Accepted Manuscript

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Marco Brianti, Mario Menegatti, Marco Magnani

PII: S1090-9443(17)30060-1
DOI: 10.1016/j.rie.2017.03.005
Reference: YREEC 717

To appear in: *Research in Economics*

Received date: 16 February 2017
Revised date: 20 March 2017
Accepted date: 27 March 2017

Please cite this article as: Marco Brianti, Mario Menegatti, Marco Magnani, Optimal choice of prevention and cure under uncertainty on disease effect and cure effectiveness, *Research in Economics* (2017), doi: 10.1016/j.rie.2017.03.005

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ACCEPTED MANUSCRIPT

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MARCO BRIANTI
Department of Economics
Boston College
Chestnut Hill MA, USA
brianti@bc.edu

MARCO MAGNANI
Dipartimento di
Scienze Economiche e Aziendali
Università degli Studi di Parma
Parma, Italy
marco.magnani@unipr.it

MARIO MENEGATTI *
Dipartimento di
Scienze Economiche e Aziendali
Università degli Studi di Parma
Parma, Italy
mario.menegatti@unipr.it

Abstract

This paper studies optimal prevention and cure when an agent copes with two different sources of uncertainty: uncertainty on disease effect and uncertainty on cure effectiveness. We first analyze how optimal choices are affected by uncertainty when prevention and cure do not interact. Under both types of uncertainty, we obtain that the optimal level of prevention rises. Furthermore, we characterize for each source of uncertainty the conditions for the optimal level of cure to increase. We show that these conditions are related to different measures of prudence in health and cross-prudence in wealth. Lastly, we generalize our results to the case where prevention and cure interact and characterize for each source of uncertainty the conditions for the optimal level of prevention and cure to jointly increase. These conditions are similar to those obtained in the case without uncertainty but, in this context, Edgeworth-Pareto complementarity is also required.

* *Corresponding author: Dipartimento di Scienze Economiche e Aziendali, Università degli Studi di Parma, Via Kennedy 6, I-43125 Parma, Italy. e-mail: mario.menegatti@unipr.it. phone number:+390521032450*

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