C A M O S U N C O L L E G E

ENVR 229: QUANTITATIVE ASSESSMENT

Course Information – Winter 2011

INSTRUCTOR: **Dr. DAVID BLUNDON**
OFFICE: Y-352
TELEPHONE: 370-3984
EMAIL: D2L email only

CONSULTATION

Office hours: **see schedule**

For an appointment or to leave a message call or email anytime.

LECTURE/:LABORATORY **see schedule**

PREREQUISITE: BIOL 228 and MATH 216

COMPUTER PROGRAMS and WORD PROCESSING: Computers are available in Ewing

WEEKLY SCHEDULE: **Five hours of lecture and lab**
Expect to spend an additional 6 hours a week on this course outside of class time.

COURSE TEXTS (Available for purchase in the College Bookstore):

- **Henderson, P. A. 2003. Practical Methods in Ecology. Blackwell Publ..**

COMPUTER PROGRAMS (available for use in Ewing 100 and 112)

- **Programs for Ecological Methodology, Version 7.02 by Krebs, C.J. 2009.**
- **PC-ORD**
- **Minitab 2010. Version 16.**

ADDITIONAL REFERENCE MATERIAL:

- **MATH 216 or other statistics text**
- **Other suggested and optional reading will be given in class.**

ABSENCES:

- **If you should miss a class, you should arrange to borrow notes from another student. You are responsible for all information (including exam dates and changes in course content or emphasis) covered in class.**
- **If you miss an exam you will receive a grade of zero for that exam unless you provide a note from your MD.**

ASSIGNMENTS:

- **Please note the cut off dates for the dropbox – submitting a late assignment is not possible.**

LABORATORY INFORMATION:

- ***Please comply with the general department policies. These will be outlined in your first lab period.***
- ***Make-up labs are not offered. If you are unable to attend your regularly scheduled lab due to illness, contact the instructor. Lab attendance is compulsory. You will lose 5% of your lab mark for each lab period missed.***

MARK DISTRIBUTION:

Lecture/Lab Exams - 55%

- **Midterm Exam I - 15%** **(Week 8: Wednesday, March 2: 2 hours)**
- **Final Lab Exam – 15%** **(Week 14: Tuesday, April 12: 3 hours)**
- **Final Exam - 25%** **(Week 15: April 18-21: 3 hours)**

Assignments - 45%

- **10 assignments** **(TBA)**

Letter Grades:	**A+**	**90-100%**	**A**	**85-89%**	**A-**	**80-84%**
	B+	**77-79%**	**B**	**73-76%**	**B-**	**70-72%**
	C+	**65-69%**	**C**	**60-64%**	**D**	**50-59%**
	F	**<50%**				

A. LECTURE TOPICS:

- **Introduction to Quantitative Analysis**
- **Review of Descriptive Statistics**
- **Probability**
- **Review Of Parametric versus Non-Parametric Statistics**
- **Mark-Recapture Techniques,Removal Methods, Quadrat Counts**
- **Line Transects and Distance Methods**
- **Distance Methods and Removal Methods**
- **Samplng Designs**
- **Experimental Designs**
- ***Regression***
- **ANOVA**
- **Multivariate Analysis**

B. LABORATORY TOPICS AND EXERCISES:

- **Population Estimation:**
  - **Peterson, Schnabel & Jolly-Seber Mark-Recapture Sampling Methods**
  - **Catch Effort Methods for Exploited Populations**
  - **Line Intersect Methods**
  - **Aerial Methods**
  - **Maximum Likelihood Resight Method**
- **Descriptive Statistics**
- **Sampling: Random, Stratified and Two-Stage**
- **Experimental Design: Random and Block**
- **ANOVA Analysis**
- **Regression Analysis**
- **Multivatiate Analysis**

NAME: Dr. David Blundon

Office: F352 **Phone: 3984** **Term: Winter 2011**

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY
8:30-9:20					
9:30-10:20		ENVR 229 X01B Lab E112			
10:30-11:20			ENVR 246 X01 Lec F244		
11:30-12:20	OFFICE HOUR				
12:30-1:20	OFFICE HOUR	OFFICE HOUR			
1:30-2:20	OFFICE HOUR		ENVR 229 X01B Lec E346	ENVR 246 X01 Lab F244	
2:30-3:20	OFFICE HOUR	ENVR 229 X01A Lab E100			
3:30-4:20					
4:30-5:20					
5:30-6:20					
6:30-7:20					
7:30-8:20					
8:30-9:20					