## Please comment by May 17, 2024 on the following elements related to asset adequacy analysis for reinsurance ceded by life insurers:

<u>Terminology</u> - The terminology and details on the concept of testing for reserve adequacy when business is ceded, including in situations where the assuming company does not submit a VM-30 actuarial memorandum to a US state regulator, the assuming company holds reserves lower than US statutory reserves, collectability risk associated with the assuming reinsurer is significant, or the treaty involves an affiliated transaction.

<u>Materiality</u> - Narrowing the scope on requirements for the ceding company to test the adequacy of reserves while not violating existing federal laws and rules and in-force covered agreements.

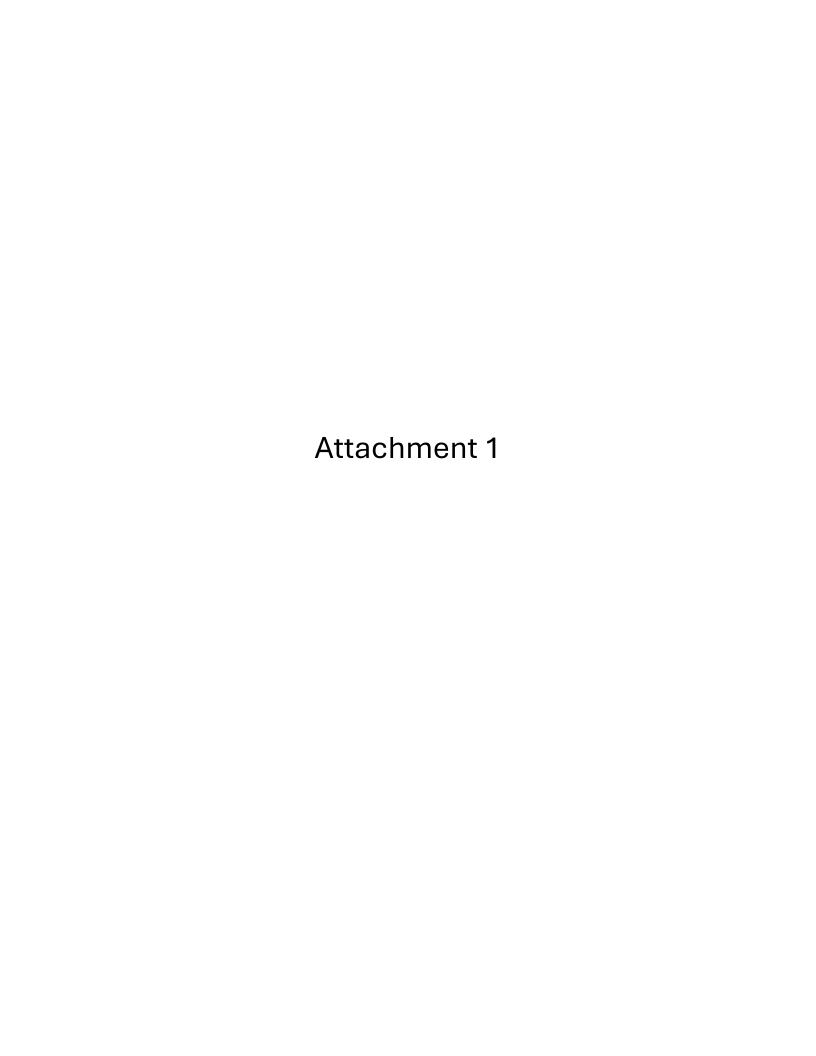
<u>Aggregation</u> - Allowing an appropriate level of aggregation to account for availability of cash flows to support a certain treaty or a certain group of treaties.

<u>Retroactivity & applicability</u> – Initial proposal: include treaties developed on and after 1/1/2020 while companies can voluntarily include earlier treaties. Is additional language needed on which treaties can be exempted?

<u>Methodology</u> – Are there any approaches that could serve as an alternative to cash flow testing to appropriately demonstrate the adequacy of reserves, and assets supporting such reserves, while still providing a level of rigor and quantification that provides comfort to regulators reviewing this analysis? Likewise, are there ways to design a cash-flow testing requirement that would be more efficient or less burdensome than others?

**Attachment 1:** Reinsurance Ceded Cash Flow Testing Discussion Items, Presented by Fred Andersen at the Life Actuarial (A) Task Force Session of the NAIC's Spring National Meeting

**Attachment 2:** A Proposal to Require Asset Adequacy Analysis ("AAA") to be Performed using a Cash Flow Testing Methodology for Life and Annuity Reinsurance Transactions, Presented by David Wolf and Kevin Clark at the Feb. 15, 2024 meeting of the Life Actuarial (A) Task Force



# Reinsurance Ceded Cash Flow Testing Discussion Items

Fred Andersen, FSA, MAAA

3/14/2024



## What is the issue? What are state regulators trying to accomplish?

- State regulators oversee the reserves and solvency of US insurers.
- Reinsurance activity is taking place where reserves are held lower than US statutory standards.
  - In some cases, reserves are substantially lower, disappear, or can even be negative
- It is important to know if the lower reserve amounts are adequate.
- One way to evaluate reserve adequacy is with asset adequacy analysis using appropriate assumptions.
  - For example, is reserve adequacy achieved only with aggressive asset return, guarantee utilization, or mortality / longevity assumptions?
- Whether reserves are adequate using appropriate assumptions is important for US regulators to know when the reserves and supporting assets are impacting US insurers.



#### Goals

- Provide US state regulators what is needed to review the reserves & solvency of US life insurers.
- Steer clear of conflict with reciprocal jurisdiction / covered agreement issues.
  - Regarding treating certain reinsurance arrangements differently than others.
- Prevent work by US ceding companies where there's immaterial risk.



#### **Basic Considerations**

- Considerations re: whether cash-flow testing should be performed on ceded business:
  - Does the assuming company not submit a VM-30 actuarial memorandum to a US state regulator?
    - Consider carve out when reinsurer submits VM-30 in US
  - Does the assuming company hold reserves lower than US statutory reserves?
  - Does the assuming company not have substantially high capital (or other safeguards in place) to minimize collectability risk?
    - Should this risk be handled separately, as part of reinsurance collectability inquiries?
    - Should capital level be considered if higher than US even if reserves are less than US?
  - Is the assuming company affiliated with the ceding company?
    - Potentially signaling reserve reduction as a driver of the transaction



#### **Specific Considerations to Drive Discussion**

- Terminology "Gross of reinsurance" testing
- Materiality determination
- Aggregation level / prior approval
- Retrospective or prospective application
- Asset assumption guardrails / lessen need to have knowledge of assets
- Other assumption guardrails
- Considerations for holding additional AAT reserves
- Sensitivity testing versus baseline testing



## Example of Cession of U.S. Asset Intensive Reinsurance Offshore/Captive

In the example below, AIR is ceded via 100% coinsurance to either an offshore reinsurer or a U.S. captive that is not subject to the requirements of the valuation manual

Item	US Statutory	Offshore/Captive
Formula Reserves	\$100	NA
Total Reserves*	\$100	\$64
Total Capital	\$6	\$2
Total Asset Requirement	\$106	\$66

When cash flow testing (CFT) is run standalone for this business, it shows that \$80 of reserves are needed to runoff liabilities under moderately adverse conditions, and \$70 under best estimate conditions (this is *before* consideration of required capital)

Significant reduction in total policyholder funds due to regime differences

Reserves are insufficient but even more concerning, even TAR is insufficient even in a best estimate scenario

<sup>\*</sup>US total reserves are formula reserves plus AAT reserves

## **Appendix - Example of VM or AG Wording**



## **Example of Wording re: Gross of Reinsurance AAT**

- Language like the following could be added as subsection 2.C.4 "Liabilities To Be Covered" in VM-30 or similar language could be incorporated in an Actuarial Guideline:
  - All business written or assumed by a United States life insurer shall be subject to the standards
    of asset adequacy analysis, as described in Section 2.B. Therefore, in addition to other
    applicable requirements in VM-30, asset adequacy analysis shall be completed on a gross of
    reinsurance basis for any [material] blocks of business that are reinsured, whether through an
    alien reinsurance transaction or a domestic reinsurance transaction.
  - For any [material] blocks of business that are reinsured, the business ceded shall be tested on a standalone basis.

(continued)



## **Example of Wording re: Gross of Reinsurance AAT**

- Sample language, continued...
  - [For the purposes of this standalone testing, reinsurance arrangements with the same legal entity serving as the counterparty (but by line of business / with similar risk profile) may be aggregated.] [Additional aggregation, for example across affiliated legal entities, may be permissible if supported and with prior approval of the domiciliary commissioner, who will consult with the NAIC's Valuation Analysis Working Group when reviewing the request.]
  - [The domiciliary commissioner may also accept standalone testing performed by the counterparty, if it is made available to the domiciliary commissioner and is otherwise compliant with these requirements.] [This requirement applies to all reinsurance transaction executed on or after XX/XX/XXXX.]



- All business written or assumed by a United States life insurer shall be subject to the standards of asset adequacy analysis, as described in Section 2.B. Therefore, in addition to other applicable requirements in VM-30, asset adequacy analysis shall be completed on a **gross of reinsurance** basis for any material blocks of business that are reinsured, whether through an alien reinsurance transaction or a domestic reinsurance transaction.
- "Gross of reinsurance" terminology:
  - The most accurately descriptive terminology?
  - Or should the focus be on the starting assets being the amount actually held, including by the assuming company?



- For any **material** blocks of business that are reinsured, the business ceded shall be tested on a standalone basis.
- Materiality determination could be based on:
  - Judgment but with general guidance of:
    - 10-20% of reserves ceded to single reinsurer?
    - % of surplus?
    - Cap at the largest 3 or so material asset intensive reinsurance treaties per ceding company?



- For the purposes of this standalone testing, reinsurance arrangements with the same legal entity serving as the counterparty may be **aggregated**. Additional aggregation, for example across affiliated legal entities, may be permissible if supported and with **prior approval** of the domiciliary commissioner, who will consult with the NAIC's Valuation Analysis Working Group when reviewing the request.
- What aggregation level makes sense?
  - Will assets from Treaty A cover a shortfall on Treaty B?
  - Amount of regulator discretion?
    - What sort of regulator coordination is needed to ensure a level playing field?
  - Note that an insolvent counterparty won't use surplus from other counterparties.



- This requirement applies to all reinsurance transaction executed on or after XX/XX/XXXX.
- Retrospective (including past treaties) or Prospective application?
  - Focus on recent years' transactions?



#### **Example Addition of Asset Documentation for Gross AAT**

- Language like the following could be added as subsection 3.B.10.f and 3.B.10.g in VM-30 or similar language could be incorporated in an Actuarial Guideline:
  - f. If, under the terms of a reinsurance agreement, some of the assets supporting the reserve are held by the counterparty or by another party:
    - i. A description of the degree of linkage between the portfolio performance and the calculation of the reinsurance cash flows.
    - ii. The sensitivity of the valuation result to the asset portfolio performance.

(continued on next slide)



#### **Example Addition of Asset Documentation for Gross AAT**

- Language like the following could be added as subsection 3.B.10.f and 3.B.10.g in VM-30 or similar language could be incorporated in an Actuarial Guideline:
  - g. To the extent that asset adequacy analysis is necessary pursuant to Section 2.C.4:
    - i. A comparison of the amount of assets held by the counterparty or other party to the assets included in asset adequacy analysis (note that these amounts should be the same).
    - ii. The investment strategy of the company holding the assets, as codified in the reinsurance agreement or otherwise based on current documentation provided by that company. [If this information is not available, a discussion of why the investment strategy modeled by the cedant for the gross analysis is prudent and appropriate.] [If this information is not available, asset modeling shall comply with the relevant asset modeling requirements and guardrails in VM-20 and VM-21.]
    - iii. Actions that may be taken by either party that would affect the net reinsurance cash flows (e.g., a conscious decision to alter the investment strategy within the guidelines).



#### **Questions and Considerations**

• The investment strategy of the company holding the assets, as codified in the reinsurance agreement or otherwise based on current documentation provided by that company. [If this information is not available, a discussion of why the investment strategy modeled by the cedant for the gross analysis is prudent and appropriate.] [If this information is not available, asset modeling shall comply with the relevant asset modeling requirements and guardrails in VM-20 and VM-21.]

#### Assumption guardrails

- Asset assumption guardrails can make it unnecessary to know the actual assets
  - Will reserves be adequate under reasonable asset return assumptions?
  - Actual assets or proxy can be used if known, otherwise apply VM-20 guidance
- Guarantee utilization and mortality are among other key assumptions
  - Differences between VM-30 or formulaic / PBR assumptions from those underlying the assuming company's reserves should be discussed



#### **Example Addition of Gross of Reinsurance AAT**

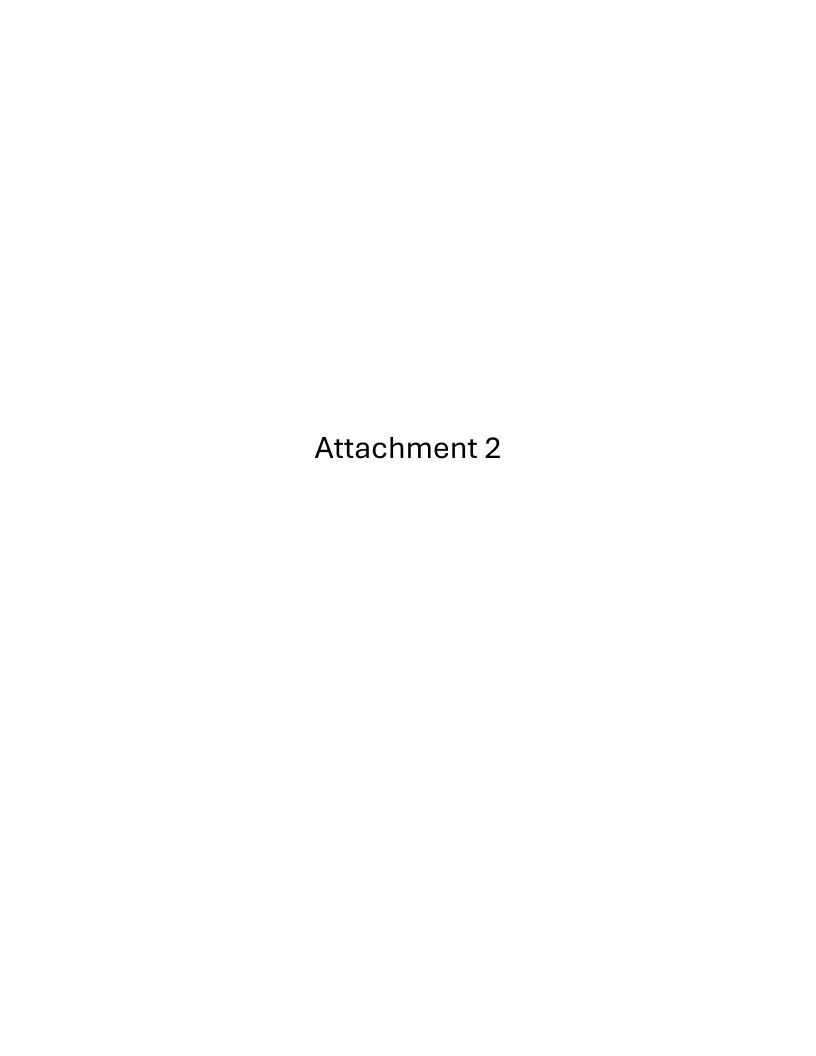
- Language like the following could be added as subsection 2.C.5 in VM-30 or similar language could be incorporated in an Actuarial Guideline:
  - If the appointed actuary determines, as the result of gross standalone asset adequacy analysis for any business that is reinsured by an entity outside the scope of VM-30, that a reserve should be held in addition to the aggregate reserve held by the company and calculated in accordance with the requirements set forth in the Valuation Manual, the company shall establish the additional reserve. [Considerations to be evaluated when determining whether an additional reserve is needed shall include but not be limited to:
    - Where applicable, do the assuming company's standalone cash-flow testing results (whether produced by the assuming company or the ceding company) show deficiencies?
    - Are any assuming company standalone cash-flow testing deficiencies offset by other assuming company's blocks' sufficiencies?]



#### **Questions and Considerations**

- [Considerations to be evaluated when determining whether an additional reserve is needed shall include but not be limited to:
  - Where applicable, do the assuming company's standalone cash-flow testing results (whether produced by the assuming company or the ceding company) show deficiencies?
  - Are any assuming company standalone cash-flow testing deficiencies offset by other assuming company's blocks' sufficiencies?]
- Regarding holding additional asset adequacy analysis reserves in relation to the ceded block of business:
  - Where applicable, do the assuming company's standalone cash-flow testing results show deficiencies?
    - Whether produced by the assuming company or the ceding company.
  - Are any assuming company standalone cash-flow testing deficiencies offset by other assuming company's blocks' sufficiencies?





TO: Life Actuarial (A) Task Force

FROM: David Wolf, Acting Assistant Commissioner, Office of Solvency Regulation, New Jersey

Department of Banking and Insurance

Kevin Clark, Chief Accounting & Reinsurance Specialist, Iowa Insurance Division

RE: A Proposal to Require Asset Adequacy Analysis ("AAA") to be Performed using a Cash Flow

Testing Methodology for Life and Annuity Reinsurance Transactions

DATE: February 5, 2024

State insurance regulators in various forums have discussed and identified the need to better understand what assets, reserves and capital are supporting long duration insurance business that relies heavily on asset returns ("asset-intensive business"). In particular, there is risk that domestic life insurers may enter into reinsurance transactions that materially lower the total asset requirement (the sum of reserves and required capital) in support of their asset-intensive business, and thereby facilitate releases of capital that prejudice the interests of their policyholders. Based on these discussions, the purpose of this letter is to propose enhancements to reserve adequacy requirements for life insurance companies by requiring that asset adequacy analysis (AAA) use a cash flow testing methodology that evaluates ceded reinsurance as an integral component of asset-intensive business.

The AAA requires reserves to be held at a level that meets moderately adverse conditions, or approximately one standard deviation beyond expected results. When a reinsurance transaction lowers the ceding insurer's reserves, the new reserves established by the reinsurer could be materially less than what would be needed to meet policyholder obligations under moderately adverse conditions in addition to providing an appropriate level of capital. The ceding company's Appointed Actuary might not recognize this insufficiency for the following reasons:

- 1. Some Appointed Actuaries believe that the requirements of AAA for reinsured business only require evaluation of the counterparty risk. So, if the counterparty is financially strong, no testing is done to assess whether the invested assets supporting the reserves are sufficient under moderately adverse conditions.
- 2. Some Appointed Actuaries may combine the reinsured business with other direct written business, so that the inadequacy in the reinsured business (and the associated shortfalls in the reinsurer's assets supporting that business) are offset by margins in the cedant's other lines of business.
- 3. Some Appointed Actuaries may not be able to obtain sufficient information from their reinsurers in order to do AAA, and therefore place reliance on the reinsurer to do so.

The ability of insurers to significantly lower the total asset requirement for long-duration blocks of business that rely heavily on asset returns appears to be one of the drivers of the significant increase in reinsurance transactions.

Regulators are concerned that the level of policyholder protection may be declining for the reasons outlined above. Therefore, this proposal intends to ensure that the AAA safeguard continues to apply within the domestic cedent for all business for which it remains directly liable to pay policyholder claims. This will ensure that the assets supporting reserves continue to be held based on moderately adverse conditions, whether those assets are held by the direct insurer or a reinsurer. Specifically, we recommend

the following requirements for all reinsurance transactions, including but not limited to long-duration business that is subject to material market or credit risks or is subject to material cash flow volatility.

- 1. AAA must be performed using a cash flow testing methodology.
- 2. AAA must be performed at the line of business and treaty level (so within each individual treaty, AAA must be performed standalone for life insurance, annuities, long duration health insurance, etc.).

These requirements could be incorporated into VM-30 via an Amendment Proposal Form (APF) or as an Actuarial Guideline.

Consequently, these requirements will allow for reserve levels, and associated supporting assets, that will be sufficient under moderately adverse conditions consistent with the minimum reserve requirements. This approach would also still allow companies to enter into reinsurance arrangements with reinsurers subject to various formulaic, economic or principles-based reserving standards, and would still allow for application of judgement by the Appointed Actuary in determining the methods and assumptions underlying the cash flow testing analysis.

In order to conform with these requirements, consideration should also be given to updating the *Life and Health Reinsurance Agreements Model Regulation* (#791) and *SSAP No. 61R—Life, Deposit-Type and Accident and Health Reinsurance* in the *Accounting Practices and Procedures Manual* to require reinsurance treaties to include the necessary information for the cedent to perform cash flow testing.

In order to move forward with the requirements proposed above, we recommend LATF consider drafting an Amendment Proposal Form for changes to VM-30. The APF could then be referred to the Reinsurance Task Force for consideration and support. Additional referrals may be necessary and/or desired to be made to the Statutory Accounting Principles Work Group, the Macroprudential Working Group and the Financial Stability Task Force.

Please let us know if you have any questions as LATF considers the proposal.

Sincerely,

David Wolf, Acting Assistant Commissioner, Office of Solvency Regulation, New Jersey Department of Banking and Insurance

Kevin Clark, Chief Accounting & Reinsurance Specialist, Iowa Insurance Division