrition through College Years Global Nutrition	November 30: Learning Curve Ch 13 & Spotlight E  December 2: Spotlight F and G  December 4: Learning Curve Ch 14 & Spotlight H
12/7			Nov 30: -Analyze My Diet Activities  December 6: Summative Quizzes Ch 11-14,  SPOTLIGHT E,F and G  December 7: Exam 4  December 8: Comprehensive Final Exam, Online

\*\*\* LaunchPad Assignments: Access these assignments in Canvas https://eagleonline.hccs.edu

Student Phone Support: 1-800-936-6899 Technical Support Hours (Eastern Time): Monday - Thursday: 8:00 a.m. - 3:00 a.m.

Friday: 8:00 a.m. - 12:00 a.m. Saturday: 12:00 p.m. - 8:00 p.m. Sunday: 12:00 p.m. - 3:00 a.m.

### **Syllabus Modifications**

The instructor reserves the right to modify the syllabus at any time during the semester and will promptly notify students in writing, typically by e-mail, of any such changes.

### **Instructor's Practices and Procedures**

### **Missed Assignments**

You can access all activities (assignments, exams, and quizzes) by logging into your Eagle Online account from a computer at home or HCC computer lab within a specified time limit. Any activity that is not submitted on time is a missed activity which will be graded as zero. There will be no make-up opportunities for missed activities. Technical issues are not acceptable excuses for missed online activities, so please make sure to resolve all technical problems before taking online activities.

- There will be no makeup exams, quizzes or homework/project assignments for any reason.
- This course requires students to take the mandatory final exam in a proctored environment.
- All other online exams require Lockdown Browser. Specific guidelines and dates are provided online once you log into our course at https://eagleonline.hccs.edu/courses/

### **Academic Integrity**

I am committed to a high standard of academic integrity in the academic community. In becoming a part of the academic community, students are responsible for honesty and independent effort. Failure to uphold these standards includes, but is not limited to, the following: plagiarizing written work or projects, cheating on exams or assignments, collusion on an exam or project, and misrepresentation of credentials or prerequisites when registering for a course. Cheating includes looking at or copying from another student's exam, orally communicating or receiving answers during an exam, having another person take an exam or complete a project or assignment, using unauthorized notes, texts, or other materials for an exam, and obtaining or distributing an unauthorized copy of an exam or any part of an exam. Plagiarism means passing off as his/her own the ideas or writings of another (that is, without giving proper credit by documenting sources). Plagiarism includes submitting a paper, report, or project that someone else has prepared, in whole or in part. Collusion is inappropriately collaborating on assignments designed to be completed independently. These definitions are not exhaustive. When there is clear evidence of cheating, plagiarism, collusion, or misrepresentation, disciplinary action may include but is not limited to requiring you to retake or resubmit an exam or assignment, assigning a grade of zero or "F" for an exam or assignment; or assigning a grade of "F" for the course. Additional sanctions including being withdrawn from the course, program or expelled from school may be imposed on a students who violate the standards of academic integrity.

Scholastic Dishonesty will result in a referral to the Dean of Student Services. See the link below for details.

Here's the link to the HCC information about academic integrity (Scholastic Dishonesty and Violation of Academic Scholastic Dishonesty and Grievance):

http://www.hccs.edu/about-hcc/procedures/student-rights-policies--procedures/student-procedures/

### **Attendance Procedures**

Attendance is mandated by the state. You are expected to attend online class regularly. You will not receive a "W" after the official drop date. The Texas Legislature passes a law limiting first time entering freshmen to no more than SIX total course withdrawals throughout their educational career in obtaining a certificate and / or degree. Students are expected to:

- Take the mandatory online orientation. Please access to the "Online Course Information" by visiting this website http://de2.hccs.edu/courses/index.php?sem=6201
- Take the syllabus quiz one day before official day of record (due on **September 30, 2020**). Students who do not complete the syllabus quiz before the due date may be automatically dropped for non-attendance.
  - Students are responsible for withdrawing from this course.
  - Any student who wishes to drop must officially do so on or before the drop date.
  - Failure to withdraw officially will result in a letter grade, not "W" in this course.
  - A grade "FX" will be assigned for failure due a lack of attendance.

#### **Student Conduct**

Students are expected to conduct themselves as adults. This includes courteous and respectful behavior towards instructor and classmates. Disruptive behavior or any behavior that interferes with any educational activity being performed by the instructor will not be allowed. Additionally, no student may interfere with his/her fellow students' right to pursue their academic goals to the fullest in an atmosphere appropriate to a community of scholars. Disruptive behavior may result in removal from the class.

### **Instructor's Course-Specific Information (As Needed)**

I will teach you to the best of my ability. If you have any question or concern about your test results or grade, please talk e-mail me to set a specific meeting time. You have opportunities to review module exams and discuss ways to improve your study/learning strategies.

#### **Electronic Devices**

Absolutely no phone or other personal electronic devices are to be used during exams. STUDENTS ARE NOT PERMITTED TO HANDLE CALLS DURING EXAMS. Phones will be placed in front of the class during each exam.

# **Biology Program Information**

The Biology area of study here at HCC covers the smallest and simplest organisms (microbiology) to the largest and most complex organisms (human anatomy and physiology, zoology, botany).

AWARD TYPES: Associate in Science

AREA OF STUDY: Science, Technology, Engineering & Math

Please visit link: https://www.hccs.edu/programs/areas-of-study/science-technology-

engineering--math/biology/

#### **HCC Policies**

Here's the link to the HCC Student Handbook <a href="http://www.hccs.edu/resources-for/current-students/student-handbook/">http://www.hccs.edu/resources-for/current-students/student-handbook/</a> In it you will find information about the following:

- Academic Information
- Academic Support
- Attendance, Repeating Courses, and Withdrawal
- Career Planning and Job Search
- Childcare
- disAbility Support Services
- Electronic Devices
- Equal Educational Opportunity
- Financial Aid TV (FATV)
- General Student Complaints
- Grade of FX
- Incomplete Grades
- International Student Services
- Health Awareness
- Libraries/Bookstore
- Police Services & Campus Safety
- Student Life at HCC
- Student Rights and Responsibilities
- Student Services
- Testing
- Transfer Planning
- Veteran Services

#### EGLS<sup>3</sup>

The EGLS<sup>3</sup> (Evaluation for Greater Learning Student Survey System) will be available for most courses near the end of the term until finals start. This brief survey will give invaluable information to your faculty about their teaching. Results are anonymous and will be available to faculty and division chairs after the end of the term. EGLS<sup>3</sup> surveys are only available for the Fall and Spring semesters. –EGLS3 surveys are not offered during the Summer semester due to logistical constraints.

http://www.hccs.edu/resources-for/current-students/egls3-evaluate-your-professors/

# **Campus Carry Link**

Here's the link to the HCC information about Campus Carry: <a href="http://www.hccs.edu/departments/police/campus-carry/">http://www.hccs.edu/departments/police/campus-carry/</a>

# **HCC Email Policy**

When communicating via email, HCC requires students to communicate only through the HCC email system to protect your privacy. If you have not activated your HCC student email account, you can go to HCC Eagle ID and activate it now. You may also use Canvas Inbox to communicate.

# **Housing and Food Assistance for Students**

Any student who faces challenges securing their foods or housing and believes this may affect their performance in the course is urged to contact the Dean of Students at their

college for support. Furthermore, please notify the professor if you are comfortable in doing so.

This will enable HCC to provide any resources that HCC may possess.

# Office of Institutional Equity

Use the link below to access the HCC Office of Institutional Equity, Inclusion, and Engagement (<a href="http://www.hccs.edu/departments/institutional-equity/">http://www.hccs.edu/departments/institutional-equity/</a>)

# disAbility Services

HCC strives to make all learning experiences as accessible as possible. If you anticipate or experience academic barriers based on your disability (including long and short term conditions, mental health, chronic or temporary medical conditions), please meet with a campus Abilities Counselor as soon as possible in order to establish reasonable accommodations. Reasonable accommodations are established through an interactive process between you, your instructor(s) and Ability Services. It is the policy and practice of HCC to create inclusive and accessible learning environments consistent with federal and state law. For more information, please go to <a href="http://www.hccs.edu/support-services/">http://www.hccs.edu/support-services/</a>

#### **Title IX**

Houston Community College is committed to cultivating an environment free from inappropriate conduct of a sexual or gender-based nature including sex discrimination, sexual assault, sexual harassment, and sexual violence. Sex discrimination includes all forms of sexual and gender-based misconduct and violates an individual's fundamental rights and personal dignity. Title IX prohibits discrimination on the basis of sex-including pregnancy and parental status in educational programs and activities. If you require an accommodation due to pregnancy please contact an Abilities Services Counselor. The Director of EEO/Compliance is designated as the Title IX Coordinator and Section 504 Coordinator. All inquiries concerning HCC policies, compliance with applicable laws, statutes, and regulations (such as Title VI, Title IX, and Section 504), and complaints may be directed to:

David Cross
Director EEO/Compliance
Office of Institutional Equity & Diversity
3100 Main
(713) 718-8271
Houston, TX 77266-7517 or Institutional.Equity@hccs.edu
http://www.hccs.edu/departments/institutional-equity/title-ix-know-your-rights/

#### Office of the Dean of Students

Contact the office of the Dean of Students to seek assistance in determining the correct complaint procedure to follow or to identify the appropriate academic dean or supervisor for informal resolution of complaints.

https://www.hccs.edu/about-hcc/procedures/student-rights-policies--procedures/student-complaints/speak-with-the-dean-of-students/

# **Department Chair Contact Information**

Dr. DaeJan Grigsby

Email: daejan.grigsby@hccs.edu

Phone: 713-718-7775