NORTH CENTRAL TEXAS COLLEGE

COURSE SYLLABUS

COURSE AND INSTRUCTOR INFORMATION

Course title: Solar System.
Course prefix, number, and section number: AST1404-343.
Semester/Year of course: Spring 2026.
Semester start and end dates: January 12th, May 9th.
Modality (Face to face/Synchronous or Asynchronous online/Hybrid): Asynchronous online.
Class meeting location, days, and times: Canvas online.
Lab meeting location, days, and times: Canvas online.
Semester credit hours: 48.
Course description: Study of the Sun and its Solar System, including its origin. Laboratory included.
Course prerequisites: MATH0305 or TSI eligible for MATH0310 or higher.
Required course materials:
Recommended textbook: "Astronomy-2e OpenStax". The book can be downloaded freely from https://openstax.org/details/books/astronomy-2e.
Calculator (TI30XIIS or equivalent).
Note: Students will be charged the $24 per credit hour for all courses no matter what materials are being used. If they are only enrolled in an OER class (like this one) then they would benefit from opting out, however, if they have multiple other classes not using OER they need to consider overall cost for all of their courses. Opt-out deadline closes January 16th, 2026 (10:59 pm CST)
Name of instructor: Franz Aguirre.
Office location: Flower Mound MSU-221.
Telephone number:
E-mail address: faguirre@nctc.edu
Office hours for students: Webex Mondays 4:00 pm – 6:00 pm.

SYLLABUS CHANGE DISCLAIMER

The faculty member reserves the right to make changes to this published syllabus if it is in the best interest of the educational development of this class. Any such changes will be announced as soon as possible in person and/or writing.

SUMMARY OF COURSE ASSIGNMENTS

List of graded assignments:

1. Discussion Boards: 5%
2. Quizzes 40%
3. Midterm 20%
4. Labs 20%
5. Final Exam 15%

Final grade scale: A: 90-100 B: 80-89 C: 70-79 D: 60-69 F: 0- 59
Late work policy: no late solution to any assignment will be accepted.

SEE CANVAS FOR THE COMPLETE COURSE CALENDAR, OUTLINE, DETAILED DESCRIPTION OF GRADED WORK, AND OTHER RELATED MATERIAL.

COURSE POLICIES

Academic Integrity Policy:
Students are expected to submit their own solutions to assignments. A grade of zero will be assigned to the student who submit a copy of another student's work.

Artificial Intelligence Policy: Students are allowed to use automated tools based on artificial intelligence as long as they have been properly cited. Violations of this policy will be considered student misconduct. It is the student's responsibility to verify the correctness of the result submitted in an assignment using these tools.

Attendance Policy: There is no grade for attendance but students are expected to complete their work in Canvas each week. Students' attendance will be inferred from their progress in the course.

Withdrawal Policy
A student may withdraw from a course on or after the official date of record. It is the student's responsibility to initiate and complete a Withdrawal Request Form.
Last day to withdraw from the course with a "W" is: March 30th.
Student Learning Outcomes:
At the successful completion of this course the student will be able to:

1. Define and apply basic astronomical concepts such as astronomical units, ecliptic, celestial equator, celestial coordinates, parallax, etc.

2. Demonstrate knowledge of the basic laws of physics and apply them to the study of the bodies of the solar system.
3. Compare and contrast the characteristics of the terrestrial and outer planets. Demonstrate understanding of the causes of their similarities and differences.
4. Demonstrate understanding of the properties of the smaller bodies of the solar system.
5. Demonstrate knowledge of the current best scientific explanation of the origin and evolution of the solar system.
6. Demonstrate knowledge of recent discoveries about extrasolar planetary systems.

Core Objectives:

Critical Thinking
Communication
Teamwork
Empirical and Quantitative Analysis

COLLEGE POLICIES

STUDENT HANDBOOK

Students are expected to follow all rules and regulations found in the Student Handbook.

ADA STATEMENT

NCTC will adhere to all applicable federal, state and local laws, regulations and guidelines with respect to providing reasonable accommodations to afford equal educational opportunity. It is the student's responsibility to contact the Office for Students with Disabilities to arrange appropriate accommodations. See the OSD Syllabus Addendum.

AI STATEMENT

Individual course instructors, in coordination with their divisions, set policies regulating the use of generative AI tools in their courses, including allowing or disallowing some or all uses of such tools. Course instructors will set such policies in their course syllabi and clearly communicate such policies to students. Students who are unsure of policies regarding generative AI tools are encouraged to ask their instructors for clarification.

STUDENT SERVICES

NCTC provides a multitude of services and resources to support students. See the Student Services Syllabus Addendum for a listing of those departments and links to their sites.

QUESTIONS, CONCERNS, or COMPLAINTS

The student should contact the instructor to deal with any questions, concerns, or complaints specific to the class. If the student and faculty are not able to resolve the issue, the student may contact the chair or coordinator of the division. If the student remains unsatisfied, the student may proceed to contact the instructional dean.

Name of Chair/Coordinator: Jaime Noles
Office location: Gainesville 408
Telephone number: 940-668-7731 ext. 4930
E-mail address: jnoles@nctc.edu

Name of Instructional Dean: Mary Martinson
Office location: Gainesville 1403
Telephone number: 940.668.7731 ext. 4377
E-mail address: mmartinson@nctc.edu