

# Time, utility, risk aversion: how important is the role played by the Decision Maker?

Paola Ferretti \*

*Department of Applied Mathematics  
Advanced School of Economics  
University of Venice  
Cannaregio 387  
I-30121 Venice  
Italy*

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## Abstract

In the de Finetti-Arrow-Pratt framework, the utility for wealth is assumed to be not changing with time, i.e. utility is timeless. Given that clearly preferences may change with time, in the context of time varying utility of wealth, this paper defines temporal risk aversion in the case of a Decision Maker who acts as a Buyer: temporal risk premium, instantaneous risk premium and time preference premium are studied. Sufficient conditions ensuring temporal risk aversion and a suggestion for a local measure of temporal risk aversion are presented.

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*Keywords and phrases : Temporal utility, buyer-seller viewpoints, temporal risk premium, instantaneous risk premium, time preference premium.*

## 1. Introduction

During most of the post-war period, the *Expected Utility* (EU) model has been one of the main scientific results of modern economic analysis. Nevertheless, individual choices under uncertainty may be inconsistent with the hypothesis of EU model. Then, some attempts to develop alternative models have been proposed among which some highly promising generalizations of EU. Despite that, very often they don't keep the simple and tractable formulation of EU.

In the de Finetti-Arrow-Pratt framework ([2], [7], [22]) the utility for wealth is assumed to be not changing with time, i.e. utility is timeless.

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\*E-mail: ferretti@unive.it

*Journal of Statistics & Management Systems*

Vol. 13 (2010), No. 5, pp. 961-978

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