

# Maternal Well-Being Infant Feeding and Return to Paid Work

## Technical Report: UKHLS

Professor Sarah Jewell, Dr Fari Aftab, Professor Marina Della Giusta, Professor Grace James, Professor Sylvia Jaworska and Dr Sam Rawlings



## Acknowledgements

*We would like to thank the Nuffield Foundation for funding the study (grant WEL/23247). The Nuffield Foundation is an independent charitable trust with a mission to advance social well-being. It funds research that informs social policy, primarily in Education, Welfare, and Justice. It also funds student programmes that provide opportunities for young people to develop skills in quantitative and scientific methods. The Nuffield Foundation is the founder and co-funder of the Nuffield Council on Bioethics, the Ada Lovelace Institute and the Nuffield Family Justice Observatory. The Foundation has funded this project, but the views expressed are those of the authors and not necessarily the Foundation. Visit [www.nuffieldfoundation.org](http://www.nuffieldfoundation.org).*



## Overview of the UK Household Longitudinal Study

The UK Household Longitudinal Study (UKHLS, more commonly known as the Understanding Society) is a nationally representative household and individual level panel survey. The survey began in 2009 and follows approximately 40,000 households from across England, Scotland, Wales, and Northern Ireland over time. Households are interviewed annually but each wave takes two years to complete. The dataset has a large general population sample, an ethnic minority booster sample, and an additional immigrant-ethnic minority boost sample (included from wave six), containing rich information on respondents' characteristics and behaviour.

The UK Household Longitudinal Study collects information on social and economic variables at the individual and household level. Importantly for us the survey collects information on new births including birth characteristics and breastfeeding behaviour, and information on economic activity and job characteristics, alongside demographics. It also collects information on well-being (life satisfaction and mental well-being). We make use of the UKHLS for two purposes. Firstly, we use the dataset to benchmark our primary data, as it provides information on general breastfeeding and work behaviour in the UK so we can understand breastfeeding initiation and duration rates, and the characteristics of those who are more likely to breastfeed and return to work. Secondly, since the dataset provides information on breastfeeding and work behaviour we are able to explore the relationship between breastfeeding and work as well as their association with mental well-being.

We specifically use the following special licence version of the UKHLS since we need information on the month of birth, so we can identify the age of the child upon return to work:

University of Essex, Institute for Social and Economic Research. (2023). *Understanding Society: Waves 1-13, 2009-2022 and Harmonised BHPS: Waves 1-18, 1991-2009: Special Licence Access*. [data collection]. 17th Edition. UK Data Service. SN: 6931, DOI: <http://doi.org/10.5255/UKDA-SN-6931-16>

## Sample Creation

We draw together information from different datafiles: the individual response file, newborn file and child file. We also applied for special licence data to obtain the child's month of birth. Successful pregnancies reported in a wave were identified from the individual response file and matched to information in the newborn file which then was matched to information in the child file. The individual file contains information about the pregnancy (including type of delivery and whether a multiple birth) and mother's information on employment, employment changes and maternity leave. The newborn file contains birth characteristics (birth weight, whether early/late, and information on breastfeeding (whether breastfeed and for how long); if the mother was still breastfeeding (information on age stopped breastfeeding was collected in their next

wave). We combined information from the newborn file and the child file to obtain information on breastfeeding initiation and duration. Some mothers were still breastfeeding at the point they were last interviewed. Information in the newborn file is collected from wave 2 but the data was dropped due to an error by the data collectors relating to follow up of breastfeeding mothers, who were still breastfeeding, in wave 3. The child file also included characteristics such as month (obtained via the special licence version) of birth and gender of the child. We constructed an employment and maternity leave history based on the information provided in the job and activity change modules asked in the individual files, combining information on status/job changes, maternity leave spells and expected return to work after birth. The individual file also contains information on job characteristics, such as sector (public vs private), occupation, industry, firm sizes, contract type and job hours (we collected this information at the time of birth and upon return to work).

6,163 births were identified in the data but 891 birth observations were dropped from wave 2 due to the data collector error mentioned above. We dropped the 84 who had a multiple birth, owing to the different issues relating to multiple births. We then kept the sample who had full information on breastfeeding and return to work, leaving us with a sample of 3,996 births from 3,143 mothers.

### **General Population Sample**

When we are interested in using the UKHLS to help benchmark our primary data analysis, we focus on the UKHLS's general population sample (excluding the ethnic minority and immigration boost samples). We typically focus on births since 2017, as this was the cutoff point used in our maternal experience survey. We utilise the sample in the UKHLS that has full information on return to work and infant feeding behaviour which includes 773 births from 703 women.