

Longitudinal research resources

Professor Alison Park
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Learning Hub



Why use longitudinal data to study health behaviours?

The dangers of modern lifestyles often lie in the cumulative effects of our unhealthy habits.

Longitudinal studies track the same individuals and households over time. They are powerful research tools to help us understand how our early circumstances and experiences influence our later lives. The CLOSER Learning Hub has information and resources to help you explore longitudinal studies and get you started using the data.

What are longitudinal studies? +

Types of longitudinal studies +

Strengths and weaknesses of longitudinal data +

The Learning Hub

Introductory materials for new users



Rationale

- Need for materials aimed at beginners and less experienced data users, initially with academic focus
- Focus on methods & topics
- Easily discoverable and downloadable material to support teaching and supervision
- Showcases CLOSER & individual study resources

Structure

- Introduction
- Evidence
- Study design
- Analysis
- Teaching dataset
- Explore by topic
- Glossary



1 What are longitudinal studies?

A longitudinal study is a observational study that follows the same subjects repeatedly over a period of time, in some cases from birth to death. The UK is home to the largest and longest-running collection of [longitudinal studies](#) in the world.

2 Types of longitudinal studies

There are a range of different types of [longitudinal studies](#): [cohort studies](#), [panel studies](#), record linkage studies. These studies may be either prospective or retrospective in nature.

3 Using longitudinal data for research

Each time the studies collect new information about their participants' lives, they are adding rich new data to what is already known about them.

4 Test your knowledge

How much have you learned about [longitudinal studies](#)? When you have completed all the sections in this module, take the quiz to test how much you know.



Britain's mobility problem



If you are born into a working class family, what are your chances of moving up the social ladder? Longitudinal studies are some of the most reliable sources of evidence about levels of social mobility in the UK.

Key finding

Children born into working class families are significantly less likely to move up the ladder than their peers from middle class homes. These inequalities have persisted for generations.



1 The beginning: aims, objectives and feasibility +

Scientists consider a range of factors when designing a longitudinal study. Many relate to the overall scientific purpose of the study, while others are more practical.

2 Sampling +

All surveys rely on samples, which are selected from a group of interest (often referred to as the 'target population').

3 Data collection instruments +

Each sweep of data collection for a longitudinal study covers a range of topics. This section looks at the different ways in which data is collected, and the tools used to capture information about different aspects of life.

4 Methods of data collection +

Data collection instruments can be implemented in different ways. A key distinction is between different modes of data collection: face-to-face, telephone, postal or online.



Analysis module



The Analysis module is currently being developed. The unit will cover different approaches to the analysis of longitudinal data, and will make use of the [CLOSER teaching dataset](#). Approaches covered will include:

- latent growth models
- multilevel models
- fixed effects models
- generalised estimating equations



Teaching dataset summary



CLOSER has developed a teaching dataset based on the [1958 National Child Development Study](#) (NCDS). It is fully documented and will be available shortly via the [UK Data Service](#).

The dataset includes [variables](#) from eight waves of the NCDS, from the first [sweep](#) in 1958, to the age 50 [sweep](#) in 2008. [Variables](#) in the dataset include:

- personal and family background (respondent sex; parental education and class)
- cognitive ability
- education
- marital status
- employment status and social class
- political participation
- wellbeing
- health indicators (including BMI, drinking and smoking)

The dataset will comprise respondents who have taken part in every [sweep](#) of the study (complete cases). A subsequent dataset will be prepared that includes respondents who have taken place in some but not all sweeps of the study, so students can learn how to deal with [sweep](#)-level missing cases.

The first dataset is being processed by the [UK Data Service](#) and a link will appear here once available in August 2017. The dataset with [sweep](#)-level missing cases will be available shortly afterwards.

Some suggested analysis activities will accompany the datasets.



Discover > Catalogue

Catalogue

SHARE

• Discover

Variable and question bank

QualiBank

UK Data Service data catalogue record for:

National Child Development Study: CLOSER Training Dataset, 1958-2013

[Documentation](#) | [Publications](#) | [Syntax](#)

[Download/Order](#) | [DDI XML](#)

TITLE DETAILS

SN: 8205
Title: National Child Development Study: CLOSER Training Dataset, 1958-2013
Persistent identifier: [10.5255/UKDA-SN-8205-1](http://dx.doi.org/10.5255/UKDA-SN-8205-1)
Series: CLOSER Training Datasets
Depositor: Cohort and Longitudinal Studies Enhancement Resources
Principal investigator(s): Cohort and Longitudinal Studies Enhancement Resources
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CITATION

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[Select the text above](#) to add data citation in your outputs.

Select citation format:

XML citation formats: [CSL](#) [EndNote](#)

SUBJECT CATEGORIES

Drug abuse, alcohol and smoking - Health
General - Education
General - Employment and labour
Mental health - Health
Political behaviour and attitudes - Politics
Social and occupational mobility - Social stratification and groupings
Social indicators and quality of life - Society and culture
Teaching packages and test datasets - Reference and instructional resources



Topic | Bullying

Bullying



Why use longitudinal data to study bullying?

Young people, schools, parents and government are more aware of bullying than ever before. It is a very important topic of modern day policy, practice and academic inquiry.



Glossary

Administrative data



Attrition



Cohort studies



Conditioning



Confounding



Cross-sectional



Cross-sectional surveys involve interviewing a fresh sample of people each time they are carried out. Some cross-sectional studies are repeated regularly and can include a large number of repeat questions (questions asked on each survey round).

Data harmonisation



Data linkage



Household panel surveys



Longitudinal studies



Non-response bias



Observational studies



Next steps

- Initial 'soft' launch, now looking at feedback and tweaking functionality
- Full promotion in October
- learning.closer.ac.uk

Thank you

alison.park@ucl.ac.uk

@parkali

@CLOSER_UK

closer.ac.uk

closer.ac.uk/discovery

closer.ac.uk/learning