



COURSE OUTLINE

RRMT 125

Renewable Resource Measurements

90 HOURS

3 CREDITS

PREPARED BY: Stephen Biggin-Pound

APPROVED BY: Margaret Dumkee, Dean

YUKON COLLEGE

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Course Outline prepared by Stephen Biggin-Pound.

Yukon College
P.O. Box 2799
Whitehorse, YT
Y1A 5K4

RENEWABLE RESOURCES MEASUREMENTS

INSTRUCTORS: Steve Biggin-Pound and various guest instructors

OFFICE HOURS: By arrangement with your instructor.

OFFICE LOCATION: A2105

TELEPHONE/E-MAIL: 668-8796
sbiggin-pound@yukoncollege.yk.ca

COURSE OFFERING:

DAYS & TIMES:	Classes:	April 25	1:00 - 5:00pm
		April 26-27	9:00am – 5:00 pm
		April 28	7:45am – 12:00pm
		April 30 -May -4	9:00am – 5:00pm
		May 5	9:00am – 4:00pm
	Room:	A2402/A2206 (Lectures)	
	Computer Lab:	A2702/A2408 (Analysis)	
	Field:	(Whitehorse area)	

COURSE OUTLINE:

RRMT 125 is a practical course in which students will learn how to collect renewable resources data using a variety of sampling techniques and then compile the information into products needed for management. Some of the topics covered will include survey techniques for birds, tree seedling regeneration, forest mensuration, small mammals, forest inventory, caribou winter habitat, stream discharge, and ecosystem classification. Emphasis will be on sampling techniques and principles, data entry and understanding how data sets are used in subsequent management applications.

LEARNING OUTCOMES:

Primary course objectives:

- Learn quantitative measurement techniques, especially ones used by local resource managers (practical job skills)
- Provide opportunities for students to think about how to collect and process data (e.g. by making up custom data collection sheets)
- Provide opportunities for students to collect field data, enter it on a computer, error check the data and then carry out a descriptive statistical analysis.
- Learn the difference between the terms accuracy and precision and understand the causes of measurement errors and how to minimize them
- Learn how to calculate statistical measures of central tendency (mean, mode and median) and variation (range, variance and standard deviation).
- Provide opportunities for students to use GPS and mapping software to work with geo-referenced data.

Secondary course objectives:

- Introduce local resource managers to students so they can try and establish contacts and learn about job opportunities
- Provide opportunities to obtain practice public speaking
- Ensure students' bird identification skills are on target.
- Provide reminders about the value of safe working habits for upcoming field season.

DELIVERY METHODS / FORMAT:

The practical focus of this course incorporates mandatory field and lab activities. Daily activities will generally start in the classroom with a short introduction to techniques and theory. This will be followed by fieldwork in which sampling and data collection techniques are practised. Data entry and analysis will occur at the end of the day. Students will be expected to spend two to three hours each evening completing field reports from the day's work and preparing for the next day's activities.

COURSE PREREQUISITES:

Admittance to the Renewable Resources Program, RRMT 122 (Maps and Remote Sensing), NOST 215 or permission of the instructor.

COURSE REQUIREMENTS / EVALUATION:

Attendance and Participation:

This is an intensive, fast paced course in which it will be very difficult to make up work that is missed. Attendance is mandatory. A student may be dismissed from the course if more than 10% of scheduled contact hours are missed.

Evaluation:

Quizzes	10%
Final Exam	30%
Field/Lab Assignments	40%
Attendance / participation	20%
TOTAL:	100%

The final exam consists of three parts: practical, computer-based/Excel, and written.

Attendance and participation includes an in-class presentation by each student.

Student must obtain at least 50% in the field/lab component of the course to obtain a passing grade in the overall course.

PLAGIARISM

Plagiarism involves representing the words of someone else as your own, without citing the source from which the material is taken. If the words of others are directly quoted or paraphrased, they must be documented according to standard procedures (APA). The resubmission of a paper for which you have previously received credit is considered a form of plagiarism.

Plagiarism is academic dishonesty, a serious academic offence, and will result in you receiving a mark of zero (F) on the assignment or the course. In certain cases, it can also result in dismissal from the college. And do not underestimate the impact such a situation will have on your reputation.

STUDENTS WITH DISABILITIES OR CHRONIC CONDITIONS

This course involves experiential learning and students should be capable of hiking 3 km on rough trails or through dense bush carrying their personal daypack, using chest waders to work in waterways collecting samples, using a compass and using binoculars to carry out bird transects. Reasonable accommodations are available for students with a documented disability or chronic condition. It is the student's responsibility to seek these accommodations. If a student has a disability or chronic condition and may need accommodation to fully participate in this class, he/she should contact the Learning Assistance Centre (LAC) at (867) 668-8785 or lassist@yukoncollege.yk.ca.

SUGGESTED TEXTBOOKS/MATERIALS:

Plants of Northern British Columbia Edited by A. MacKinnon, J. Pojar and R. Coupe. Revised edition

Birds of North America by C.S. Robbins, B. Bruun, H.S.Zim, J. Latimer and A. Singer. Revised Edition 2001 or equivalent field guide for western North American birds.

These books may be purchased or borrowed.

Each student will require a **waterproof notebook**, clipboard, **pencil, and calculator**. Suitable (warm and waterproof) clothing for fieldwork will also be needed. On most days we will eat lunch in the field so a thermos or water bottle and packed lunch will be needed.

ACTIVITY FEE

In addition to the course fee a charge of \$125 will be levied to help to defray the cost of rental vehicles for travel. This activity fee will be paid at registration.

EQUIVALENCY/TRANSFERABILITY

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