

Understanding Society User Support - Support #1827

Correct weights to use

12/07/2022 09:40 AM - Amelia Watts

Status:	Resolved	Start date:	12/07/2022
Priority:	Normal	% Done:	100%
Assignee:	Olena Kaminska		
Category:	Weights		
Description Dear Olena, I have two questions regarding using weights. I'm trying to conduct a cross-sectional analysis using data from a UKHLS wave. 1) If I select a sub-sample using respondents interviewed in certain years/months within a wave, can I still use the existing cross-sectional weights, or will I need to make adjustments to the cross-sectional weights? 2) All the dependent and independent variables are from one wave (eg wave 5), apart from one independent variable which was measured at an earlier wave (eg wave 2). I will match respondents from wave 5 and wave 2 to obtain the values of this independent variable. In this case, can I still use the cross-sectional weights in wave 5, or should I use the longitudinal weights in wave 5? Thank you for your help.			

History

#1 - 12/07/2022 09:58 AM - Amelia Watts

Just to clarify regarding 2), I'm not looking at changes in this wave 2 independent variable over time, but simply use it in a cross-sectional way (combined with the rest of wave 5 data). Thank you.

#2 - 12/07/2022 02:26 PM - Olena Kaminska

Amelia,

Thank you for your question. Our weights work with any population subgroup (but not a subsample). If you want to use any of our subsamples please give details, but weights should not be used with separate subsamples. For subpopulations read here:
https://www.understandingsociety.ac.uk/sites/default/files/downloads/general/weighting_faqs.pdf

I need more clarification for 2). Do you mean that you take value from wave 5, but if missing you substitute with wave 2. E.g. whether a person has a driving licence may be asked infrequently, or only once when they come to a survey - is this how you are using that independent variable?

Best,
Olena

#3 - 12/08/2022 10:45 AM - Amelia Watts

Thank you Olena for your response.

For 1), if I'm going to select respondents who were interviewed in 2014 in wave 5 (and drop respondents interviewed in 2013) in my sample, can I still use the cross-sectional weights for these 2014 respondents provided in wave 5?

Question 2) is independent of question 1). As the independent variable was only measured in wave 2 but not in wave 5, I will extract the value for this independent variable from wave 2 and combine this variable with the rest of the wave 5 data for cross-sectional analysis. Essentially only respondents interviewed in both wave 5 and wave 2 are used in the analysis of the wave 5 data. Can I use the cross-sectional weights in wave 5, or should I use the longitudinal weights in wave 5?

Kind regards,
Amelia

#4 - 12/09/2022 03:03 PM - Olena Kaminska

Amelia,

Thank you for your clarification.

1) No, you can't use only one calendar year. Using 2014 from wave 5 for example will exclude Northern Ireland (and have many more differences in selection probabilities). Read our FAQs on calendar year analysis.
https://www.understandingsociety.ac.uk/sites/default/files/downloads/general/weighting_faqs.pdf

2) For this you need a longitudinal weight. You can't use cross-sectional weight if information comes from multiple waves (regardless of your research questions).

Hope this helps,
Olena

#5 - 12/09/2022 04:28 PM - Amelia Watts

Hi Olena,

Many thanks for your response.

Could I ask a further question to help me understand the cross-sectional weights in general?

Assuming there is a single sample origin in a wave, will I need to re-scale the cross-sectional weights if I drop respondents interviewed in months 21-24? Or the provided weights for respondents (months 1-20) can be used without adjustment?

If adjustment is needed in this case, is the scaling factor = (total weights for months 1-24) / (total weights for months 1-20), and I then multiply weight for each respondent (in months 1-20) by this scaling factor?

Thank you.

#6 - 12/12/2022 01:55 PM - Olena Kaminska

Amelia,

No, this isn't a valid option. Our sample months don't have the same selection probabilities, so using some of them will result in a skewed distribution of the population (including some ethnic groups). If interested in a particular timeline you need to follow our advice in FAQs.

To understand sample design you can read here: <https://www.understandingsociety.ac.uk/sites/default/files/downloads/working-papers/2009-01.pdf>

Hope this helps,
Olena

#7 - 12/21/2022 05:51 PM - Understanding Society User Support Team

- Status changed from New to Feedback

- % Done changed from 0 to 80

- Private changed from Yes to No

#8 - 11/30/2023 12:42 PM - Understanding Society User Support Team

- Status changed from Feedback to Resolved

- % Done changed from 80 to 100