

Longitudinal Data Linkage

Tuesday/Wednesday 30-31 March 2010, 10:00 - 16:00

The University of Edinburgh

Charles Stewart House

9-16 Chambers Street, Edinburgh EH1 1HT

Programme

Aims and learning outcomes: The aim is to focus on longitudinal studies created by linking Census, vital registration records and health registration data including the Office for National Statistics' Longitudinal Study (ONS LS), the Northern Ireland Longitudinal Study (NILS) and the Scottish Longitudinal Study (SLS). The strengths and weaknesses of these longitudinal studies will be discussed. In particular, emphasis will be placed on how the NILS and SLS differ from the LS. Examples of research using these studies will be given and their potential will be investigated. Methods of analysis commonly used to analyse LS data in tabular form will be reviewed, in particular log-linear models for counts, log-linear models for rates and standardised mortality rates and log-linear models for square tables such as intergenerational social mobility tables and interregional migration tables. Methods of dealing with sparse data, i.e. small counts, will also be discussed. There will be short exercises on interpreting statistical package output.

Tuesday 30 March 2010

10:00 – 10:10	Registration, welcome and overview of the course
10:10 – 11:00	Introduction to data linkage
11:00 – 11:15	Tea/coffee break
11:15 – 12:40	ONS LS, SLS & NILS
12:40 – 13:20	Lunch break
13:20 – 14:10	Examples
14:10 – 14:15	Break
14:15 – 15:00	Strengths and weaknesses of the ONS LS, SLS & NILS
15:00 – 15:15	Tea/coffee break
15:15 – 16:00	Analytic potential
16:00	Finish

Wednesday 31 March 2010

10:00 – 10:50	Analysing LS data: testing versus regression-based approaches
10:50 – 11:00	Exercise
11:00 – 11:15	Tea/coffee break
11:15 – 12:30	Log-linear models for counts
12:30 – 12:40	Exercise
12:40 – 13:20	Lunch break
13:20 – 14:10	Log-linear models for rates and SMRs
14:00 – 14:10	Exercise
14:15 – 14:50	Analysis of square tables
14:50 – 15:00	Exercise
15:00 – 15:15	Tea/coffee break
15:15 – 15:45	Methods to deal with sparse data
15:45 – 16:00	Course evaluation forms & closing remarks
16:00	Finish

N.B. The timing of lecture sessions is indicative. Lunch and tea/coffee breaks will occur as scheduled.

Course Materials: Participants will receive photocopies of all slides.

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