UNC
UNIVERSITY OF NORTHERN COLORADO

Extended Campus

College of Natural & Health Sciences
School of Mathematical Sciences

UNC Dual Enrollment at Greeley Central High School

MATH 125-657/688: Plane Trigonometry (3 credits, LAC, gtP*)
Fall 2020

Instructor: Sean Miller
        BA, Secondary Education, emphasis in Mathematics, University of Northern Colorado, 2010
        MA, Mathematics, University of Northern Colorado/Wyoming, 2014
Email: smiller4@greeleyschools.org
Office Phone: 970-348-5102
Office Hours: Wednesday and Thursday 10:45 – 11:15

Stay Connected:
I will post daily/weekly reminders regarding upcoming assessments and homework on the free app Remind.
To Join:
- Send a text to 81010; with the message @3a59d
  Or visit
- https://www.remind.com/join/3a59d

Prerequisite for UNC Dual Enrollment:
- Junior or Senior status
- 3.0 cumulative GPA
- Grade of "C" or better in College Algebra. A grade of C- is not acceptable.
- Counselor/Instructor approval prior to taking the course
- Parent consent
- Special Exemptions to these qualifications may be made on an individual basis through written request to UNC Extended Campus

Course Description: Topics covered in this course include circular functions and their applications, inverse trigonometric functions and identities, complex numbers and DeMoivre's Theorem.

Required Materials:
- Text Book: Precalculus: Graphical, Numerical, Algebraic 7th Edition.
  Demana, Waits, Foley, Kennedy, 2007, Pearson-Addison Wesley
  (Please note: these books cost $100 to replace.)
- Graphing Calculator. Acceptable models include TI-83, TI-83+, TI-84, TI-84+, all other models please ask. (Instructor will be using a TI-83+).
  - Sharing of calculators during quizzes or exams will not be permitted.
  - Bring calculators to class. We will be using them throughout the semester.

Grading Scale:

A	90 – 100%	Weighted 5.0 (on 4.0 scale)
B	80 – 89.99%	Weighted 4.0
C	70 – 79.99%	Weighted 3.0
D	60 – 69.99%	NOT Weighted 1.0
F	below 60%	

Unit Tests (Summative) - 75% of course grade:
- Tests are given at the end of each unit of study.
- If you miss a test due to an excused absence and would like the opportunity to take it:
  - You or your parent MUST contact the instructor on exam day to verify that your absence is excused.
  - Take the missed exam by appointment, within 1 week of the absence. (You will receive an alternate, more challenging version of the test, because you will have had more time to study!)
- The following will result in a test score of ZERO:
  - Unexcused absence on an exam day.
  - Failure to complete an exam missed due to an excused absence, as described previously.
- There are **NO** test retakes.
- A final cumulative course exam will be given. ***There is no opportunity for retake on the final!***
  - The final will **not** be dropped and is weighted as 1.5% of a normal exam

Classwork & Homework Assignments – 15% of course grade:
- Assignments are given daily and will require a significant commitment of time at home to complete.
- Assignment deadlines/due dates will be announced during class.
- Late assignments will only be accepted for 1/2 credit after the day of the unit exam.

Quizzes - 10% of course grade:
- Quizzes will be given frequently to assess your progress with the daily material.
- If you miss a quiz due to an excused absence and would like the opportunity to take it:
  - Contact the instructor on to verify that your absence is excused.
  - Take the missed quiz by appointment, *immediately* upon returning to school.
- There are no opportunities for retaking quizzes.

Attendance:
This is a university level course. If you miss class for ANY REASON, YOU are responsible for learning the missed material (read the book, peer tutoring, online—YouTube has everything! etc.)

Planned Excused Absences:
If you will miss class because of a planned event, i.e. school activity, family event, doctor's appointment, you must get the assignment for the period that you expect to miss, prior to the absence.
This work is due on the same due date given to the rest of the class.

Unplanned Excused Absences:
If you miss class because of an unexpected event, i.e. illness, family emergency, you may contact the instructor by phone or email for your assignment. At the very least, ***you must meet with the instructor immediately upon your return*** to obtain the work missed.
Upon your return, you will have the same amount of time as your classmates to complete the assignment.

Unexcused Absences:
If your absence from school is unexcused, ***you are not entitled to earn credit for work missed***; this includes credit for tests, quizzes, and assignments!

Student Behavior Expectations
- Students will respect the rights of others, allowing everyone the opportunity to learn
- Students will attend class daily
- Students will be on time

- Students will come to class with the appropriate materials (I do not loan out materials)
- No food or drink will be permitted in class (Water bottles are acceptable)
- Students are expected to remain on task the entire period, using work time effectively
- Absolutely *no electronic devices* will be allowed, including, but not limited to cell phones, CD players, MP3 players, IPODs, etc. If these items materialize during class, I will take the item(s) and deliver them to one of the administrators.

Violation of any expectations will result in one of the following: a conference with Mr. Miller, parent / administrator conference, and/or removal from class.
*Other expectations not mentioned explicitly will follow directly with GCHS policy. *

Students with Disabilities

Any student requesting disability accommodation for this class must inform the instructor giving appropriate notice. Students are encouraged to contact Disability Support Services at Greeley Central High School to certify documentation of disability and to ensure appropriate accommodations are implemented in a timely manner.

Changes

The instructor reserves the right to amend, adjust, or otherwise modify the outline and syllabus at any time during the course. Changes will be announced in class and posted online on blackboard. The new syllabus will be available under the 'Syllabus' link, and I will post an announcement on blackboard to make everyone aware of the changes.

Honor Code

All members of the University of Northern Colorado community are entrusted with the responsibility to uphold and promote five fundamental values: Honesty, Trust, Respect, Fairness, and Responsibility. These core elements foster an atmosphere, inside and outside of the classroom, which serves as a foundation and guides the UNC community's academic, professional, and personal growth. Endorsement of these core elements by students, faculty, staff, administration, and trustees strengthens the integrity and value of our academic climate.

Academic Conduct: UNC's Policies

UNC's policies and recommendations for academic misconduct will be followed. For additional information, please see the Dean of Student's website, Student Handbook link
http://www.unco.edu/dos/pdf/StudentCodeofConduct.pdf
Off-campus students taking courses from UNC, should familiarize themselves with the academic regulations and procedures contained in the current UNC catalog: http://catalog.unco.edu/.

Dropping or Withdrawing from a UNC Dual Credit Course:

Note: Drop and withdrawal dates for the courses at your school can be found on your dual enrollment page for your high school.
Please use the Dual Enrollment Drop & Withdrawal Form.

- You can drop your course up until the designated Drop Deadline. The course will be removed from your transcript and you will receive a full tuition refund.
- After the Drop Deadline and up until the Withdrawal Deadline you can withdraw from your course. The course will remain on your transcript with a grade of "W" (this does not impact your GPA), and there is no tuition refund.
- After the withdrawal deadline you are unable to be removed from the course. The course will remain on your transcript with the grade that you have earned, and there is no tuition refund.
- If you stop attending the course but fail to officially withdraw from the course(s), you will be responsible for full tuition and fees and the course grade will remain on your transcript.

*Liberal arts core & Colorado gtPathways. This course satisfies 3 credits of Area 2. (Mathematics) of the UNC Liberal Arts Core. This course has been approved by the Colorado Commission on Higher Education for inclusion in the Colorado Guaranteed Transfer Program, gtP. gtP courses automatically transfer to any public institution in Colorado and will continue to count toward general education or other graduation requirements for any liberal arts or science associate or bachelor's degree program IF a grade of C- or higher is recorded. Statewide articulation agreements prescribe specific general education and degree requirements in the following

professional degree programs: business, early childhood, elementary education, engineering and nursing. Most other courses not approved for the gtP designation will also be accepted in transfer by other institutions but may not fulfill general education or degree requirements. For more information on the GT Pathways program, go to http://highered.colorado.gov/academics/transfers/gtpathways/curriculum.html.

Students who successfully complete the Area 2 Liberal Arts Core requirement in mathematics will have developed an understanding of fundamental mathematical concepts and their applications, will have developed their quantitative problem-solving skills, and will have developed a level of quantitative literacy that provides a foundation for success in their programs of study, careers, and citizenship.

Specifically, they will be able to:
a) Demonstrate good problem-solving habits, including:
- estimating solutions and recognizing unreasonable results
- considering a variety of approaches to a given problem, and selecting one that is appropriate
- interpreting solutions correctly
b) Generate and interpret symbolic, graphical, numerical, and verbal (written or oral) representations of mathematical ideas
c) Communicate mathematical ideas in written and/or oral form using appropriate mathematical language, notation, and style
d) Apply mathematical concepts, procedures, and techniques appropriate to the course
e) Recognize and apply patterns or mathematical structure
f) Utilize and integrate appropriate technology
g) Demonstrate competency in Quantitative Literacy by being able to:
  1) Interpret Information
     a. Explain information presented in mathematical forms (e.g., equations, graphs, diagrams, tables, words).
  2) Represent Information
     a. Convert information into and between various mathematical forms (e.g., equations, graphs, diagrams, tables, words).
  3) Perform Calculations
     a. Solve problems or equations at the appropriate course level.
     b. Use appropriate mathematical notation.
     c. Solve a variety of different problem types that involve a multi-step solution and address the validity of the results.
  4) Apply and Analyze Information
     a. Make use of graphical objects (such as graphs of equations in two or three variables, histograms, scatterplots of bivariate data, geometrical figures, etc.) to supplement a solution to a typical problem at the appropriate level.
     b. Formulate, organize, and articulate solutions to theoretical and application problems at the appropriate course level.
     c. Make judgments based on mathematical analysis appropriate to the course level.
  5) Communicate Using Mathematical Forms
     a. Express mathematical analysis symbolically, graphically, and in written language that clarifies/justifies/summarizes reasoning (may also include oral communication).

Students will be assessed on the content and competency criteria through a combination of tests, quizzes and homework assignments.

Outline of Course Content: Major Study Units:
- Radian measure, trigonometric functions, the fundamental identity.
- Graphs of trigonometric functions.
- Trigonometric identities
- Solving trigonometric equations
- Applications of trigonometry
- Complex numbers and trigonometry.

Instructors Note: UNC gets through chapters 1-6 using Dugopolski.

Trigonometry Contract

_____
Student Name (Please Print)

I have read and agree to comply with the policies for this course.

_____
Student Signature   Date

I have read and agree to support my student in complying with the policies for this course.

_____
Parent/Guardian Signature   Date

EMAIL ADDRESS: (please print)   [   ]

Parent/guardians: You can view your student's grades AND sign up for automated email notification of your student's grade status by logging on infinite campus I highly suggest that you visit this site regularly. Also, please feel free to contact me at any time for any reason.