**13316 - PHSC 1203-903**

**Physical Science, Spring, 2022**

**Course Information**

**Instructor**: Tracy Woodruff

**Meeting day/time/place**: MTWRF 11:25 am -12:20 pm NHS 122

**Office hours**: By appointment through email.

**Email address**: twoodruff@astate.edu

 tracy.woodruff@nettletonschools.net

**Textbook and Materials**

**Required text**: None

**Additional materials**: \*A scientific calculators, *phones will not be allowed during exams*

**Purpose and Goals/Learning Outcomes**

**Course Description: PHSC 1203. Physical Science** The relationship of man to his physical world, content of the course is centered on the development of our modern concepts about matter and energy and how this development is related to the social order of which man is a part. Lecture three hours. This course does not satisfy science certification for secondary school teachers. It is not accepted as a major requirement in any natural science field. Special course fees may apply. To be taken concurrently with PHSC 1201. Prerequisite, MATH 0013 or ACT Mathematics score of 16.

**General Education Goal**: Students should understand how science is conducted and the criteria for scientific evidence so that they will be able to make informed decisions about the health and well-being of their communities and the natural environment. They should be aware of the ethical and political issues raised by science.

**Student Learning Outcomes**: Students will be able to apply foundational knowledge of the various sciences to make informed decisions.

**Materials to be covered:** I will cover aspects of physical science, food, and current events with their relevance to our lives, such as food molecules, energy, additives packaging, waste and how this affects our environment.

**Exams, Quizzes and Homework:**

EXAMS: There will be three unit exams composed of true/false, multiple choice, and/or an essay portion. There will also be a comprehensive final. You cannot make up an exam unless you are absent due to a university sanctioned event, in which case you need to bring me a letter. **The final is comprehensive and is required, as this is required by the university.**

 QUIZZES/HOMEWORK: Quizzes and homework will be assigned throughout the semester. They will consist of Quest assignments and readings/research of various articles/stories online. These will be done on your own time and each will be worth 10 points. Your lowest two quiz/homework with be dropped and the rest of the quizzes and homework will be combined to equal an exam grade. **No extensions for homework will be granted for ANY reason.**

PROJECT: The project will be done at the end of the semester. You will be working in pairs or individually. This will be a project in which you will study scientific claims of a product, prove or disprove these claims and present your experiments to the class in a 10-15 minute presentation. NO LATE SUBMISSIONS WILL RECEIVE CREDIT.

Make-up Work/Late Work: Make-up work will not be accepted unless your absence is excused. Late work will not be accepted. All assignments will be posted on Google Classroom and will be accessible even if we are not on campus.

**Class Lecture Schdule**

|  |  |
| --- | --- |
| **Week** | **Topic** |
| 1-4 | Units, unit conversions, temperature, atoms, elements, compounds, matter, bonds, changes, water, food molecules, chemistry of flavor |
| 5-8 | heat, heat transfer, energy, calorimetry, specific heat, latent heat, food additives, acids & bases, food packaging, polymers, waste |
| 9-12 | food waste, agriculture, and climate change |
| 13 | Project presentations and final |

**Exam Schedule**

|  |  |
| --- | --- |
| **EXAM** | **DATE** |
| Quizzes/Homework | random |
| Exam 1  | February 1 |
| Exam 2  | March 1 |
| Exam 3 | April 4 |
| Project Presentations | Beginning April 11 |
| Comprehensive Final | April 18 |

**Grading:** Grades will be based on the standard 90% (A), 80%(B), 70%(C), 60%(D). Please note that final grades **will not** be rounded up. Also, please note that because of the Family Educational Rights Privacy Act, no grades may be given or discussed over the phone.

***Please note: I will reserve the right to ask those who are constantly talking or being disruptive to leave the classroom. If this occurs more than once, I will deduct points from your total grade.***

**Students with Disabilities:** Students who require academic adjustment in the classroom due to a disability must first register with ASU Disability Services. Following registration and within the first two weeks of class, please contact me to discuss appropriate academic accommodation. Appropriate arrangements can be made to ensure equal access to this course.

**Tutoring services can be found in the Library.**

If you are feeling overwhelmed, stressed, depressed, etc., please consider using the counseling services on campus. They are there to help. <https://www.astate.edu/a/counseling-services/>

**Policies**

**The following is copied directly from the ASU Student Handbook:**

**ACADEMIC INTEGRITY POLICY**

Arkansas State University enthusiastically promotes academic integrity and professional ethics among all members of the ASU academic community. Violations of this policy are considered as serious misconduct and may result in disciplinary action and severe penalties.

**A. PLAGIARISM**

**Plagiarism** is the act of taking and/or using the ideas, work, and/or writings of another person as one's own.

1. To avoid plagiarism give written credit and acknowledgment to the source of thoughts, ideas, and/or words, whether you have used direct quotation, paraphrasing, or just a reference to a general idea.

2. If you directly quote works written by someone else, enclose the quotation with quotation marks and provide an appropriate citation (e.g., footnote, endnote, bibliographical reference).

3. Research, as well as the complete written paper, must be the work of the person seeking academic credit for the course. (Papers, book reports, projects, and/or other class assignments)

**Discipline:** Faculty members may respond to cases of plagiarism in any of the following ways:

1. Return the paper or other item for rewriting; the grade may be lowered.

2. Give a failing grade on the paper or other item—"F" if a letter grade is used or zero if a numerical grade is used.

3. Give the student who plagiarized a failing grade in the course.

4. Recommend sanctions, including disciplinary expulsion from the university. All cases should be referred to the student conduct system.

**B. CHEATING**

**Cheating** is an act of dishonesty with the intention of obtaining and/or using information in a fraudulent manner.

1. Observing and/or copying from another student's test paper, reports, computer files and/or other class assignments.

2. Giving or receiving assistance during an examination period. (This includes providing specific answers to subsequent examinees and/or dispensing or receiving information that would allow the student to have an unfair advantage in the examination over students who did not possess such information.)

3. Using class notes, outlines, and other unauthorized information during an examination.

4. Using, buying, selling, stealing, transporting, or soliciting, in part or in whole the contents of an examination or other assignment not authorized by the professor of the class.

5. Using for credit in one class a term paper, book report, project, or class assignment written for credit in another class without the knowledge and permission of the professor of the class.

6. Exchanging places with another person for the purpose of taking an examination or completing other assignments.

**Discipline:** Faculty members may respond to cases of cheating in any of the following ways:

1. Allow the testing to progress without interruption, informing the offending student about the offense—and award a failing grade on the test—"F" if a letter grade is used or zero if a numerical grade is used.

2. Seize the test of the offending student and give a failing grade on the paper.

3. Give the offending student a failing grade in the course.

4. Recommend sanctions, including disciplinary expulsion from the university. All cases should be referred to the student conduct system.

**C. ATTENDANCE**

Students enrolled in freshman or sophomore level courses numbered 1000 or 2000 may during the spring and fall semester miss no more than twice the number of lectures, recitations, laboratory sessions, or other regularly scheduled class activities that would normally be scheduled during a week. Students who miss more than the maximum number of freshman or sophomore level classes may be assigned a grade of “FN” for the course. Students who may be assigned a grade of “FN” in a course because of excessive absences may withdraw from the course without penalty before the deadline for dropping an individual course. In determining whether excessive absences should result in a failing grade, consideration shall be given to the maturity and class standing of the student, the quality of academic work being accomplished by the student, and extenuating circumstances related to such absences.

**D. SEXUAL MISCONDUCT**

Arkansas State works to provide a safe, productive learning environment. Title IX and university policy prohibit sexual discrimination, which regards sexual misconduct — including harassment, domestic and dating violence, sexual assault, and stalking. Sexual violence can undermine students’ academic success. If you have been sexually assaulted, you can immediately speak with someone at NEARK’s Family Crisis Center’s 24-hour Sexual Assault Line: (870) 933-9449. Reports to law enforcement can be made to the University Police Department: (870) 972-2093 If you or someone you know has been harassed or assaulted, support can be provided from the Counseling Center and Pack Support. The Student Health Center provides Sexual Assault resources. Alleged violations can be reported non-confidentially to the Title IX and Institutional Equity office. It provides local, state and national resources for counseling, law enforcement, medical treatment, financial assistance, and legal services.

**E. INCLEMENT WEATHER**

In the case of inclement weather, any assignments due will be due the next class day. If the day is assigned as an AMI day you will need to complete the AMI assignment for the assigned day in Google Classroom. The AMI work will be due on the second day of class once school resumes.

**COVID-19 University Syllabus Statement**

**Spring 2022**

Arkansas State University has made every effort to provide a safe and comfortable learning environment for our return to in-person instruction during the Spring 2022 semester. The University is following the most up-to-date guidelines set forth by the Arkansas Department of Health and the Centers for Disease Control and Prevention.

Given the uncertainty surrounding the continuing threat from the COVID-19 pandemic, we acknowledge there is potential for the interruption of in-person instruction during the course of this semester. While it is the goal of the institution to offer traditionally face-to-face classes, the social distancing measures arising out of the COVID-19 pandemic have caused many of the classes to be offered in a hybrid format this semester (i.e. a combination of face-to-face and remote modes of delivery). This means nearly every course offered will have a component where internet access is essential to course success. Students are strongly encouraged to secure WiFi access they can use for the semester either on or off campus. The purpose for this strategy is to protect our students, faculty, and staff while adhering to physical distancing recommendations from public health officials while accomplishing the course learning objectives.

If the university transitions to all-online instruction, campus housing will remain available for students who do not have a safe place to move or who do not have access to the internet elsewhere. Students who leave campus will need to ensure that they have reliable access to the internet to continue their course work. Web cameras may also be required by instructors to facilitate remote instruction (**please see technology recommendations section below**). University officials will provide students with as much advanced notice and information as possible if the transition to all-online instruction becomes necessary.

Please remember, all official notifications are made through your official A-State email account, the university website, and Blackboard Learn. You are responsible for checking your university email to ensure you receive the latest updates regarding this course.

**COVID-19 University Technology Recommendations for Students**

Technology (hardware and software) and internet access will be key to course success in Spring 2022. Please check the following list to be certain you have the technology needed to be successful in your courses.

1.      *Internet Access—You should make arrangements to have access to the Internet, preferably high-speed Internet, for the duration of this course.* A wired, high-speed, Internet connections (ethernet cable), is highly recommended especially when taking a test.

*2.      Computer Operating Systems*

         *For PCs: Windows 8+*

         *For MACs: OS 10.13+*

         *For Cellular Phones: iOS or Android*

3.      *iOS Devices, any of these options should work; however, completing most course assignments will need a computer:*

         *iPhone 6s or later, iPad Air 2 or later*

*4.      Android Devices, any of these options should work; however, completing most course assignments will need a computer:*

         *Samsung Galaxy (S9+, Note 9+), Google Pixel (3A+), OnePlus (7T+)*

*5.      Software—You will be the most successful in this course if you have access to a computer with the following software installed:*

         *Microsoft Office****–Excel, Power Point and Word.*** *A-State has secured for you access to the latest MS Office software for both Mac and PC users. For more information, please visit the*[*software download*](https://www.astate.edu/a/its/software-downloads/)*page where you will find other tools needed to be successful in this course.*

         *Students are welcome to use Mac Applications such as Keynote, Numbers, and Pages, but please plan to convert these documents to the Microsoft file types prior to assignment submission. This course technology requirement also applies to Google Slides, Sheets, and Docs.*

         *Browsers, Plug-ins, Players and Viewers—to take full advantage of all the features in this course, be sure you have the right technology at your fingertips. This includes:*

         *Blackboard-supported browser - Firefox 60+, Chrome 74+, and Safari 12+ (Internet Explorer is no longer supported) are compatible with the current version of Blackboard.*

         [*Acrobat Reader*](https://get.adobe.com/reader/)

         *It is recommend running the*[Blackboard Browser Check](https://help.blackboard.com/Learn/Student/Getting_Started/Browser_Support/Browser_Checker)*to verify installed plug-ins on your computer*

*6.      Additional Computer Hardware:  web camera, microphone, and speakers (can be internal hardware already available on your computer)*