

Inverse probability weighted M -estimators for sample selection, attrition, and stratification^{*}

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Abstract. I provide an overview of inverse probability weighted (*IPW*) M -estimators for cross section and two-period panel data applications. Under an ignorability assumption, I show that population parameters are identified, and provide straightforward \sqrt{N} -consistent and asymptotically normal estimation methods. I show that estimating a binary response selection model by conditional maximum likelihood leads to a more efficient estimator than using known probabilities, a result that unifies several disparate results in the literature. But *IPW* estimation is not a panacea: in some important cases of nonresponse, unweighted estimators will be consistent under weaker ignorability assumptions.

Key words: Attrition – Inverse probability weighting – M -estimator – Nonresponse – Sample selection – Treatment effect

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