

Insurance Practice

Alternative capital in property and casualty: A way forward

We take a look at five likely trends for alternative capital in property and casualty insurance—and outline how insurers can use this capital to close the insurance gap.

by Mahima Agarwal, Chien-Teng Chia, Rajiv Dattani, and Shannon Varney



The global property and casualty (P&C) insurance market is facing a significant capacity crunch, with demand outstripping supply.¹ Losses from increasingly frequent and severe catastrophes, emerging exposures, new types of risk, and rising interest rates have produced a surge in demand for insurance cover. These same forces have also shrunk supply, with both reinsurers and investors having reassessed their risk tolerance and sought to minimize exposure to tail risks.

But there is good news. Alternative capital from sources outside of traditional reinsurance has surged and embedded itself into P&C insurers' capital structure. This was already happening in 2013, when McKinsey outlined three scenarios for how alternative capital in insurance could evolve (see sidebar "Recap of 2013 insights:

How the reinsurance market could evolve").² Our analysis shows that alternative capital deployed into reinsurance grew significantly from 2010 to 2020, by 15 percent per year, and has consistently contributed 13 to 18 percent of total reinsurance capital since 2015. Although total reinsurance capital declined 11 percent from 2021 to 2022, alternative capital stayed constant at about \$95 billion.

This market is dynamic, and we believe it will grow beyond catastrophe classes and see the evolution of platforms for insurance-linked securities (ILS) as well as new investors, new business models, and regulatory reform. Insurers should consider making alternative capital a core part of their capital management strategy.

¹ *Global insurance report 2023: Expanding commercial P&C's market relevance*, McKinsey, February 16, 2023.

² For more, see Kevin Bradicich, Ari Chester, Peter Hahn, and Giambattista Taglioni, *Could third-party capital transform the reinsurance markets?*, McKinsey, September 11, 2013.

Recap of 2013 insights: How the reinsurance market could evolve

We published a report about global alternative capital in 2013. In that report, we sketched out three scenarios for how the reinsurance market could evolve in the future. A brief review is below.¹

Peaks at 2013 levels. In 2013, alternative capital was 15 to 20 percent of the reinsurance market. We wrote that developments such as a large catastrophic event that erodes a principal investment or rising yields in standard markets could dampen investors' appetite for involvement with the reinsurance market. Insurance carriers could also favor traditional reinsurers if they believed investors lacked long-term commitment to reinsurance.

Disruption. We predicted that alternative capital could grow to become 25 to 35 percent of the market's capacity if insurers became more comfortable with alternative-capital instruments and if investors were attracted by uncorrelated yields and became more comfortable with the risks of participating in the reinsurance market.

Dislocation. We wrote that alternative capital could reach or exceed 40 percent of the reinsurance market's capacity since the global value of managed assets dwarfs that of the property catastrophe reinsurance market. Because their large balance sheets can absorb volatility in the comparatively smaller reinsurance market, major investors that take large positions in the market could create this dislocation.

¹ For the full report, see Kevin Bradicich, Ari Chester, Peter Hahn, and Giambattista Taglioni, *Could third-party capital transform the reinsurance markets?*, McKinsey, September 11, 2013.

Advantages for both investors and insurers

Within an appropriately structured relationship, investors that provide alternative capital and insurers both benefit. ILS help investors diversify their portfolios and manage and refine the kinds of risks they take on. In return, insurers can receive capital at better terms.

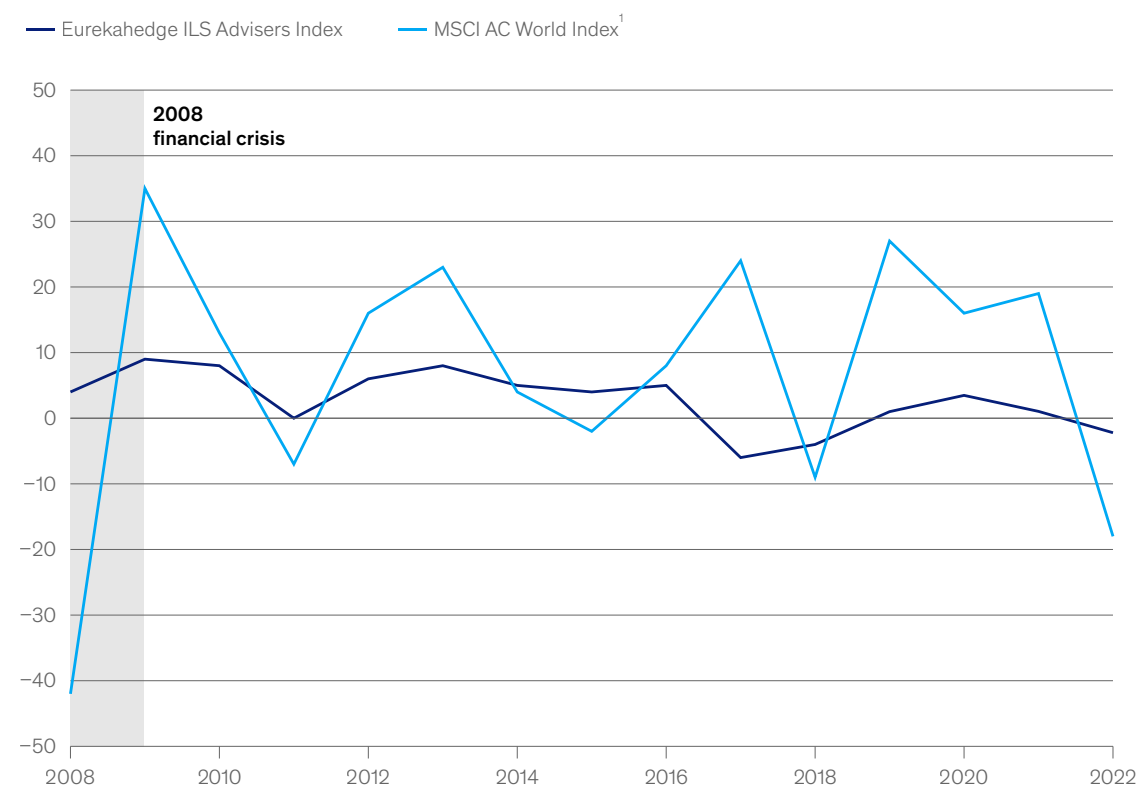
For investors: Diversification and managed risk

Investors are attracted to ILS because they have better risk-adjusted returns than global equities. ILS returned 4 percent per year from 2005 to 2022, compared with 3 percent per year from equities in the same period.³ And because ILS returns are typically uncorrelated with equity market returns, ILS are an appealing source of diversification (Exhibit 1).

Exhibit 1

Insurance-linked securities are generally uncorrelated with equity market returns.

Insurance-linked securities (ILS) funds and global equity market returns, %



¹FactSet's MSCI AC World Index captures large- and mid-cap representation across 23 developed-markets and 26 emerging-markets countries. This index covers approximately 85% of the global investable equity opportunity set.
Source: Eurekahedge ILS Advisers Index, accessed March 4, 2023; MSCI AC World Index, returns 2008–22, FactSet, accessed March 4, 2023

McKinsey & Company

³ Eurekahedge ILS Advisers Index, accessed March 4, 2023; MSCI AC World Index, returns 2008–22, FactSet, accessed March 4, 2023.

Reinsurance structures such as catastrophe bonds, collateralized reinsurance, and reinsurance sidecars also allow investors to invest in specific types of risks rather than in an entire insurer, effectively helping investors isolate their investments from

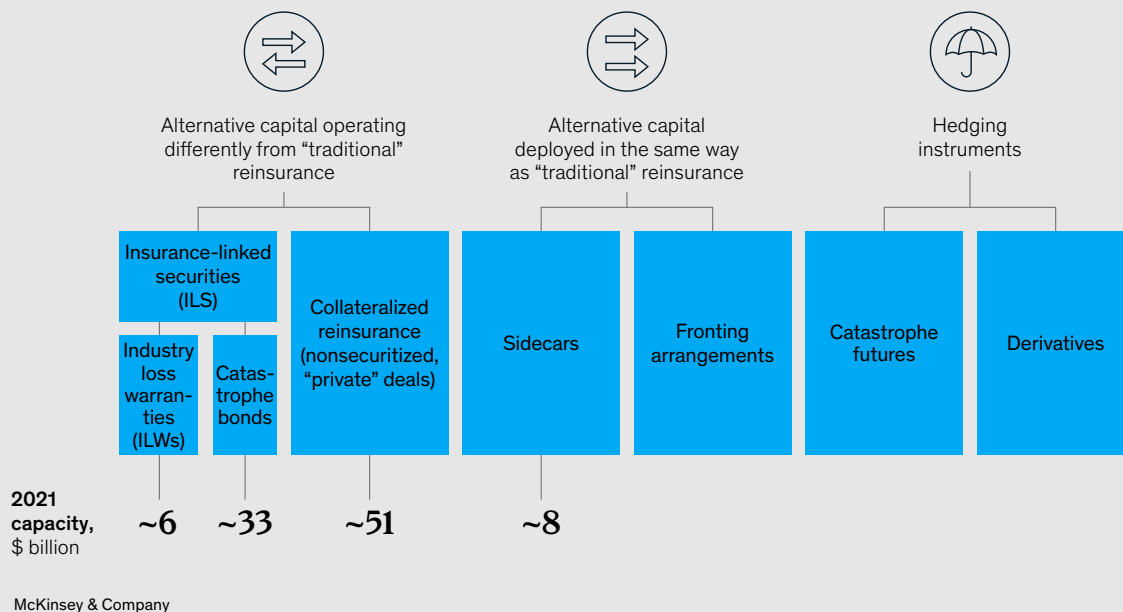
unwanted risks and from other reinsurance capital that supports the insurer (for more on the relevant instruments, see sidebar “Alternative-capital instruments in P&C”).

Alternative-capital instruments in P&C

Alternative capital can be deployed in property and casualty (P&C) insurance through seven kinds of financial instruments (exhibit).

Exhibit

Alternative capital can be deployed against seven kinds of instruments.



Industry loss warranties (ILWs) are securitized contracts indexed on industry-wide losses arising from an event.

Catastrophe bonds (cat bonds) are risk-linked securities. They can be defined for a single peril or multiple perils and are conveyed in a securitized special-purpose vehicle (SPV).

Collateralized reinsurance refers to nonsecuritized private transactions that allow entities without credit ratings to participate in the market.

Sidecars are co-investments in which an SPV contains third-party capital and traditional reinsurance capital.

Fronting arrangements refer to third-party capital provided through the infrastructure of a carrier with a credit rating.

Catastrophe futures are indexed to parameters associated with events covered in parametric insurance, and they are publicly traded. When losses are high, the value of the contract increases. When losses are low, the value of the contract declines.

Derivatives allow for cat bonds and ILWs to be traded.

The demand for alternative capital is large enough to fit investors' needs. The reinsurance market was valued at \$560 billion as of the end of 2022.⁴ And because of the size of alternative-capital investors' balance sheets, many that are looking to invest large amounts may find a match in this market.

Reinsurance may also help investors fulfill their environmental, social, and governance (ESG) agendas, particularly for funds that are thematically structured around specific ESG goals. At a basic level, it facilitates risk pooling and transfer and can help cover communities that may otherwise be underinsured.

For insurers: An additional source of capital

For insurers, alternative capital is attractive because it helps them reduce their dependency on the reinsurance market. By attracting a broader base of investors to the market, insurers may be able to negotiate better terms with reinsurers.

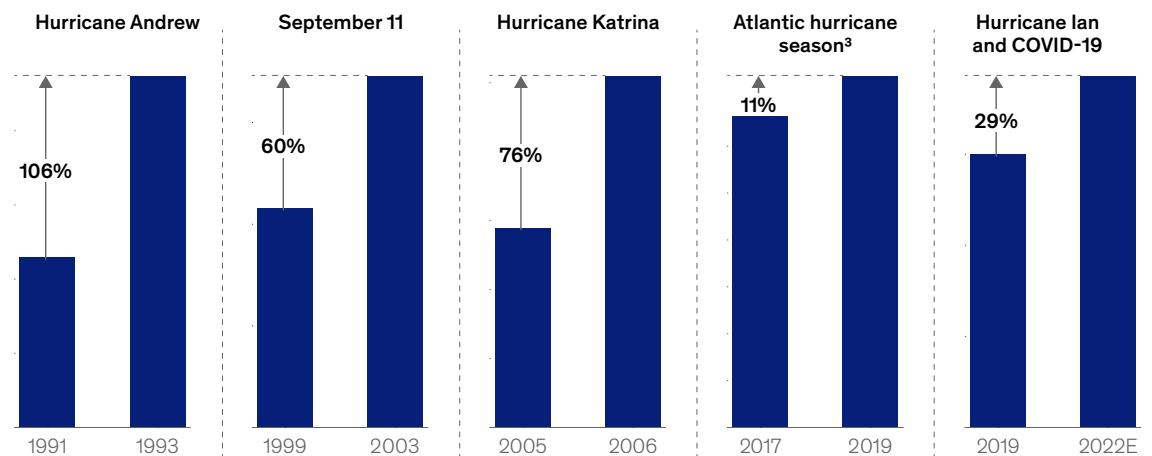
These alternative sources of funding also offer a lower cost of capital than traditional reinsurance, particularly in a context of increased industry losses and rising costs of equity and debt raising. In fact, the influx of alternative capital has pushed rates down in catastrophe markets, dampening overall hardening following major loss events. Consider the increases in the rate-on-line (which reflects how much an insurer has to pay to obtain reinsurance coverage) that resulted from the 2018 Atlantic hurricane season and from Hurricane Ian, as well as from the acute phase of the COVID-19 pandemic. Our analysis shows that at 11 percent and 29 percent, respectively, these increases are markedly lower than the 106 percent increase in 1993, soon after Hurricane Andrew (Exhibit 2).

Alternative-capital structures such as collateralized reinsurance promise ready capital for payouts, held in escrow until the end of the investment cycle. This diverges from the practices of traditional

Exhibit 2

Jumps in reinsurance coverage rates after catastrophic events decreased after alternative capital became more widely available.

Catastrophe rate-on-line¹ change after significant events²



¹Rate-on-line is premium paid to loss recoverable in a reinsurance contract. This indicates how much an insurer has to pay to obtain reinsurance coverage, with a higher ROL indicating higher rates.

²Change measured from trough to peak, before and after a major catastrophe.

³Hurricanes Harvey, Irma, and Maria in 2017; Hurricanes Florence and Michael in 2018.

Source: Guy Carpenter, reinsurance coverage rates (1991, 1993, 1999, 2003, 2005, 2006, 2017, 2019, and 2022), accessed March 8, 2023

⁴ Reinsurance market dynamics January 2023, Aon, January 2023.

reinsurers, which do not escrow funds specifically for a contract. Locking in capital for a fixed period is particularly useful when rates are uncertain. It relieves some short-term balance sheet pressure and frees insurers to focus on long-term capital management.

Alternative capital can also increase insurers' franchise value by generating additional capital through fees. The predictable stream of income from investors who subscribe to the franchise can also offset volatility from underwriting results, all of which are regarded positively in the capital markets.

The future of the P&C reinsurance market

Alternative capital's plateau since 2018 could be attributed to lower returns; ILS returns in 2022 were negative because of catastrophic losses.⁵ These losses are a reminder that ILS funds are concentrated in a single peril—catastrophe.

Insurers have responded to industry-wide losses with refined policy terms and pricing. As a result, we believe the insurance gap will continue to bring investors and insurers together, with alternative capital pulling reinsurance into the disruption scenario we first described in 2013.⁶ As part of the transition to the disruption scenario, we see five major shifts coming for the market: growth beyond catastrophe classes, new business models, new investors, platforms for alternative capital, and regulatory reform.

Growth beyond catastrophe classes

Non-catastrophe products are currently considered emerging segments. We believe there will be growth in cyberinsurance, casualty, niche P&C classes, and life and annuity classes.

The protection gap in cyberinsurance is significant. Economic losses from cyber risks in 2020 have been estimated at \$945 billion—more than 100 times the total premium market (estimated at just

over \$9 billion at the end of 2021).⁷ There is a clear need for additional capital because primary markets alone cannot cover the gap. Cyber risks are drawing growing interest from investors because of their similarities to natural-catastrophe structures, solid risk-adjusted returns, and low correlation with equities, and insurers are exploring combinations of risk coverage and structures that can give investors confidence.

Meanwhile, in our experience, investors have not generally considered casualty risk attractive because of its tail risk and correlation with the equity market. To mitigate their concerns, insurers could provide investors with more certainty on the timing of exits and the ability to manage tail risk.

Smaller, more niche P&C classes are another possible area of growth. Consider motor protection. Global demand for motor coverage—and the capital to do it with—has increased because of the increase in average claims severity and the emergence of diverse business models in the transportation industry, including micromobility and car sharing. At the same time, traditional reinsurers have a pessimistic outlook, and their profits have remained low. These factors have caused a reduction in the supply of capital and opened an opportunity for alternative-capital investors.

Compared with other liability classes, we see that motor liability has a shorter tail, inherently low frequency, and a range of severity that can be estimated with a large degree of confidence because of the large volume of available data. These characteristics have lent themselves to a few new products and recent interest from investors.

Finally, increasing life expectancies and advances in medical care have generated demand for longevity risks, and reinsurers have been looking for investors to offload these increasingly concentrated risks. Because these tend to be long-term risks, they are likely to be suited to investors that take long-term

⁵ *ILS annual report 2022: Alternative capital: Growing markets*, Aon, 2022; "Eurekahedge ILS Advisers Index—USD hedged," Eurekahedge, accessed April 25, 2023.

⁶ *Global insurance report 2023*, February 16, 2023; *Could third-party capital transform the reinsurance markets?*, September 11, 2013.

⁷ Eugenia Lostri and Zhanna Malekos Smith, *The hidden costs of cybercrime*, McAfee, December 2020; most of the gap is attributable to commercial lines. *Cyber insurance: Risks and trends 2022*, Munich Re, May 16, 2022.

views and are willing to lock up their capital for more than five years.

New and emerging business models

New business models serve a variety of functions. In our experience, direct participation disintermediates the relationship between insurers and investors; insurers issue bonds directly instead of relying on reinsurers.

Public–private partnerships share the risk between the private and public sectors, particularly for risks that the private sector cannot bear alone. Consider Australia's \$10 billion government-backed cyclone reinsurance pool, which fills market gaps that private capital is unable to meet, or the Swiss Influenza Pandemic Plan, which is ready to address commercial risks stemming from company-wide lockdowns.

Critical protection gaps remain, and the capacity to close them is constrained. We expect new business models to proliferate in response to this challenge.

A new wave of investors

We've observed that a new class of investors—including pension funds, sovereign wealth funds, and life insurers—are seeking long-term investments that are less volatile and less correlated with equity markets. They may invest in ILS if the projected returns are appealing enough.

Many investors remain wary of increased loss frequencies, but these new investors may be willing to take a slightly lower return for more stable performance over the insurance cycle. Index-focused investors, which concentrate on investing in exchange-traded funds, may also be interested in the development of simpler, more tradable ILS structures.

Alternative-capital platforms

Alternative-capital platforms that use artificial intelligence and machine learning technologies may emerge. Through more accurate and efficient modeling, insurers' risks can be better matched with investors' risk–reward appetites. For instance, insurers may use AI to identify the risk types, return hurdles, and payout periods investors are looking for and then recommend a portfolio of risks and structures that fit the requirements.

Regulatory reform in alternative capital

Regulations can attract capital that brings tax revenue and provides capital relief to local insurers. Countries such as Brazil and South Korea have established regulatory regimes to attract capital.⁸

At the same time, countries such as the United Kingdom and the United States have implemented reforms to encourage investment in ILS. One Florida bill from December 2022 would reduce legal and fraud-related risks and create a more robust framework in the property insurance market—and encourage more capital and reinsurance to enter the state.⁹

Insurers' call to action

Alternative capital is already a meaningful source of reinsurance capital for the insurance industry, and insurers should consider making it a core part of their capital management strategy, alongside traditional reinsurance. They can position themselves by increasing investor confidence, catering to different investor appetites, and securing the right talent.

Provide transparency and certainty on their offerings' underlying risk. Doing this could boost investors' confidence. Modern data sets, real-time reporting, and data analytics can help insurers build the capabilities to effectively model probable maximum loss. Parametric triggers can help reduce the tail risk of exposures and make the value of loss payouts more predictable for customers.

⁸ Steve Evans, "Brazil seeks feedback on ILS regulatory framework proposal," Artemis, August 10, 2020; Steve Evans, "South Korea urged to establish catastrophe bond & ILS regulatory regime," Artemis, April 7, 2021.

⁹ Steve Evans, "Florida cat bonds more attractive after insurance reforms: Plenum's Schmelzer," Artemis, February 2, 2023.

Find more content like this on the
McKinsey Insights App



Scan • Download • Personalize



Simplify structures and language in investment contracts. This could attract a wider array of investors. Insurers could also issue bonds directly into the alternative-capital market instead of relying on reinsurers or third-party providers of capital.

Diversify risks across multiple lines. This approach can help insurers match their offerings to different investors' risk profiles and appetites. Risks could be segmented, with aggregate or stop-loss structures in place to meet specific capital requirements. Multiple risks could also be packaged into diversified collateralized structures, something that is already happening. This is a departure from the current natural-catastrophe-focused model, which leads to a higher risk concentration for investors.

Consider talent. As with any effort, successfully accessing and scaling alternative capital requires not only insurance experts but also talent with the right capital- and portfolio-management skills. In light of the ongoing race for talent,¹⁰ this work may require a broader consideration of how insurers can attract diverse talent to the industry.¹¹

As part of insurers' core capital management strategy, alternative capital can help drive returns and plug the P&C insurance gap. Understanding the key shifts ahead for the market and responding to them will be critical.

Mahima Agarwal is an associate partner in McKinsey's London office, where **Chien-Teng Chia** is a consultant and **Rajiv Dattani** is a partner; and **Shannon Varney** is a partner in the Boston office.

Copyright © 2023 McKinsey & Company. All rights reserved.

Contact:

Mahima Agarwal

Associate partner, London
Mahima_Agarwal@McKinsey.com

Shannon Varney

Partner, Boston
Shannon_Varney@McKinsey.com

Rajiv Dattani

Partner, London
Rajiv_Dattani@McKinsey.com

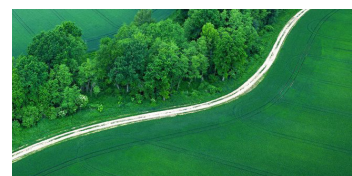
Further insights



[Global Insurance Report 2023](#)



[Reducing climate-related property risk with AI](#)



[Net-zero underwriting in P&C and the growth at stake](#)

¹⁰ For more, see Aaron De Smet, Bonnie Dowling, Marino Mugayar-Baldocchi, and Bill Schaninger, "Gone for now, or gone for good? How to play the new talent game and win back workers," *McKinsey Quarterly*, March 9, 2022.

¹¹ For more on talent in insurance, see "Transforming the talent model in the insurance industry," McKinsey, July 6, 2020.