

Subject Description Form

Subject Code	HTI5601
Subject Title	Epidemiology
Credit Value	3
Level	5
Pre-requisite / Co-requisite/ Exclusion	Knowledge of research methods and data analysis is strongly recommended
Objectives	<p>To discuss the practical use of epidemiology with emphasis on the methods used in the collection and analysis of epidemiological data.</p> <p>To identify and discuss the usefulness of sources and use of epidemiological data</p> <p>To critically analyse epidemiological studies.</p> <p>To examine the use of epidemiological data in the planning and evaluation of health care activities.</p>
Intended Learning Outcomes	<p>Upon completion of the subject, students will be able to:</p> <ol style="list-style-type: none"> a. demonstrate understanding of the basic concepts of epidemiology b. identify sources and use epidemiological data and information. c. critically review epidemiological studies to assess their usefulness for research and health care planning. d. demonstrate understanding of the epidemiological considerations for the planning and evaluation of health activities, services or programmes.
Subject Synopsis/ Indicative Syllabus	<ol style="list-style-type: none"> 1. Concepts of epidemiology: development of epidemiological methods, causality, validity. 2. Sources of epidemiological information: demography, mortality and morbidity statistic, disease mapping, prevalence and incidence. 3. Infectious disease epidemics: investigation and management; application of epidemiological methods in the control of disease in Hong Kong 4. Epidemiological methods: descriptive studies, cohort studies, case control studies, intervention studies. 5. Health planning and evaluation. 6. Selective examples of use of epidemiological techniques in the outbreak investigation.
Teaching/Learning Methodology	<p>Lectures, Tutorials, Seminars</p> <p>Lectures are used to introduce the concepts of epidemiology and provide a solid basis for discussion of individual studies which are used in tutorials. Seminars involve demonstrations of the use of epidemiological studies in various contexts and discussion of the adequacy of published studies to answer research questions.</p>

Assessment Methods in Alignment with Intended Learning Outcomes	Specific assessment methods/tasks	% weighting	Intended subject learning outcomes to be assessed				
			a	b	c	d	
	1. Seminar presentations	30 %	√	√	√	√	
	2. Written report	40 %	√	√	√	√	
	3. Test	30 %	√			√	
Total	100 %						
<p>Students are required to identify suitable materials for their presentations which require them to critically evaluate the content of the epidemiological studies and to determine their usefulness in the context of local healthcare needs.</p> <p>The test covers the concepts of epidemiology as well as interpretation of epidemiological data.</p>							
Student Study Effort Expected	Class contact:						
	▪ Lectures						21 Hrs.
	▪ Tutorials						6 Hrs.
	▪ Seminars						12 Hrs.
	Other student study effort:						
	▪ Assignment preparation						30 Hrs.
	▪ Self-study						30 Hrs.
	Total student study effort						99 Hrs.
Reading List and References	<p>Szklo, M. (2007) Epidemiology: beyond the basics Sudbury Massachusetts: Jones and Bartlett</p> <p>Gordis, L. (2004) Epidemiology: The Essentials 3rd Ed Philadelphia: Saunders.</p> <p>Fletcher, R.H, Fletcher, S. (2005). Clinical Epidemiology - the essentials. (4th Ed) Baltimore: Williams & Wilkins.</p> <p>Lilienfeld, A.M., Lilienfeld, D.E. (1994). Foundations of epidemiology. (3rd ed). New York: Oxford University Press.</p> <p>Valanis, B. (1999). Epidemiology in Nursing and Health Care. (3rd ed). Norwalk, Connecticut: Appleton & Lange.</p> <p>Giesecke, Johan. (2002) 2nd Ed Modern infectious disease epidemiology. London: Arnold</p> <p>Jekel, DL, Elmore, JG, Katz, DL. (2007) Epidemiology. Biostatistics and Preventive Medicine. 3rd Ed Philadelphia: Saunders.</p> <p>Wang, Jung-Der (2002) Basic principles and practical applications in epidemiological research. River Edge, N.J.: World Scientific</p>						