

Understanding Society User Support - Support #440

Longitudinal Regression Analysis Weights

11/01/2015 06:55 PM - Esther Afolalu

|  |                |                    |            |
|--|----------------|--------------------|------------|
| <b>Status:</b>   | Closed         | <b>Start date:</b> | 11/01/2015 |
| <b>Priority:</b>   | Urgent         | <b>% Done:</b>     | 100%       |
| <b>Assignee:</b>   | Olena Kaminska |                    |            |
| <b>Category:</b>   | Weights        |                    |            |
| <b>Description</b> <p>Hello. I am working on the understanding society database looking specifically at the self-completion questionnaire data for the sleep and health questions. I am carrying out a longitudinal regression analysis to explore the association between change in individual sleep status on the health outcomes from wave 1 – wave 4 controlling for a number of other variables. I just wanted to double-check which longitudinal weight I should apply to the regression analysis – I am thinking 'd_indscus_lw'? And for descriptive statistics to describe the initial sample at wave one, would I just use the 'a_indscus_xw' weighting?</p> <p>Also, if I wanted to incorporate nurse assessment CRP biomarker data at Wave 2 as a mediator or examine the association from Wave 1 sleep status to Wave 2 biomarker status, which weighting would I apply in this case 'b_indnsus_lw'? And lastly, is there a weighting that's applicable perhaps to look at the association from Wave 2 biomarker status to Wave 4 sleep?</p> <p>Thank you,<br/>Esther.</p> |                |                    |            |

History

#1 - 11/02/2015 10:50 AM - Olena Kaminska

Here are the answers to your questions in the order asked. Yes, d\_indscus\_lw is correct, and a\_indscus\_xw is correct as well for the analysis you describe.

We do not have the weight for combining biomarker data from wave 2 and self-completion questionnaire, but b\_indnsus\_lw is a good suboptimal weight. This weight takes into account all nonresponse stages except for nonresponse to self-completion questionnaire conditional on response to full questionnaire.

Yes, there is a weight for longitudinal analysis of full questionnaire data with combined biomarker data from wave 2 and wave 3 in each mainstage wave. It is called 'd\_indnsus\_lw' and you will find it on d\_indresp.dta file released with the mainstage w4 release. There are two points you need to keep in mind here. First, the same as above - the nonresponse to self-completion conditional on full questionnaire response is not taken into account, but this is a good suboptimal weight. And second, the weight is created for the combined w2 and w3 nurse data - so you need to keep in mind that some respondents were asked nurse questions at different time points.

Hope this helps,  
Olena

#2 - 11/04/2015 09:14 PM - Esther Afolalu

That's great thank you!

#3 - 11/09/2015 01:00 PM - Redmine Admin

- Status changed from New to Closed
- % Done changed from 0 to 100

#4 - 11/10/2015 10:36 AM - Gundi Knies

- Target version set to X M