

ASSESSING NONRESPONSE BIAS IN MACRO INDICATORS BY COMBINING PARA-, ADMINISTRATIVE, AND SURVEY DATA (joint with Guy Lichtinger, Daniel B. Reeves)

Abstract

National surveys are crucial for estimating key economic aggregates, including the unemployment rate, labor force participation, and household expenditures.

The accuracy of these indicators is increasingly under scrutiny due to declining response rates and the consequent risk of nonresponse bias.

How can we assess nonresponse bias in these key economic aggregates? Using two Israeli national surveys, we propose a novel approach.

First, using often-available paradata such as number of contact attempts and nonresponse reason, we create respondent and nonrespondent subcategories.

Second, using rarely-available merged administrative records, we identify, for each nonrespondent subcategory, which respondent subcategory appears to resemble it most.

We find that nonrespondents are a heterogeneous group: some—e.g., those temporarily unavailable—share administrative-record demographic and outcome profiles with

harder-to-reach respondents, while others—e.g., refusals and withdrawals—are more similar in the administrative data to easier-to-reach respondents.

Third, assuming that these resemblances would extend to survey outcomes, we impute (always-available) survey-based aggregates to nonrespondents within each paradata-based subcategory.

We demonstrate that our method can help assess nonresponse bias in surveys lacking matched administrative records, using the U.S. Consumer Expenditure Survey as an example.