MEMO FOR STUDENTS ENROLLED IN CVEG 563 Section 969, Geosynthetic Applications in Civil Engineering

SUBJECT: Administrative Instructions, CVEG 563-969 Geosynthetic Applications in Civil Engineering, Second Eight Week Term, Fall 2016

1. General: Meeting Time TBD
   Location TBD
   Prerequisites: Soil Mechanics, CVEG3133
   Soil Mechanics Lab, CVEG3130
   Instructor Norman D. Dennis, Jr.
   Office: 4188 Bell Engineering Center
   Phone: 5-6011
   Email: ndennis@uark.edu
   Office Hours: By Appointment, call 5-7455
   Home: 856-6072 Before 9:30 PM daily and after 8:00 AM on weekends.

2. Course Description This course will afford you a solid understanding of the beneficial use of the five major categories of geosynthetics; textiles, grids, nets, membranes and composites for civil engineering applications. Major design applications will focus on those related to the sub-disciplines of geotechnical, transportation and environmental engineering. Design considerations for each beneficial use will be developed. In addition, quality control issues for both manufacturing and installation of geosynthetic products will be addressed.

3. Course Objectives: When you complete this course you should be able to:

   a. Identify the various polymers used for geosynthetics and describe their engineering properties.
   b. Describe the various laboratory testing procedures for obtaining engineering properties of geosynthetics.
   c. Identify geosynthetics by major category and function.
   d. Design reinforced roadways and slopes with geosynthetics.
   e. Design filters and drainage systems for roads and embankments with geosynthetics.
   f. Design covers and liner systems for landfills with geosynthetics.
   g. Design erosion control systems with geosynthetics.
h. Describe and analyze recent case studies of engineering works that use geosynthetics.

4. **Texts and References:**


   b. Course Supplements. At specific points in the course we will use course supplements in the form of trade magazines and journal articles to present information not specifically covered in the assigned text.

5. **Attendance:** Class attendance is in accordance with the published university course schedule. You are responsible for material identified in the readings and covered in class, even if absent from class.

6. **Class Room Procedures:** Bring the text or assigned journal articles, study notes, a calculator and note taking material to each class period. Engineers take notes, perform calculations and take tests in pencil. You should also develop and bring a large 3-ring binder to accommodate class handouts and in class notes.

7. **Study Assignments:** Study assignments for each lesson will be posted on the board at the start of the previous class. The assignments are the basis for classroom discussion and problems. You should come to class with a general understanding of the major concepts to be discussed that day.

8. **Additional Instruction (AI):** If you are having a difficult time understanding a concept, coordinate a time for AI with me on as needed basis, even if it is outside normal office hours. Remember, AI is to answer specific questions on problem solving techniques or concepts already covered in class. AI is not a time for you to learn new material or cover material that you may have missed in class.

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9. **Examinations, Homework and Grading:**

   a. Examinations: CVEG 563-2 has two exams during the semester as indicated in the Course Schedule. There is no final examination in this course, but the second exam will be given during the final exam period. Exams may include both closed and open book sections.

   b. Quizzes. Quizzes will be given at the discretion of the instructor. Specific points associated with the quizzes will be rolled into the Instructor Grade in the grading plan.
SUBJECT: Administrative Instructions, CVEG 563-8, Spring Term AY2015

c. Homework. Homework assignments will be posted to BlackBoard and will be submitted through Blackboard. Submission deadlines will always be at 11:59 PM.

d. Solutions. Solutions to homework problems, exams, or any other special problems, will be maintained on BlackBoard and will be posted two days after the submission deadline.

e. Late Submissions. For major homework assignments late work will be accepted if coordination is made prior to the turn-in date. Work turned in late will be cut in decrements of 10%. The first 10% cut begins on the due date! A report or problem due at 11:59 PM but submitted at 12:01 AM on the next day will receive a 10% cut. Additional 10% decrements will be made on subsequent days at the discretion of the instructor. Work will not be accepted beyond three days late without special coordination affected well in advance of the due date.

g. Grade Summary:

<table>
<thead>
<tr>
<th>ITEM</th>
<th>POINTS</th>
<th>PERCENT</th>
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</thead>
<tbody>
<tr>
<td>Exams (2 @ 150 pts ea)</td>
<td>300</td>
<td>30</td>
</tr>
<tr>
<td>Special Problems/Homework (3@ 100 pts / Multiple totaling 50 pts)</td>
<td>350</td>
<td>35</td>
</tr>
<tr>
<td>Report/Presentation (250/100)</td>
<td>350</td>
<td>35</td>
</tr>
<tr>
<td>TOTAL</td>
<td>1000</td>
<td>100.00%</td>
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h. Raw score conversions to letter grades follow.

<table>
<thead>
<tr>
<th>Grade</th>
<th>Points</th>
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<tbody>
<tr>
<td>A</td>
<td>900 points</td>
</tr>
<tr>
<td>B</td>
<td>800 points</td>
</tr>
<tr>
<td>C</td>
<td>700 points</td>
</tr>
<tr>
<td>D</td>
<td>650 points</td>
</tr>
<tr>
<td>F</td>
<td>Less than 650 points</td>
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</tbody>
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10. Special Problems (SPs):

a. Special Problems. CVEG 563- has three Special Problems (DPs).

   (1) DP1 – Roadway Reinforcement (100 pts)
   (2) DP2 – Filter Design (100)
   (2) DP2 – Cover/Liner Stability (100 pts)
b. Admin Instructions. Instructions specific to each DP will be covered in the administrative instructions handed out with the specific problem. Issue/due dates for each problem are noted on the Course Schedule.

c. Group Work. There is no group work in this course

11. Report/Presentation:

   a. You will be required to do a literature review and prepare a written report (term paper) on a narrowly focused topic within the broad category of geosynthetics. As part of the report requirement you will be given one third of a class period to present your topic and lead a group discussion/problem solving session.

   b. Your grade will be based on the quality and completeness of both the report and presentation. Your presentation will be graded by both myself and the rest of the class.

   c. You will be required to view each student’s presentation, evaluate their presentation for content and delivery and write a brief summary of the content of their presentation.

   d. A list of potential topics will be distributed during the second week of class if you have not made a selection before then.

12. Written Submissions:

   a. Documentation. Written submissions are governed by The McGraw Hill College Handbook. Submissions, except routine homework, must be typed and should comply with the above reference or another appropriate reference. Assistance you get from me need not be acknowledged, however, assistance from other instructors or other students must be properly acknowledged as a parenthetical note and a proper bibliographic citation.

   b. Organization/Neatness of Submissions. A significant part of engineering is written communication of laboratory work and analysis/design proposals. As a significant course in your Civil Engineering program, heavy emphasis will be placed on the clarity, organization, and readability of your work. I will exercise significant freedom in decrementing work due to poor “readability.”

13. Instructor Availability: You and your understanding of the course material is my primary responsibility. You may contact me at my office during the normal working day or at home in the evenings if needed (not later than 9:30 PM please).
a. Unfortunately I cannot establish normal office hours during the work day. Ms. Rifi Raindriati manages my calendar and you can get an office hours (phone) appointment by calling her at 575-6010 if you have urgent questions.

b. I will respond to email as quickly as possible, but likely not during the normal business day.

c. Once the course starts I will try to find a convenient time for the class to meet via Blackboard Collaborate one evening per week for no more than an hour. This will be your opportunity to ask questions or get clarification on any issues with schedules or assignments.

14. **Academic Integrity** As engineers you will be responsible for upholding the canons of ethics of the profession. A test of your ability to do so is to uphold the University's Academic Honesty Policy. See http://honesty.uark.edu for a discussion of the Honesty Policy. While I don’t anticipate problems of this nature, any instance of academic dishonesty, as defined by the University Sanction Rubric, will be dealt with immediately and severely in accordance with the published procedures. The absolute minimum sanction for academic dishonesty will be a grade of zero for the work in question.

Norman D. Dennis, Jr.
University Professor
Civil Engineering