



April 8, 2024

Mr. Philip Barlow
Chair, Risk-Based Capital Investment Risk and Evaluation (E) Working Group
National Association of Insurance Commissioners (NAIC)

Re: Review of Oliver Wyman study on ABS residual tranches

Dear Chair Barlow,

Oliver Wyman has conducted a study on Asset-Backed Securities (ABS) residual tranche risk (OW study) that was presented to the Risk-Based Capital Investment Risk and Evaluation Working Group of the NAIC (RBCIRE) at the 2024 Spring National Meeting. Working Group members asked the American Academy of Actuaries¹ C1 Subcommittee (subcommittee) to review and comment on the OW study. This letter focuses on the OW study's consistency with the six ABS RBC principles [presented by the subcommittee](#) to RBCIRE at the 2023 Fall National Meeting. A full technical review of the OW study is outside the scope of this letter.

The table below provides a summary of this review's conclusions, with detailed explanations provided throughout the remainder of this letter.

Principle #1	Partially consistent
Principle #2	Consistent
Principle #3	Consistent
Principle #4	Partially consistent
Principle #5	Partially consistent
Principle #6	Inconsistent

Principle #1: The purpose of RBC is to help regulators identify potentially weakly capitalized insurers, therefore changes that have a small impact on RBC ratios may not justify a change to the RBC formula.

Principle #1 includes two complementary elements. The first is that RBC is intended to highlight for regulators potential solvency issues with insurers. In other words, if an insurer is exposed to a

¹ The American Academy of Actuaries is a 20,000-member professional association whose mission is to serve the public and the U.S. actuarial profession. For more than 50 years, the Academy has assisted public policymakers on all levels by providing leadership, objective expertise, and actuarial advice on risk and financial security issues. The Academy also sets qualification, practice, and professionalism standards for actuaries in the United States.

risk, then its RBC ought to reflect that. The second is a materiality consideration where enhancements with the highest potential impact on RBC should be prioritized over potential changes that may increase precision but not materially impact RBC.

Regulators have identified residual tranches as a material risk warranting a change to the RBC formula. Therefore, the OW study, providing data on residual tranches, is consistent with Principle #1.

However, the subcommittee disagrees with the implicit suggestion from the OW study that C-1 for residual tranches can be informed by comparing risk of residual tranches to the risk of common stock (other sections of this letter also reference the comparison to common stock, which we believe is implied although not explicitly stated in the OW study). The subcommittee's view is based on the following:

- While leveraging existing C-1 factors from other asset classes may be a reasonable approach under some circumstances, the use of this approach should be predicated on similar risk characteristics or having insufficient data to support risk modeling (see Appendix 1 for the C-1 modeling flowchart that was introduced by the subcommittee at the 2023 NAIC Summer National Meeting).
- In the subcommittee's view, the risk characteristics for residual tranches (especially in the tail) are significantly different from common stock. Therefore, assessing the C-1 factor for residual tranches using the existing C-1 factor for common stock may lead to inappropriate conclusions.
- The C-1 factor for residual tranches should not be informed by the C-1 factor for common stock because statutory accounting for these two asset classes is different. Accounting for common stock is on a mark-to-market basis whereas SSAP 21R provides an option for residual tranches to be valued on a discounted cash flow basis (further discussed under Principle #3 below).

Principle #2: Emerging investment risks create concerns for regulators, and existing regulatory tools can be considered alongside RBC for addressing these newer risks—but RBC needs to be considered when there are material solvency issues.

Regulators have generally identified ABS as an emerging risk that could impact solvency. Residual tranches, specifically, are an emerging risk. By providing new data and analysis to explore the risk of residual tranches, the OW study is consistent with Principle #2.

In addition, emerging investment risk can arise in circumstances where the C-1 factor for an asset class is not commensurate with the underlying investment risk. The OW study brings to light material differences in risk characteristics across different types of residual tranches and therefore the potential need for differentiated C-1 factors. This is a helpful insight and is consistent with Principle #2.

Principle #3: C-1 requirements should generally reflect the impact of risk on statutory surplus. Changes in accounting treatment will affect RBC.

Statutory accounting for residual tranches is impacted by the recently adopted SSAP 21R where residual tranche valuations are not directly subject to mark-to-market volatility. SSAP 21R allows insurers to use a discounted cash flow approach to residual tranche valuation (an approach

that was adopted after the development of the OW study). Under this approach, a discount rate for each residual tranche is determined at purchase and remains unchanged. The asset is impaired if the present value of cash flows is less than book value.

The OW study uses a fixed discount rate in assessing potential loss exposure for residual tranches, which in effect excludes potential mark-to-market exposure under a stress scenario. This approach is largely consistent with SSAP 21R and Principle #3.

Principle #4: C-1 requirements for a given tranche should align with that tranche's risk, to the extent practical.

Principle #4 addresses the idea that C-1 should reflect the level of risk in each tranche, rather than being constrained by requirements that C-1 on ABS equals C-1 on collateral. On this point, the OW study is consistent with Principle #4 where the exposure analysis of residual tranches is based on projected performance of the underlying collateral.

The subcommittee's view is that residual tranches and common stock have different risk characteristics, so the study's reference to C-1 factors for common stock may be inconsistent with Principle #4. Further, since the OW study assumes sufficient data to support modeling the risks, the C1 modeling flowchart would not end with using existing C-1 factors, whether for common stock or some other asset class, unless residual tranches are impractical to model individually. An assessment of individual asset modeling's practicality is outside the scope of the OW study and of this letter.

Principle #5: C-1 requirements on ABS should treat the collateral as a dynamic pool of assets, incorporating future trading activities that are reasonable and vary appropriately by economic scenario.

Principle #5 clarifies that no assumption should be made for reduced risk through better-than-market credit selection, which is consistent with the OW study.

Principle #5 also suggests that trading activity subject to or mandated by the structure's legal documents should be incorporated as part of the risk modeling in determining C-1 requirements. Specific to collateralized loan obligations (CLOs), the OW study does not incorporate trading activity in the form of reinvestments within the collateral pool. This simplification is inconsistent with Principle #5 and may potentially bias the results in a conservative direction, which the OW study acknowledges.

Principle #6: Each C-1 factor is based on the asset class's risk profile. However, the risk profile for ABS differs from the risk profile for bonds. Therefore, C-1 requirements for ABS should be calibrated to different risk measures where appropriate.

Principle #6 suggests that ABS and corporate bonds need not use the same risk measure and that a conditional tail expectation (CTE) risk measure is likely more appropriate than percentile for ABS to capture tail risk. The OW study is based on percentiles, which would be inconsistent with Principle #6 because percentiles may struggle to capture tail risk for ABS. While not using CTE explicitly, the OW study does include percentile results under a deep-tail scenario. This provides a potential upper bound for a CTE risk measure.

The C1 Subcommittee appreciates your attention to the issues raised in this letter and looks forward to discussing them further with you. Should you have any questions or comments in

response to this letter, please contact Amanda Barry-Moilanen, life policy analyst (barrymoilanen@actuary.org).

Sincerely,

Stephen Smith
Chairperson, C1 Subcommittee
American Academy of Actuaries

Appendix 1

C-1 Modeling Flowchart

