Rethinking Fixed Deferred Annuities: Applying a Risk-Based Economic Value Approach

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Presented at
2010 Enterprise Risk Management Symposium
Society of Actuaries
April 12-15, 2010

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Abstract

The recent turbulence observed in financial markets has highlighted the importance for insurers to have a clear understanding of the risks inherent in the business they write. Risk-based metrics such as economic capital and market-consistent embedded value provide a framework for developing such an understanding of risk and value. Over the last few years, the use of market-consistent metrics in North America has increased. However, much confusion persists on how to calculate, interpret and use these to manage life insurance business.

This paper aims to provide clarity on these issues by examining a particular product type that presents a number of challenges in these areas for US life insurers: fixed deferred annuities.

It examines a number of key areas relevant to managing this business using a risk-based approach. It begins with an overview of the economic framework and associated risk-based metrics used to assess value (market-consistent embedded value). It also provides a high level analysis of the risks inherent in typical fixed annuity products.

The paper then discusses in more detail some of the methodology and modeling issues that are frequently encountered with fixed annuity products in an economic framework. These include selection of an appropriate discount rate, modeling of crediting strategy, modeling of policyholder behavior.

There then follows a discussion on how to interpret these results, focusing in particular on the market-consistent embedded value, which for many fixed annuity products can appear much less attractive (in many cases resulting in negative values) compared to other traditional metrics.

The paper will conclude by considering the implications of the above and will discuss what risk management options are available to life insurers to address the (perceived) issues highlighted. These include possible changes in product design, crediting strategy, asset strategy.