SOCIETY OF ACTUARIES

Article from

**Expanding Horizons**

May 2019

Issue 58

## BOOK REVIEW

# Guy Thomas' *Loss Coverage: Why Insurance Works Better With Some Adverse Selection*

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Actuaries and economists should listen to what author Guy Thomas is saying in *Loss Coverage*. An alternative title might be *A History of Exaggeration: Adverse Selection can Even be Beneficial*. In it, Thomas summarizes his points of difference as:

a. Adverse selection in insurance is usually weaker than most commentaries suggest ...

b. From a public-policy perspective, "weak" adverse selection in insurance is a good thing ...

c. ... Some restrictions on risk classification are a good thing in some insurance markets ...[1]

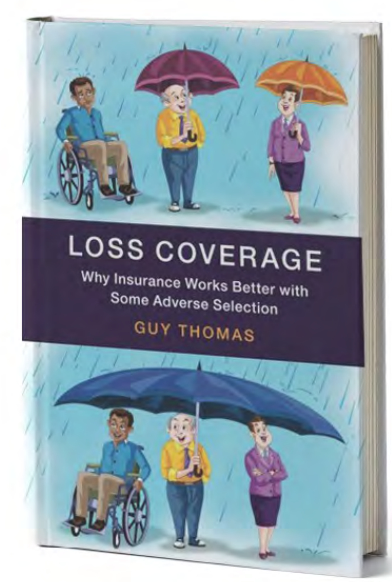
His characterisation of "most commentaries" is not a straw man. He quotes many actuaries, academics and industrial commentators, arguing that failure to distinguish among risks will lead to upward price spirals and failing insurance companies. Dire predictions about the effect on insurance markets of adverse selection because of limiting discrimination based on HIV, genetics and gender have proved largely baseless.

The contribution to theory is the concept of "loss coverage," which is a measure of the extent to which potentially insurable losses are actually compensated by insurance. The second part of the book is devoted to defining it and exploring its mathematics. These more technical chapters demonstrate how some adverse selection increases loss coverage—depending on the price elasticity of both high and low risks—and how industry agreements or a regulator might induce optimal loss coverage under differing circumstances. He also deals with partial risk classification, where prices only partly reflect underlying differences in risk.

Part III returns to Thomas' points of difference. It opens with a taxonomy of objections to risk classification. Of the 10 objections given, two are perhaps the most powerful. First, the unfairness to individuals of statistical discrimination, which may confuse causation and correlation, or effectively differentiate on socially objectionable grounds. Second, the perverse incentives that can arise for individuals to avoid obtaining genetic and other useful information in order to avoid higher insurance premiums or being refused insurance.

He defines "informational adverse selection" as that arising from unavoidable informational asymmetries and suggests that what little effect it has on insurance markets is probably positive in increasing loss coverage. "Competitive adverse selection," on the other hand, arises when some companies begin to discriminate on new grounds and requires their competitors to follow suit or be left with only the highest risks. The argument is that agreements or regulations that prevent competitive adverse selection create greater social welfare.

The political chapters are critical of industry and professional lobbying against regulations that might prevent unfair discrimination or increase loss coverage. He gives examples of emotive and exaggerated prognostications of huge losses from adverse selection related to HIV, genetic testing and gender-neutral pricing. He suggests that the actuarial profession has bought into industry prejudices, and that much lobbying in favor of



"freedom to underwrite" is based on an ideological agenda that wishes to undermine redistributive social security systems.

The ideological debate can be explained as a species of class warfare but also as a clash of values between the political left (and its concern for equality of living standards and addressing individual needs) and the political right (and its concern for liberty and just deserts). I think that the book would have benefited from more discussion of these issues, as in the work of Jonathan Haidt.[2] On the issue of just deserts, it seems to me that the industry is muddling actuarial equity (equality of premiums and benefits) with desert. One cannot be held accountable for one's genes, in the same way one might be charged more for choosing to smoke, drink or climb dangerous mountains. In its desire to be free from regulation, there are those in the industry who fail to see the potential benefits of relatively benign restrictions on underwriting. In any event, as Thomas points out, underwriting can involve an invasion of privacy that I would see as a restriction on individuals' freedoms.

Thomas' criticisms extend to economic models of adverse selection, such as Rothschild-Stiglitz, in which constructs such as differentially priced deductibles and restrictions on cover for low risks do not reconcile well with insurance practice. He also takes issue with orthodox concepts of efficiency in risk classification, and suggests that loss coverage offers a better definition of efficiency. To my mind, efficiency depends on the costs of insurance—the lower the cost of underwriting, and the less risk classification, the greater the efficiency.

There is also a question (raised by Thomas in Chapter 3) of whether insurance is best understood as providing reassurance in the actual present state or probabilistic compensation of losses in some possible future state. There may well be a trade-off, but this does not detract from Thomas' three points of difference.

My own early experience of what is termed "advantageous selection" led me to come to an understanding like Thomas'. In the '70s "bush war" in what became Zimbabwe, we loaded term insurances higher than whole life and endowment policies because of potential adverse selection, only to find the experience of the latter was worse. Policyholders informed enough to take the higher coverage offered by term insurance were also more able to avoid falling casualty. I also found that policies exercised using guaranteed insurability benefit options experienced much lower mortality than our ultimate rates. They provided the sales force with the excuse to visit and sell policies, and this swamped the occasional higher-risk individual obtaining an advantage. Other factors frequently swamp price in the purchasing decision, and value for money is often more related to costs other than the pure premium.

While he describes himself as an outsider—both an academic and actuary—Thomas' criticisms of the actuarial profession are those of someone deeply embedded in its methodology and values. As Chesterton[3] might have it, he loves the profession, and the book is an attempt to heal its shortcomings. His disagreements with positive economics are those that every actuary must have: We cannot accept that the realism of assumptions is irrelevant, nor that scientific understanding has no normative implications.[4]

The cartoon on the cover belies the more serious subject matter and careful argument. It does, however, tie in with the teacher's concern to make points as clear as possible as in his toy examples to illustrate the points. The mix of simple and rigorous does mean that readers should read the chapter summaries before getting into the meat of each chapter.

I appreciate the academic desire to address the questions rigorously. I also like the relatively unusual combination of the personal and political together with the technical, and I applaud the desire to persuade readers to see things more clearly. These are all to be welcomed if we are to avoid economic reductionism and be open to expanding our understanding.

Thomas quotes U.K. academic John Kay's regrets at once feeling used by conference sponsors. He felt he was inveigled into debating (and therefore inadvertently affirming) the alleged "crisis in social security" that has been used to justify a reduction in the redistributive elements of pensions systems. In reading the book, I too felt some regrets at not having responded more actively to some of the issues raised—as well you may ... ■

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## ENDNOTES


1 Thomas, Guy. 2017. *Loss Coverage: Why Insurance Works Better With Some Adverse Selection*. Cambridge, England: Cambridge University Press, p. 5.

2 Haidt, Jonathan. 2012. *The Righteous Mind: Why Good People are Divided by Politics and Religion*. New York: Vintage.

3 Chesterton, Gilbert Keith. 1908. *Orthodoxy*. London: John Lane.

4 Friedman, Milton, and Marilyn Friedman. 1953. *Essays in Positive Economics*. Chicago: University of Chicago Press.