Comment #1 – 5/23/16 – 8:33 a.m.

Aaron Ziegler, FSA, CERA, MAAA Modern Woodmen of America 1701 1<sup>st</sup> Avenue Rock Island, IL 61201 Phone: 309-793-5622 Email: <u>Aaron.Ziegler@modern-woodmen.org</u>

The opinions contained in this document are my own and do not necessarily represent the opinions of Modern Woodmen of America or its employees.

Putting this ASOP together must have been a tremendous undertaking. I want to thank you for your hardwork and for supporting the Actuarial Profession.

## **1.** Does the draft ASOP provide appropriate guidance to the actuary when providing actuarial services related to the pricing of life insurance and annuity products?

Yes, I find that this draft ASOP provides a decent level of guidance to pricing actuaries.

# 2. Given the range of roles actuaries may have in the pricing of life insurance and annuity products, is the scope of the draft ASOP appropriate?

The scope of this draft ASOP appeared to conflict with section 3.1.b.

**Scope:** "This standard does not address: (i) other considerations that may affect the ultimate price charged, such as <u>marketing goals and competition</u> ..." [Emphasis mine]

**Section 3.1.b:** "The actuary should consider taking into account ... (b) the intended <u>market and the</u> <u>competitive alternatives</u> to the product." [Emphasis mine]

While I understand that the intent was that the Scope was attempting to exclude the impact of Marketing Departments and executive-level strategic decisions, I don't believe this should be excluded from this ASOP. Instead, I think that this phrase should be deleted from the section describing the Scope and left in section 3.1.b as something which actuaries must consider.

Since the assumption / price was set by an external party (management or marketing ...etc.), this assumption should be a part of the pricing disclosures under section 4.2.

### **3.** Does the draft ASOP address the range of products and pricing methodologies used in the industry?

For the most part, I believe this draft addresses the range of products and methodologies. However, I have a few contentions:

#### **Internal rate of return**

Section 3.2.1 - By singling-out the Internal Rate of Return (IRR) in the first paragraph for profitability metrics, it appears that the ASB is recommending that the IRR should become the industry standard for pricing measures. I disagree with this.

IRR has several known issues:

- 1. There are several different methodologies of calculating an internal rate of return (IRR), this ASOP does not indicate which IRR methodology the actuary "should consider" using.
- 2. The IRR for certain products may not even exist. Certain product such as single premium and limited pay whole life products may not have the "first year loss" to produce a valid IRR.

In spite of these limitations, IRR is an important metric. As a result, IRR should be considered as a <u>possible</u> profitability measure, but no single profitability measure should be singled out in the main paragraph under section 3.2.1.

#### **Unknown industry assumptions**

In the AAA Code of Professional conduct, Precept 1: An Actuary shall act ... in a manner to fulfill the profession's responsibility to the public

This ASOP should clearly address the case where the entire industry does not have the experience necessary to credibly set assumptions. While this isn't a Health ASOP, I think of industry difficulties in setting assumptions for Long Term Care products in the early 1990's; or on the Life side: the Guaranteed Living Benefits in the mid 2000's.

In these cases, the assumptions were speculative. Some companies were put on the brink of bankruptcy because of industry-wide unknown policyholder behavior assumptions. In order to fulfill our responsibility to the public we as actuaries should clearly address this issue in this standard of practice with the recommendation of careful conservatism in these cases.

#### **Pricing Controls**

See Section 3.6.a.iii

The actuary should consider ... (a - iii.) there is an appropriate separation of duties.

Instead, I would like to see:

*The actuary should consider ... (a - iii.)* <u>where possible</u> there is an appropriate separation of *duties.* 

I believe this wording will allow sufficient room to accommodate actuaries who work in small companies.

#### **Assumption setting**

See section 3.4.3

I would like a section added about policyholder behavior regarding election rates of product optionality (such as: taking living benefits while products are "in the money", taking loans while fixed loan rates are lower than market rates...etc.). The wording should indicate that actuaries should consider the desire for policyholders to act in their own best interest.

#### **Stochastic Analysis**

See section 3.5.4

This section says that the "actuary should consider using stochastic analysis." I agree that this suggestion is appropriate for this ASOP. However, the word "stochastic" is often just used as a buzz-word.

Stochastic models are not inherently less risky. More-often, it seems that since they are more complicated, comfort is found in the complications (i.e. the unknown risks). If stochastic models are to be used, the ASOP should recommend that the foundation of the stochastic model should also be stressed.

What do I mean by the foundation of the stochastic model?

The actuary should consider stressing or changing the underlying stochastic model-structure by using:

- a different underlying probability function
- different mean regression
- different variances
- different correlations / correlation structures
- a different random number generator
- etc.

Stochastic analysis such as this would provide for a deeper understanding of the risks of the model and the underlying liabilities.

#### 4. Are the disclosures required in section 4 appropriate?

I would add "Management assumptions/ prices" to section 4.2. See my response to question 2 above.

#### 5. Other commentary

Section 3.1 first paragraph: The word "Some" should be inserted before "Relevant characteristics that the actuary should consider taking into account include the following:" In this way, it is clear that the list is not all-inclusive.