CAPITAL MARKETS
Special Report

NAIC
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The NAIC's Capital Markets Bureau monitors developments in the capital markets globally and analyzes their potential impact on the investment portfolios of U.S. insurance companies. Please see the Capital Markets Bureau website at INDEX.

Continued Double-Digit Increase in U.S. Insurers' Collateralized Loan Obligation Exposure in 2022

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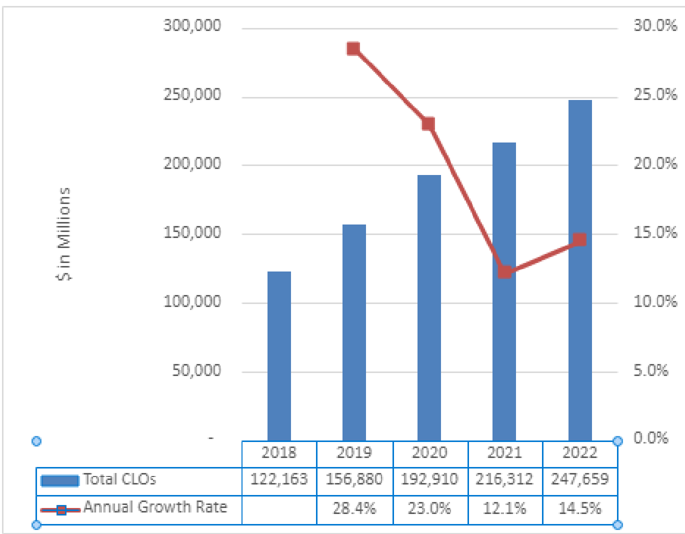
Executive Summary

- U.S. insurers' exposure to collateralized loan obligations (CLOs) collateralized by bank loans and middle market loans was $247.6 billion in book/adjusted carrying value (BACV) at year-end 2022, representing a 14.5% increase from about $216.3 billion at year-end 2021.
- The pace of growth in insurers' CLO investments, however, continued to slow in 2022, down from 23% in 2021 and 28% in 2020 and 2019.
- CLOs continue to represent a small proportion of U.S. insurers' total cash and invested assets, but they increased to almost 3% of the total from approximately 2.7% at year-end 2021.
- The credit quality of U.S. insurers' CLO investments that were reported in Schedule D Part 1 at year-end 2022 improved slightly, with tranches rated investment grade (BBB and higher) increasing to 82% of total CLO investments from almost 80% in 2021.
- Most U.S. insurer CLO investments continue to be held by large life companies—i.e., those with at least $10 billion in invested assets—many of which have CLO asset manager subsidiaries.
- The top 15 U.S. insurance groups accounted for half of the U.S. insurance industry's total CLO exposure.

For many investors, including U.S. insurers, collateralized loan obligations (CLOs) have represented an attractive alternative investment with higher yields than traditional bond investments. Consequently, U.S. insurers' exposure to CLOs has been increasing over the last several years. After a couple of years of double-digit growth in the mid-to-high 20% range (Refer to Chart 1), the pace of growth of U.S. insurers' CLO exposure slowed in 2021 and 2022. Despite high inflation and concern regarding a possible recession having a negative impact on new issuance, growth was 14.5% from year-end 2021 to year-end 2022 due in part to attractive investment opportunities in the rising interest rate environment. Bank loan defaults are expected to increase towards the end of 2023, particularly for speculative-grade borrowers that make up CLO collateral, which could also contribute to a slowdown in new CLO issuance.

As of year-end 2022, U.S. insurers' exposure to CLOs collateralized predominantly by leveraged bank loans, and middle market loans increased to $247.6 billion in book/adjusted carrying value (BACV) ($243.9 billion of which was reported in Schedule D Part 1 – Bonds, and the remaining $3.7 billion was reported in Schedule BA – Other Long-Term Investments) from $216.3 billion at year-end 2021.[1] Note that U.S. insurers' exposure to CLOs has doubled over the last four years.

Chart 1: U.S. Insurance Industry's Historical CLO Exposure, 2018–2022



As in previous years, the majority of total CLO exposure was held by life companies at 78% of the total, followed by property/casualty (P/C) companies at 19% at year-end 2022 (Refer to Table 1). This is not a significant change from the prior year, and consistent with previous years, health and title companies continue to have minimal exposure to CLOs.

Table 1: U.S. Insurers' Exposure to CLOs by Industry Type, 2020–2022 ($BACV bil.)*

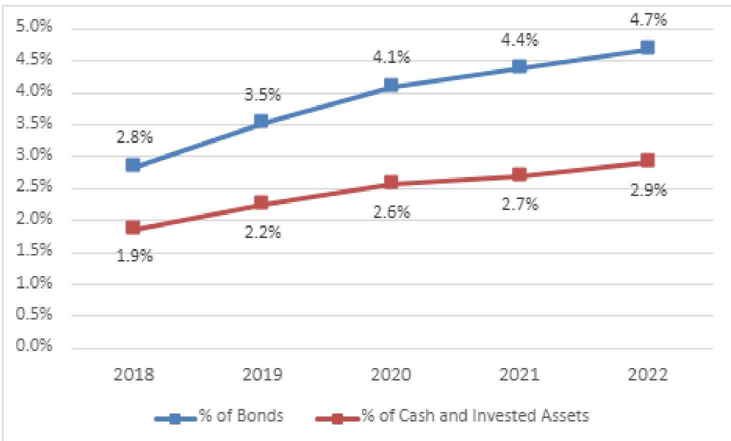
Industry Type	YE 2022	% of YE 2022 Total	YE 2021	% of YE 2021 Total	YE 2020	% of YE 2020 Total
Life	192.3	78%	163.6	76%	152.4	79%
P/C	47.4	19%	45.5	21%	35.2	18%
Health and Title	8.0	3%	7.2	3%	5.3	3%
Total	**247.7**	**100%**	**216.3**	**100%**	**192.9**	**100%**

Note: Numbers in the table have been rounded.
* YE 2021 Total excludes approximately $1 billion of CLOs reported in Schedule BA.

[1] Since 2018, U.S. insurers' CLO exposure has been determined via data reported in the annual statement filings, as well as through additional analysis that was completed with third-party data sources, allowing for a more granular and thorough review. In addition, effective year-end 2022, U.S. insurers' CLO exposure includes CLOs that were reported in Schedule BA – Other Long-Term Investments and Schedule D Part 1 – Bonds.

While CLOs do not account for a large portion of the U.S. insurance industry's total cash and invested assets, or their overall bond investments, the two metrics have been trending higher over at least the last few years (Refer to Chart 2). CLOs accounted for 2.9% of total cash and invested assets at year-end 2022, a slight increase from 2.7% the prior year but a whole percentage point higher than 1.9% at year-end 2018. As a percentage of total bond investments, CLOs have increased to 4.7% at year-end 2022 from 4.4% at year-end 2021 and much higher than 2.8% in 2018.

Chart 2: CLO Exposure as a Percentage of Cash and Invested Assets and Bond Investments, 2018–2022



Consistent with prior years, large companies accounted for about 80% of the U.S. insurance industry's CLO exposure at year-end 2022. U.S. insurers with assets between $1 billion and $10 billion accounted for an additional 18% of the industry's exposure (Refer to Table 2).

Table 2: CLO Exposure by Insurer Size, Year-End 2022 ($BACV bil.)

Industry Type	Less Than $250M	Between $250M and $500M	Between $500M and $1.0B	Between $1.0B and $2.5B	Between $2.5B and $5.0B	Between $5.0B and $10.0B	Greater Than $10.0B	Total
Life	0.3	0.6	1.1	4.1	6.3	6.7	173.2	192.3
P/C	1.5	1.3	2.1	7.0	5.7	7.0	22.9	47.4
Health and Title	0.3	0.6	1.3	2.7	1.7	0.5	0.8	8.0
Total	**2.1**	**2.5**	**4.5**	**13.8**	**13.6**	**14.2**	**196.9**	**247.7**
% of Total	1%	1%	2%	6%	6%	6%	80%	100%

Note: Numbers in the table have been rounded.

At year-end 2022, half of U.S. insurers' CLO investments were held by 15 insurer groups.[2] The top 10 U.S. insurance groups with CLO exposure made up 40% of the total, and the top 5, 26%. In comparison, at year-end 2021, half of U.S. insurers' CLO exposure was accounted for among 14 insurer groups, while the top 10 accounted for 41%. The top 10 are also large life companies, many of which have CLO management subsidiaries. As such, these insurers benefit from having internal CLO infrastructure and knowledge.

[2] A list of the top 25 U.S. insurers with CLO exposure at year-end 2022 is available only to U.S. state insurance regulators via StateNet.

Private equity (PE)-owned U.S. insurers, which totaled 137 as of July 2023, owned approximately $53 billion in CLO investments at year-end 2022. This includes $51.6 billion as reported in Schedule D Part 1 (Bonds), with the remaining $1.4 billion reported in Schedule BA (Other Long-Term Investments). In comparison, at year-end 2021, PE-owned insurers' CLO exposure was about $46 billion as reported in Schedule D Part 1 based on the total number of PE-owned insurers; i.e., 132 at that time. This represents a 15% year-over-year (YOY) increase in exposure. About 90% of CLOs reported as bonds held by PE-owned insurers carried NAIC 1 and NAIC 2 Designations.

There was a small improvement in credit quality from 2021 to 2022 based on CLOs reported in Schedule D Part 1. The proportion of CLO investments rated investment grade (BBB and higher) increased to 82% of total U.S. insurers' CLO investments from about 80% in 2021 (Note: this excludes CLO investments rated BBB-, which were about 10% of total CLO exposure at both year-end 2022 and year-end 2021). AAA-rated tranches remained at approximately 40% of total CLO investments (Refer to Chart 3 and Chart 4), while those rated in the AA and A-ratings categories combined increased to about 40% of the total in 2022 from 37% in 2021. The non-rated category includes CLO debt tranches that were reported without a rating, as well as CLO equity tranches that are not rated by nationally recognized statistical rating organizations (NRSROs).

Chart 3: U.S. Insurer CLO Credit Quality as of Year-End 2022

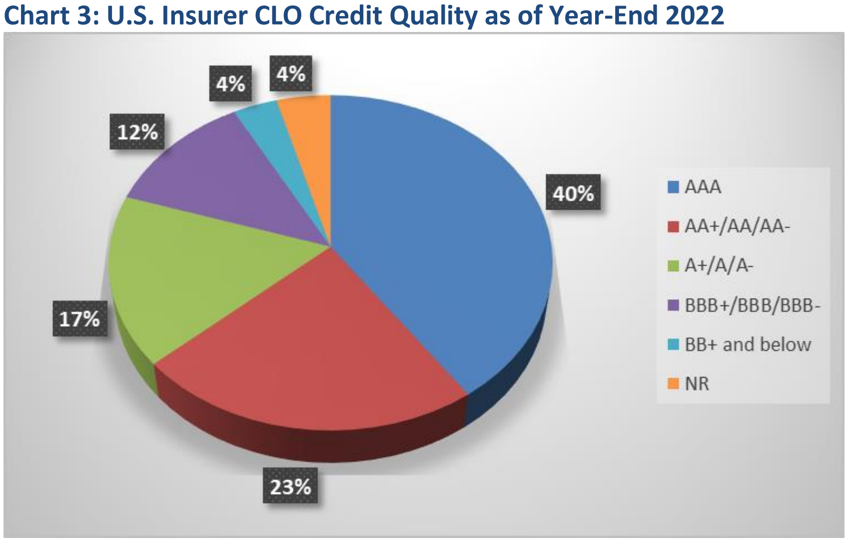
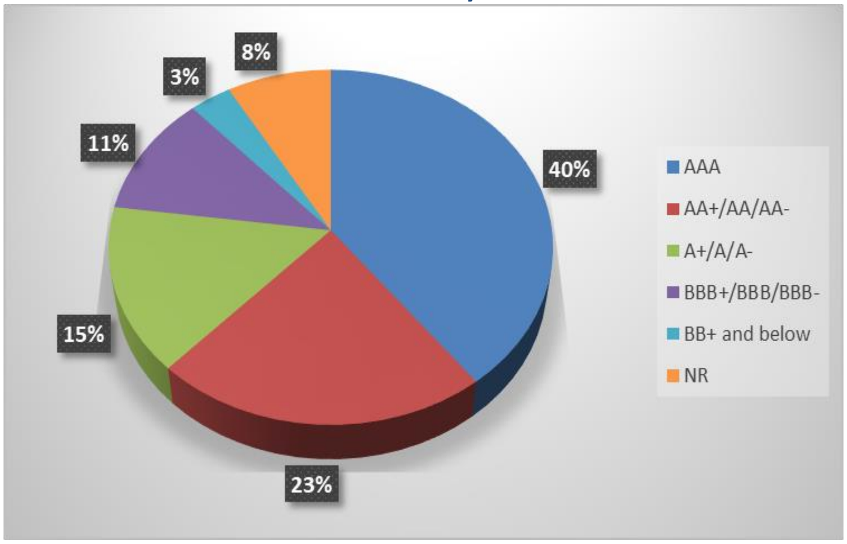


Chart 4: U.S. Insurer CLO Credit Quality as of Year-End 2021



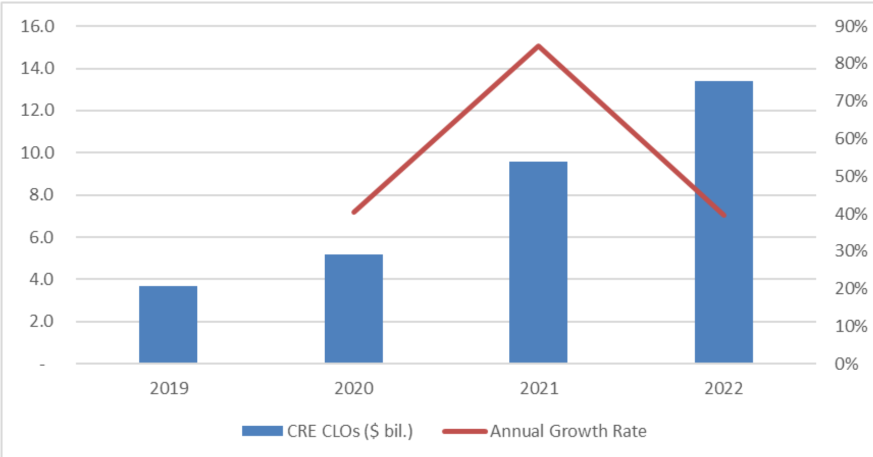
CLO investment risk is dependent, in part, on the credit quality of the CLO collateral, which for the most part is mitigated by the relatively high percentage of AAA-rated tranches held by insurers, as well as the slight improvement in overall credit quality of the investments. In addition, risk is also dependent on the concentration of exposure within each insurer's investment portfolio, particularly as a percentage of a company's total capital and surplus.

Commercial Real Estate Collateralized Loan Obligation Investments

U.S. insurers' exposure to commercial real estate (CRE) CLOs has also been increasing over the last few years (Refer to Chart 5). While similar in structure to other CLO types, the underlying collateral in CRE CLOs includes shorter-term loans on transitional CRE properties.

U.S. insurers held approximately $13.4 billion in CRE CLOs at year-end 2022, representing a 40% increase from $9.6 billion at year-end 2021. The YOY growth in BACV is in part due to the attractiveness of the relatively shorter duration and floating rate nature of CRE CLO debt tranches. About 76% of U.S. insurers' CRE CLO exposure was held by life companies, which was an increase from 71% at year-end 2021, while exposure among P/C companies decreased to about 19% from 23% at year-end 2021. Almost all U.S. insurers' exposure to CRE CLOs carried NAIC 1 and NAIC 2 Designations at year-end 2022, with NAIC 1 Designations accounting for 86%, implying the highest credit quality.

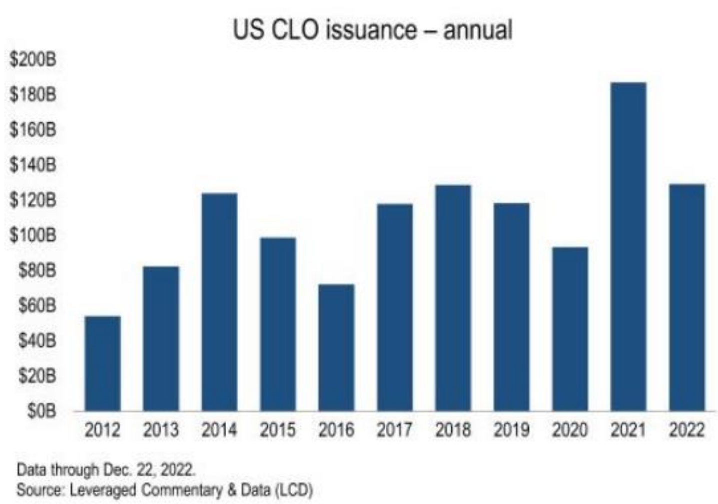
Chart 5: U.S. Insurers' CRE CLO Investments, 2019–2022



Collateralized Loan Obligation and Leveraged Loan Market Trends

As of December 2022, new U.S. CLO issuance was $129.3 billion according to S&P Global, the second highest full-year total after $185.2 billion in 2021 (Refer to Chart 6). With high, albeit declining, inflation, along with uncertainty regarding continued Federal Reserve interest rate hikes, and still some concerns about recession, new issuance into 2023 is not expected to be as robust. Through 1Q 2023, new CLO issuance was approximately $56 billion.[3]

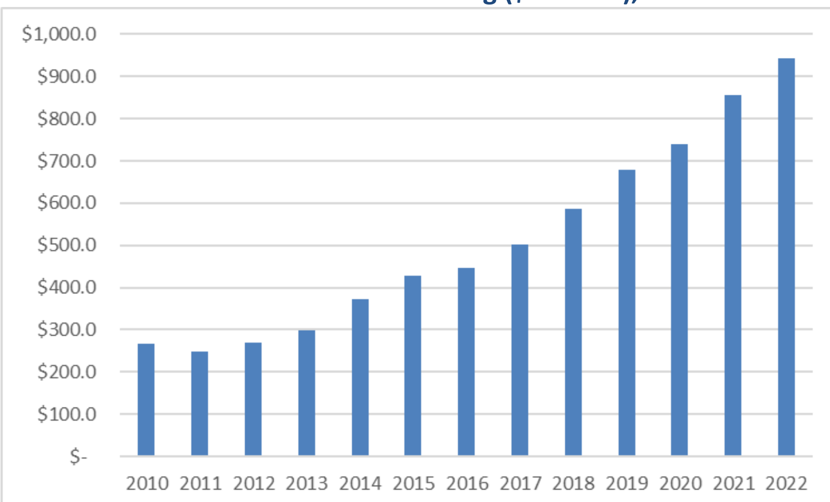
Chart 6:



[3] PitchBook, *CLO Mid-Year Outlook: Dry Spell Remains in Forecasts for 2023 Issuance*, July 17, 2023.

At year-end 2022, there was about $944 billion in outstanding U.S. CLOs, representing an 11% increase from $856 billion as of year-end 2021 (Refer to Chart 7). Based on reported exposure, and similar to 2021, U.S. insurers held approximately one-quarter of total outstanding CLOs at year-end 2022. In addition, as of June 2023, the total CLOs outstanding was $971.5 billion, according to BofA Securities.

Chart 7: Historical U.S. CLOs Outstanding ($ billions), 2010–2022



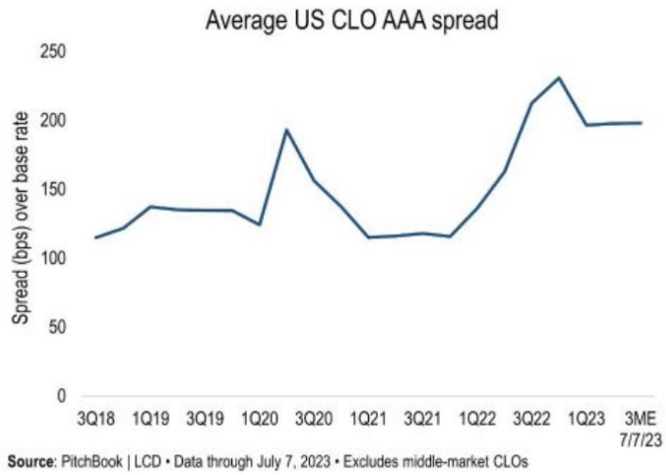
Sources: BofA Securities and Voya Investment Management CLO and Loan Market Commentary – 4Q 2022

CLOs are mainly floating rate investments, and U.S. insurers' exposure to CLOs has continued to increase, as they have offered an attractive yield alternative to other more traditional asset types, particularly as interest rates are rising. Beginning in January 2022, newly issued U.S. CLOs and leveraged loans were to be priced based on the CME Group Term Secured Overnight Financing Rate (SOFR) as the three-month London Interbank Offered Rate (LIBOR) was phased out. Previously existing, or legacy CLOs—i.e., issued before 2022—were to have been transitioned away from LIBOR by June 30, 2023.

According to Leveraged Commentary & Data (LCD), in 4Q 2022, spreads on new-issue AAA-rated CLOs, which are the most commonly held rated tranches by U.S. insurers, averaged about 223 basis points (bps) over term SOFR, but the spread narrowed to an average of 198 bps over term SOFR in 2Q 2023 (Refer to Chart 8).[4] Spreads tend to decrease with a presumed decrease in risk, and they may also move based on other factors, such as supply and demand. Higher spreads in 4Q 2022 may be attributed to the Federal Reserve's continuation of increasing the federal funds rate to combat high inflation, as well as continued concerns about a possible recession. Note that the trailing 12-month leveraged loan default rate is expected to increase to about 2.5% by year-end, up from the current rate of less than 1%, which could result in higher spreads on CLO tranches.

[4] PitchBook, *US CLO Outlook: Market Conditions Expected to Remain Rocky in Early 2023*, Jan. 4, 2023.

Chart 8:



For more background on CLOs, please see the NAIC Capital Markets Bureau (CMB) primer published in August 2018.

Decline in Leveraged Bank Loan Issuance

The lower growth in leveraged loan new issuance in 2022 may have contributed to the slower pace of CLO growth for U.S. insurers in 2022. Institutional bank loan new issuance in 2022 totaled about $250 billion, with about 44% in the 'BB' ratings category. In comparison, gross new issuance in 2021 was $850 billion. The decrease in new issuance in 2022 is due in part to high inflation and rising interest rates throughout the year that resulted in higher borrowing costs and, therefore, less attractive borrowing opportunities.

More background on leveraged bank loans can be found in the NAIC CMB primer on Leveraged Bank Loans published in November 2018, and more information on U.S. insurers' bank loan exposure at year-end 2022 may be found in a special report titled, *Another Year of Double-Digit Growth in U.S. Insurers' Bank Loan Exposure*, that was published by the NAIC CMB in July 2023.

Commercial Real Estate Collateralized Loan Obligation Market Trends

In 2022, $30 billion in CRE CLOs were issued, which was down 33% from 2021 due in part to general market volatility, particularly in the real estate market, and rising interest rates.[5] In addition, for 1Q 2023, DBRS Morningstar cites $1.1 billion in new issuance of CRE CLOs, which is a 93% decrease from 1Q 2022, which had a record high new issuance of $15.2 billion. While U.S. insurers continue to participate

[5] CRE Finance Council, *2022 Private-Label CMBS and CRE CLO Issuance Summary and 2023 Outlook,* Jan. 9, 2023.

in this market, it is a relatively small exposure at less than 1% of total cash and invested assets. The NAIC CMB published a CRE CLO primer in July 2021.

The NAIC CMB will continue to monitor trends with CLOs and report as appropriate.

Questions and comments are always welcome. Please contact the Capital Markets Bureau at CapitalMarkets@naic.org.