Course Description: Classical, nonparametric and robust inferences about means, variances, and analysis of variance, using computers. Emphasis on problem formulation, assumptions, and interpretation.

Objective: This course provides the basic statistical toolkit required for the understanding and use of a range of methods for both summarizing and analyzing data, giving a platform for further study of applied Statistics. The emphasis in the course will be the application of these methods to real life situations from Science.

Prerequisites: One of MATH 101, 103, 105, 120 or SCIE 001.

Course Website: connect.ubc.ca
Please check the Connect website regularly to keep up-to-date with the course.


Clickers: We will be using the i>Clicker in lectures. i>Clicker is a response system that allows you to respond to questions posed by instructors during class, and you will be graded on your participation and performance. You are required to purchase an i>Clicker remote for in-class participation.

Labs: Labs start the second week of class. We will use R Commander for data analysis. You will have registered for a lab when you enrolled in the course, and only under exceptional circumstances should you switch from this session to another.

Piazza Discussion Board:
This term we will be using Piazza for class discussion. The system is highly catered to getting you help fast and efficiently from classmates, the TAs, and myself. Rather than emailing questions to the teaching staff, I encourage you to post your questions on Piazza. If you have any problems or feedback for the developers, email team@piazza.com.
**Course Assessment:**

<table>
<thead>
<tr>
<th>Assessment</th>
<th>Date</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Class participation and performance via i&gt;clicker</td>
<td>in-class</td>
<td>6%</td>
</tr>
<tr>
<td>WeBWork Online homework</td>
<td>Weekly</td>
<td>10%</td>
</tr>
<tr>
<td>Labs</td>
<td>Weekly</td>
<td>8%</td>
</tr>
<tr>
<td>Written Assignments</td>
<td>TBA</td>
<td>6%</td>
</tr>
<tr>
<td>Midterm</td>
<td>TBA</td>
<td>25%</td>
</tr>
<tr>
<td>Final Exam (you must pass the final to pass the course)</td>
<td>To be scheduled by Classroom Services</td>
<td>45%</td>
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**Policy regarding missing the midterm or final exam:**

1. There will be no make-up exam

2. Students who miss an exam should notify the instructor prior to (if possible) or immediately after the exam. Students must supply a supporting document (for example, a doctor’s note will be sufficient in case of a medical emergency) within one week of the day of exam.

**Examination Aids:**

The following examination aids will be permitted for midterms and final examinations: calculators, statistical tables and a single A4 (8.5x11) aid sheet. The calculator must be a basic scientific model; calculators with graphics, programming or text storage capabilities are not allowed. Statistical tables will be provided to you on the day of the midterms or exam. Bring your student ID to midterms and the final exam.

It is important to note that the A4 aid sheet has to be handwritten (no printed material, nor photocopies allowed). You may write any notes and formulas that you feel are useful and you may use both sides.

**Chapters to be covered:** 1-8, 10-18, 20-23, 25

Detailed learning outcomes can be found on the course website. Refer to this document throughout the course to clarify the outcomes you are expected to attain for each section of the material.

**Reach Out for Success**

University students often encounter setbacks from time to time that can impact academic performance. Discuss your situation with your instructor or an academic advisor. Learn about how you can plan for success at: [www.students.ubc.ca](http://www.students.ubc.ca).

For help addressing mental or physical health concerns, including seeing a UBC counsellor or doctor, visit: [www.students.ubc.ca/livewelllearnwell](http://www.students.ubc.ca/livewelllearnwell).