PSYC 2101
STATISTICS AND RESEARCH METHODS
IN PSYCHOLOGY
Fall, 1997
12:30 - 1:45 pm TR
MUEN E0046

Professor: Dr. Diane Martichuski
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Office: Muen D251E
Phone: 492-4246
Office Hours: 12-2 W, 11-12 R, or by appt.


Teaching Assistants:
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Recitation Sections (You must be registered for one of these):
L210 11:00 - 12:50 M  Muen D346
L211  9:00 - 10:50 T  Muen D346
L212  1:00 - 2:50 W  Muen D346
L213  11:00 - 12:50 F  Muen D346
L214  1:00 - 2:50 F  Muen D346

COURSE GOALS AND OBJECTIVES
Students will demonstrate knowledge of basic statistical measures, including descriptive measures of central tendency, variability, and frequency and probability, and inferential measures of t-tests, analyses of variance, correlation, linear regression, and chi-square. Students will also learn to use statistical software.

REQUIREMENTS
1. Students are expected to read the assigned chapters before class.

2. Four exams will be given. The first three (unit) exams will each be worth 100 points. The final (comprehensive) exam will be worth 200 points. Makeup exams will only be given in extreme cases, and will occur during finals week.

3. Homework assignments: Homework assignments will be due for a chapter the next lab period after we finish that chapter in lab (except when exams fall on the next day). Some homework assignments will be from the textbook; others will require the use of the computer system. Homework assignments total 100 points. You must turn in your own copy, but you can work in pairs.

4. You need a calculator of some kind. It will be to your advantage to get a calculator with statistical functions on it ($\Sigma X$, $\Sigma X^2$, $\Sigma Y$, etc.).
5. Attendance is required in labs. I highly recommend that you attend all lectures because we will be moving quickly through the material. If you fall behind, it will become increasingly difficult to catch up as the semester progresses.

**GRADING** A course grade will be assigned to each student according to the student's percentage of the total course points (600).

<table>
<thead>
<tr>
<th>Test</th>
<th>Points</th>
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<tbody>
<tr>
<td>4 tests (3x100+1x200)</td>
<td>500 pts</td>
</tr>
<tr>
<td>Homework assignments</td>
<td>100 pts</td>
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<tr>
<td>Total</td>
<td>600 pts</td>
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**TOPICS AND SCHEDULE:**

<table>
<thead>
<tr>
<th>Week beginning</th>
<th>Chapter(s)</th>
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<tbody>
<tr>
<td>8/25</td>
<td>1, 2</td>
</tr>
<tr>
<td></td>
<td>Homework Ch 1: 1-13, 15-16</td>
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<tr>
<td></td>
<td>HW Ch 2: 1-2, 4-15, 17, 21-23</td>
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<tr>
<td>9/01</td>
<td>3, 4</td>
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<td></td>
<td>Labor Day holiday, Sept 1</td>
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<td>HW Ch 3: 1, 2, 4, 6, 8, 9, 12, 14, 18, 27</td>
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<td>HW CH 4: 1(not a), 3 (not a,d), 5 &amp; 6 (measures of CT only), 9, 11, 12, 13, 29 (a and c only)</td>
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<tr>
<td>9/08</td>
<td>5, 6</td>
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<td>HW Ch 5: 1 &amp; 2 (not b or d), 6 (d,e,g,h), 9, 11, 15, 16, 18, 28</td>
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<tr>
<td>9/15</td>
<td>6, 7</td>
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<td>HW Ch 6 (no interpolation required): 1-17, 30 (no eyeball), 34</td>
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<tr>
<td>9/22</td>
<td>Test 1 (chaps 1-6): Tuesday, Sep 23</td>
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<td>7, 8</td>
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<td>HW Ch 7: 1, 5-10, 13, 14 (NOTE: on #9, there are only 150 student scores)</td>
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<tr>
<td>9/29</td>
<td>8, 9</td>
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<td>HW Ch 8: 1-7, 11 &amp; 12 (no eyeball)</td>
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<td></td>
<td>HW Ch 9: 1-9, 12, 14 (a and b only)</td>
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<tr>
<td>10/06</td>
<td>10, 11</td>
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<td>HW Ch 10: 1 &amp; 2 (show 4 steps, do prob with $\alpha = .05$ and test statistic), 3 (do #2 with $\sigma$ unknown), 4 &amp; 5 &amp; 6 (do 4 steps and test stat only)</td>
</tr>
</tbody>
</table>
10/13  Test 2 (chaps 7-10):  Tuesday, Oct 14
     11
     HW Ch 11:  2 - 4 (do t-test and draw conclusions only),
             and 5

10/20
     12
     HW Ch 12:  1, 2, 3 & 4 (4 steps, test stat only), 5, 6, 10,
             and 11

10/27  13, computer training
     HW Ch 13:  1, 2, 11 (FOR ALL PROBLEMS, do 4 steps,
             analyze data on computer only, draw conclusions,
             do Tukey's HSD where appropriate)

11/03
     14, 15
     HW Ch 14:  1, 4 & 17 (4 steps, computer, draw
             conclusions)

11/10
     15, 16
     HW Ch 15:  4, 5, 16, 22 (FOR ALL PROBLEMS, do
             computer analysis, draw conclusions)

11/17  Test 3 (chaps 11-15):  Tuesday, Nov 18
     16

11/24
     16, 17
     HW Ch 16:  1, 2, 4, 11(FOR ALL PROBS: scatterplot, r,
             test H₀ with computer)
     Thanksgiving Break Nov 27-28

12/01
     17, 18
     HW Ch 17:  1 & 2 (reg line, predict y for x=-4 and
             predict y for x=15.  Which of these is useless?)

12/08
     18
     HW Ch 18:  1, 2, 12 (do stat only, draw conclusions)
             (last class meeting is Tuesday, 12/09)

12/12-12/19  Finals week
     FINAL EXAM:
             3:30 - 6:30 pm, Tues Dec 16