Note: A more detailed syllabus will be distributed the first day of class.



Sociology 3673

Social Epidemiology

Credit hours: 3

Course Description:

Epidemiology is the study of the distribution and determinants of health-related states or events in a specified population. Epidemiology is also concerned with the application of health-related data to the control of health problems and the formation of public health interventions and policies. Using lectures, readings, videos, guest speakers, and frequent homework assignments, this course will introduce students to the concepts and methods used in epidemiology.

We will discuss topics such as how a disease spreads across a population and how public health interventions and medical technology help to control the spread of disease. We will use real-life data to explore how epidemiologists measure morbidity, mortality, and life expectancy across a population. We will explore the various types of research methods and designs epidemiologists use, as well as how to statistically calculate the risk factors or causes of disease. Finally, we will review epidemiology as a social science by reviewing the social causes and consequences of health.

Professor: Rebecca Utz, PhD rebecca.utz@utah.edu 585-5496

<u>Prerequisites:</u>

Epidemiology is an objective method of problem solving which relies on quantitative logic and statistical analysis. SOC 3673 fulfills both the Quantitative Reasoning (QB) and Quantitative Intensive (QI) general education requirements. Thus, a basic knowledge of algebra and elementary statistics are required before taking this course. Students must have already <u>completed</u> a basic statistics course (eg, soc 3112, FCS 3210, ECON 3640, PSY 3000) prior to enrolling.

Accommodations:

The University of Utah seeks to provide equal access to its programs, services and activities for people with disabilities. If you need accommodations in the class, reasonable prior notice needs to be given to the Center for Disability Services, 162 Olpin Union Building, 581-5020 (V/TDD). CDS will

work with you and the instructor to make arrangements for accommodations. All written information in this course can be made available in alternative format with prior notification to the Center for Disability Services.

Course Requirements:

Readings: The required textbook is <u>Epidemiology</u> (4th edition) by Leon Gordis. Additional reading assignments will be made available through Canvas. All readings should be completed <u>prior</u> to the class they are assigned.

Calculator: A calculator is strongly encouraged for this class. Nothing fancy– just one that will add, subtract, multiply, and divide. Calculators can be used to complete assignments and problem sets. Only basic, non-graphing calculators will be allowed during exam period (no telephones, computers, or other electronic devices)

Attendance & Participation: Active participation in the course material is encouraged. Active participation consists of regular attendance, asking and answering questions during lectures, participating in in-class exercises, and coming to class prepared. All course materials will be posted on Canvas. Students are expected to check the course website frequently. Attendance will be taken randomly throughout the semester. Some in-class activities will also be collected.

- This will count for 10% of your final grade.

Assignments: Nine assignments will be graded. Details about each assignment will be posted on Canvas. Late assignments will be accepted for half credit.

- Together, assignments will make-up 50% of your final grade.

Exams: There will be two exams throughout the semester. Exam #1 will cover parts 1 & 2 of the course. Exam #2 will cover Parts 3, 4, 5 of the course. Lecture notes and handouts posted on Web-CT will serve as your study guide. One notecard (up to 4x8 size) can be brought into the exam as a "cheat sheet."

- Each exam will comprise 20% of your final grade (40% total).

Grading:

Final course grades will be awarded according to the following cutpoints.

A 100-93 points	B +	89-87 points	C +	79-77 points	D +	69-67 points	Е	< 60
	В	86-83 points	С	76-73 points	D	66-63 points		points
A - 90-92 points	В-	80-82 points	C -	70-72 points	D-	60-62 points		

Academic Integrity:

It is assumed that all work submitted to professor is your own work. When you have used ideas of others, you must properly indicate that you have done so. Plagiarism and cheating are serious offenses and may be punished by failure an individual assignment, failure in the course, and/or

expulsion from the university. All students should be familiar with the University of Utah Student Code http://www.admin.utah.edu/ppmanual/8/8-10.html	

Course Overview

Part 1

Introduction to Epidemiology & Disease Transmission

Read: Chapters 1, 2

Reaction paper: How Safe Are We (video) & Hindsight 20/20 (article)

Case Study: Gastrointestinal Illness After a Church Dinner

Part 2

Measuring Health

Read: Chapters 3, 4, 5, 6

Case Study: Paralytic Illness in Ababo

Case Study: Screening for Antibody to the Human Immunodeficiency Virus

Fxam #1

Part 3

Epidemiological Research Methods & Study Designs

Read: Chapters 7, 8, 9 10, 13, 20

Study Design Assignment

Part 4

Estimating Risk & Exploring the Causality of Disease

Read: Chapters 11, 12, 14, 15, 16

Case Study: Cigarette Smoking & Lung Cancer

Case Study: Oral Contraceptive Use & Ovarian Cancer

Part 5

Social Epidemiology & "Hot" Topics

<u>Read</u>: Extra readings posted on Web-CT <u>Reaction Paper</u>: Unnatural Causes (video)

Self Evaluation Assignment

Exam #2