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Next Steps at age 32: explore the new data

6th March 2025, 12pm-1.30pm

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1

Housekeeping

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- Please keep your cameras off and mics muted at all times
- If you have a question, please use the chat function, and please note your question will be visible to all attendees
- Technical issues – please email us: ioe.clsevents@ucl.ac.uk
- We would be grateful for your feedback. Please follow the link in the chat at the end of the event for the short survey

Thank you for joining us today

2

Outline

- Introduction to Next Steps (5 mins)
- Age 32 survey contents (10 mins)
- Sample design, attrition and weights (10 mins)
- Data structure, documentation (10 mins)
- Accessing the data (5 mins)
- Research Opportunities:
  - Women's pay penalty and job quality (10 mins)
  - Work and Health (10 mins)
- Questions (30 mins)

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3

About CLS

- The Centre for Longitudinal Studies is home to four* national longitudinal cohort studies, which follow the lives of tens of thousands of people
- Each of our four studies follows large, nationally representative groups of people born in a given year
- By collecting information from the same people over time, as they live their lives, we can answer important research questions

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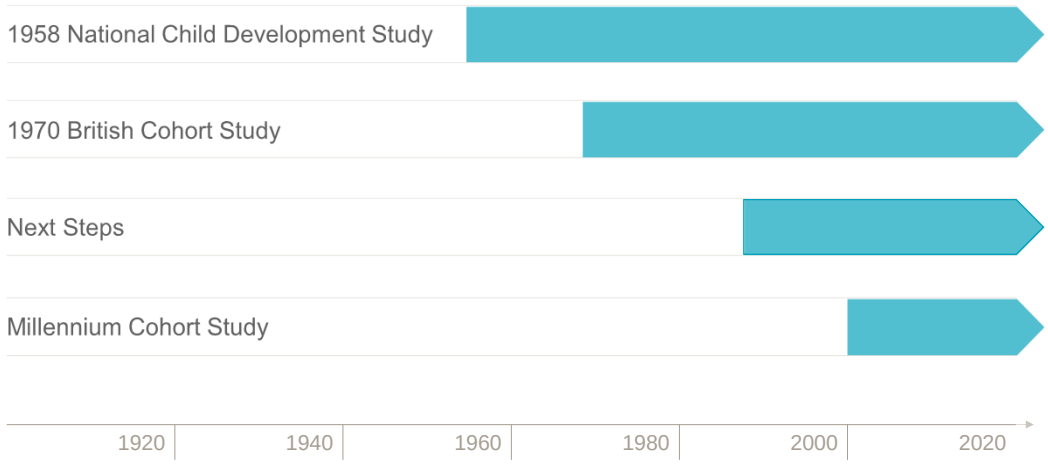
4

Timeline of the studies



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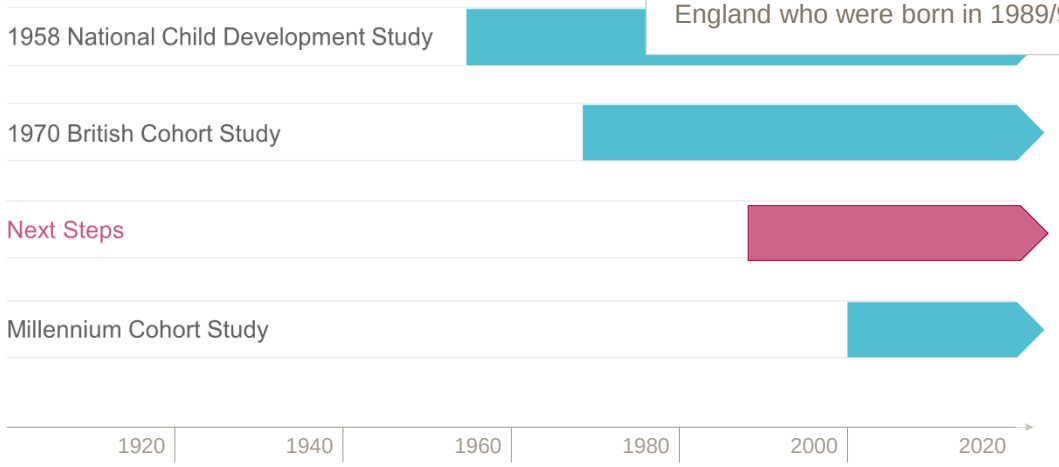
Timeline of the studies

Next Steps follows the lives of around 16,000 young people living in England who were born in 1989/90.



6

About Next Steps

- Began in 2004 when study members were aged 13/14 and in Year 9
- Surveyed annually until 2010 when they were aged 19/20 and then again at age 25 and age 32 data
- Covid-19 sweeps, collecting information about living conditions more generally, not just Covid-19 stuff age 30/31
- Age 32 data collection took place between 25 Apr 2022 – 24 Sep 2023 and now available on **UK Data Service**

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About Next Steps

- Previously run by the now Department for Education (DfE) - strong focus on education transitions and transitions to the labour market
- Transferred to CLS in 2013 and the cohort was restarted in early adulthood
- From age 25 onwards the resource has became much more multi-disciplinary with more similarities with the other CLS cohorts (MCS, BCS70, NCDS)
- Age 32 sweep continues this focus on all life experiences as they navigate young adulthood during a cost of living crisis
  - Adulthood trajectories more diverse than ever
  - At age 32 the cohort members may be becoming parents, have more established careers, may be saving for a house, taking on more responsibility and have increased coping strategies

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Why is Next Steps important?

- The “missing” cohort – young people born in the early ‘90s
- Unique challenges of their generation*
- Only major national longitudinal study focussing on pathways through the teenage years and transitions into adulthood

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9

Next Steps A study of people born in 1989/90

	2004 Age 14	2005 Age 15	2006 Age 16	2007 Age 17	2008 Age 18	2009 Age 19	2010 Age 20		2015 Age 25	2022 Age 32
main respondent	Study member	Study member	Study member	Study member	Study member	Study member	Study member		Study member	Study member
Parent response	Parents	Parents	Parents	Parents						
Linked data	National Pupil Database			Individual Learning Record					Hospital Episodes Statistics, Student Loans Co	Updates to linked data coming soon
sample	15,770	13,539	12,439	11,801	10,430	9,799	8,682		7,707	7,279
response rate	74%	86%	92%	92%	89%	87%	90%		51%	53%

10

Specialist features of Next Steps

- Data linkage
  - NPD, ILR, HES, SLC already available
  - More data linkages underway
- Geospatial data linkage opportunities
  - Enumeration District/Output Area, Lower Super Output Area, Middle Layer Super Output Area, Census Area Statistical Ward, Ward (98 boundaries), Parliamentary constituency, Local Authority District, Government Office Region, Country
- Genetic data
  - The final quality controlled imputed set of genotypes contained 1,568 samples and 8,084,945 genetic variants and are provided in plink format (genome build: hg38)

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Age 32 Survey Contents

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12

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What does the Next Steps data include?

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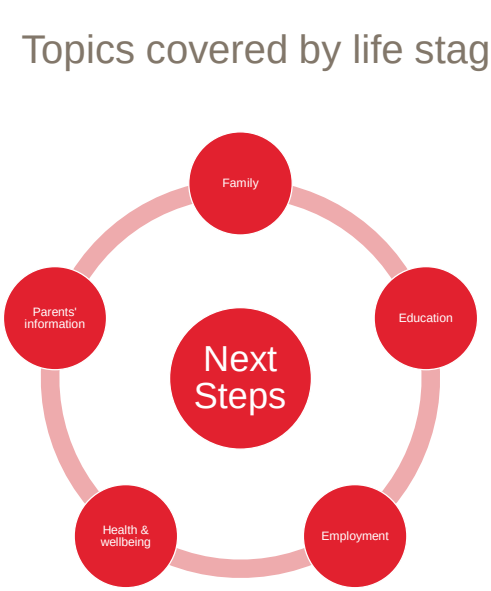
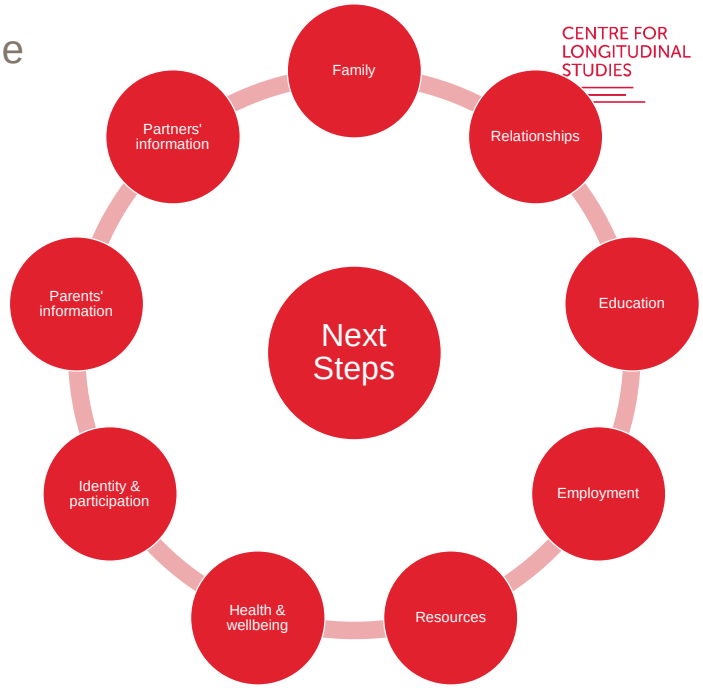
13

Topics covered by life stage





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Topics covered by life stage

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Family
Housing
Health
Educational attainment
Educational aspirations
Subject choice
School life

Educational transitions
Family (partners, children)
Employment & Income
Housing
Health
Courses and qualifications
Sexual identity
Political engagement
Locus of control

Family (partners, children – fertility experience)
Employment & Income
Housing
Health (more)
Identity
Political engagement, social attitude
DNA
Cognitive skills

15

The Age 32 survey: Survey overview

- Fieldwork took place between May 2022 and September 2023
- Interviewing involved sequential mixed-mode design - including web first (Web), after which non-respondents were assigned to interviewers, and the following modes were available: face-to-face (F2F), telephone (Tel), video interviewing, secondary devices
- All cohort members who have ever taken part in any of the previous sweeps of the study were contacted
- 13,859 cohort members were issued for fieldwork, interviews were completed with 7,279, representing a 53% response rate
- *See Next Steps Age 32 User Guide and Survey Technical Report for full account of the study development and fieldwork procedures*

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Data, by theme

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Themes

- Family and Relationships (and children's information)
- Employment and Resources
- Physical health
- Mental health & wellbeing
- Identity & Participation

…but there are many more

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Family, relationships and children's information

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Family, relationships and children's information

⊕: parents
⊙: cohort member
⊛: cohort member and parents
*: boost

	Age 14	Age 15	Age 16	Age 17	Age 18	Age 19	Age 20	Age 25	Age 32
Household composition	⊕	⊕	⊕	⊕			⊙	⊙	⊙
Housing tenure	⊕	⊕	⊕	⊕	⊙	⊙	⊙	⊙	⊙
Homeless experience									⊙
Relations with parents/CM	⊕	⊕	⊕	*					
Relationships and sexuality						⊙	⊙	⊙	⊙
Social connection		⊙						⊙	⊙
Childcare and caring responsibilities				⊙	⊙	⊙	⊙	⊙	⊙
Household responsibilities and resources	⊛	⊛	⊛	⊕					
Sibling information	⊕	⊕		*					
Adverse childhood experience									⊙

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New features – Age 32

- Homelessness after 16
  - Whether have ever or number of times have been homeless after age 16
  - Age when (first) became homeless
  - (Total) Period of homelessness
  - Whether homeless on their own or with family (last period)
  - Reason(s) to become homeless (last period)
  - Where stayed while homeless (last period)
- Adverse childhood experiences
  - Childhood health
  - Difficult events in childhood (parental separation, death, violence)
  - Financial difficulties in childhood

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Employment & finance

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Employment & finance

⊕: parents
⊙: cohort member
⊛: cohort member and parents
*: boost

	Age 14	Age 15	Age 16	Age 17	Age 18	Age 19	Age 20	Age 25	Age 32
Current activities & activity history			⊙	⊙	⊙	⊙	⊙	⊙	⊙
occupation types				⊙	⊙	⊙	⊙	⊙	⊙
Jobs and training			⊙	⊙	⊙	⊙	⊙	⊙	⊙
Apprenticeships		⊙	⊙	⊙	⊙	⊙	⊙		
Reasons for being NEET				⊙	⊙	⊙	⊙		⊙
Income and benefits			⊙	⊙	⊙	⊙	⊙	⊙	⊙
Attitudes to work						⊙	⊙		⊙
Job quality									⊙
Economic shocks experienced since coronavirus									⊙
Financial literacy									⊙

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New features – Age 32

- Job quality
  - Work security
  - Satisfaction with current job
  - Stress at work
- Economic shocks experienced since COVID-19 pandemic
  - Whether experienced by cohort member or their (cohabiting) partner
  - Time period of economic shock
- Financial literacy

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Physical health

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Physical health

⊕: parents
⊙: cohort member
⊛: cohort member and parents
*: boost

	Age 14	Age 15	Age 16	Age 17	Age 18	Age 19	Age 20	Age 25	Age 32
CM's health and disability	⊕	⊛	⊙	⊙		⊙	⊙	⊙	⊙
Pregnancy and fertility experience								⊙	⊙
Sport frequency	⊙	⊙	⊙	⊙		⊙	⊙	⊙	⊙
Diet								⊙	⊙
Substance use	⊙	⊙	⊙	⊙		⊙	⊙	⊙	⊙
Coronavirus experience									⊙
Saliva sample									⊙
Height and weight								⊙	⊙

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New features – Age 32

- Pregnancy and fertility experience
- Coronavirus experience
  - Experience of COVID_19
  - Tests taken and results
  - Long COVID
  - Vaccinations
- Saliva sample - DNA

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Mental health and wellbeing

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Health and wellbeing

⊕: parents
⊙: cohort member
⊛: cohort member and parents
*: boost

	Age 14	Age 15	Age 16	Age 17	Age 18	Age 19	Age 20	Age 25	Age 32
Mental and emotional health		⊙		⊙				⊙	⊙
Locus of Control		⊙		⊙			⊙	⊙	
Social support									⊙
Grit (e.g. Passion and perseverance)									⊙
Risk factors (absences, truancy, police contact, bullying, domestic violence)	⊛	⊛	⊛	⊙		⊙	⊙	⊙	⊙
Backward digit sequence test									⊙

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New features – Age 32

- Mental and emotional health
  - ONS Personal wellbeing (life satisfaction, worthwhile, happiness, anxiety)
  - Generalised Anxiety Disorder questions
  - Patient Health Questionnaire items
  - UCLA loneliness scale
- Social support:
  - Number of close friends, current relationships with friends, family members, community members
- Grit (e.g. Passion and perseverance)
- Backward digit sequence test (Working memory and concentration)

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Identity and Participation

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Identity and Participation

⊕: parents
⊙: cohort member
⊛: cohort member and parents
*: boost

	Age 14	Age 15	Age 16	Age 17	Age 18	Age 19	Age 20	Age 25	Age 32
Importance of ethnicity, nationality as part of identity									⊙
Gender diverse or sexual identity						⊙	⊙	⊙	⊙
Social attitudes and participation (e.g. social equality, voting behaviour/intension)					⊙		⊙		⊙
Use of leisure time	⊙	⊙		⊙				⊙	
Personality									⊙

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New features – Age 32

- Importance of ethnicity, and nationality as part of identity
  - Self-rated importance of ethnicity
  - National identity
  - European identity
  - Birthplace
- Social attitudes
  - Right to abortion, importance of women at work, immigration, environmental issues
- Personality (BIG5)

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Sample Design and Weights

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Sample design and weights

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Outline

- The Next Steps sample and design
- Response rates and patterns
- Accounting for missing data

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The Next Steps sample

- Target population of those in Year 9 (or equivalent) in February 2004
- Predominantly, age 13/14 at recruitment and born between 01 September 1989 and 31 August 1990.
- Comprised ‘Main’ (Sweep 1; n = 15,770) and ‘Boost’ (Wave 4; n = 352) samples
- Two stage complex sampling design: multiple pupils selected from co-operating schools

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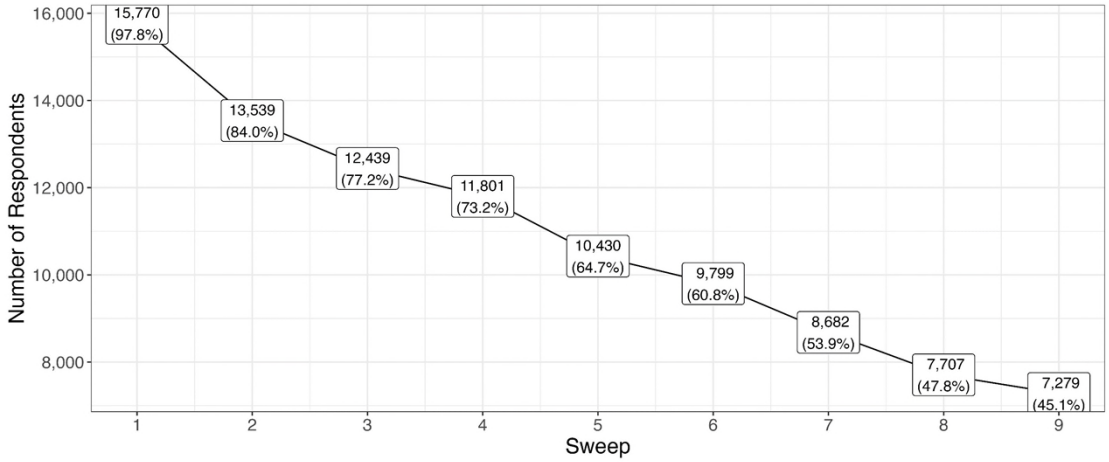
Productive sample over time



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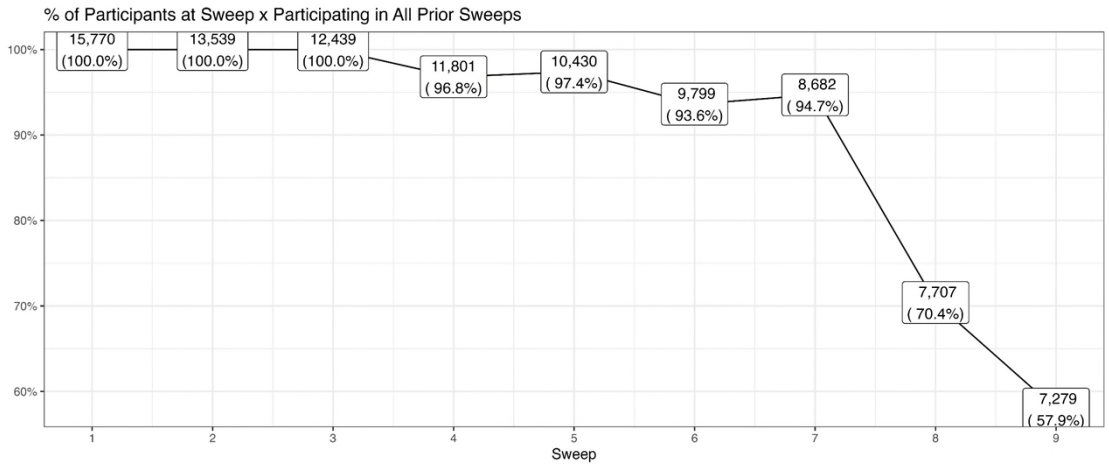
38

Response patterns



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Available weights

- Survey weights available for all sweeps, including Sweep 9
- Target population for the Sweep 9 weight is individuals in Year 9 in 2003/04 and alive and not in prison in 2022/23.
- Variable name: **W9FINWT**

```
svyset [pweight=W9FINWT],
       psu(SampPSU)
       strata (SampStratum)
```

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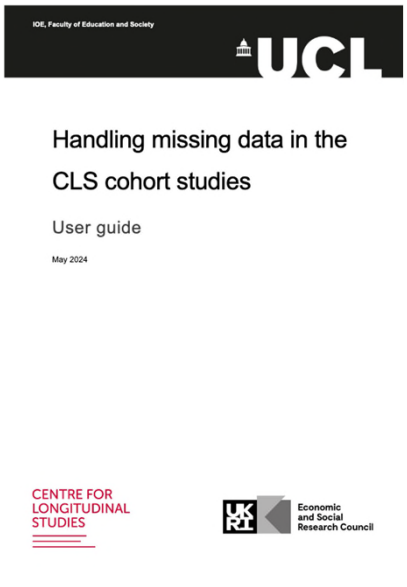
40

CLS Missing data strategy



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Data structure, documentation and access

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Data structure

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43

Data: List of Datasets

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Name	Contents	Structure	Identifier
NS9_2022_Main_Interview	Modules 1 to 8, 12 and cognitive assessment scores	Flat	NSID
NS9_2022_Partnerships	Relationship histories	Hierarchical	NSID, W9RELID
NS9_2022_Person_Grid	Details of members living in the same household as CM including children and partners	Hierarchical	NSID, GRIDID
NS9_2022_Non_Resident_Parent	Details of non-resident parents of children	Hierarchical	NSID, GRIDID
NS9_2022_Non_Resident_Children	Details of non-resident children	Hierarchical	NSID, GRIDID
NS9_2022_Pregnancy_History	Pregnancy histories	Hierarchical	NSID,W9PREGID,W9CHILDNO
NS9_2022_Benefits	Details of individual benefits including unfolding brackets	Hierarchical	NSID, W8BENID
NS9_2022_Activity_History	Activities and Employment histories	Hierarchical	NSID, W9HISTID
NS9_2022_Derived_variables	Derived variables	Flat	NSID W9COGID
NS9_2022_Cognitive_Tests	Cognitive responses for practice and test trials	Hierarchical	NSID
Next_Steps_Longitudinal_File	Sample, weights and outcome variables for sweeps 1 to 9	Flat	NSID

44

Data: Summary

- Datasets Summary
  - Licence: Datasets are End User Licence unless specified otherwise
  - Structure: Where applicable, the naming and structure of the datasets are consistent with the Age 25 survey e.g. NS32_Main_Interview. This dataset contains the majority of the survey data including results from the cognitive assessment
  - New to Age32: The person grid NS32_Person_Grid is comprised of 5 separate loops: partner grid, two child grids (reported in Age25 and additional), and two 'other' household grids (reported in Age25 and additional). In Age25, partner, child and household grids were reported separately.

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45

Data: Structure

- Flat files
  - 1 record per case
  - Cohort member (CM) response **uniquely** identified by the key identifier NSID
  - Dataset: **NS9_2022_Main_Interview**
- Hierarchical files
  - 1 or more records per case
  - CM response uniquely identified by NSID and a secondary index e.g. W9RELID
  - Dataset: **NS9_2022_Partnerships**

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46

Data: Conventions

- Variables
  - Order within questionnaire
  - CAPI name contained within dataset variable name
  - Prefixed with W9 denoting wave/sweep of the cohort study
  - Multi-coded variables have been given the suffix:

    0A, 0B, ... , AB to denote the 1st, 2nd... , 27th responses
- Variable Labels
  - Indication of the question content
- Values and Value Labels
  - Indication of the question content
  - Missing values (-9,-8,-1,-2,-3)

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47

Data: Redeposit

- New information recently added
  - Additional derived variables about cohort members' households and education
  - Updated advice on weighting your analyses
  - Prefixed with W9 denoting wave/sweep of the cohort study
  - A comprehensive user guide:

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Resources and Data Access

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49

Next Steps: https://cls.ucl.ac.uk/cls-studies/next-steps/

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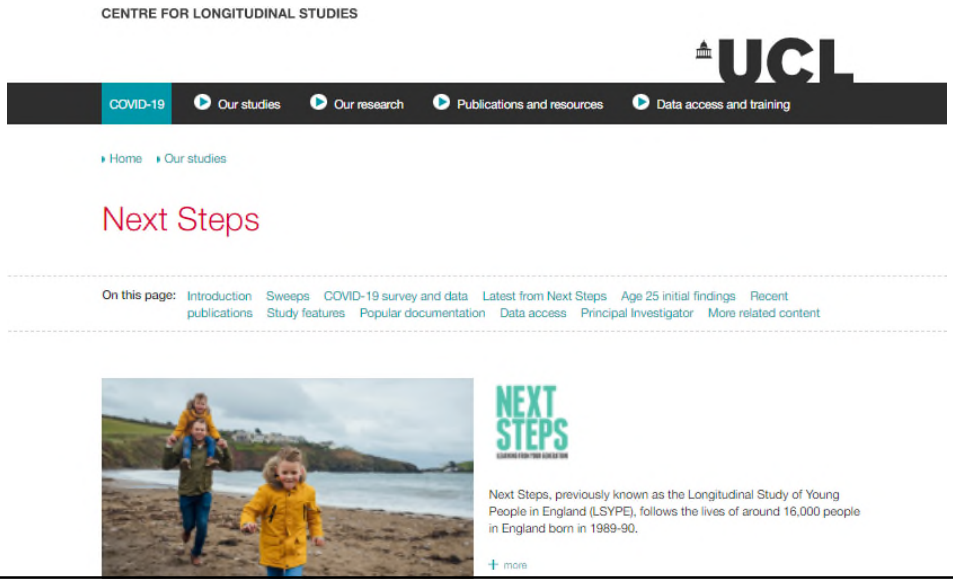

50

Available resources

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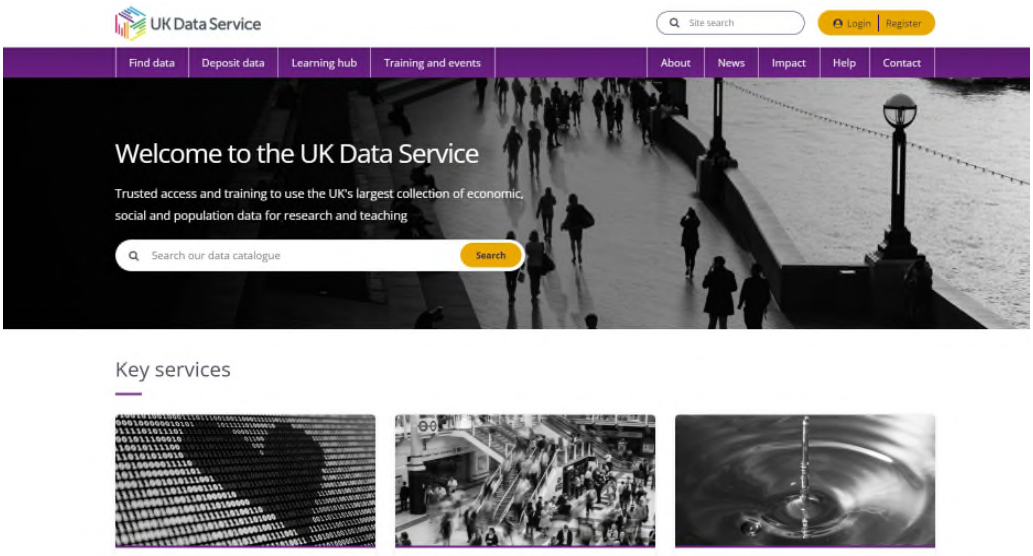
- User guides
  - Overview of measures; Response and weights
- Questionnaire
  - Exact question wording; Questionnaire routing; Variable names
- Data documentation
  - Data notes; Variables lists, including derived variables
- Technical report
  - Sample and questionnaire design, development
  - Fieldwork, response, ethics
  - Coding, editing
- Previous journal publications https://cls.ucl.ac.uk/publications-and-resources/
- Cohort Profile: https://academic.oup.com/ije/article/53/6/dyae152/7900073?login=false

51

Data freely available to researchers, government analysts and third sector workers: https://ukdataservice.ac.uk/



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Research opportunities using Next Steps

Paper 1: Women's pay penalty and job quality
Paper 2: Work and Health

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Research opportunities using Next Steps

Women's pay penalty and job quality

Bożena Wielgoszewska, Alex Bryson,
Claire Crawford, Heather Joshi

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54

Overall trends in aggregate data:

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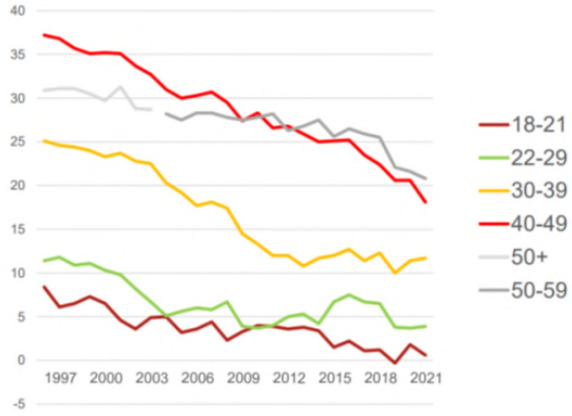
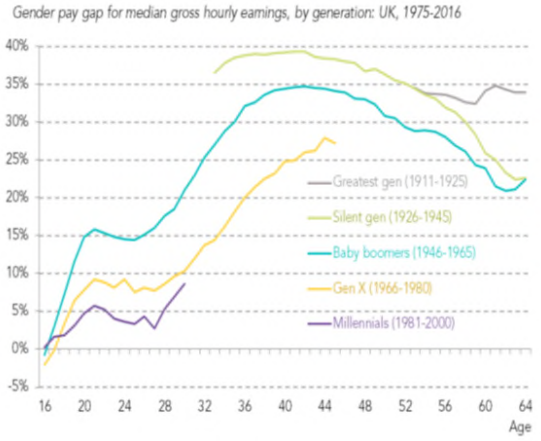
By age group



Source: ONS

By generation



Source: Resolution Foundation

55

Background and motivation:

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- **Gender pay gap** - women continue to earn significantly less than men, although the gap is closing gradually
- **Educational convergence** - in the past the gap was partly explained by women having lower educational qualifications than men, but this is no longer the case – women are now on average at least as well qualified as men
- **Motherhood penalty** - mothers are less likely to be in paid work, more likely to work fewer hours, and more likely to receive lower hourly pay than fathers

Aims:

- To explores the extent to which **gender pay gaps** persist among a recent cohort of 32-year-olds, both amongst parents and those who do not have children
- To explore the extent to which to which these gaps are driven by the **characteristics of individuals in work and the jobs they do**
- To examine the role of new measures of **self-perceived "job quality"** such as prospects of career advancement, job security and work stress

56

Mothers are more likely to work part time and look after family:

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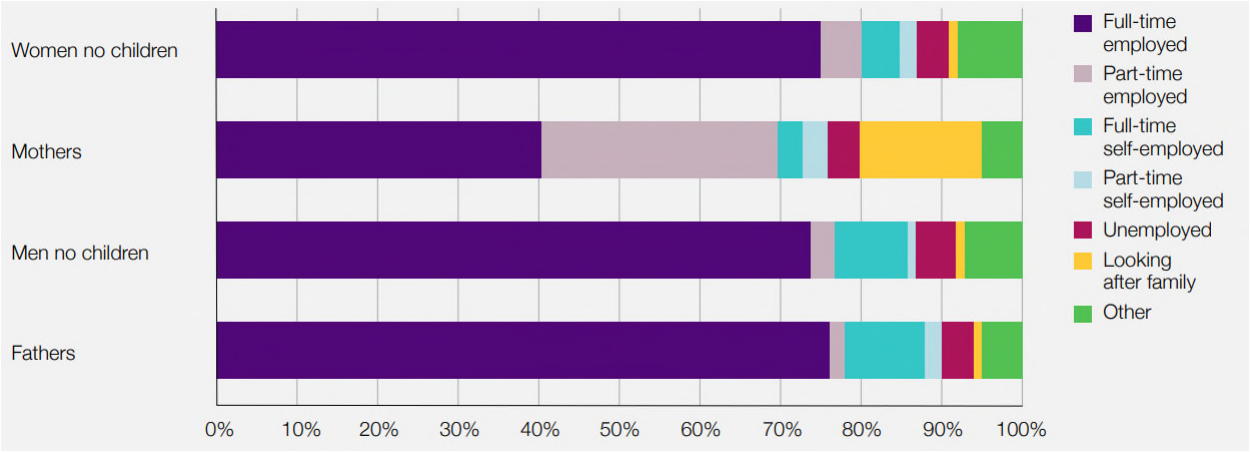

57

Occupational segregation:

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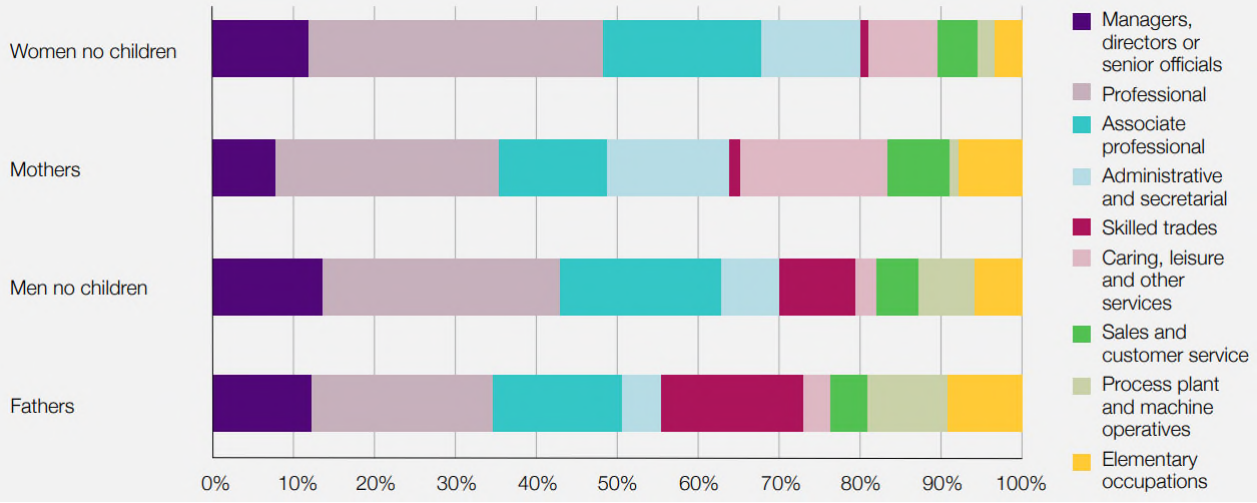

58

No evidence of “compensating differentials”:

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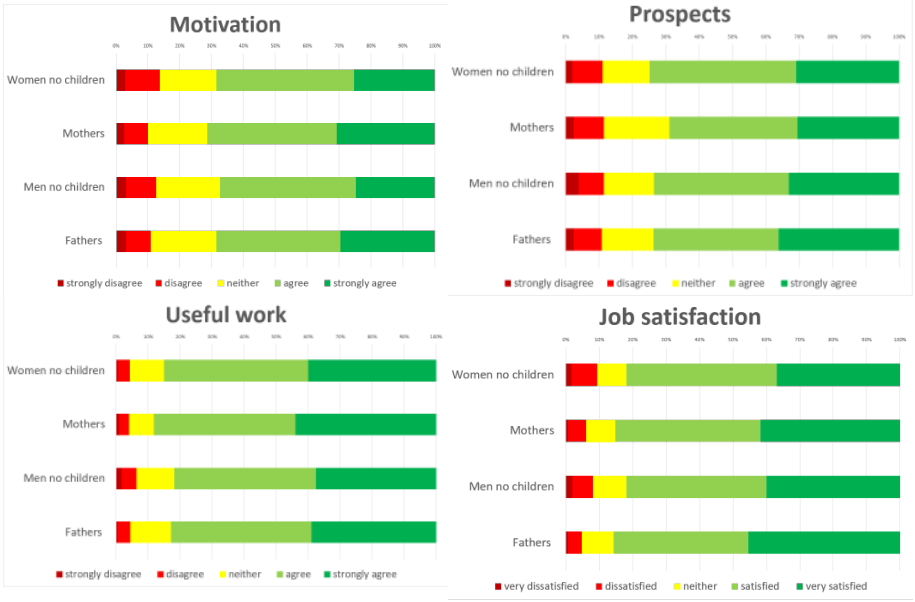

59

…but women and mothers are more stressed:

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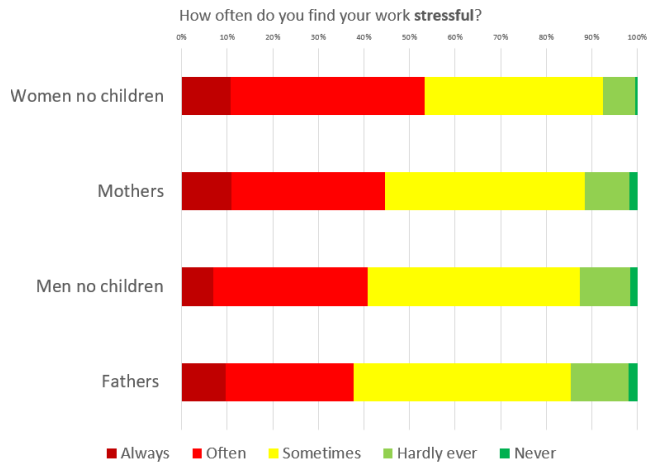

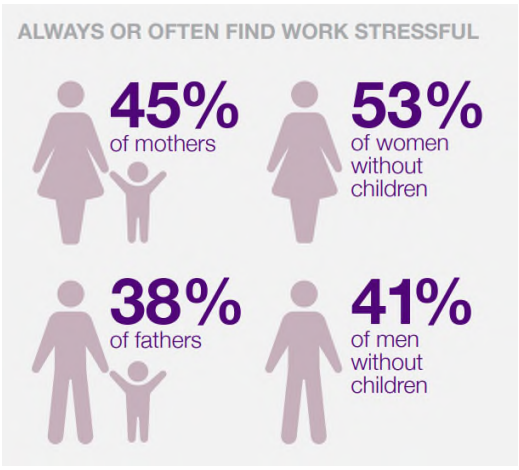

60

Individual and job characteristics do not fully explain the gender pay gaps:

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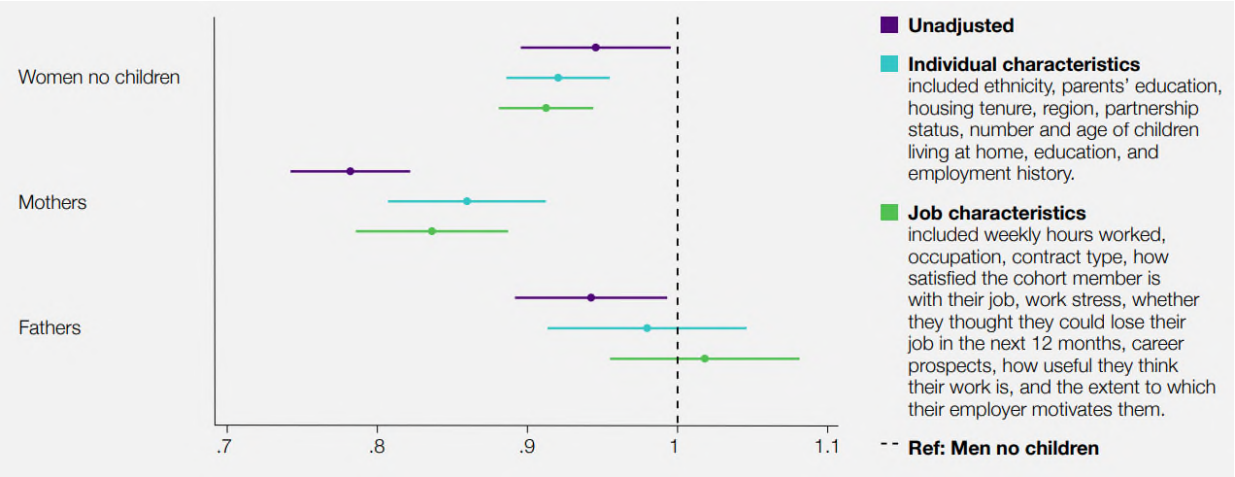

Ref. Men no children

61

Key findings:

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- **Employment** - labour market participation among mothers was high, with 80% of mothers either in paid work or seeking employment. Mothers were much more likely to work part-time and look after family.
- **Gender pay gap** - women's unadjusted median hourly pay is more than £2 less than men.
- **Motherhood penalty** - these gaps are even larger among parents - mothers' median hourly pay over £3 less than fathers.
- **Work stress** - 45% of mothers and 53% of women who do not have children report finding their work always or often stressful. This compares to 38% of fathers and 41% for men with no children.
- **Individual and job characteristics** - When comparing individuals with similar characteristics, working in similar types of jobs, women without children on average earn 9% less and mothers earn 16% less, than men without children, highlighting the existence of large, unexplained gender and motherhood wage penalties.

62

Find out more:

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- CLS news item https://cls.ucl.ac.uk/millennial-women-paid-less-than-male-colleagues-in-similar-jobs/
- Briefing paper https://cls.ucl.ac.uk/wp-content/uploads/2017/02/Womens-pay-penalty-and-job-quality_Initial-findings-from-Next-Steps-at-Age-32.pdf
- Press coverage https://www.thetimes.com/uk/society/article/millennial-women-earn-9-percent-less-than-men-in-same-jobs-g7p2wn8zt

63

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Thank you!

Bożena Wielgoszewska, Alex Bryson, Claire Crawford, Heather Joshi

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Research opportunities using Next Steps

Work and Health

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Aims

- Understanding the associations between work and health among midlife adults – critical life stage regarding long-term labour market outcomes

Not working groups

Unemployed | **Inactive**

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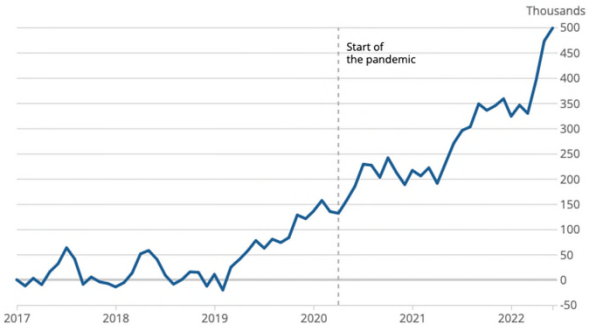
The challenge in the UK labour market

- 12% of the aged 25-40 population is currently not working (Office for National Statistics, 2024).
- 6.6% of 16-64-year-olds are now economically inactive for health reasons, a record high since 1993. - Christopher Rocks, Lead Economist for the Health Foundation's Commission for Healthier Working Lives



Source: Office for National Statistics – Labour Force Survey

▸ Embed code

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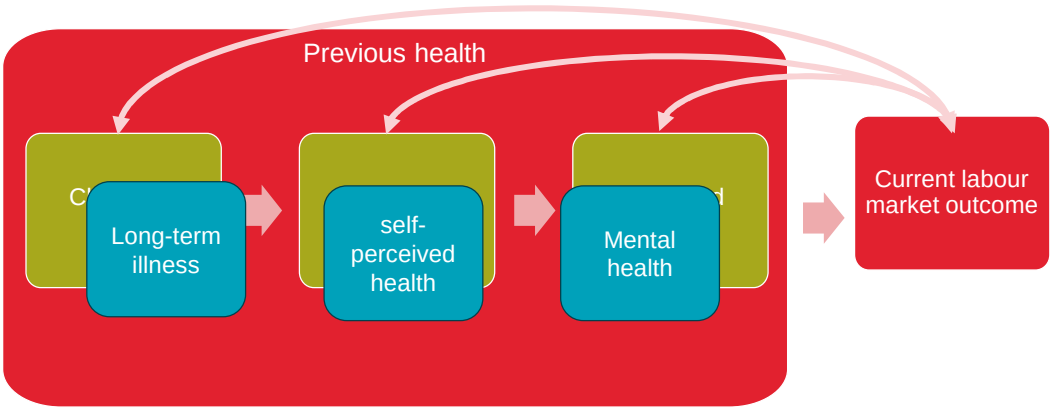
67

The associations between work and health and life course perspective



van Rijn et al., 2014
Sergio Salis et al., 2021

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68

Research questions

1. What are the current economic activities among the age 32 population in England?
2. What is the prevalence of long-term illness, self-rated health issues, and poor mental health in this population?
3. How do health conditions relate across early life stages?
4. How do different health dimensions at different life stages vary across economic activity groups?

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Variables

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Variables	Childhood S1-3 + S9 retro, before 16	Adolescence S4, age 17	Early Adulthood S8, age 25	Adulthood S9, age 32
Economic activities				v
Health	v	v	v	
Covariates				
Work			v	
Health				v
Education				v
Gender	v			
Ethnicity	v			
Parent occupation level and education	v			

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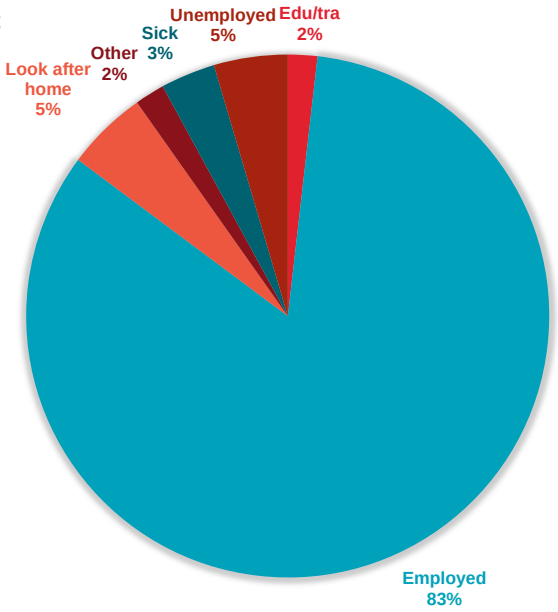
71

What are the current economic activities among the age 32 population in England?



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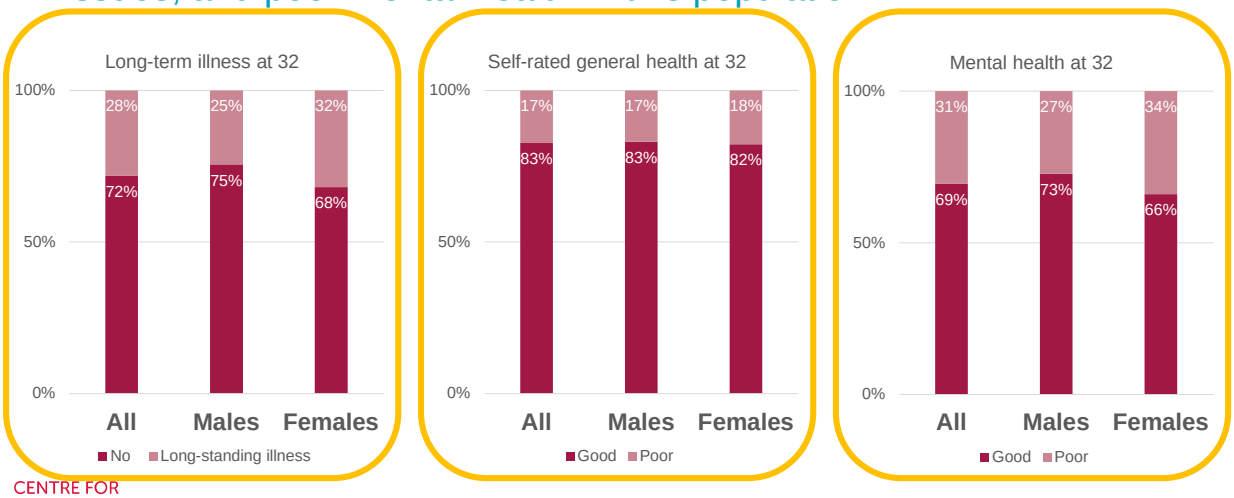
72

What is the prevalence of long-term illness, self-rated health issues, and poor mental health in this population?



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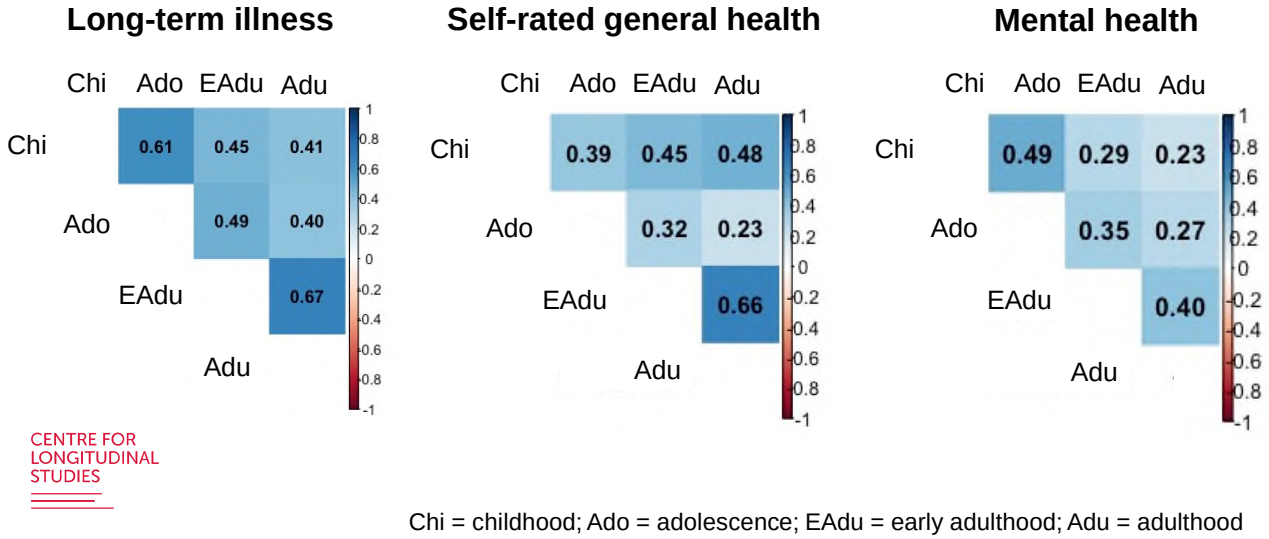
How do health conditions relate across early life stages?



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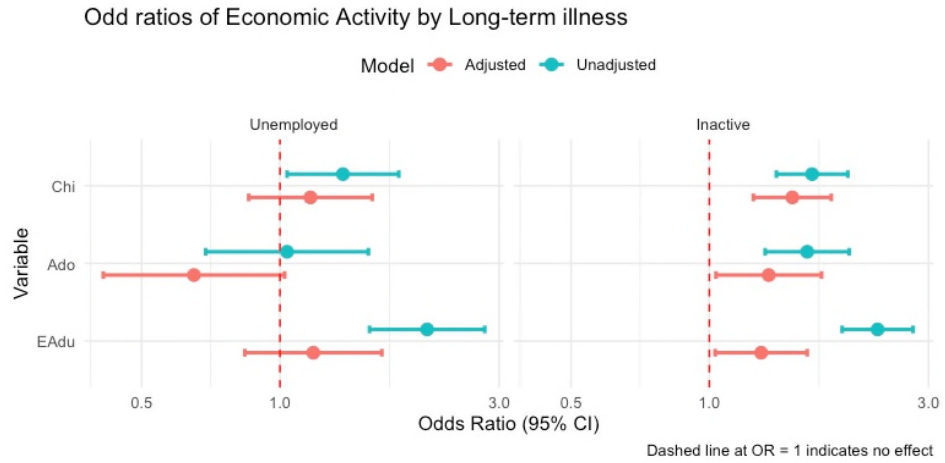
Chi = childhood; Ado = adolescence; EAdu = early adulthood; Adu = adulthood

74

How do different health dimensions at different life stages vary across economic activity groups?
Long-term illness



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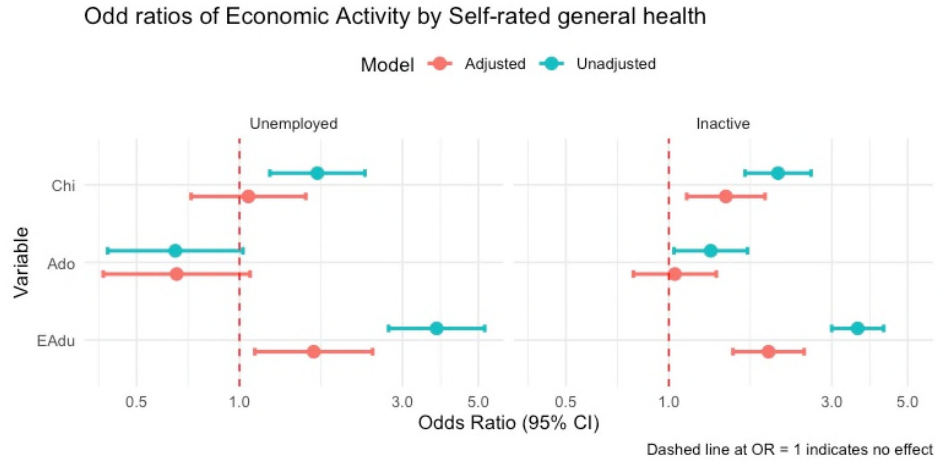
Reference group: employed

75

How do different health dimensions at different life stages vary across economic activity groups?
Self-rated general health



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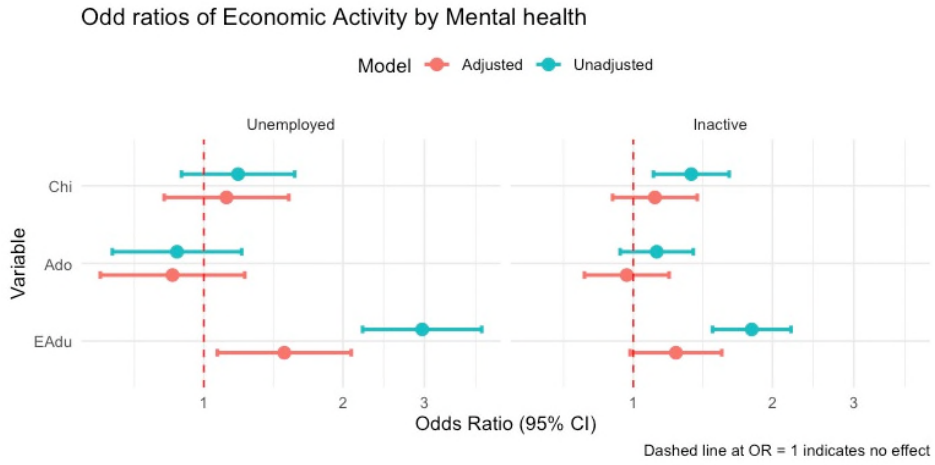
Reference group: employed

76

How do different health dimensions at different life stages vary across economic activity groups?
Mental health



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Reference group: employed

77

Conclusion

- Around 17% of our sample was unemployed at age 32.
- Most participants reported good health.
- Health at different life stages relates to later health outcomes.
- The inactive group was associated with previous long-term illness and poor self-rated general health, particularly during childhood and early adulthood.
- The unemployed group was associated with poor mental health in early adulthood.

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Please complete the feedback form

Any questions?

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79