Clinical Decision Analysis

Module Code: ECO00006M Credits: 10 Term: 1

Contact Hours: 5 x two-hour Seminars (10 contact hours)

Module Organiser: Professor K. Claxton

Overview:

The aim of this module is to provide an understanding and experience of the application of basic methods of clinical decision analysis to a range of decision problems in health care. In particular it provides a thorough understanding of the way clinical decision analysis can be used to evaluate diagnostic information, provide a framework for the economic evaluation of alternative strategies of patient management, and can also be used to inform allocative decisions about which health care technologies should be adopted and what research may be required to inform these decisions in the future.

Objectives:

On completing the module the student will be able to:

- structure a range of clinical decision problems as decision analytic models.
- construct and solve these models in a spreadsheet, conduct sensitivity analysis, and interpret the results of their analysis.
- use these methods to conduct economic evaluation of alternative health care interventions.
- identify the limitations of the models they construct and recognise circumstances when more sophisticated methods of decision analysis may be appropriate.

Assessment:

Students will complete a procedural exercise, “Modelling the Test Treatment Decision”, by week 3 of the Autumn Term. Students will then work in small groups on a case study, The Cost-Effectiveness of Alternative Strategies for the Diagnosis and Treatment of Angina, and present a draft model in week 6 and final results in week 9. Final assessment requires students to submit a solution to the case study in the form of a short (3,500 words, excluding tables, figures and appendices) research report at the end of the Autumn Term.

Pre-requisites:

Only available to students registered for the MSc programme in Health Economics and visiting students.
Main References:

No single text covers all the material in this module but the following texts will be referred to:

Weinstein, M. C., and Fineberg, H. V., Clinical Decision Analysis, Saunders, 1980.