A Competing Risk Model for Health and Food Insecurity in the West Bank

Elisa Cavatorta*

Luca Pieroni[†]

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Abstract

This paper explores behavioural changes caused by the presence of a background risk. We argue that background risks make preferences more sensitive to undesirable events, increasing the attractiveness of an insurance against insurable risks. We present a theoretical framework to investigate this interaction and we test empirically this hypothesis with household data from the Palestinian Territories. We consider the risk of food insecurity in the Palestinian Territories as a background risk and the risk to health as an insurable risk. We estimate the conditional probabilities of buying a health insurance with and without a background risk with a bivariate probit model. We find robust empirical evidence of interdependence between the background risk of food insecurity and the propensity to buy a health insurance. The predicted conditional probabilities reveal that the propensity to buy a health insurance is higher in presence of a background risk of food insecurity than without background risk. This study shows that, in presence of a background risk, there might be incentive changes towards the desirability of risk protection schemes that policy-makers should be mindful of.

Keywords: Competing Risks, Background Risk, Food Insecurity, Health Insurance, Bivariate Probit

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 $[*] Corresponding author. \ Birkbeck \ College, \ University \ of \ London. \textit{E-mail}: \ ecavatorta@ems.bbk.ac.uk$

[†]Department of Economics, University of Perugia. *E-mail*: lpieroni@unipg.it

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