



2024

Invesco Global Sovereign Asset Management Study

This study is not intended for members of the public or retail investors.
Full audience information is available on the next page.



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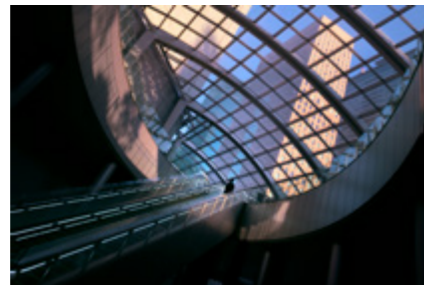
Theme 1 07



Shifting investment landscape drives changing allocations

Amid an unpredictable macro environment, sovereign wealth funds are recalibrating their portfolios, pivoting towards equities, private credit, and hedge funds. Emerging markets are gaining traction, with funds adopting a selective approach and prioritising India.

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The rise of private credit: a compelling opportunity

Private credit is increasingly attractive to sovereign wealth funds, with many investing through funds and direct deals. SWFs favour developed markets but are also exploring emerging markets while balancing defensive and opportunistic strategies to navigate the competitive landscape.

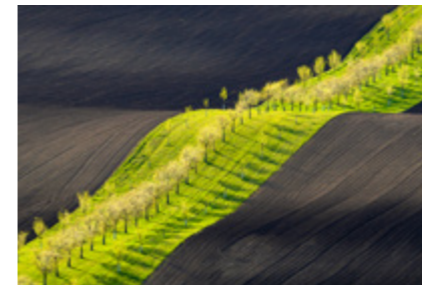
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The AI awakening: sovereign investors embrace the future

Sovereign investors are increasingly adopting AI in their investment processes, recognising its potential to become an essential tool. While challenges exist, funds are investing in training and partnerships to overcome barriers.

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On the threshold of transition

ESG adoption continues to rise among central banks, while SWFs refine their approach as the market matures. Climate risk is recognised as a material factor, with investors aligning portfolios with global climate goals. Engagement and allocation to renewables are preferred over complete divestment to drive the energy transition.

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Central banks navigate uncertainty in a global election year

Amid global uncertainties, central banks are strengthening and diversifying reserves. Gold's appeal is growing due to concerns about reserve weaponisation and rising US debt levels. Allocations to emerging markets are increasing as central banks seek to enhance returns and mitigate risks.

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Welcome

It is my pleasure to introduce the twelfth edition of our annual report on sovereign investors, a project that began in 2013 and has since expanded in both scope and depth. For this 2024 study, we have gathered insights and perspectives from 140 senior investment professionals, including chief investment officers, heads of asset classes, and lead portfolio strategists, representing 83 sovereign wealth funds and 57 central banks. Together, these organisations oversee approximately US\$22 trillion in assets under management.



In 2024, sovereign investors navigate a shifting investment landscape, adapting their strategies to seize opportunities and mitigate risks. Our first theme explores how the changing macro environment, characterised by inflation and interest rate risk, is driving a pivot towards equities and private credit. Emerging markets are also attracting more interest, especially from non-Western funds, with a selective approach seen as key. India emerges as a top priority.

Theme 2 delves into the rise of private credit, a compelling opportunity for sovereign wealth funds. Over half of SWFs are now investing in private credit, with most planning to increase allocations. Infrastructure debt, real estate debt, and corporate lending are favoured sectors. SWFs are also exploring emerging markets and are increasingly attracted to mezzanine debt and preferred equity in real estate. Amid growing competition, funds are balancing defensive and opportunistic strategies, utilising both external managers and specialised internal teams.

Theme 3 examines the use of AI among sovereign investors. A third are already using AI in their investment process, with nearly all believing it will become an essential tool. SWFs are also investing across the AI technology stack to position themselves at the forefront of this revolution. Most respondents believe AI will have a deflationary effect, with a pronounced impact in certain sectors such as healthcare and technology.

In Theme 4, we find sovereign investors on the threshold of an ESG transition. While the percentage of SWFs with a formal ESG policy dipped slightly, adoption among central banks continues to rise. Climate risk is seen as an immediate, material factor, with half of respondents modelling their portfolios against global climate goals. To drive the energy transition, engagement and allocation to renewables are generally preferred over complete divestment.

Our final theme explores how central banks are navigating uncertainty in a global election year. They are bolstering and diversifying reserves, with over half planning to increase reserve size. Gold's appeal is growing amid concerns about the weaponisation of reserves and rising US debt. Emerging market allocations are also on the rise, with the proportion of central banks holding more than 10% projected to double in five years.

As sovereign investors adapt to a complex and evolving landscape, the 2024 study offers invaluable insights into their strategies and priorities. We hope you find this report informative and thought-provoking.

Rod Ringrow
Head of Official Institutions

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Key metrics

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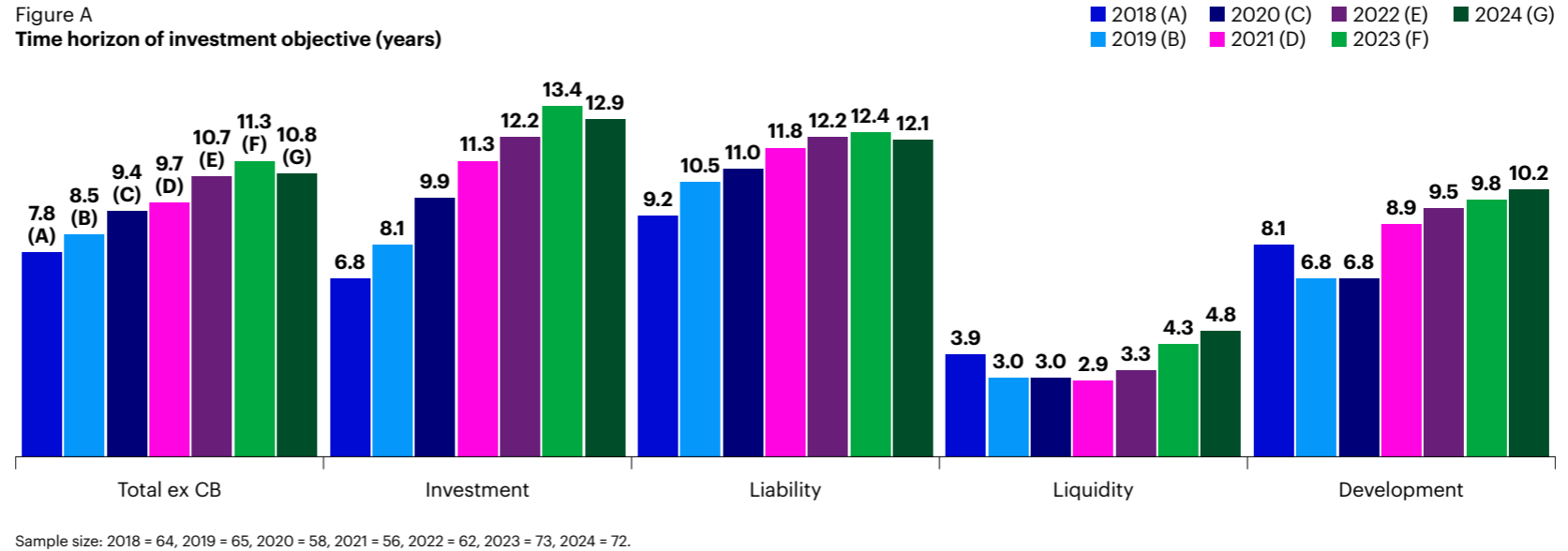
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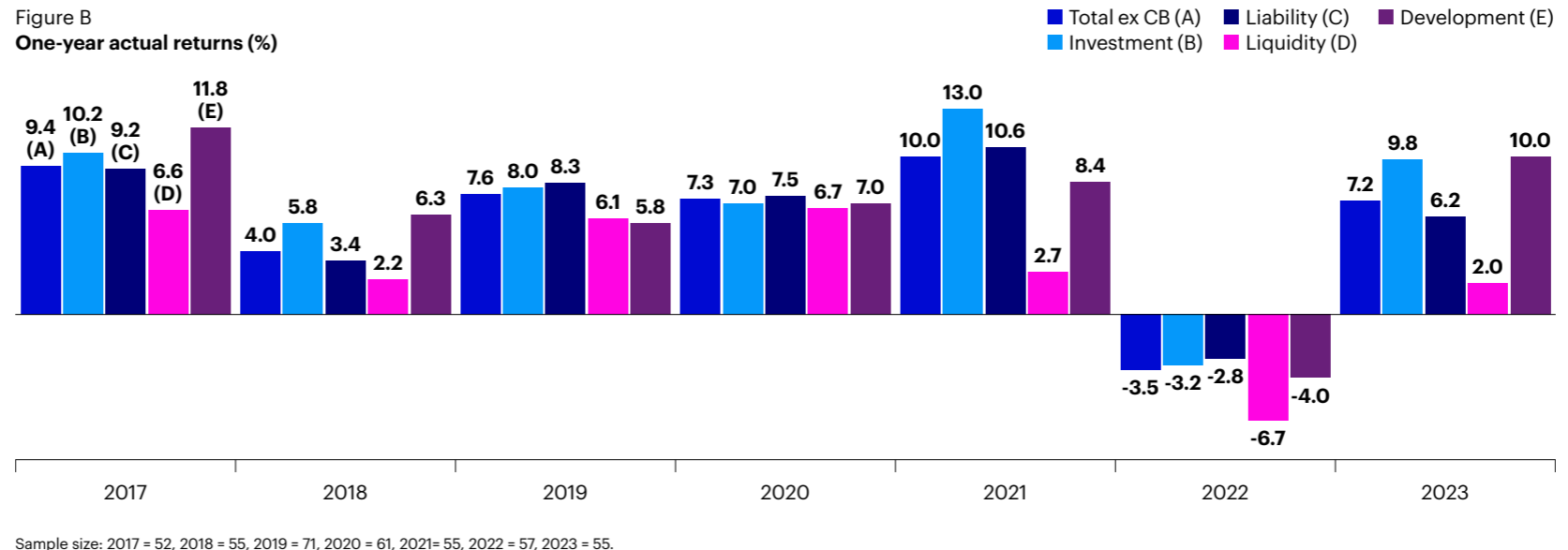
Investment horizons

In 2024, sovereign wealth funds reported an average investment horizon of 10.8 years, a slight decrease from the 11.3 years reported in 2023. Investment sovereigns continued to have the longest time horizon at 12.9 years, followed by liability sovereigns at 12.1 years. Liquidity sovereigns saw an increase in their investment horizon, reaching 4.8 years, while development sovereigns reported a horizon of 10.2 years.



Performance

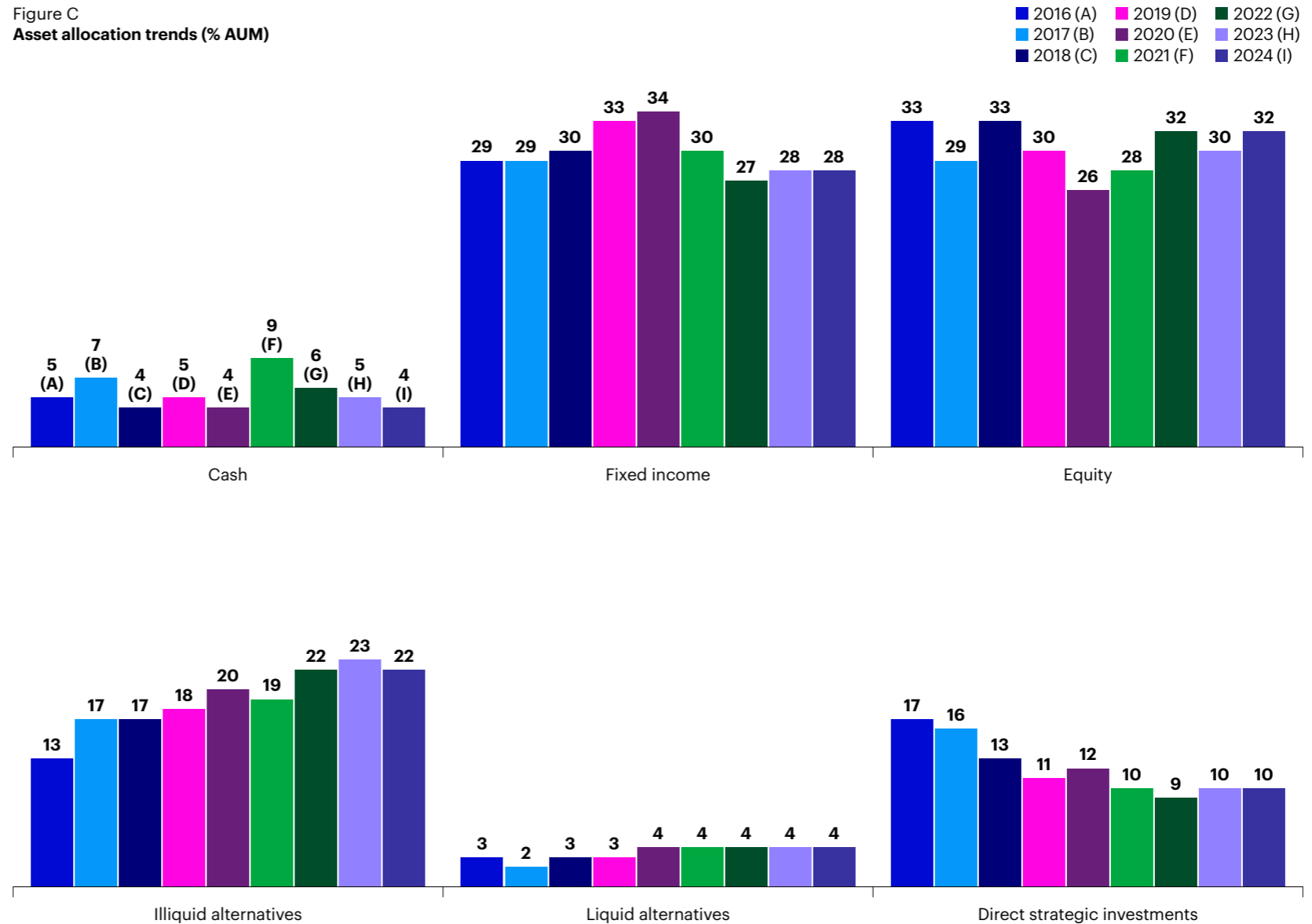
Sovereign wealth funds reported an average one-year actual return of 7.2% in 2023, a significant improvement from the -3.5% reported in the previous year. Investment sovereigns saw a return of 9.8%, while development sovereigns reported a return of 10.0%. Liability sovereigns experienced a return of 6.2%, and liquidity sovereigns reported a return of 2.0%.



Asset allocation

In 2024, sovereign wealth funds allocations to fixed income remained steady at 28%, while equity allocations increased to 32% from 30% in the previous year. Illiquid alternatives accounted for 22% of total assets, while liquid alternatives and direct strategic investments (DSI) stood at 4% and 10%, respectively.

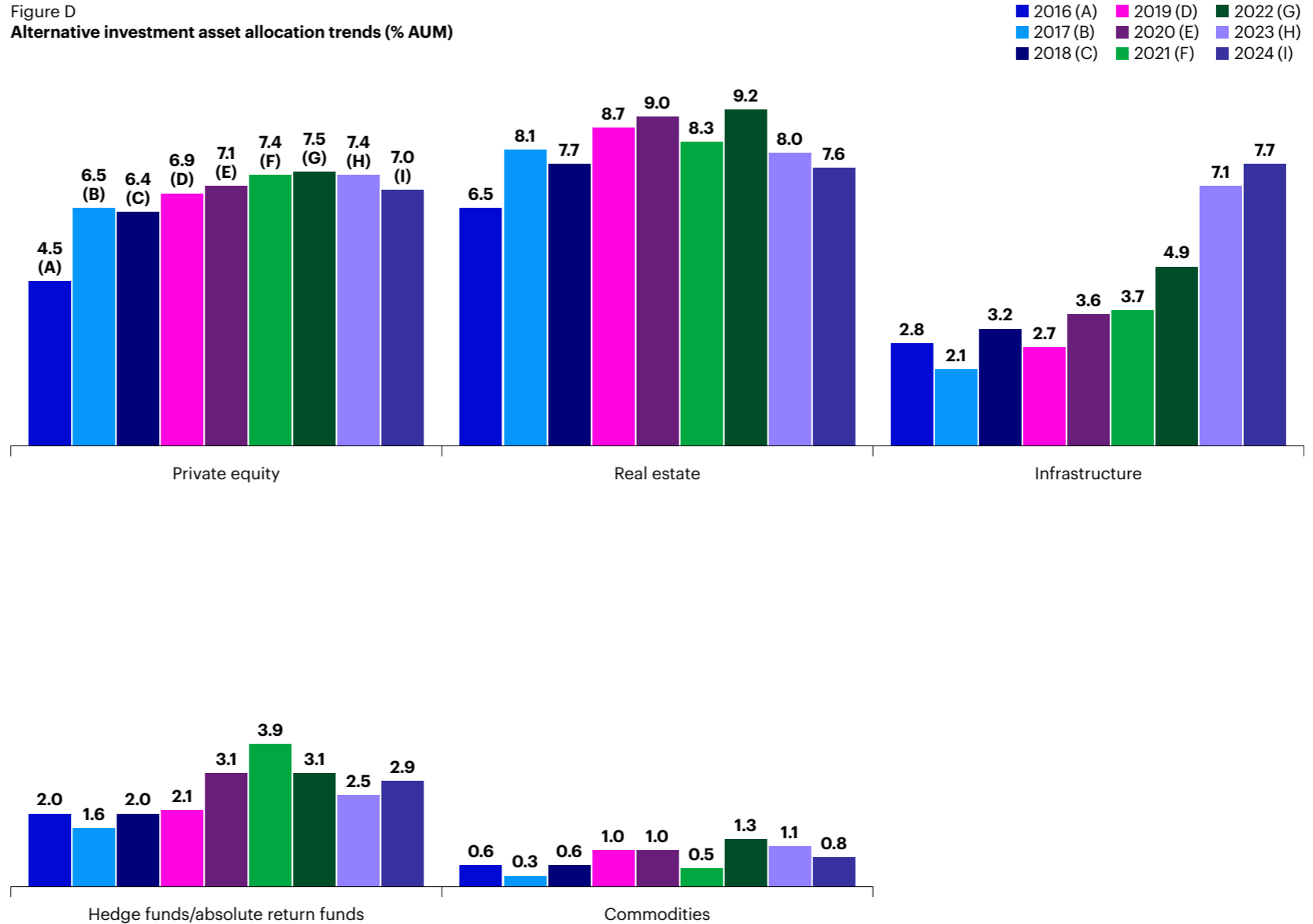
Figure C
Asset allocation trends (% AUM)



Sample size: 2016 = 57, 2017 = 62, 2018 = 63, 2019 = 53, 2020 = 78, 2021 = 54, 2022 = 74, 2023 = 80, 2024 = 74.

Within alternative investments, private equity allocations decreased to 7.0% from 7.4% in the previous year, and real estate allocations fell to 7.6% from 8.0%. Conversely, infrastructure allocations rose to 7.7% from 7.1%, and hedge funds/absolute return funds increased to 2.9% from 2.5% in 2023. Commodities allocations remained relatively stable at 0.8%.

Figure D
Alternative investment asset allocation trends (% AUM)



Sample size: 2016 = 57, 2017 = 62, 2018 = 63, 2019 = 53, 2020 = 78, 2021 = 54, 2022 = 74, 2023 = 80, 2024 = 74.

Shifting investment landscape drives changing allocations



Sovereign investors bounce back in 2023 after a tough 2022, with over half exceeding return targets



Sovereign wealth funds are focused on navigating a complex geopolitical environment and adopting active asset allocation strategies to generate alpha and manage risk



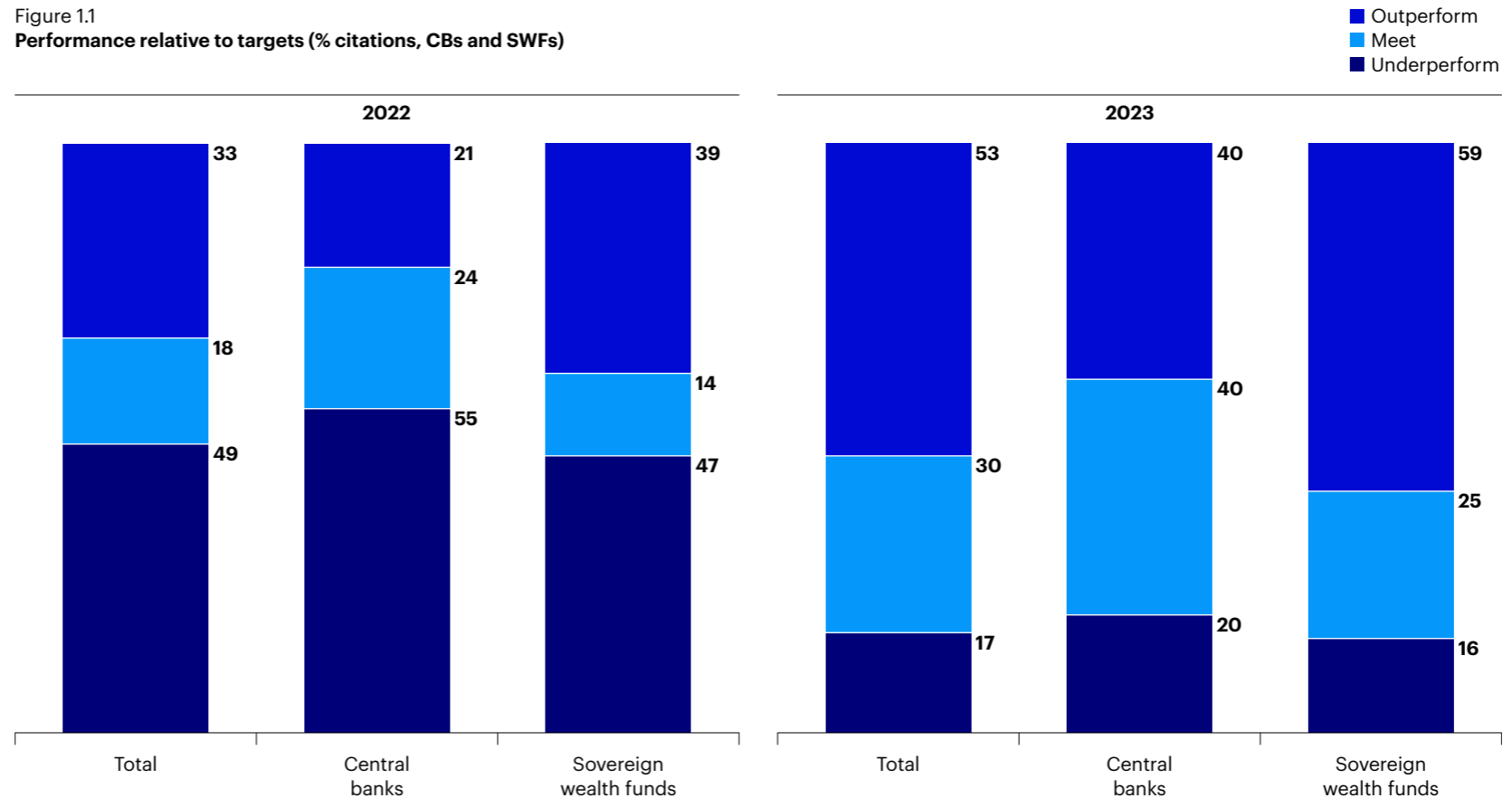
Emerging markets are attracting more interest, especially from non-Western funds. A selective approach is seen as key, with India a top priority

Following a tumultuous 2022, when the majority underperformed their return targets, sovereign wealth funds (SWFs) and central banks (CBs) rebounded strongly in 2023, with over half outperforming (**figure 1.1**).

However, SWFs remain cautious about the future, as many of the risks that made 2022 a tumultuous year, such as inflation and geopolitical conflicts, continue to cast a shadow over the investment horizon. In light of these concerns, SWFs are actively reassessing their asset allocation strategies, seeking to reduce their exposure to duration risk and capitalise on the diversification opportunities presented by emerging markets.

Our expectation is that growth will be positive, but it will be low, and we don't see a global recession taking place.

Central bank
Middle East



Did you outperform, meet or underperform your target return in 2023? Sample size: 94.

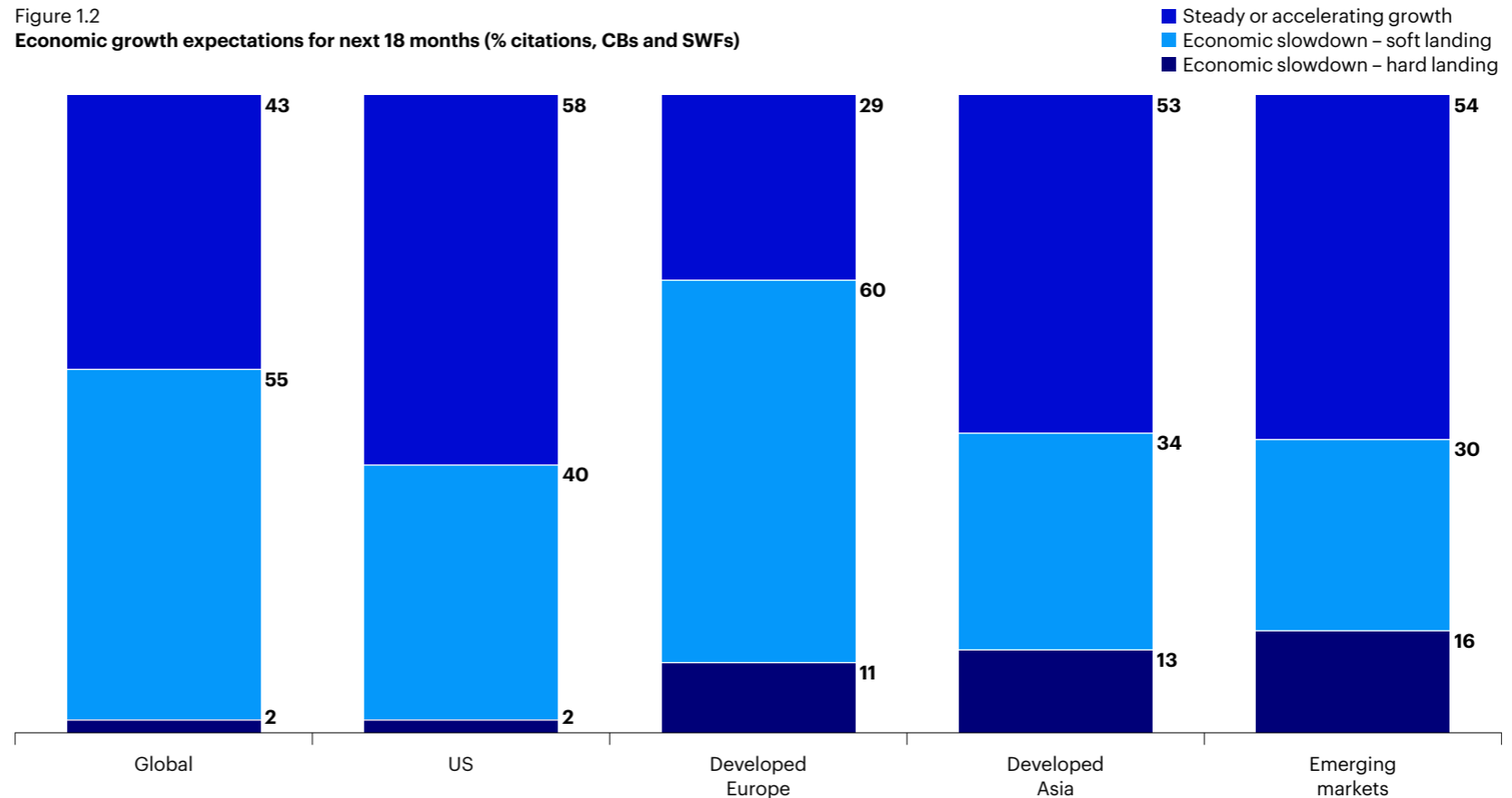


Regional divergence in economic outlook

Survey participants expressed cautious optimism about the global economic outlook but with significant regional variations (**figure 1.2**). Globally, 43% of respondents expect steady or accelerating growth over the next 18 months. The US economy stands out as a beacon of confidence, with 58% predicting steady or accelerating growth, supported by low unemployment and rising wages (despite respondents flagging the uncertainty caused by the upcoming presidential election). In contrast, only 29% hold similar expectations for Europe.

As an emerging markets central bank explained, “We think we will avoid recession on a global level. In Europe, we are seeing a big divergence between economies and not that optimistic. China also looks like they are not going to have the growth they have had in the past.” This was echoed by an emerging markets-based SWF, “We expect weakness in some regions, particularly in Europe. We don’t expect a hard landing but expect relatively weaker performance.” Another central bank from the Middle East added, “Our expectation is that growth will be positive, but it will be low, and we don’t see a global recession taking place. The US appears to be delivering a very soft landing.”

Figure 1.2
Economic growth expectations for next 18 months (% citations, CBs and SWFs)



What are your expectations for the economic growth in the following regions over the next 18 months? Sample size: 97.

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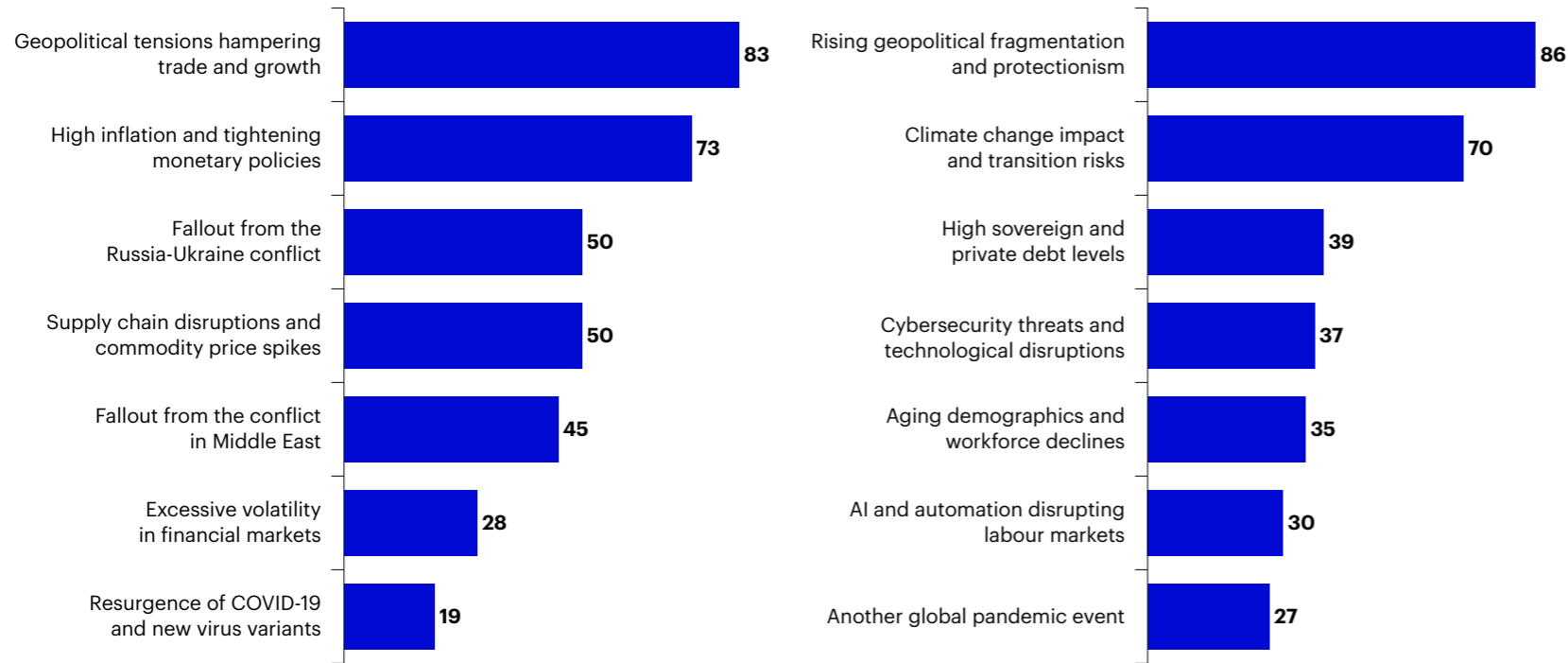
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Figure 1.3
Risks to global economic growth in next year (LHS) and next 10 years (RHS) (% citations, CBs and SWFs)



What do you see as the major risks to global economic growth in the next year? What do you see as the major risks to global economic growth in the next 10 years? Sample size: 132.

Geopolitical tensions temper optimism

The cautious optimism is tempered by a range of risks on the horizon. In the short term, geopolitical tensions (83%), high inflation and monetary tightening (73%), and the continued fallout from the Russia-Ukraine conflict (50%) emerge as the primary concerns (figure 1.3). Over the next decade, rising geopolitical fragmentation and protectionism (86%) and climate change (70%) top the list of threats (figure 1.3).

The heightened focus on geopolitical risks reflects the ongoing conflict in the Middle East

as well as tensions between major powers and the uncertainty caused by the large number of elections taking place in 2024. A Western central bank highlighted the interconnected nature of these risks, stating, “The elections are a real unknown for the world economy and could also have an impact on the inflation outlook.” Climate change, too, is a central concern for sovereign investors and linked to concerns around inflation. As one Western central bank noted, “Climate and geopolitical issues are putting pressures on pricing so inflation will remain a concern and interest rates will stay higher.”

The elections are a real unknown for the world economy and could also have an impact on the inflation outlook.

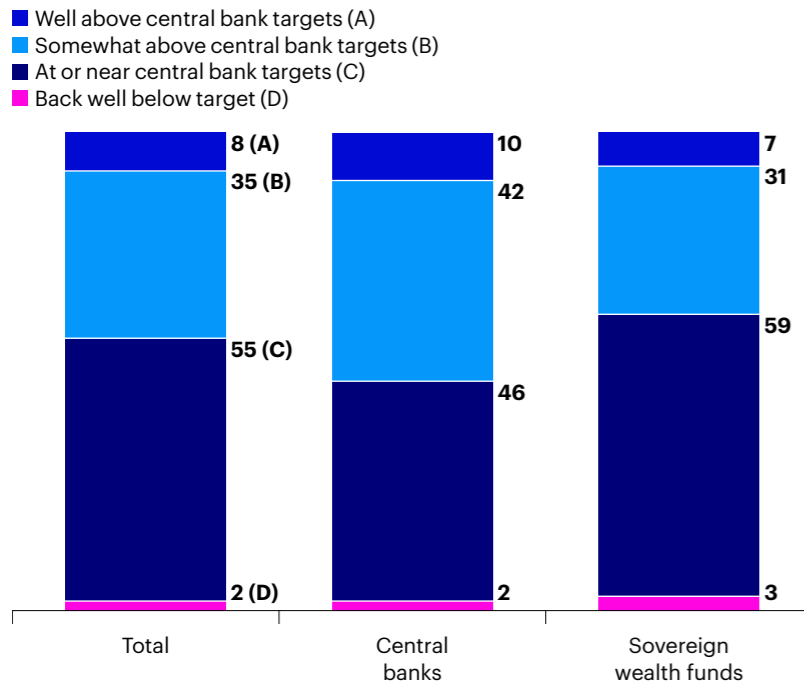
Central bank
 The West

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Rates will not go back to zero, barring any catastrophe, and will be relatively high for a longer period.

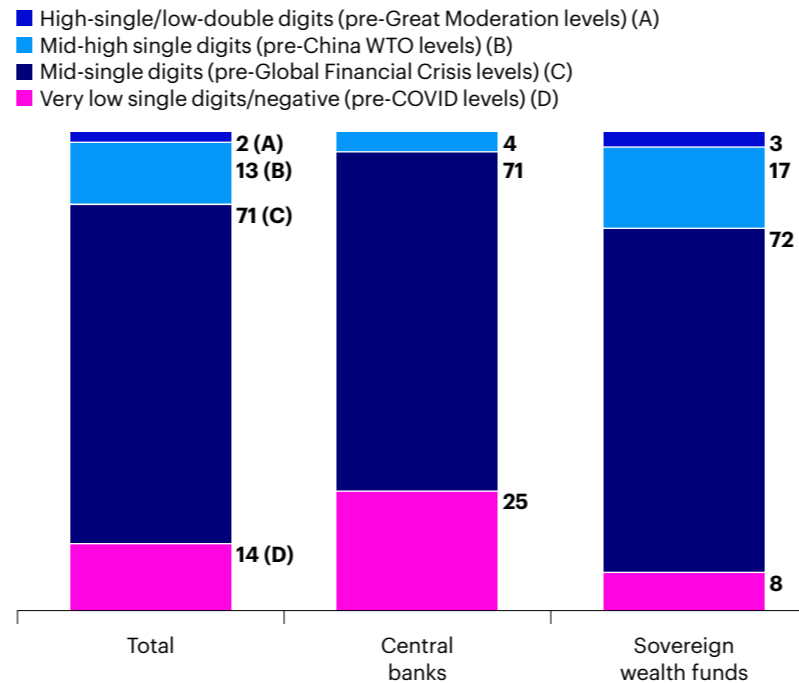
SWF
Emerging markets

Figure 1.4
Expectations for long-term inflation in developed markets
(% citations, CBs and SWFs)



In developed markets where do you expect longer-term inflation to settle?
Sample size: 124.

Figure 1.5
Long-term outlook for interest rates and bond yields
(% citations, CBs and SWFs)



How do you expect interest rates and major-economy long-term bond yields to be evolve over time?
Sample size: 87.

Inflation concerns persist

Inflation clearly remains a significant concern for sovereign investors and some 43% of respondents expect inflation to settle above central bank targets (figure 1.4). The persistent nature of inflation has led to a shift in expectations for the future path of interest rates and bond yields. A substantial majority (71%) of respondents anticipate interest rates and bond yields to remain in the mid-single digits, while only 14% believe that we will witness a return to the exceptionally low interest rate environment of the previous decade (figure 1.5). This is supported by the inflation data from the first quarter of 2024, which suggests that the journey towards lower inflation levels may prove more challenging than initially anticipated, especially in the United States. "Rates will not go back to zero, barring any catastrophe, and will be relatively high for a longer period," said one emerging markets-based SWF.

The higher-than-expected inflation readings during 2024 were front of mind for many respondents, prompting a re-evaluation of the timeline and magnitude of potential interest rate cuts and a concern that additional rate hikes may be necessary. The prevailing uncertainty surrounding the inflation outlook and the trajectory of interest rates was seen as posing significant challenges, with many respondents pointing to lessons learnt in 2022 and looking to adjust their portfolios to accommodate the heightened duration risk.

Inflation and interest rate concerns drive shifts in asset allocation

The possibility of persistently high inflation and interest rates was perceived as potentially having a profound impact on the valuation of various assets, especially those in growth-oriented industries and those with significant debt exposure. As a result, this year's survey reveals quite a notable reversal in certain allocation trends of recent years, with net increases expected for equities, infrastructure and commodities but net decreases for cash, as well as less liquid investments such as private equity and real estate (figure 1.6).

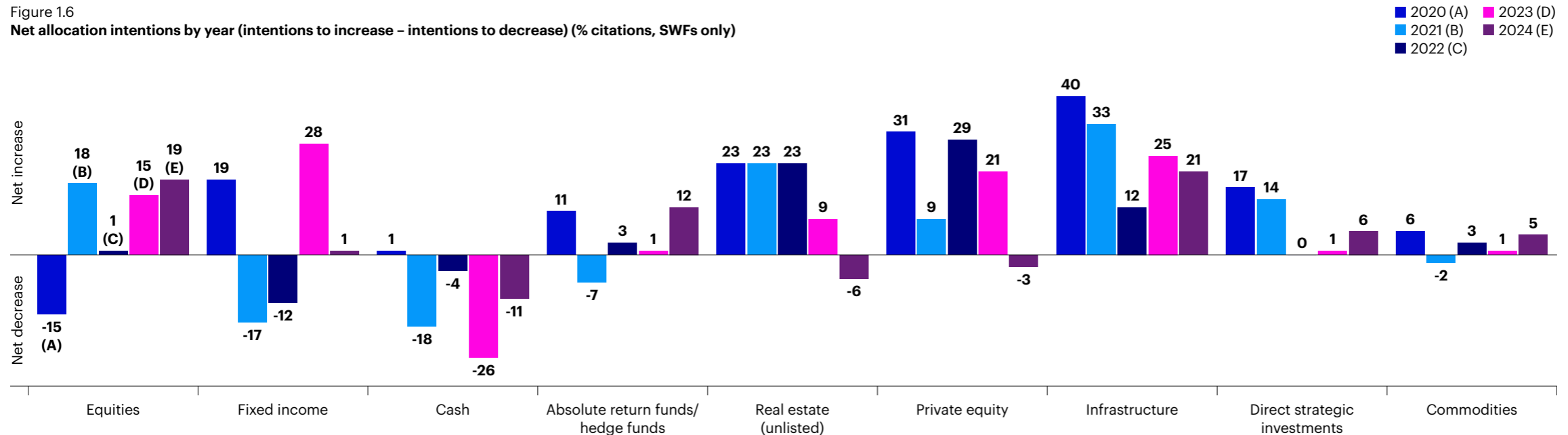
The appeal of equities reflects a broader trend among institutional investors, as they seek to capture long-term growth opportunities and hedge against inflation. As a Western SWF noted, "A higher equity allocation can help us to safeguard our portfolio's purchasing power if inflation remains a concern."

In contrast, heightened interest rate risk and uncertain future borrowing costs have dampened SWFs' perception of the highly leveraged private market assets. A Western SWF noted, "Private equity opportunities are simply not there," while another added, "Private equity has been impacted by rate hikes and narrowing opportunities. Real estate is also facing the same headwinds and does not look as attractive as before."

In contrast, the higher rate environment has boosted the appeal of private credit which has emerged as a compelling alternative to traditional fixed income, offering attractive yields and additional diversification. As one Western SWF explained: "We like the diversifying opportunity with exposure to certain markets that you don't find in public markets." The growing appetite for private credit is reflected in the broader market

trends. According to data from Bloomberg, the size of the private credit market reached approximately \$1.4 trillion at the start of 2023, up from \$875 billion in 2020 and this is a topic explored in more detail in Theme 2.

SWFs have also shown increased appetite for hedge funds as they aim to enhance portfolio diversification and achieve returns that are not tied to broader market movements. Hedge funds' capacity to manage risk in turbulent markets has made them particularly attractive in the present landscape, with credit-oriented strategies garnering particular attention due to their potential to capitalise on inefficiencies arising from the elevated yield environment. As a European SWF noted, "We've been increasing our allocation to hedge funds. We see this as a way to generate alpha while also providing some downside protection to our portfolio."



For each asset class, how do you expect your allocation to change over the next 12 months? 2024 Sample size: 74.

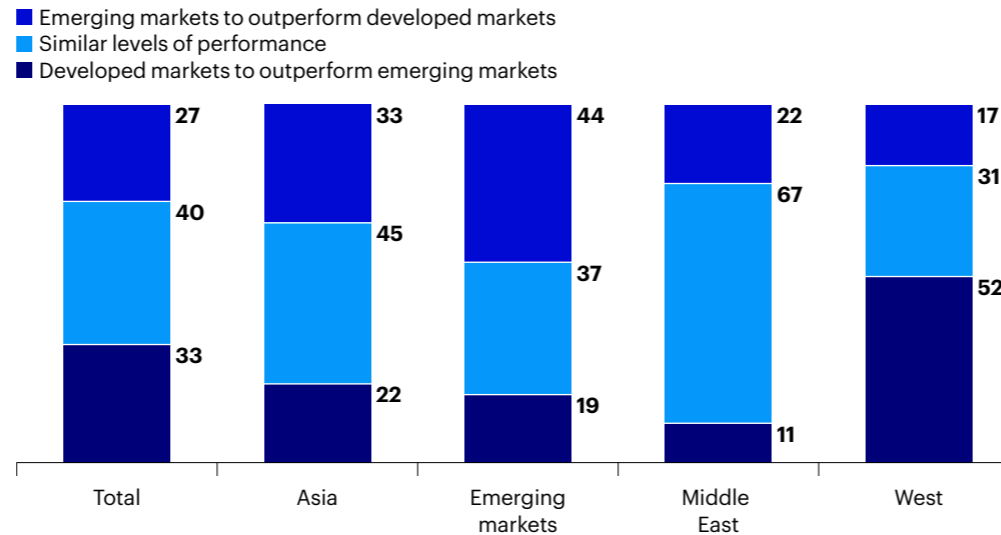
Geopolitical shifts and supply chain realignment to benefit emerging markets

This year's study finds that SWFs based outside of the West are particularly bullish on the prospects of emerging markets over the next three years, anticipating outperformance relative to developed markets (**figure 1.7**).

Geopolitical tensions, often seen as a source of uncertainty and risk, are paradoxically expected to benefit emerging markets in the coming years. As the world becomes increasingly multipolar, with competing powers vying for influence and resources, emerging markets are expected to capitalise on the shifting dynamics (**figure 1.8**). SWFs suggested that the strategic competition between the United States and China, as well as the growing influence of other regional powers, will create new opportunities for emerging markets to attract investment, forge new partnerships, and assert their economic and political influence on the global stage.

Another key trend that is expected to boost the appeal of emerging markets is the growing emphasis on near-shoring and regionalisation (**figure 1.8**). In response to the growing challenges posed by trade conflicts, geopolitical strains, and the vulnerabilities exposed by the COVID-19 crisis, companies are seeking to enhance the resilience of their global supply chains by diversifying their manufacturing and procurement strategies across multiple locations and suppliers. This trend is seen as benefitting emerging markets that can offer competitive advantages in terms of cost, skills, and market access. SWFs are keen to tap into these opportunities, either through direct investments in emerging market-based companies or by targeting multinational corporations that are expanding their presence in these markets.

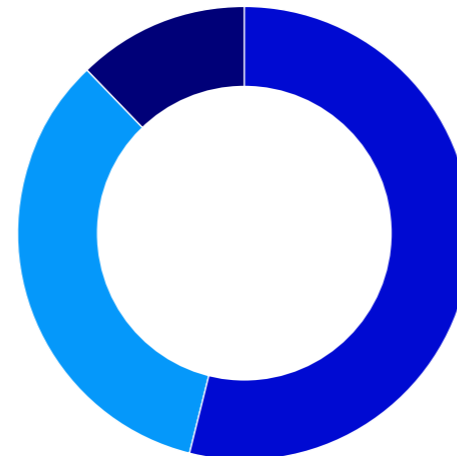
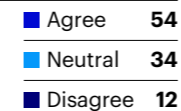
Figure 1.7
Expected performance of emerging vs developed markets in next 3 years (% citations, SWFs only)



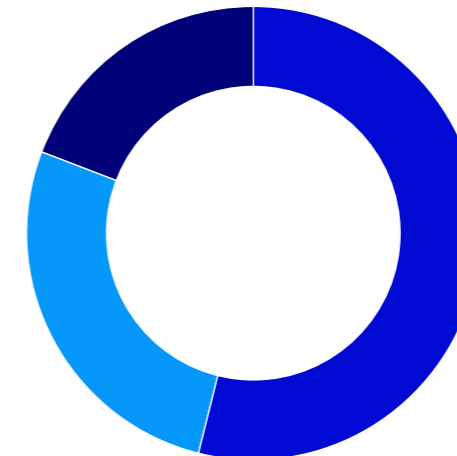
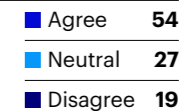
What is your outlook for developed markets vs emerging markets over the next 3 years? Sample size: 63.

Figure 1.8
Emerging market trends (% citations, SWFs only)

Emerging markets stand to benefit by playing off competing great powers



Emerging markets are becoming more attractive due to near-shoring and regionalisation



To what extent do you agree with the following statements? Sample size: 53.

However, the survey also reveals that SWFs are not approaching emerging markets as a homogeneous bloc. Instead, they are increasingly adopting a nuanced and differentiated approach, considering the unique characteristics and risk profiles of individual countries and regions (**figure 1.9**). A focus on emerging Asia beyond China as a top regional priority reflects a growing belief in the region's economic dynamism and potential (**figure 1.10**). Investors are particularly interested in India, with its large domestic market, growing middle class, and increasing global competitiveness attracting significant investor interest. As a Middle Eastern SWF observed: "India is a key focus for us, given its strong growth prospects and the government's focus on reforms and infrastructure development."

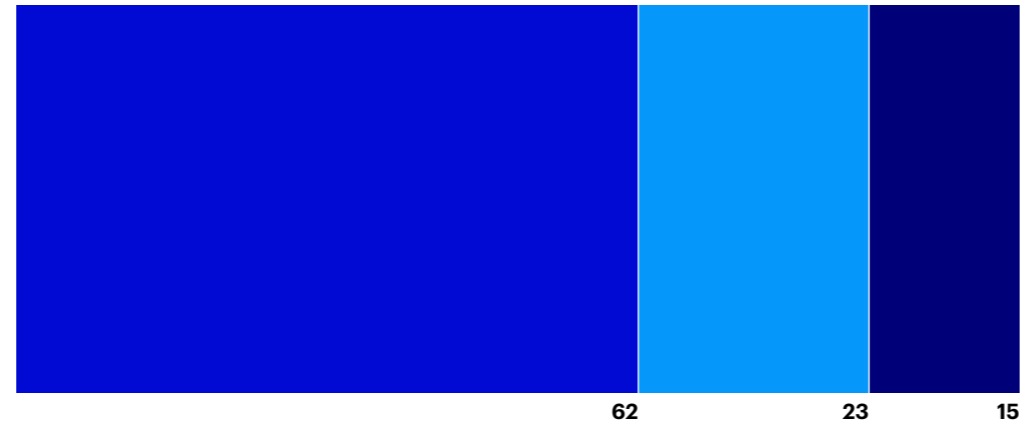
Latin America is also in the spotlight, particularly for Middle Eastern and Asian funds, with Mexico and Brazil seen as well-placed to benefit from US near-shoring. As an Asian SWF noted: "The region has a lot of potential, and we believe it could benefit from the ongoing global supply chain reconfiguration."

SWFs are retooling their approach to China in the near term as it remains a large and important market, navigating relatively moderate economic growth, regulatory shifts, and geopolitical tensions. As a European SWF observed: "We're being selective in our approach to China. We're focusing on sectors that align with the government's long-term priorities, such as technology and healthcare."

Figure 1.9
Evolution in approach to emerging markets (% citations, SWFs only)

■ Agree
■ Neutral
■ Disagree

Our approach to emerging markets is evolving to become more differentiated



To what extent do you agree with the following statement: Our approach to emerging markets is evolving to become more differentiated? Sample size: 53.

Figure 1.10
Priority emerging market regions (% citations, SWFs only)

■ >80% ■ >20%
■ >60% ■ >0%
■ >40%

	Region based				
	Total	Asia	Emerging markets	Middle East	West
Asia (ex-China)	83%	100%	58%	100%	83%
China	43%	75%	25%	43%	42%
Latin America	53%	75%	42%	71%	46%
Central & Eastern Europe	48%	88%	17%	57%	48%
Africa	43%	13%	77%	57%	32%
Middle East	51%	50%	50%	100%	36%

What are your top EM investment priorities? Sample size: 53.

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India the most attractive destination for emerging market debt

Emerging market debt is now an attractive asset class for SWFs seeking to diversify their portfolios and capture higher yields. Over half of the surveyed SWFs invest in emerging market debt, with a significant majority (71%) allocating to both local currency and hard currency bonds (figures 1.11 and 1.12), often through ETFs.

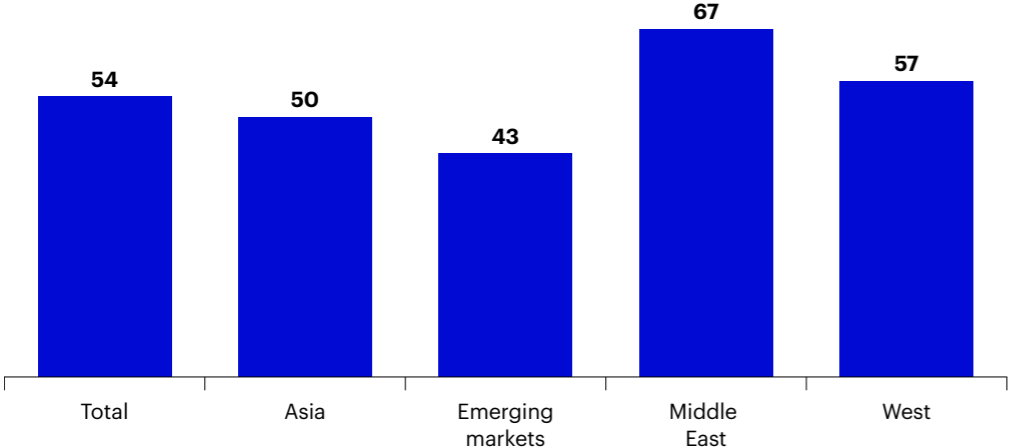
SWFs have traditionally favoured hard currency bonds, particularly those denominated in US dollars. As one Western SWF noted, “Hard currency debt markets are more liquid and accessible, which provides us flexibility in our portfolio management.” Hard currency debt also offers protection against currency volatility, which can be a risk factor that some funds are not willing to contend with.

EM debt is seen as offering attractive spreads over developed market bonds, providing a potential boost to portfolio income. Meanwhile, the improving economic fundamentals and policy reforms in many important emerging markets have enhanced their creditworthiness, reducing the perceived risks associated with investing in these markets.

However, local currency debt is gaining traction among some SWFs, as it is seen as providing greater exposure to the underlying economic dynamics of emerging markets and consequently the potential for currency appreciation. Local currency bonds were also viewed as offering the opportunity to capture higher yields, with the development of new ETFs making them more accessible to foreign investors while also allowing for the selective exposure to targeted countries or regions that funds. As a Middle Eastern SWF explained, “You can buy the market through ETFs. They are very liquid, and you gain broad exposure, reducing the risk.”

Among the emerging markets, India was identified as the most attractive destination for SWFs investing in emerging market debt, with 88% of respondents expressing interest in increasing their exposure to Indian debt (figure 1.13, page 16). This represents a substantial increase from the 66% recorded in 2022, reflecting the growing confidence in the country’s economic prospects and the government’s reform agenda.

Figure 1.11 Allocations to emerging market debt (% citations, SWFs only)



Do you invest in EM debt? Sample size: 65.

Figure 1.12 Type of emerging market debt invested in (% citations, SWFs that invest in emerging market debt only)

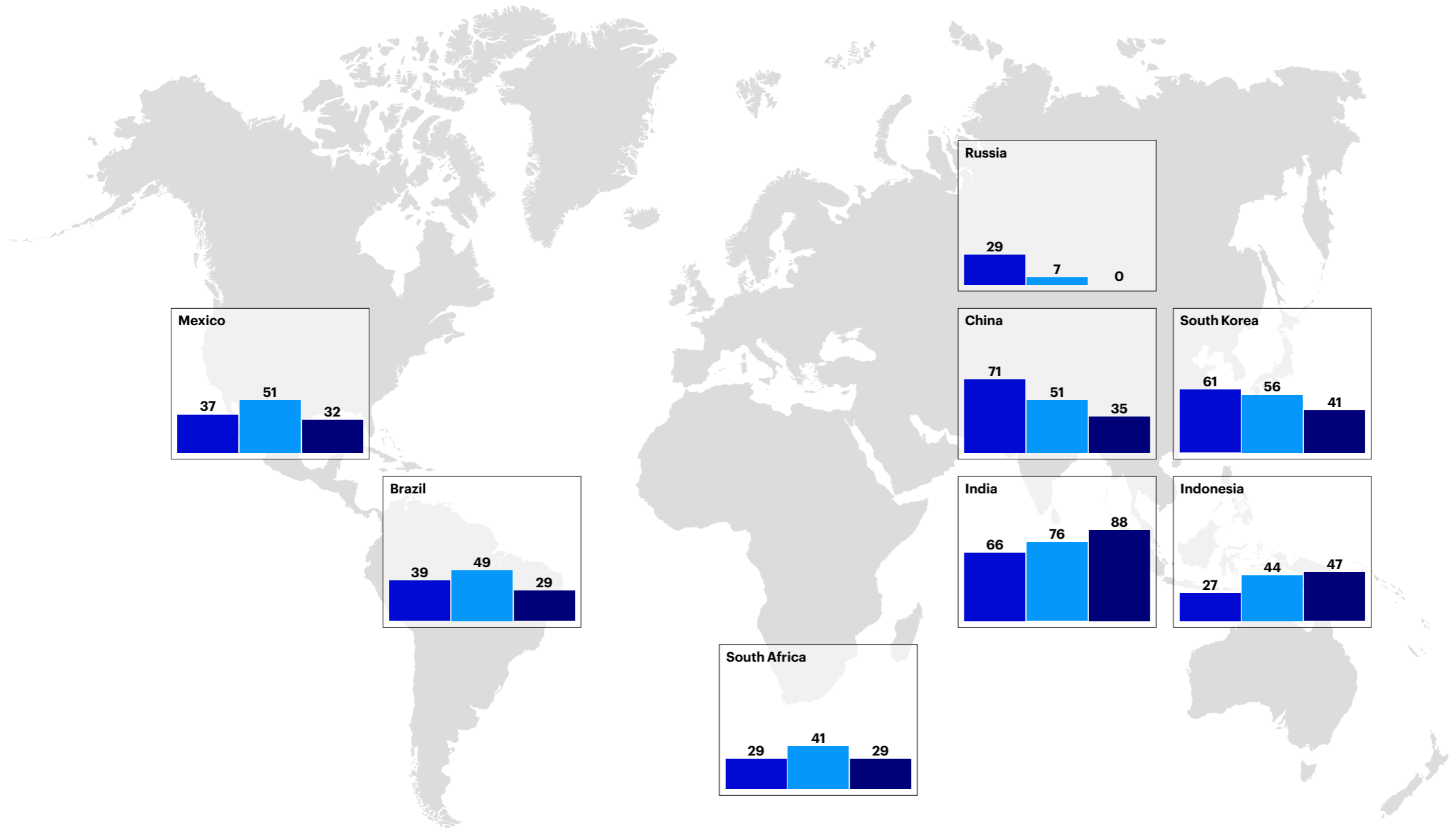


Do you invest in local currency debt or hard currency debt? Sample size: 24.

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Figure 1.13
Attractive markets for increasing emerging market debt exposure (% citations, SWFs only)

■ 2022
 ■ 2023
 ■ 2024



Which of the following markets do you see as attractive for increasing your emerging market debt exposure? Sample size: 34.

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Conclusion

The 2024 study paints a picture of sovereign investors adapting to a complex and evolving global landscape. Inflation, geopolitical tensions, and the climate transition are key forces shaping investment strategies, and these themes are expected to remain dominant in the years ahead. The higher interest rate environment has had a significant impact, prompting investors to reassess their asset allocation and explore new opportunities.

As investors navigate this challenging environment, emerging markets are poised to play an increasingly vital role in the pursuit of growth and diversification. However, the study underscores that sovereign investors are increasingly adopting a nuanced approach to investing in these markets, considering their unique risks and opportunities and reflective of each country's positioning in an increasingly complex and interconnected geopolitical landscape.

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The rise of private credit: a compelling opportunity

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Private credit is gaining popularity among SWFs, with 56% investing via funds and 30% directly. Two-thirds plan to increase allocations, reallocating from fixed income, equities, and private equity



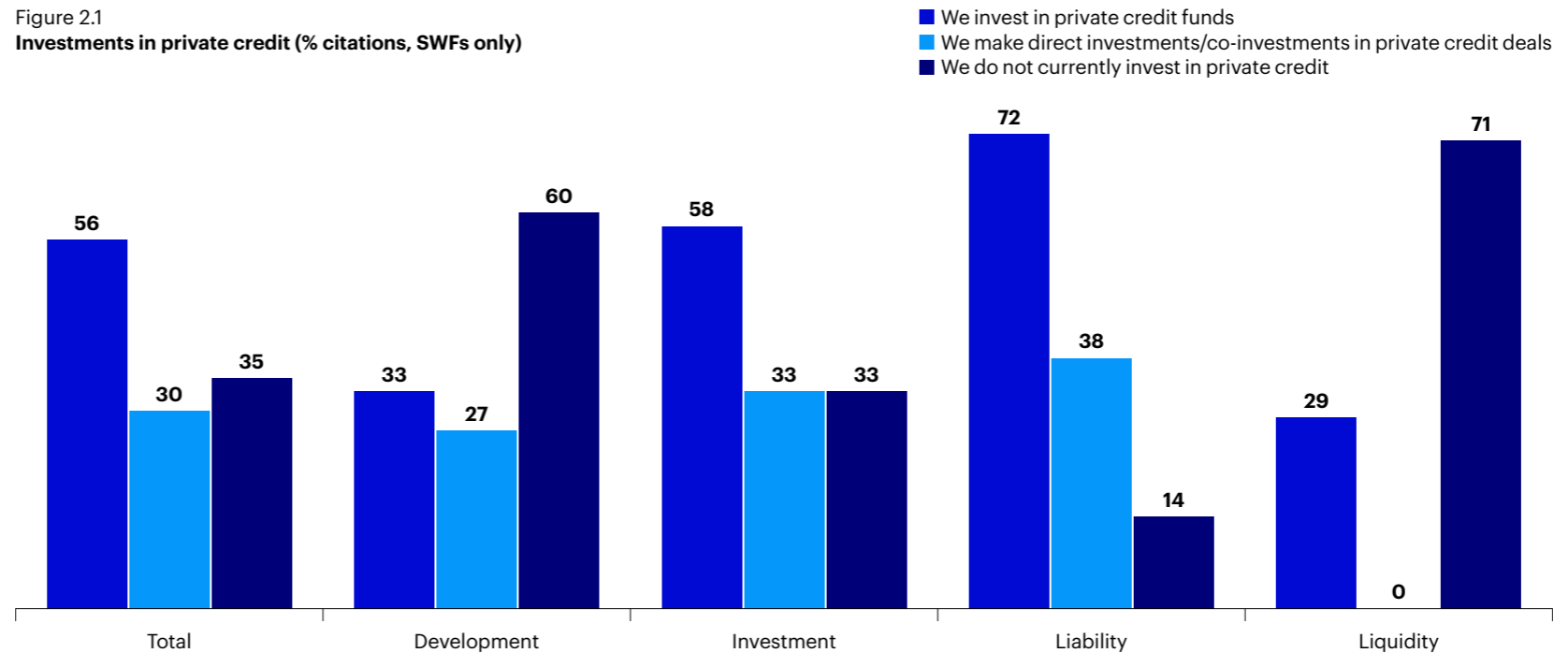
SWFs favour infrastructure, real estate, and corporate lending in developed markets, while also exploring emerging markets. Mezzanine debt and preferred equity are increasingly attractive in real estate



Amid growing competition, SWFs are balancing defensive and opportunistic strategies, utilising both external managers and specialised internal teams to maximise value and manage risk

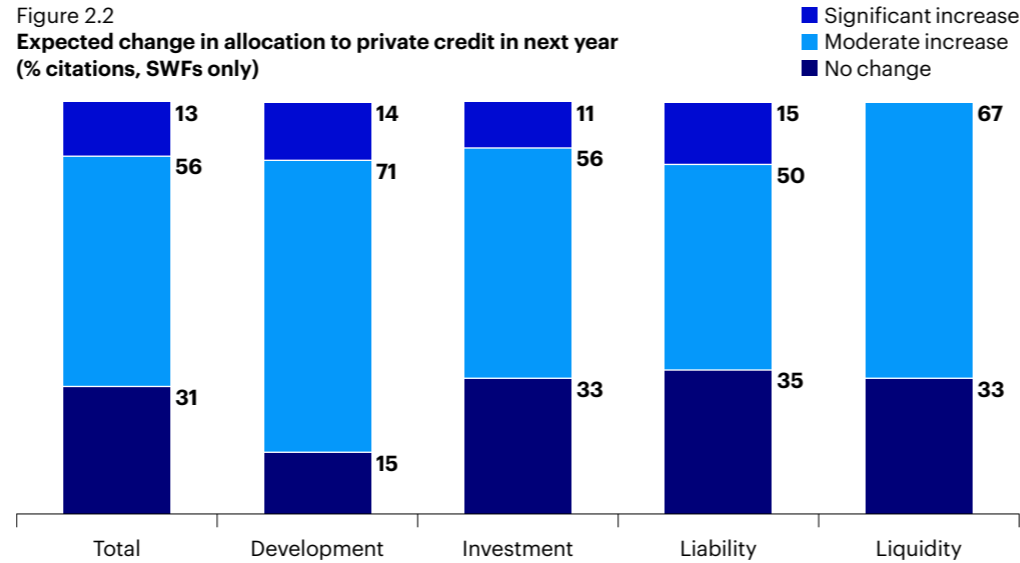
Over the past decade, there has been a significant shift in the lending landscape, as traditional banks have gradually withdrawn from certain segments of the credit market. This retreat has been primarily driven by stricter regulations and increased capital requirements imposed in the wake of the global financial crisis. As banks have pulled back, they have left a void in the market, creating new opportunities for alternative lenders to step in and fill the gap.

SWFs have been quick to recognise the potential of this new lending environment and private credit is now a widely adopted strategy among SWFs, with 56% of respondents participating through fund investments and 30% engaging directly or via co-investments (figure 2.1). As traditional lending channels remain constrained, the role of private credit in SWF investment strategies looks set to grow, with two-thirds of SWFs planning to increase their allocations to private credit in the coming year (figure 2.2, page 20).

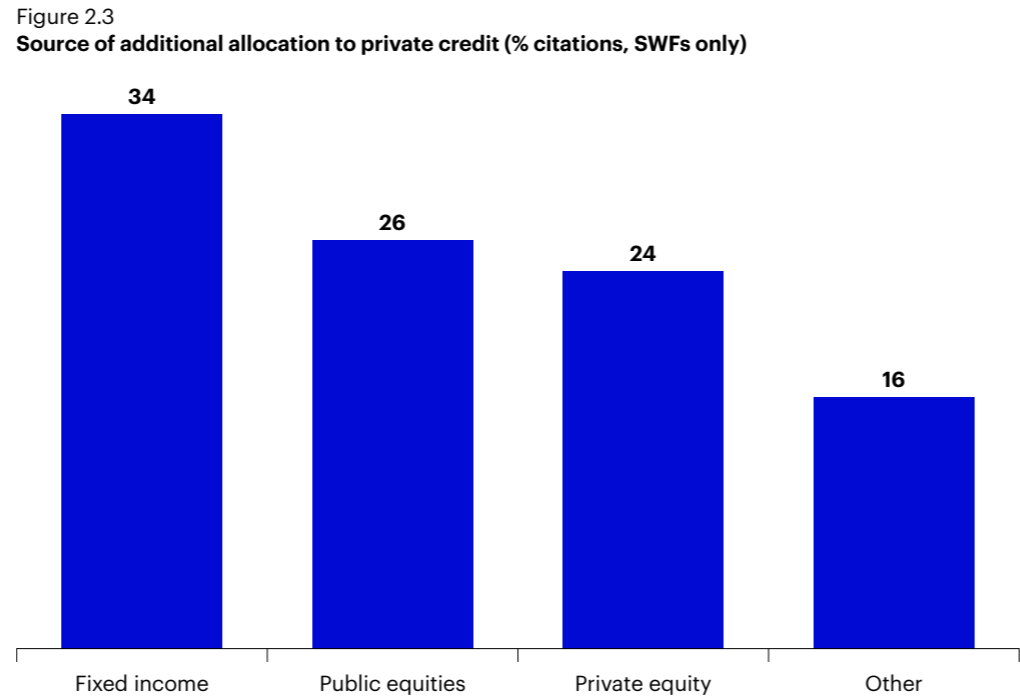


How are you utilising private credit in your portfolio? Sample size: 63.

Interestingly, the sources of these additional allocations vary, with SWFs primarily reallocating capital from fixed income (34%), public equities (26%), and private equity (24%) (**figure 2.3**). As one SWF from Asia noted, “We currently have a very low allocation, but private debt is one of our main priorities. We need to develop our in-house capacity, because if you are starting a new asset class, it is important to have people who specialise in that field.”



How do you expect your allocation to private credit to change over the next year? Sample size: 45.



Where does an increased allocation to private credit typically come from? Sample size: 38.

We need to develop our in-house capacity, because if you are starting a new asset class, it is important to have people who specialise in that field.

SWF
Asia

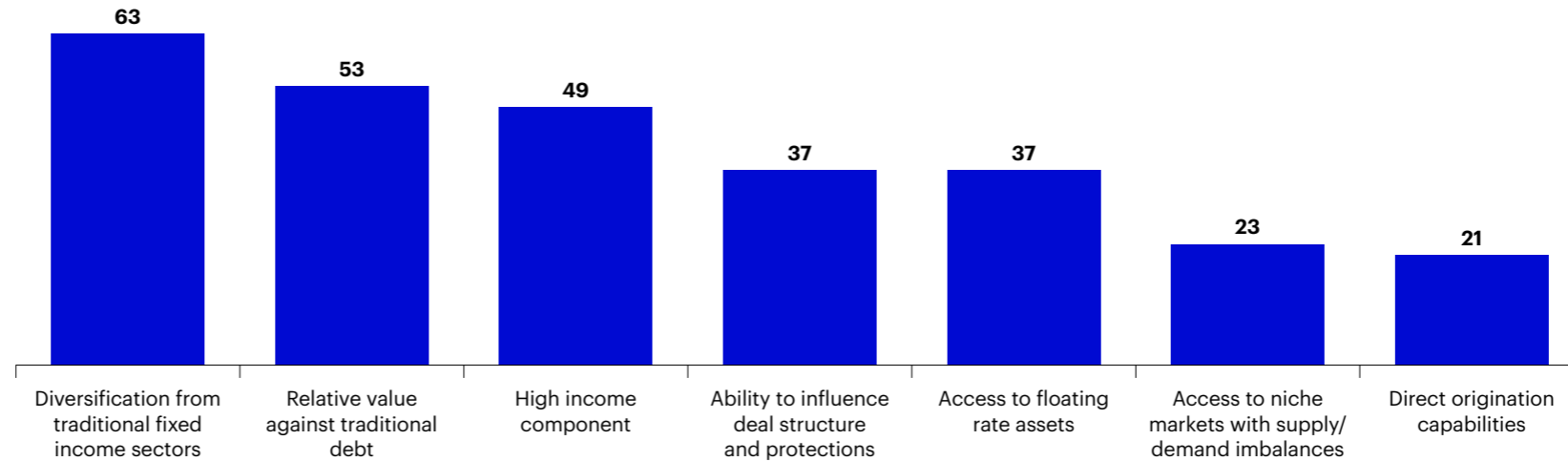
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Diversification and relative value drive appeal

The growing interest in private credit can be attributed to several key factors. Chief among these is the asset class's potential for diversification from traditional fixed income sectors (63%) and its relative value compared to conventional debt (53%) (**figure 2.4**). The high income component of private credit investments (49%) and the ability to influence deal structures and protections (37%) are also seen as significant drawcards.

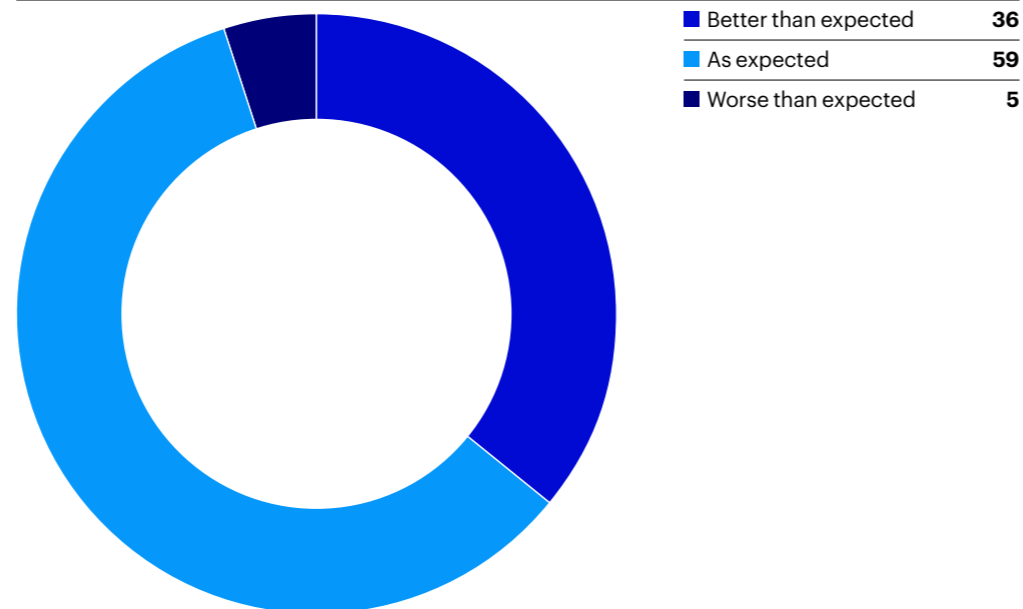
The strong performance of private credit investments has further fuelled interest in the asset class. More than a third of SWFs that have invested in private credit report that returns have exceeded their expectations (**figure 2.5**). As one SWF from the Middle East explained, "Structurally, when bank regulation keeps increasing, there is a good market fit for private credit operators and we are participating in that."

Figure 2.4
Key benefits driving the appeal of private credit (% citations, SWFs only)



What is the appeal of private credit for your fund? Sample size: 43.

Figure 2.5
Returns from private credit since started investing (% citations, SWFs only)



What is the appeal of private credit for your fund? Sample size: 43.

Navigating the competitive landscape

While the appeal of private credit is clear, SWFs also recognise the challenges that come with investing in this increasingly competitive market. Finding high-quality opportunities (78%), aligning interests with partners (47%), and valuation and pricing (44%) are among the most frequently cited concerns (figure 2.6).

To navigate this competitive landscape and maximise value creation, many SWFs are building out internal private credit teams with specialised expertise and capabilities. They are also focusing on identifying top-performing funds and positioning themselves strategically to gain access to attractive co-investment opportunities.

As one SWF from the West noted, “We’ve strategically targeted private credit, notably through tactical credit opportunities, involving direct lending mainly in senior tranches. This approach aligns with a low-risk, lower-return framework, yet it’s proven to deliver remarkable historical performance. Our success reflects the tactical credit team’s rigorous risk evaluation and disciplined investment philosophy.”

SWFs are also leveraging their unique strengths to gain a competitive edge in the private credit market. For example, their long-term investment horizons allow them to be patient and selective in their deal sourcing, focusing on opportunities that align with their strategic objectives and risk

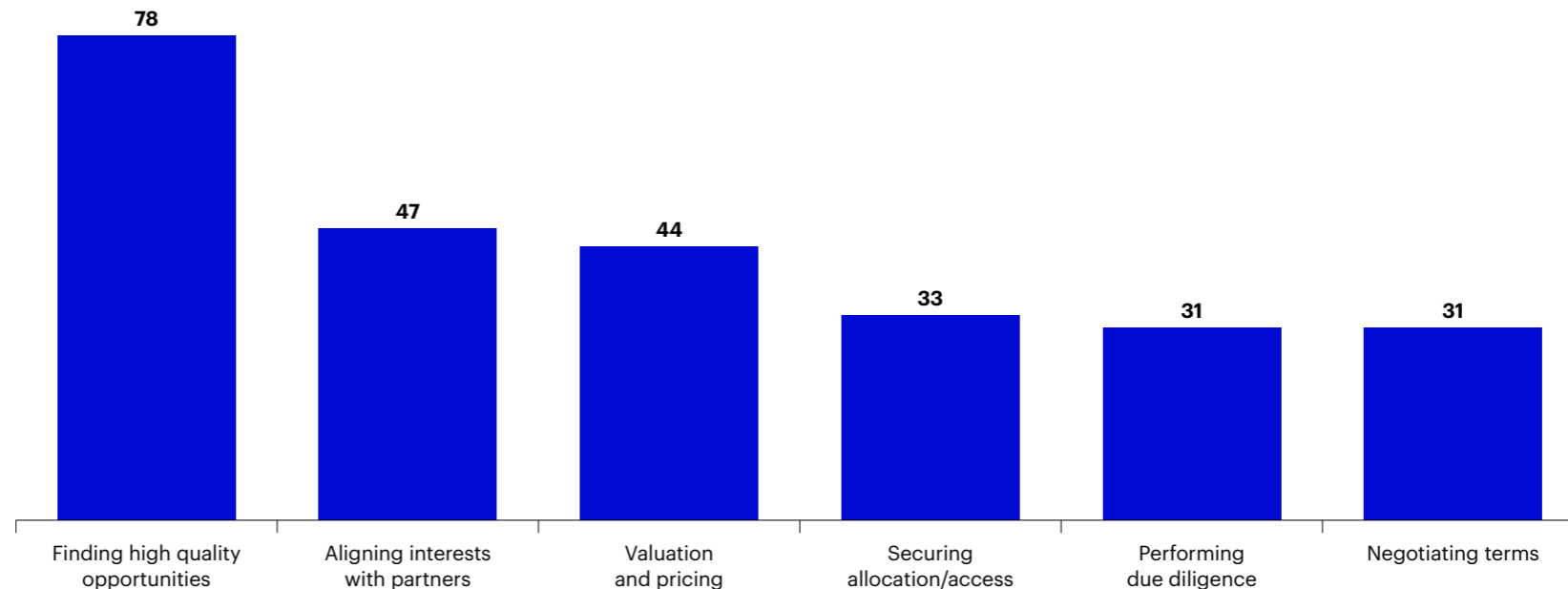
tolerance. Additionally, many SWFs are forming strategic partnerships with leading private credit managers, using their scale and influence to secure favourable terms and access to exclusive deal flow.

One SWF from the Middle East highlighted the importance of these partnerships, stating, “We work closely with a select group of top-tier private credit managers who have a proven track record of delivering strong returns. By aligning our interests and leveraging our combined expertise, we are able to identify and execute on the most compelling opportunities in the market.”

We work closely with a select group of top-tier private credit managers who have a proven track record of delivering strong returns.

SWF
Middle East

Figure 2.6
Challenges with direct/co-investments in private credit (% citations, SWFs only)



What are the main challenges you see with private credit direct investments/co-investments? Sample size: 36.

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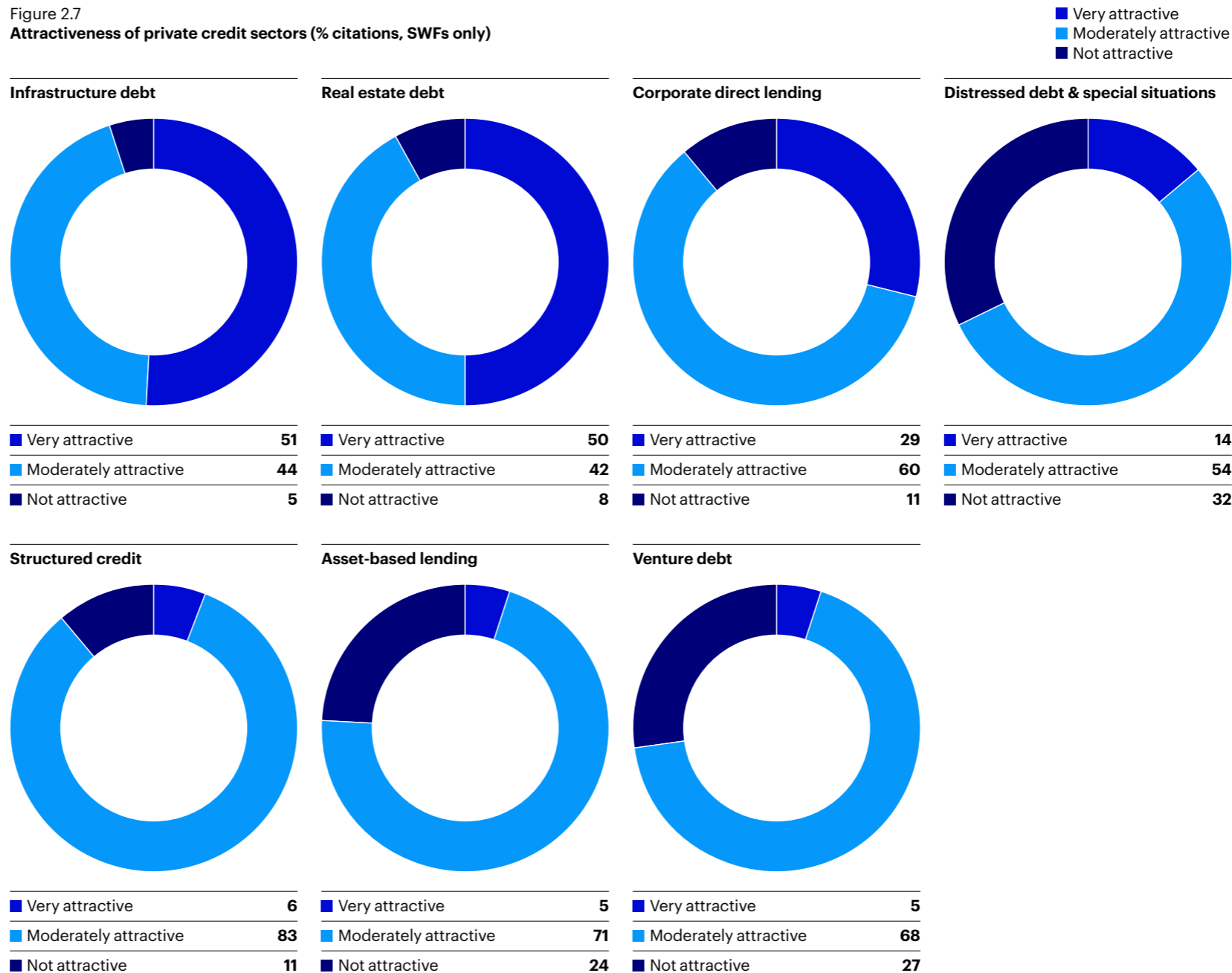
Developed markets lead private credit focus, but emerging markets gain recognition

When it comes to specific sectors within private credit, SWFs are most focused on infrastructure debt (51%), real estate debt (50%), and corporate direct lending (29%) (**figure 2.7**). The attractiveness of these sectors reflects their potential for stable, long-term cash flows and the opportunity to capitalise on the growing demand for infrastructure and real estate financing globally.

Infrastructure debt aligns well with SWFs' long-term investment horizons and also sometimes their mandate to support economic development in their home countries and regions. By financing critical infrastructure projects, such as transportation networks, energy systems, and telecommunications infrastructure, SWFs can generate attractive risk-adjusted returns while also contributing to the long-term growth and resilience of local economies. Compared to infrastructure equity investments, infrastructure debt was seen as preferable by some SWFs due to its lower risk profile and more predictable cash flows, as well as less need for direct involvement in the management and operation of assets.

Real estate debt is another area of focus for SWFs, driven by the potential for stable income streams and the opportunity to finance the development of high-quality, income-generating properties. The sector's attractiveness is further enhanced by the current market environment, where dislocations and funding gaps have created compelling investment opportunities for well-capitalised investors.

Figure 2.7
Attractiveness of private credit sectors (% citations, SWFs only)

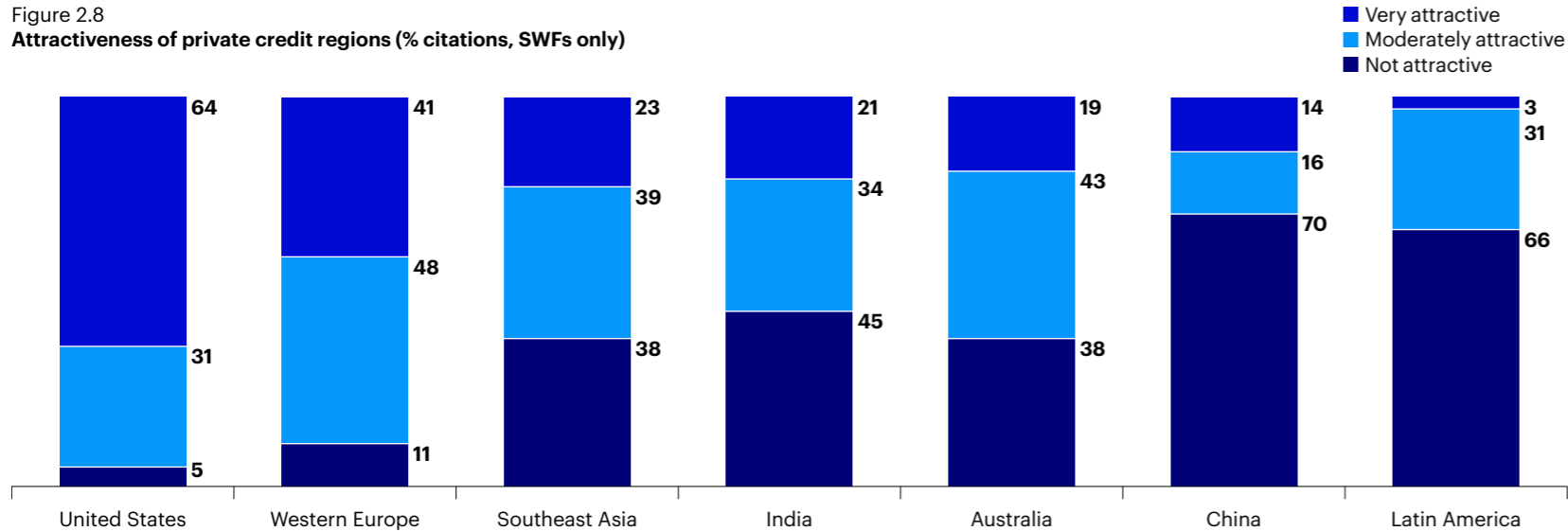


How attractive are the following private credit sectors? Sample size: 37.

Very attractive
Moderately attractive
Not attractive

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Figure 2.8
Attractiveness of private credit regions (% citations, SWFs only)



How attractive are the following private credit regions? Sample size: 39.

Corporate direct lending, meanwhile, offers SWFs the ability to fill the financing gap left by traditional banks, which have pulled back from this market in the wake of increased regulation and capital requirements. By providing customised financing solutions to middle-market companies, SWFs can generate attractive yields while also supporting the growth and expansion of businesses in their target markets.

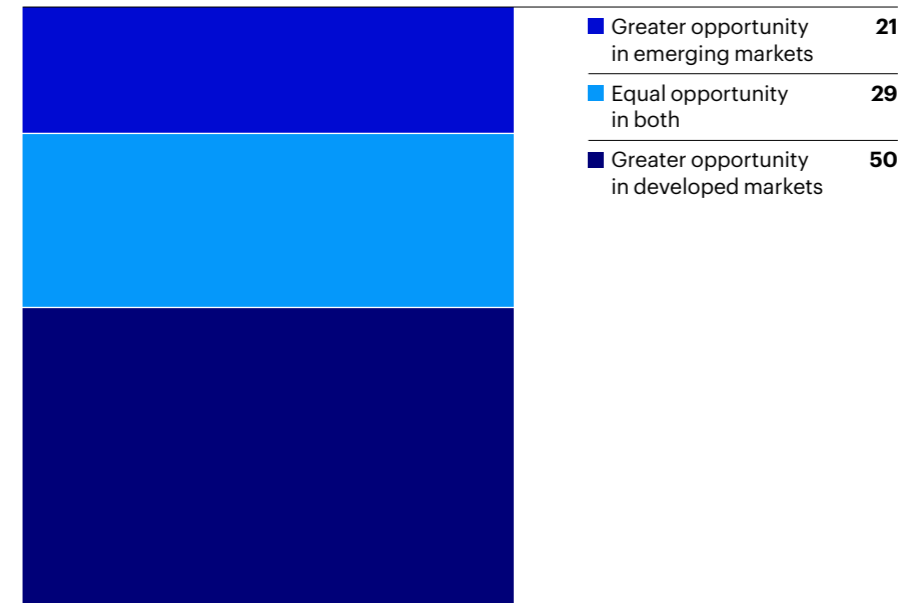
Geographically, SWFs are primarily focused on developed markets, with the United States (64%) and Western Europe (41%) seen as the most attractive regions for private credit investments (figure 2.8). The depth and maturity of these markets, coupled with their robust legal and regulatory frameworks, provide a stable and attractive environment for private credit investing.

However, there is also growing recognition of the opportunity in emerging markets, given the underdeveloped state of public markets and the vast need for funding to support ambitious infrastructure goals (figure 2.9). In many emerging economies, private credit is seen as playing a critical role in filling the financing gap and supporting economic growth and development.

As one SWF from the West noted, “India is interesting and we are seeing more opportunities from India that meet our return requirements.” The Indian market, in particular, has attracted significant interest from SWFs, driven by its large and growing economy, favourable demographic trends, and the government’s focus on infrastructure development and financial sector reform.

However, investing in emerging markets also comes with its own set of risks and challenges. As one SWF cautioned, the combination of emerging markets and private credit could be “very shaky,” given the lack of oversight and the potential for political and economic instability in these markets. To mitigate these risks, SWFs are taking a highly selective and disciplined approach to emerging market private credit, focusing on opportunities with strong downside protection and partnering with experienced local managers who have a deep understanding of the market and regulatory landscape.

Figure 2.9
Opportunity in developed vs emerging markets (% citations, SWFs only)



How do you view the risk-adjusted opportunity for private credit in emerging markets compared to developed markets? Sample size: 38.

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SWFs eye mezzanine debt for enhanced yield in real estate lending

Within the real estate sector, SWFs are increasingly focused on maximising opportunities where attractive bargains and value propositions currently exist, given ongoing bank activity at lower loan-to-value levels. The study reveals that SWFs anticipate more use of mezzanine debt over the next three years, valuing the additional yield on offer (**figure 2.10**).

Mezzanine debt is becoming increasingly popular among SWFs due to its ability to provide exposure to real estate while also offering downside protection and the potential for higher returns compared to senior debt. This instrument typically sits between senior debt and equity in the capital structure, providing a layer of credit enhancement while also offering highly attractive yields.

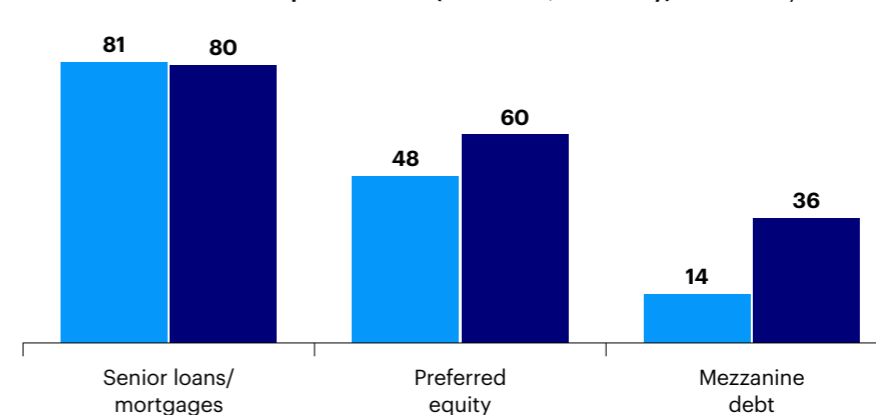
As one SWF from the Middle East explained, “We did several mezzanine type of deals last year and I am currently working on one as well. You get equity-like return without taking equity risk. If you get 14-15% return and you still have some equity buffer protecting your capital, it is an attractive position. You are not taking part in any value appreciation, so your upside is capped but you still have a pretty attractive return.”

The use of mezzanine debt is also seen as allowing SWFs to optimise their risk-adjusted returns in the current market environment. With property valuations currently volatile, these instruments provide a way to generate attractive yields without taking on the full risk of equity ownership. Additionally, the structured nature of these investments allows SWFs to negotiate favourable terms and protections, such as minimum return thresholds and control rights, which can help to mitigate downside risk.

SWFs also emphasised the importance of duration in real estate private credit investments, with a consensus that a certain minimum duration was generally required to make a deal viable (**figure 2.11**). The option to extend the term of a well-performing loan was seen as an advantageous feature, providing flexibility and the potential for additional yield.

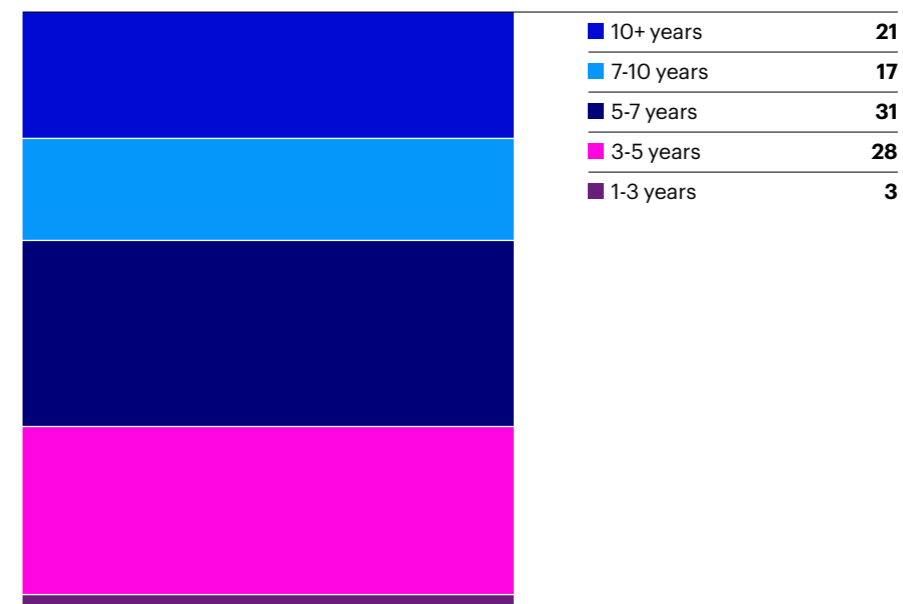
As another SWF from the Middle East noted, “If we are mezzanine, we want to have minimum return, e.g. 2 years’ interest rate to make it worthwhile and we don’t want to get into a situation and then get paid back too quickly. It is a minimum 2 years return and if it is longer, that is positive as long as the underlying asset is performing.”

Figure 2.10
Investments in real estate private credit (%citations, SWFs only)



What types of real estate debt do you invest in currently? Where do you think you will invest in three years' time?
Sample size: 25.

Figure 2.11
Preferred duration for real estate private credit (% citations, SWFs only)



What duration do you prefer for commercial real estate private credit investments?
Sample size: 29.

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Balancing defensive and opportunistic investments

As the private credit market continues to evolve, SWFs are also increasingly focused on balancing defensive and opportunistic investments. While some funds are taking a more cautious approach in light of the current market environment, others are remaining open to new opportunities in riskier segments, recognising that this may be necessary to remain competitive as market competition intensifies.

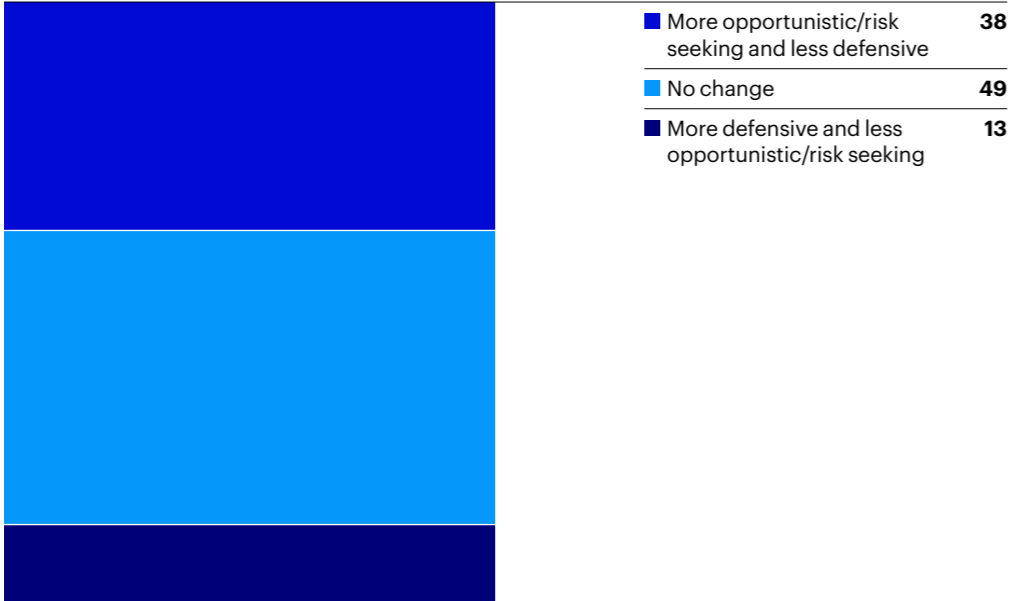
The study found that 38% of respondents plan to make more opportunistic/risk-seeking allocations to private credit over the next year, while 13% expect to take a more defensive approach (figure 2.12). This divergence in strategies reflects the varying risk appetites and investment objectives of different SWFs, as well as their differing views on the relative value and potential of different segments of the private credit market.

For some SWFs, the current market environment is seen as an opportune time to take on additional risk in pursuit of higher returns. These funds are often focusing on opportunities in distressed debt, special situations, and other high-yield segments of the market, where they believe the potential rewards outweigh the risks.

As one SWF from the West noted, “We have built a very good team and are seeing a growing market where we can use our skillset to grow our portfolio within the harder opportunities.” This SWF has developed specialised expertise in these more complex and challenging segments of the market, allowing them to identify and execute on attractive opportunities that may be overlooked by other investors.

Other SWFs, however, are taking a more cautious approach, focusing on defensive investments in senior secured debt and other lower-risk segments of the market. These funds are prioritising capital preservation and stable income generation, recognising that the current market environment may not be conducive to aggressive risk-taking. Ultimately, the decision to pursue a more defensive or opportunistic approach to private credit depends on a range of factors, including an SWF’s overall investment strategy, risk tolerance, and market outlook.

Figure 2.12
Planned change in private credit allocations over next year (% citations, SWFs only)



How do you expect your allocation to private credit to change in terms of defensive versus opportunistic investments over the coming year? Sample size: 40.

We have built a very good team and are seeing a growing market where we can use our skillset to grow our portfolio within the harder opportunities.

SWF
The West

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The role of external managers and internal teams

As SWFs seek to capitalise on the opportunities in private credit, they are also grappling with the question of how best to approach these investments. The study found that the use of external managers versus internal teams varies depending on the size of the fund, with larger SWFs (those with assets under management exceeding \$100 billion) more likely to rely on a combination of internal and external resources (**figure 2.13**).

The decision to use external managers or build internal teams for private credit investments involves weighing a range of factors, including cost, control, and access to expertise. External managers can provide SWFs with immediate access to specialised skills and resources, as well as a broad network of industry contacts and exposure to high quality deals. They can also help to mitigate some of the risks associated with direct investing, such as the need to build and maintain a large internal team.

However, using external managers is also seen as coming with drawbacks, including higher fees and a potential loss of control over investment decisions. As SWFs become more experienced and sophisticated in their approach to private credit, many are looking to build their own internal teams to gain more direct control over their private credit investments and to reduce costs.

One SWF from the West explained, “We’ll eventually look at building our own internal team for most private credit.” By developing in-house expertise and capabilities, this SWF aims to have greater control over its private credit investments and to align its investment activities more closely with its overall strategic objectives.

Another SWF, also from the West, noted, “We have increased our number of external managers, but our private credit is primarily through internal means.” This hybrid approach allows the SWF to leverage the expertise and resources of external managers while also maintaining a strong internal team to oversee and manage its private credit investments.

Ultimately, the optimal balance between external managers and internal teams depends on an SWF’s specific circumstances and objectives. Factors such as the size of the fund, the complexity of the investment strategy, and the availability of internal resources and expertise all play a role in determining the most effective approach.

We’ll eventually look at building our own team for most private credit.

SWF
The West



Do you have internal teams managing private credit investments or utilise third-party managers? Sample size: 43.

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Conclusion

Private credit is of growing importance to sovereign wealth funds. Driven by the search for yield, diversification, and the ability to capitalise on market inefficiencies, SWFs are increasingly allocating capital to this growing asset class, with a particular focus on infrastructure, real estate, and corporate direct lending in developed markets.

As the private credit market continues to evolve and become more competitive, SWFs are adapting their strategies to maximise value creation and achieve their investment objectives. This includes building out specialised internal teams, identifying top-performing external managers, and remaining open to new opportunities in riskier segments of the market.

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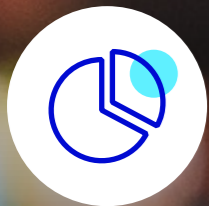
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The AI awakening: sovereign investors embrace the future



33% of sovereign investors are using AI in their investment process, with 6% employing it extensively; nearly all believe AI will become an essential tool



Lack of expertise is the top barrier for SWFs, while central banks are most concerned about AI model explainability; to address this, funds are investing in training and partnering with external experts



SWFs are investing across the AI stack, including data centre infrastructure, AI chip development, regional versions of large language models, and vertical AI platforms; these investments are driven by both financial returns and to help drive AI adoption and innovation

In our 2019 research on technology adoption, we discovered that sovereign investors often saw themselves as lagging other institutional asset owners when it came to implementing technology within their own organisations. Interestingly, this often contrasted with their investment in technology as a theme, with many funds prioritising this sector and recognising its potential for attractive returns.

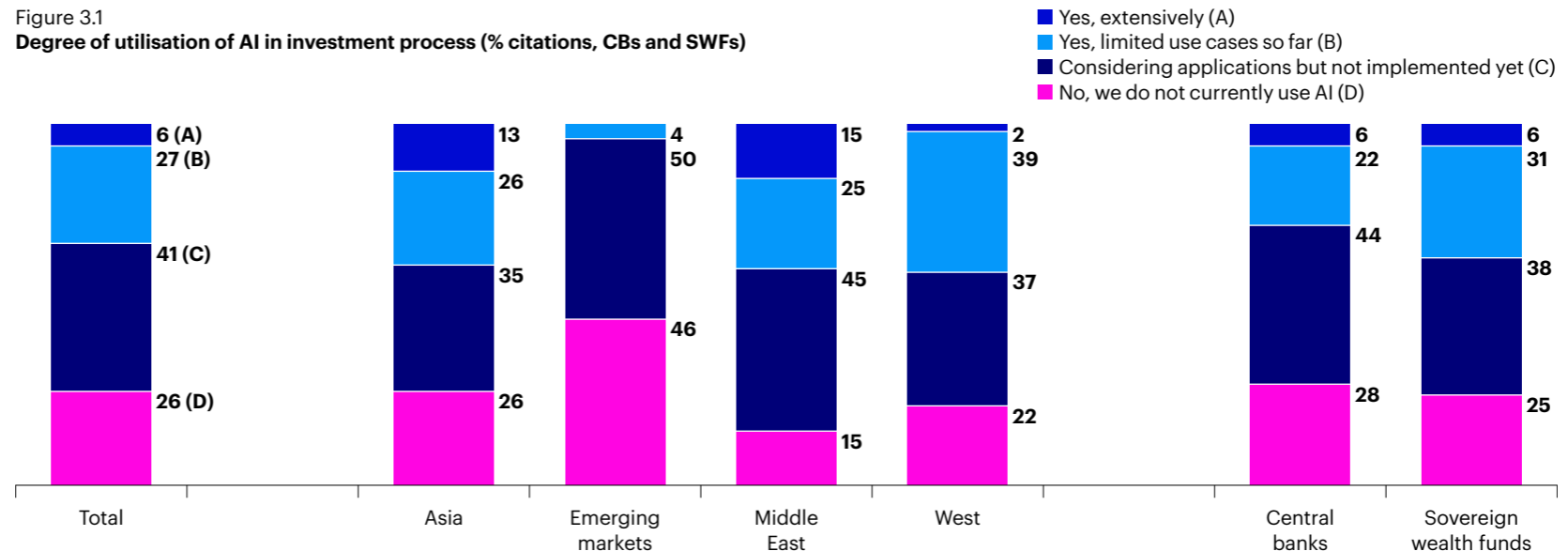
This year's study has unveiled a shift in attitudes, catalysed by the rapid advancements in artificial intelligence (AI), especially the groundbreaking rise of generative AI. These developments have compelled SWFs and central banks to reassess their internal processes and decision-making approaches, with many starting to embrace these transformative technologies while also considering their impact of AI on the wider investment landscape.

Growing adoption and widespread interest

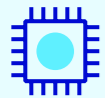
This year's study reveals that a third of SWFs and central banks are already utilising AI in their investment processes, with 6% employing it extensively (figure 3.1). This adoption looks set to accelerate, as the rise of generative AI has prompted two-thirds of organisations to reevaluate their

current strategies and explore new applications for this technology (figure 3.2, page 31). "We are doing a literature review and attending webinars by asset managers. We have also had meetings with consultants to understand where AI could help," said a central bank from the West.

Figure 3.1
Degree of utilisation of AI in investment process (% citations, CBs and SWFs)

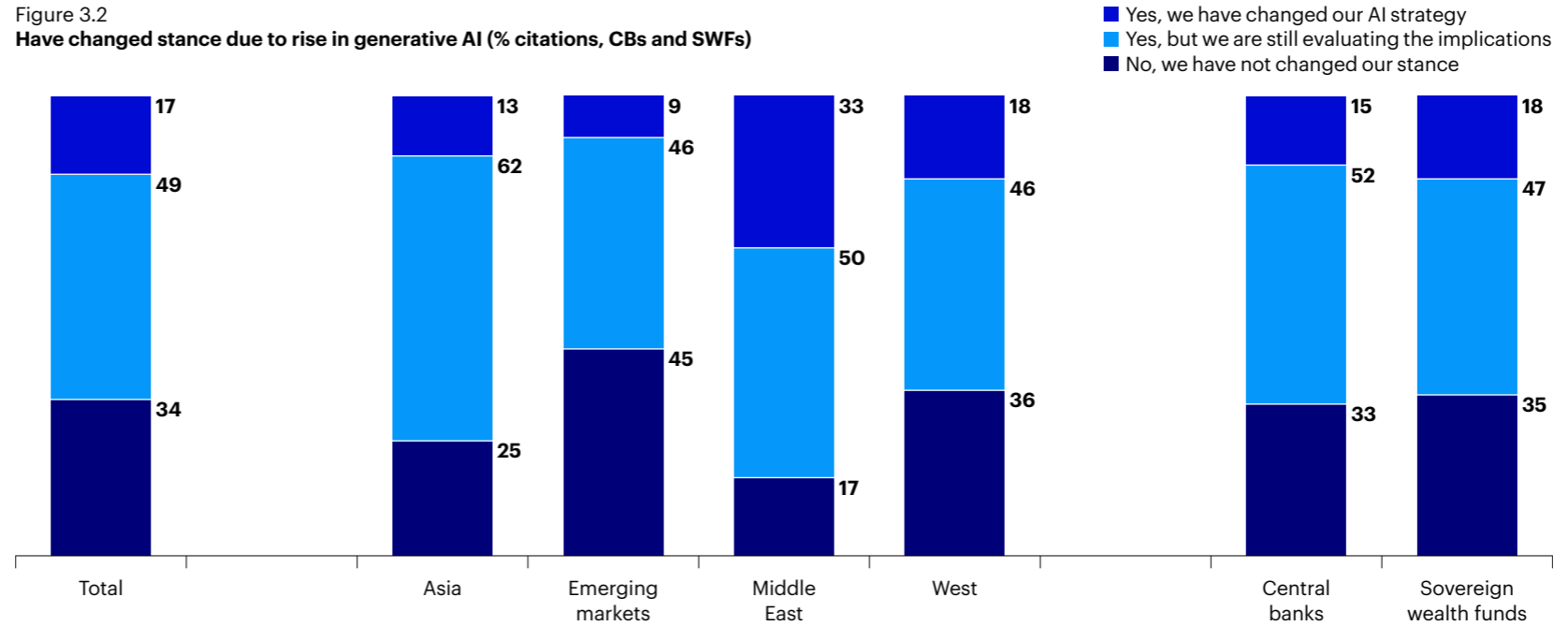


Does your organisation currently utilise AI in your investment process? Sample size: 121.



For the purposes of this research artificial intelligence (AI) was defined as the application of advanced computer systems and algorithms, including machine learning, to automate, optimise and enhance various aspects of the investment process.

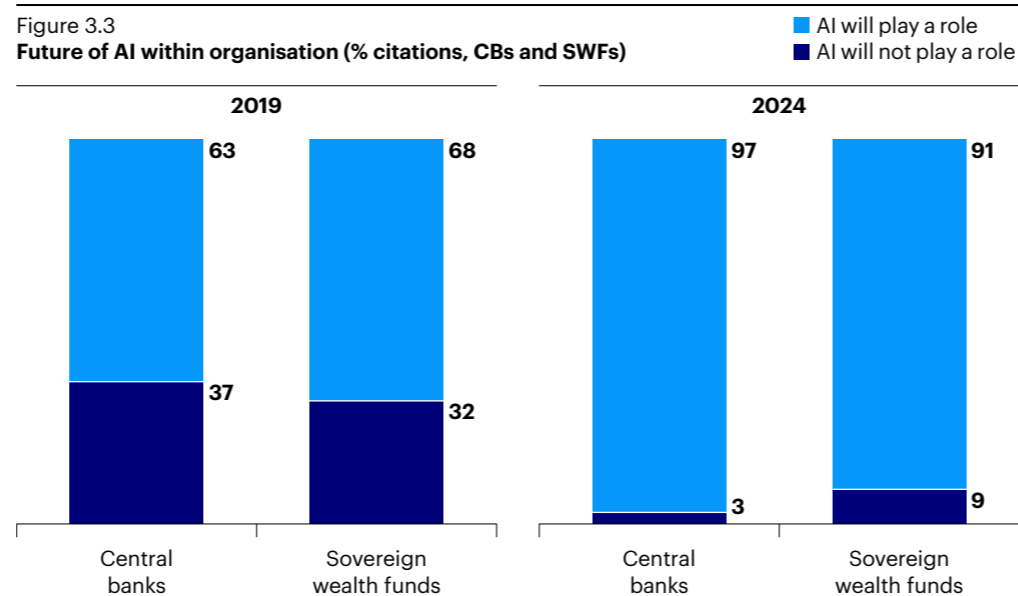
Figure 3.2
Have changed stance due to rise in generative AI (% citations, CBs and SWFs)



Has the rise of generative AI materially changed your organisation's stance towards AI integration and use? Sample size: 100.

Nearly all sovereign investors now believe that AI will eventually become an essential tool in their own investment process (figure 3.3). This marks a change from 2019, when 37% of central banks and 32% of SWFs thought AI had no role to play in their organisations.

Figure 3.3
Future of AI within organisation (% citations, CBs and SWFs)



What do you think the future of AI within your fund is likely to look like? Sample size: 89.

AI has improved our reporting and the way we look at our portfolios, allowing us to gain a better view of our exposures.

Central bank
The West

The AI-powered investor

In many sovereign organisations the launch of generative AI tools such as ChatGPT has sparked a bottom-up approach to AI adoption, with individuals experimenting with the available tools to understand how they can support their daily work. “We all using these tools on the administrative side to make things faster” said one emerging markets based SWF. Others have adopted a more organised and deliberate strategy, with decision-makers carefully planning and overseeing the incorporation of AI technologies into their organisation’s processes. In both cases SWFs and central banks are finding a wide range of applications for AI, with data processing, risk management, and forecasting being the most common use cases (figure 3.4).

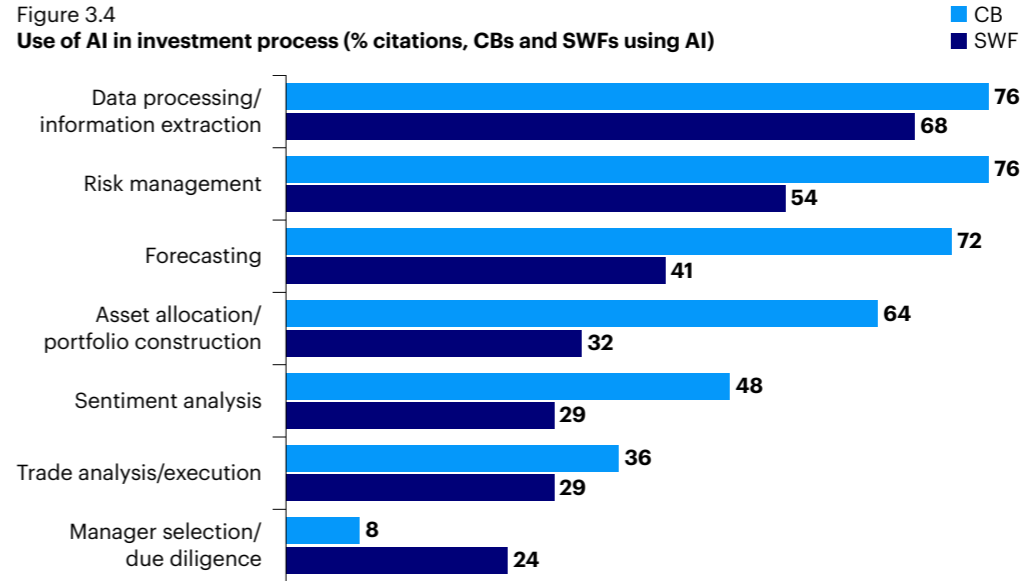
One such example comes from a central bank in the West that is using AI to gain insights into market trends. “We employ AI to aid our portfolio managers’ decisions. Our AI system analyses data from the market and our own research, providing insights on relevant topics and sentiment to support informed investment choices.”

Another SWF from the Middle East is leveraging AI to generate trading ideas and enhance its investment decision-making process. “We have spent time on how to set up our investment framework to get AI to develop trading ideas for us that we can then further evaluate.” This highlights the potential for AI to not only support existing investment processes but also to drive new insights and strategies

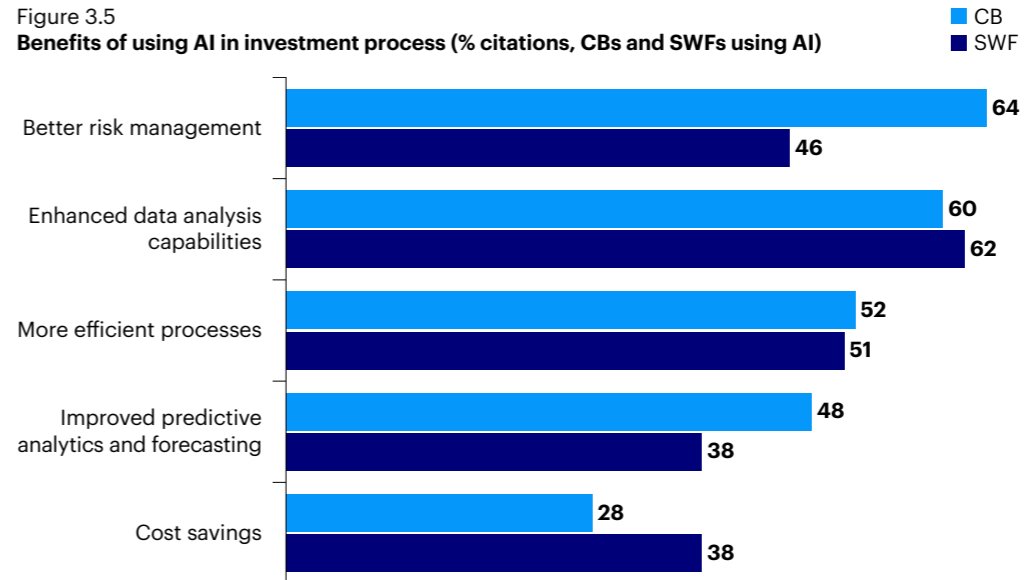
This ability to process large volumes of unstructured data is seen as a key advantage of AI, enabling funds to gain a more comprehensive understanding of investment opportunities and risks. A SWF from the West noted, “We have used AI software in our risk management and for running climate simulations. Our researchers have also tested out being able to aggregate due diligence research.”

Private markets are another area where funds are seeing significant benefits, given the often-scarce data available in this space. A SWF from the Middle East shared their experience: “We possess a wealth of data on early-stage companies that is challenging to analyse. By leveraging AI tools on this dataset, we can gain valuable insights.”

Funds that have already integrated AI are reporting significant benefits, including improved risk management, enhanced data analysis capabilities, and more efficient processes (figure 3.5). A central bank from the West observed, “AI has improved our reporting and the way we look at our portfolios, allowing us to gain a better view of our exposures.” This highlights the potential for AI to not only drive better investment outcomes but also to streamline and enhance various aspects of the investment management process, from risk management to reporting and communications.

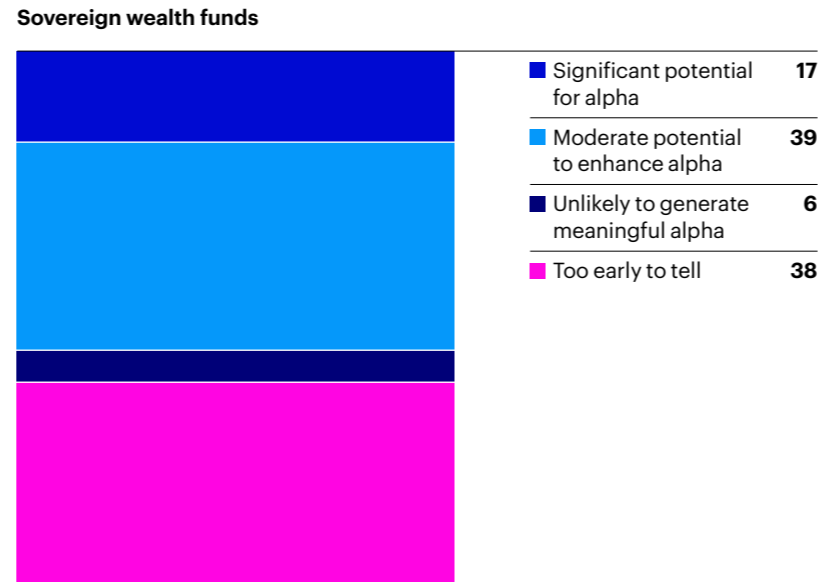
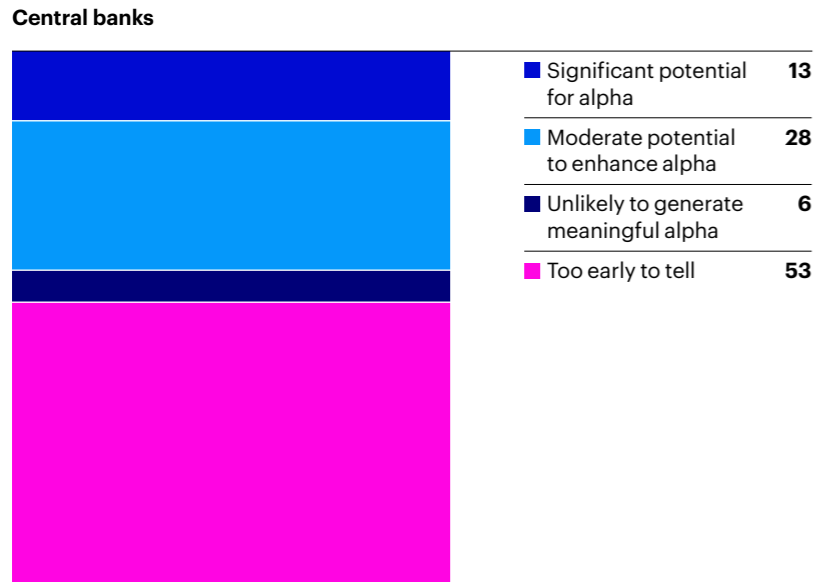


What investment activities do you use AI for? Sample size: 66.



What benefits have you realised from implementing AI? Sample size: 64.

Figure 3.6
Belief that AI can generate alpha (% citations, CBs and SWFs)



Do you think AI can generate alpha and enhance returns? Sample size: 84.

The potential for alpha generation

A majority of SWFs believe that AI can generate alpha and enhance returns, although most central banks think it is too early to tell (**figure 3.6**). Several organisations that have extensively integrated AI into their investment processes reported that they have already seen a positive impact on risk-adjusted returns.

Improved risk management was seen as an important source of alpha, with AI helping funds identify and mitigate a range of risks more effectively, leading to more resilient portfolios. A SWF from the West noted, "It helps us focus on more granular data and allows us to make better decisions."

AI algorithms were also seen as helpful for quickly identifying trends and relationships in large datasets that would be difficult for human analysts to spot, potentially allowing funds to capitalise on emerging opportunities or avoid pitfalls. A SWF from the Middle East observed, "Unquestionably it can generate alpha, especially when we are researching private markets and start-up companies. Aggregating early data and information becomes much easier."

However, the ability of AI to generate sustainable alpha may depend on the pace of adoption and the ability of funds to develop proprietary AI strategies. As a central bank from the West noted, "When more people adopt a certain technology, that ability to generate alpha might fade." As such, funds that have the resources and expertise to stay ahead of the curve and leverage AI in unique and innovative ways may be best positioned to capture this advantage, while those that fail to make any adaptations may be at risk of falling behind.

Unquestionably it can generate alpha, especially when we are researching private markets and start-up companies.

SWF
Middle East

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Challenges and concerns

Despite the growing enthusiasm, SWFs and central banks identified several challenges in adopting AI within their own organisation. For SWFs, a lack of expertise is the most significant barrier, while central banks are primarily concerned with the explainability of AI models (figure 3.7). A central bank from the West noted, “Explainability is an area needing more research but we are actively exploring techniques to improve the interpretability of AI models.”

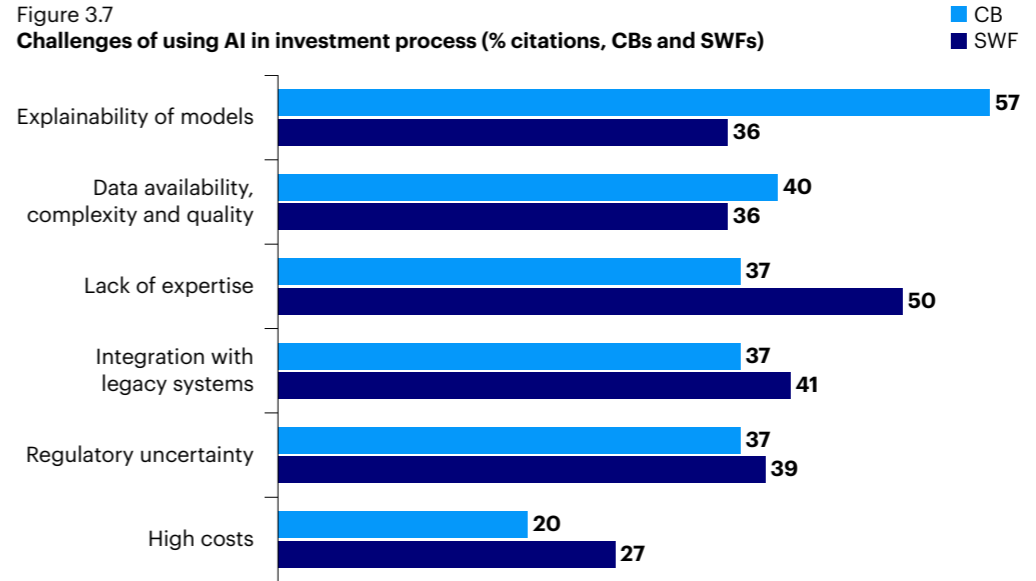
For central banks there is also some scepticism about the extent to which AI can deliver full-scale automation in a way that might replace human decision-making (figure 3.8). A central bank from the West noted, “Central bank policy is not easy to automate. I can’t imagine an asset liability committee in which the senior management talks to an AI.” Another central bank echoed this sentiment, stating, “Central bank jobs will not be replaced by AI – people would not be comfortable with these decisions being taken by computers without accountability.”

With SWFs rating a lack of expertise as their number one challenge, there was recognition that attracting and retaining AI talent is a key barrier for many funds, given the high demand for these skills across various industries. Some funds are addressing this issue by investing in internal training and development programs to upskill existing staff (figure 3.9, page 35). A SWF from the West noted, “We have to find talent that understands the AI opportunity and can help us develop our use of that technology internally.”

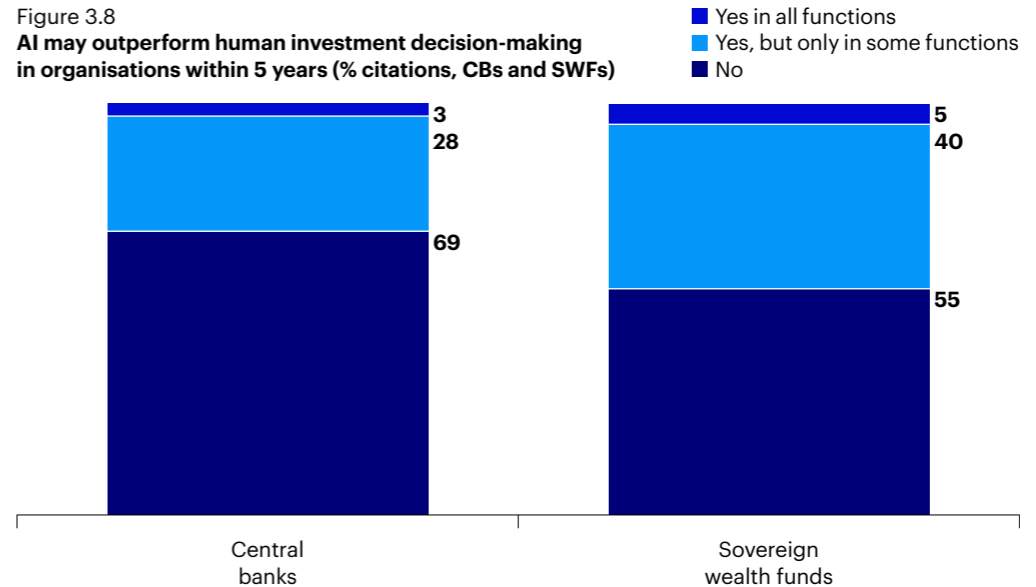
Others are partnering with external vendors and consultants to access specialised AI expertise and capabilities. A SWF from an emerging market observed, “We are partnering with an external consultant to run scenario analysis on our portfolio. We think there is a better optimisation strategy that we are keen to explore with AI.”

Data quality and availability are also significant concerns, especially given the rapid evolution of the market environment. A central bank from the West noted, “Currently, we are unclear about the data sources and data quality.” Another central bank highlighted the challenges of integrating AI with existing systems, stating, “Our IT team is extremely uncomfortable with moving data off-site. Using AI-tools often involves using somebody else’s servers and moving our data to the cloud. Our IT has so far been extremely averse to that.”

Addressing these data and infrastructure challenges will be critical for funds looking to fully harness the power of AI. This may require significant investments in data management and governance, as well as the development of secure and scalable cloud-based platforms to support AI applications.

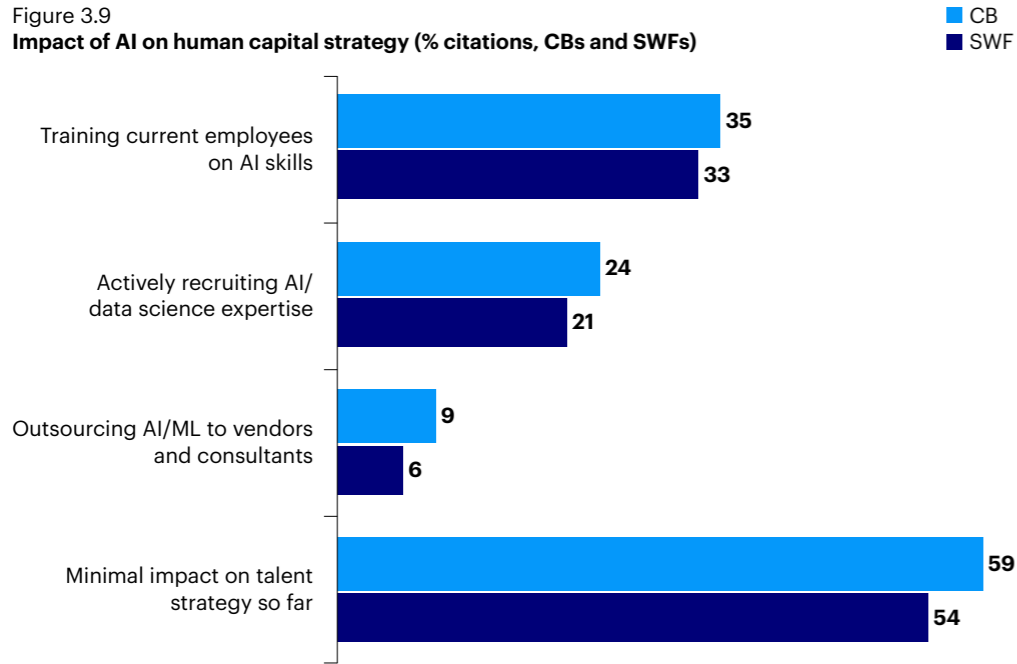


What challenges have you faced in adopting AI? Sample size: 74.

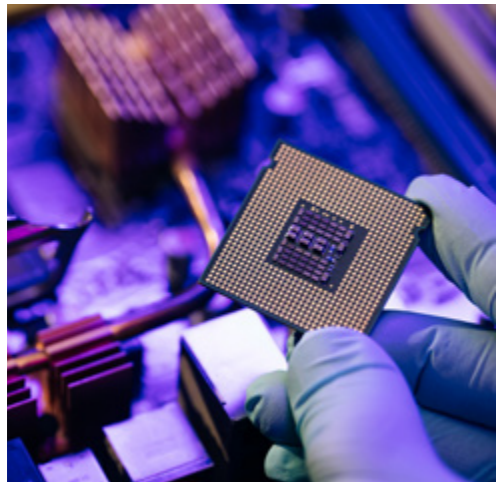


Do you think AI will surpass human investment decisions in your fund in the next 5 years? Sample size: 85.

Figure 3.9
Impact of AI on human capital strategy (% citations, CBs and SWFs)



How is AI impacting your human capital and talent strategy? Sample size: 82.



Investing in the AI ecosystem

SWFs are not only utilising AI in their investment processes but also see AI as an attractive investment opportunity, and invest across the AI stack to position themselves at the forefront of this technological revolution. “We told you five years ago that there was no great technology that would bring enormous change. We were wrong. This is one of them and we want to have exposure to that,” said a SWF from the West.

These investment themes include:

- Data Centre Infrastructure**
 Investing in data centres that provide space, cooling, and power to host servers for AI and other compute-intensive applications
- AI Chip Development**
 Partnering with and investing in emerging companies developing AI chips that can compete with established players, supporting their growth and production scaling
- Regional versions of large language models (LLMs)**
 Customising and adapting existing LLMs for specific regions and languages
- Vertical AI Platforms**
 Creating AI platforms and solutions tailored to specific industries and domains, such as healthcare, geospatial intelligence, and consumer applications

These strategic investments often serve multiple purposes for SWFs. Not only do they provide the funds with a more comprehensive understanding of the AI landscape, but they also enable them to build strategic partnerships with key players in the AI ecosystem. These partnerships can be leveraged both within the SWFs’ own internal organisations and, for funds with a development agenda, to help drive innovation and transformation within their local economies. By investing across the AI stack, SWFs are positioning themselves to be at the forefront of the AI revolution and to reap the benefits of this transformative technology.

The deflationary impact of AI

Most respondents believe that AI will have a deflationary effect, with a pronounced impact anticipated in certain sectors like healthcare and technology, as well as in markets with more flexible regulations (**figure 3.10, page 36**). AI productivity gains are seen as a potential solution to the demographic challenges facing many developed markets, with significant impacts on range of sectors. “We are looking at when and how will the benefits of AI flow down to all companies and start to show in income statements for non-technology companies,” said an emerging market-based SWF.

A central bank from an emerging market noted, “Any new technology is deflationary as it helps productivity, lowers costs, and therefore lower prices.” This highlights the potential for AI to drive significant productivity gains and cost savings across various sectors of the economy, ultimately leading to lower prices for consumers. A SWF from the West added, “We will see huge plummets in cost in healthcare and likely other technology sectors.” Another SWF observed, “Automation will replace a lot of expensive labour. It will also bring down costs in healthcare.”

The deflationary impact of AI is expected to take hold in the medium to long term. Of those respondents that believe AI will be deflationary some 62% of central banks and 61% of SWFs believe this will take effect only after at least 5 years (**figure 3.11, page 36**). However, some respondents caution that the pace of AI adoption and its impact on the economy will depend on the flexibility of local markets and the ability of businesses to adapt to this new technology. A central bank from the West observed, “I think it will be deflationary, especially in more dynamic economies like the US where it can be done more quickly.”

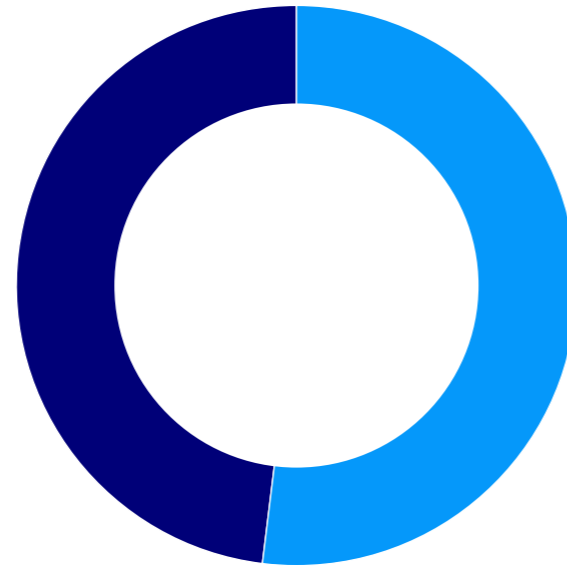
This was picked up by SWF from the Middle East “I’m convinced that AI will change the way we work. But it takes some adjustment, and the question is, will the economy be flexible enough to adjust to the pace of AI?” Both central bank and SWF respondents highlighted that there would need to be a policy response to proactively address the potential challenges and opportunities presented by AI, and to develop strategies to ensure that the benefits of this technology are widely shared and sustained over the long term.

It takes some adjustment, and the question is: will the economy be flexible enough to adjust to the pace of AI?

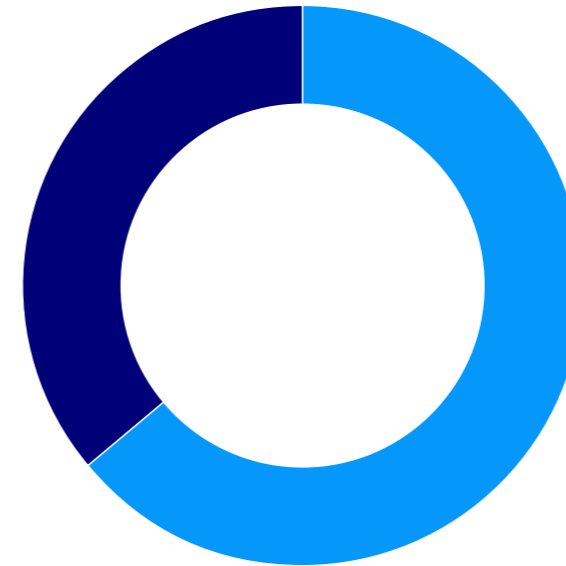
SWF
Middle East

Figure 3.10
AI will be deflationary (% citations, CBs and SWFs)

Central banks



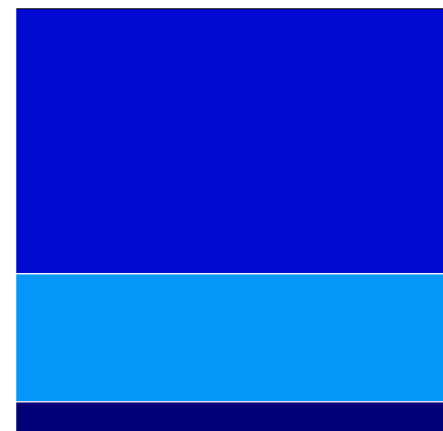
Sovereign wealth funds



Do you think AI is likely to be deflationary? Sample size: 76.

Figure 3.11
Timeframe for deflationary impact to take effect (% citations, CBs and SWFs that believe AI will be deflationary)

Central banks



Sovereign wealth funds



When will this deflationary impact start to take effect? Sample size: 41.

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Conclusion

The rise of AI, particularly generative AI, has sparked a significant shift in attitudes among sovereign investors. Many SWFs and central banks are already embracing AI in their investment processes, using it for data processing, risk management, and forecasting. SWFs are also strategically investing across the AI technology stack to capitalise on the growth potential of this transformative technology.

However, the path to AI adoption is not without challenges, such as talent scarcity, data quality, and model explainability. Funds are addressing these issues by investing in human capital and partnering with external experts.

As AI continues to advance, it is expected to have a deflationary impact on the economy, particularly in sectors like healthcare and countries with the flexibility to adapt. Sovereign investors, with their long-term horizons and significant resources, are well-positioned to navigate this changing landscape and harness the power of AI to drive better investment outcomes and shape the future of the global economy.

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On the threshold of transition

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The percentage of central banks with an ESG policy continues to rise strongly, but SWFs dip slightly as the market matures and investors apply stricter definitions to what constitutes a formal ESG policy



Climate risk is seen as an immediate, material factor and half of the respondents model and track their portfolios against global climate goals



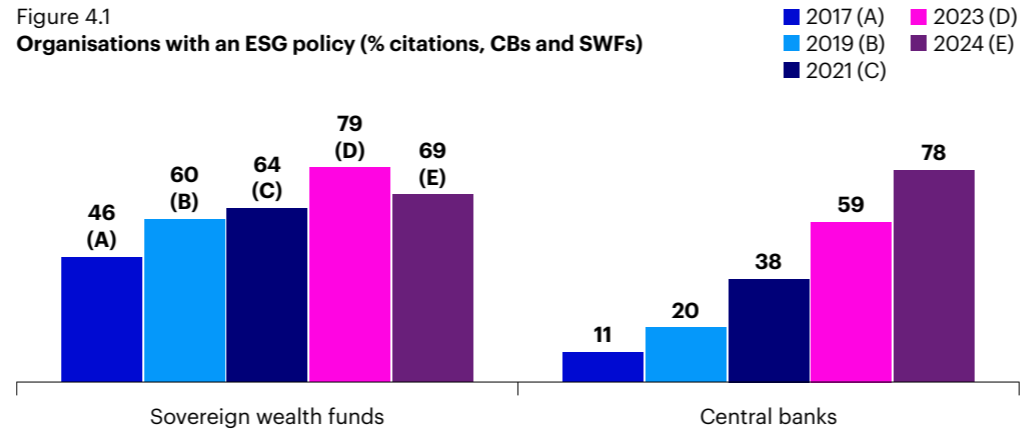
To drive the energy transition, SWFs and central banks generally prefer a combination of engagement and allocation to renewables over complete divestment

Environmental, social, and governance (ESG) investing has been on an upward trajectory for more than a decade, with sovereign investors progressively incorporating these principles into their investment approaches.

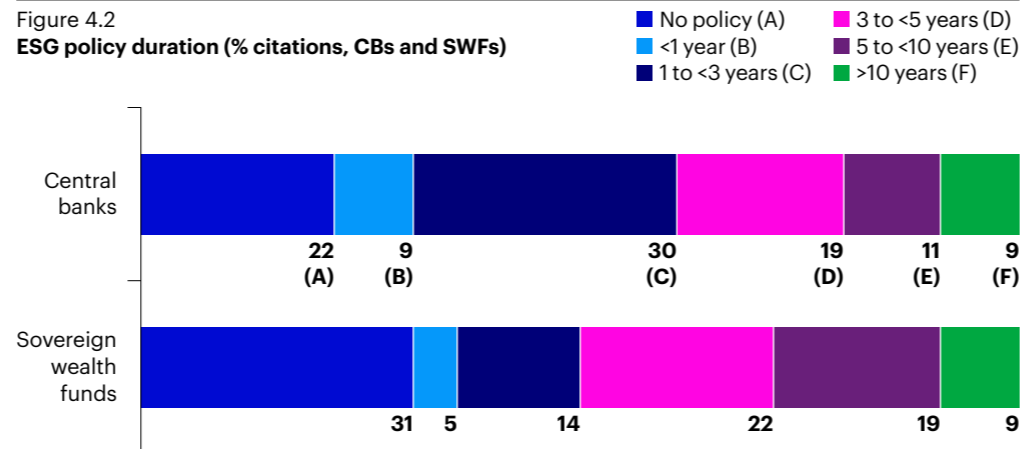
However, the 2024 Study reveals a shift: while the number of central banks with an ESG policy continued to rise, there was a retrace in the percentage of SWFs with a formal ESG policy in place (figure 4.1).

This apparent step back in ESG adoption is not a sign of waning interest or commitment, but rather a reflection of the rising maturity and higher standards in the ESG investing landscape. As investors become more sophisticated in their understanding and application of ESG principles, they are reassessing their policies and practices, leading to a rationalisation of what truly constitutes an ESG driven approach. This means that sovereign investors are now applying stricter definitions, recognising that their previous approaches may not have met the higher standards that have emerged in recent years.

At the same time, the proportion of investors with ESG policies in place for more than five years has continued to increase, now reaching a critical mass. For one in five central banks and one in three SWFs, ESG has had sufficient time to become deeply embedded in their investment strategy and philosophy (figure 4.2). As one central bank from the West noted, “ESG has been around for almost 20 years. If you want to establish an ESG programme, there are enough resources to build one. There is enough data to convince any wary stakeholder.”



Do you have an ESG policy? Sample size: 135.



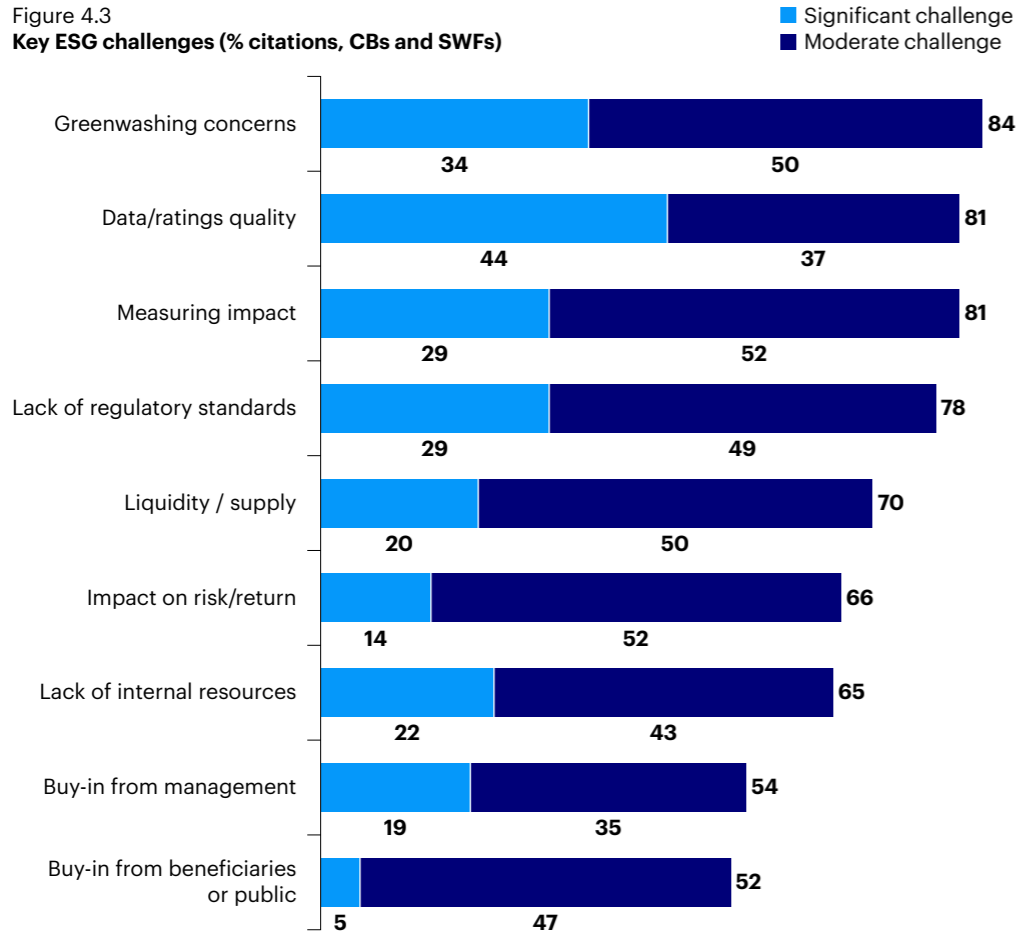
How long have you had an ESG policy? Sample size: 135.

For us, ESG isn't a controversial topic, but there's a lot of scrutiny and a brighter spotlight. You don't have to justify using ESG, but how you're using it.

SWF
Emerging markets

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Figure 4.3
Key ESG challenges (% citations, CBs and SWFs)



How significant are the following challenges in relation to ESG investing? Sample size: 115.

ESG is raising the standards

As ESG investing matures, so do the expectations and challenges that come with it. The key challenges identified by sovereign investors remain consistent in nature but have grown in magnitude. In 2019, ‘quality of data/ratings’ was seen as the most significant challenge to ESG investing. Despite tremendous advancements in ESG data and reporting since then, investors’ expectations have risen in tandem. In 2024 81% of SWFs and central banks continue to cite this as a challenge, with 44% calling it a significant one (figure 4.3).

This heightened scrutiny extends to concerns about greenwashing, with 84% of respondents identifying it as a challenge, closely followed by the difficulty in measuring impact (81%). These challenges underscore the growing demands for transparency, standardisation, and accountability in ESG investing. Sovereign investors are no longer content with surface-level commitments; they seek tangible evidence of the effectiveness and impact of their ESG investments.

This drive for greater accountability is further reflected in the ambitious targets set by sovereign investors. Approximately half of the respondents model and track their portfolios against global climate goals, with another 32% intending to do so (figure 4.4, page 41). As one central bank from an emerging market explained, “For us ESG isn’t a controversial topic, but there’s a lot of scrutiny and a brighter spotlight. You don’t have to justify using ESG, but how you’re using it.”

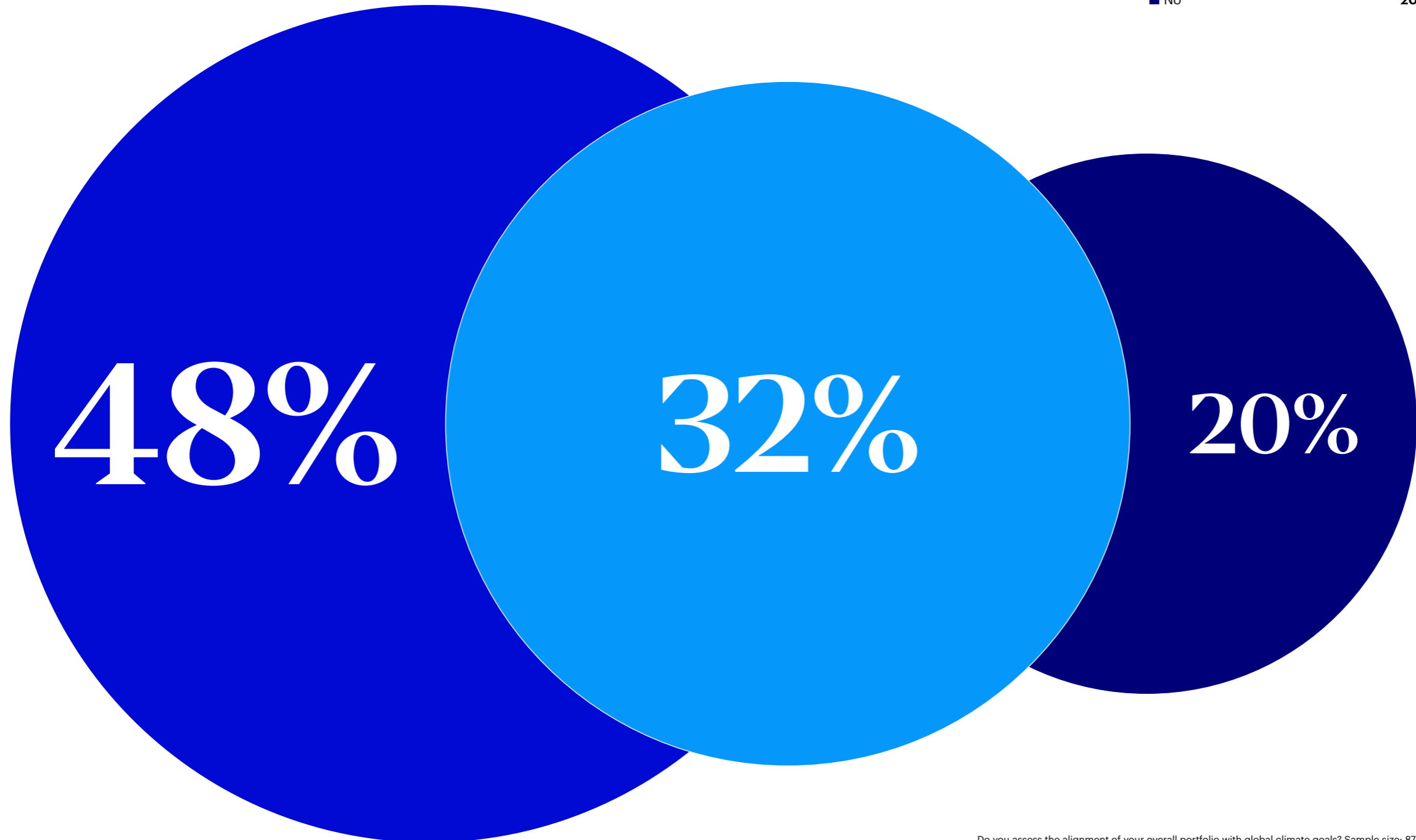
As such, SWFs and central banks increasingly rely on their asset managers to help mitigate greenwashing risks and support their reporting requirements. Consequently, 81% include ESG considerations in their manager selection and oversight, including 45% that incorporate robust ESG due diligence and ongoing engagement. This proportion is even higher in the West, where 62% of respondents have robust processes in place, driven by a combination of shared expertise and stringent European reporting standards (figure 4.5, page 42).

The high percentage of sovereign investors incorporating ESG into manager selection and oversight demonstrates the ripple effect of ESG maturity. As investors become more sophisticated in their ESG approach, they expect the same from their asset managers who are incentivised to improve their ESG practices to win and retain mandates.

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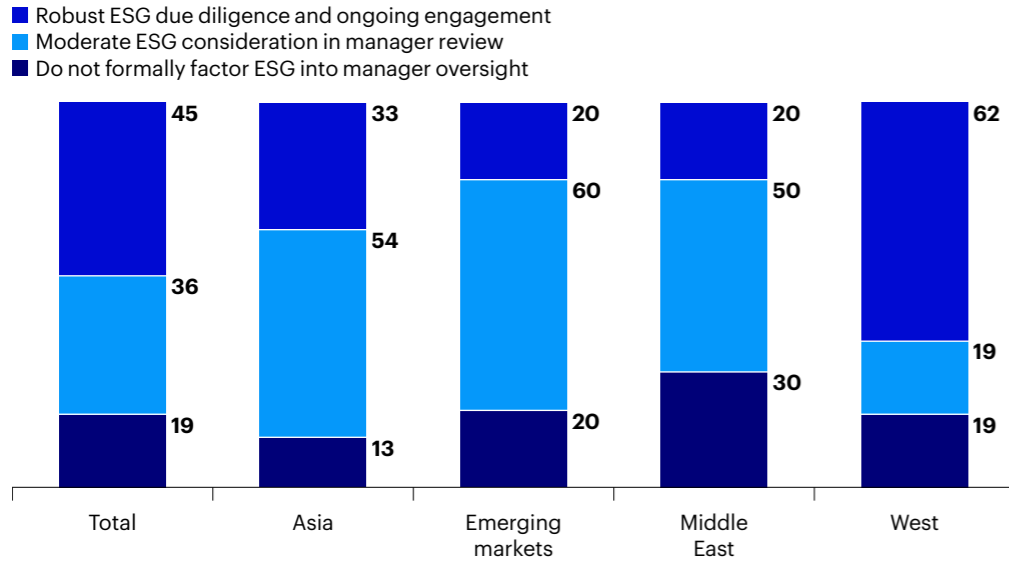
Figure 4.4
Assessment of portfolio against climate goals (% citations, CBs and SWFs)

■ Model and track portfolio alignment	48
■ Plan to implement alignment tracking	32
■ No	20



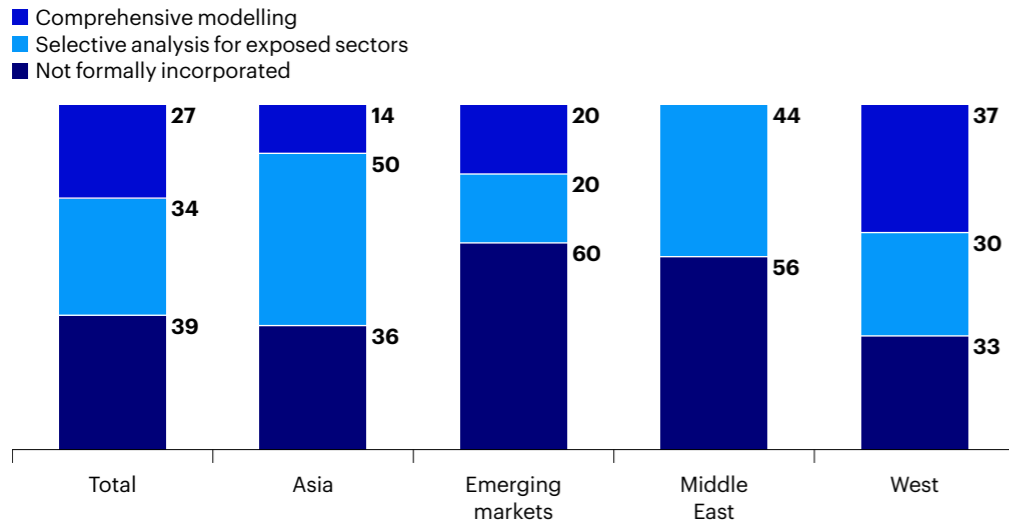
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Figure 4.5
Incorporation of ESG into external manager selection and monitoring (% citations, CBs and SWFs)



How do you incorporate ESG factors into manager selection and monitoring processes? Sample size: 77.

Figure 4.6
Incorporation of physical climate risk into investment processes (% citations, CBs and SWFs)



How do you incorporate physical climate risk (i.e. risks resulting from climatic events such as wildfires, storms, and floods) into your investment process? Sample size: 79.

Climate risk a material factor for returns

With 70% of respondents citing climate change impact and transition risks as key risks to the global economy over the next decade (figure 1.3, page 10), it is clear that the “E” in ESG remains a top priority. Climate risk is no longer viewed as a distant, future event, but rather as an immediate investment risk. The physical impacts of climate change, as well as the transition risks associated with shifting to a low-carbon economy, are seen as having direct and material implications for portfolios.

Currently, 61% of respondents incorporate physical climate risk into their investment processes (figure 4.6). For SWFs, physical climate risk is most prominent when they assess discrete investment opportunities, such as a hotel on the coast or a manufacturing plant in an area with earthquake risk. Here, the incorporation of ESG as a risk management tool really shines through, with investors assessing the potential impact on the longevity of their investments.

This granular, asset-level assessment of physical climate risk is increasingly seen as a crucial part of managing environmental risk, allowing investors to identify and potentially mitigate risks that may not be apparent at a portfolio level. For example, a coastal property may seem like a sound investment based on traditional financial metrics but factoring in the increasing risk of sea-level rise and more frequent, severe storms could change that assessment.

While many central banks support the financial institutions in their country with stress-testing portfolios against carbon taxes and natural disasters, some find it challenging to implement ESG policies within their own reserves. There is often limited scope to diversify to more actively green investments while staying within their risk appetite, and central banks’ shareholder and engagement power can be limited by rules around impartiality. However, with central banks increasingly diversifying into new asset classes, many are looking at how these new investments can help contribute to their climate targets.

Notably, some 39% of SWFs and central banks have no formal incorporation of physical climate risk. For some, this arises from the assumption that these risks are already priced fairly into the market. Others cite lack of expertise or capacity. But for many others, the issue of data remains the biggest blocker: they struggle to quantify environmental risk beyond ad-hoc decisions for individual investments. The lack of standardised, reliable data on physical climate risk is a significant barrier to its widespread incorporation into investment processes. While there have been advancements in this area, such as the development of climate risk models and scenario analysis tools, many sovereign investors said that they still find it challenging to translate this information into actionable insights.

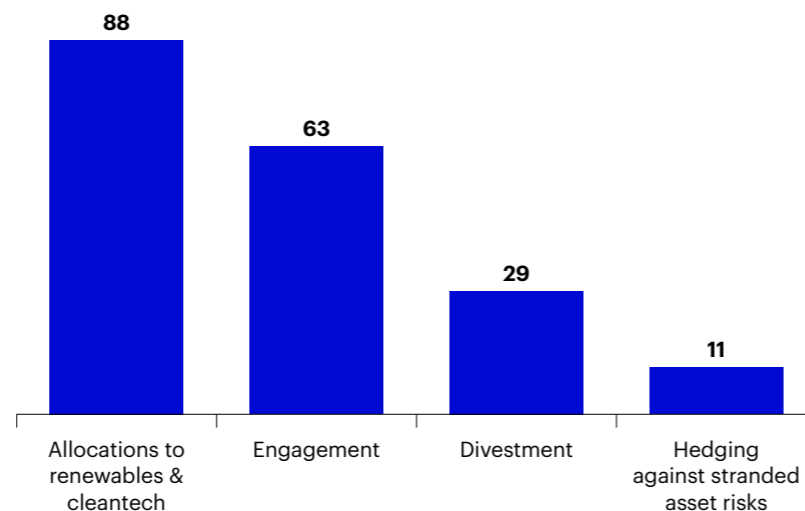
The energy transition: balancing realism and opportunity

As part of the broader climate mitigation and transition efforts, sovereign investors are balancing the realism of our current fossil fuel dependence with the opportunities presented by the shift to a low-carbon economy. This involves investing in mitigation technologies and climate solutions that address the root causes of climate change while providing attractive investment opportunities. At the same time, many respondents stressed that their approach to the transition is grounded in realism, recognising that the global economy is still heavily dependent on fossil fuels. As one SWF from an emerging market stated, "Oil will not go away: it will continue to be a major force for the next 20 years."

As such, rather than complete divestment of high carbon assets, SWFs and central banks generally prefer a combination of engagement and allocation to renewables (figures 4.7 and 4.8). This pragmatic view of the energy transition was shared by many respondents. While they recognise the need to shift to a low-carbon economy, they also often emphasised that this shift will take time. Fossil fuels are deeply embedded in economic systems and infrastructure so replacing them will require significant investment and technological innovation. By gradually shifting capital towards renewables and clean technologies, while still engaging with fossil fuel companies to encourage their transition, respondents highlighted how they can support the shift to a low-carbon economy while managing risk and maintaining returns. "We believe in helping companies in the transition towards net zero, rather than excluding the high-carbon sectors completely," said a SWF based in Asia.

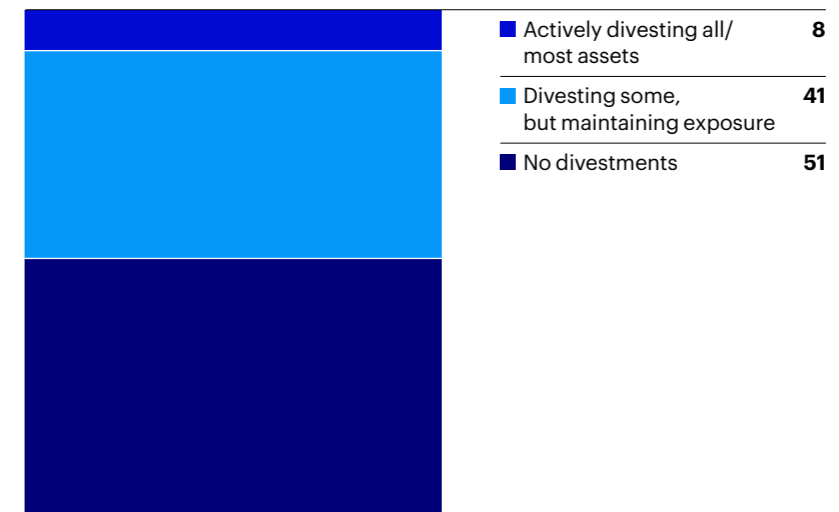


Figure 4.7
Approaches taken as part of low carbon transition
(% citations, CBs and SWFs that have taken any actions)



Which of the following are you doing as part of the low-carbon transition? Sample size: 73.

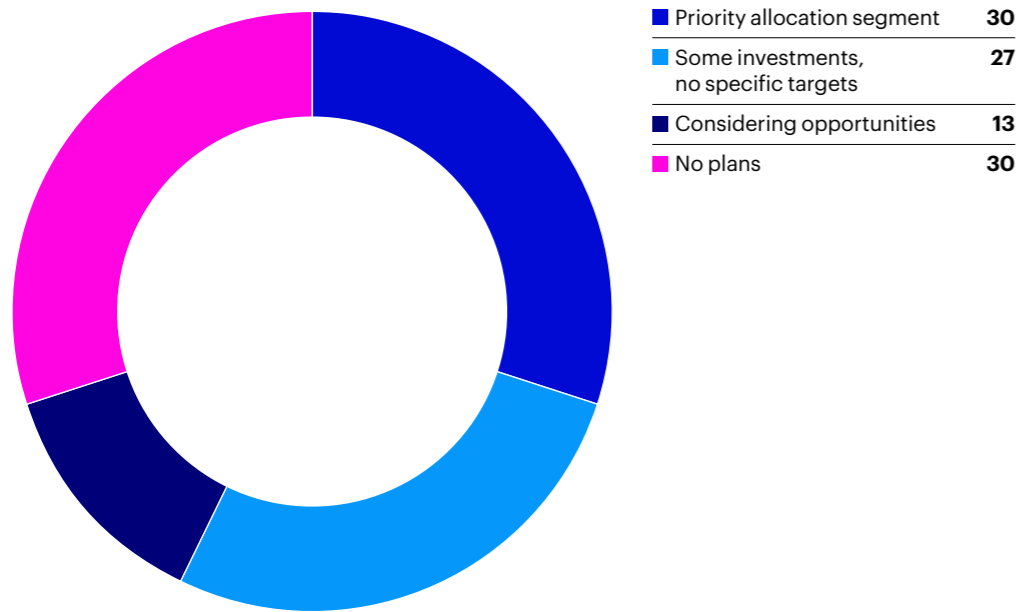
Figure 4.8
Approach to divestment of oil and gas assets
(% citations, CBs and SWFs)



What is your organisation's approach to oil and gas investments? Sample size: 84.

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Figure 4.9
Allocations to renewable energy and cleantech investments (% citations, CBs and SWFs)



Does your organisation have dedicated allocations or targets for renewable energy and cleantech investments? Sample size: 102.

A capital-intensive road ahead

The transition to a low-carbon economy, a crucial aspect of climate mitigation, will require significant capital expenditure. This presents a compelling investment opportunity for sovereign investors to support the growth of renewable energy, cleantech, and other climate solutions. By aligning their portfolios with climate mitigation and adaptation goals, sovereign investors believe they can contribute to the transition while capturing the financial benefits of the shift to a low-carbon future.

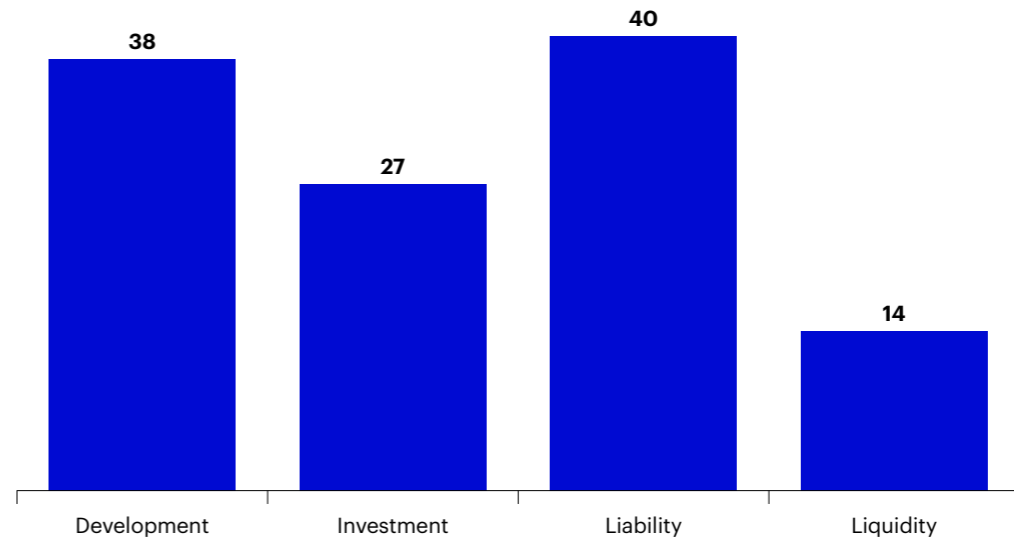
As such, 30% of sovereign investors see renewable energy and cleantech as a priority allocation segment, while a further 27% have some investments in this space (figure 4.9). Development sovereigns and liability sovereigns in particular often have strong mandates for societal good alongside long-term, steady returns that make these types of investments appealing (figure 4.10).

These investments offer the potential for stable, predictable cash flows over extended time horizons, aligning with the liability profiles of many sovereigns. They also deliver clear environmental and social benefits,

contributing to sustainable development goals and the fight against climate change. However, even if they assign it a priority allocation segment, most investors do so based on how well these investments meet their risk and return needs, just like any other investment. Renewable Energy and Cleantech investments stand out due to their long duration at least as much as they do for the impact they have on an organisations' Net Zero targets. As one SWF from Europe noted, "While we certainly consider the environmental impact of our investments in renewable energy and cleantech, our primary focus is still on ensuring that these investments align with our overall risk and return objectives."

This highlights the dual nature of the energy transition as both an environmental imperative and an investment opportunity. While the positive environmental impact is a key consideration, it's not the only factor driving investment decisions. Investors highlight that they still need to ensure that these investments fit within their overall portfolio strategy and deliver the returns needed to meet their financial obligations.

Figure 4.10
Renewable energy and cleantech investments – priority allocation (% citations, SWFs only)



Does your organisation have priority allocations or targets for renewable energy and cleantech investments? Sample size: 63.

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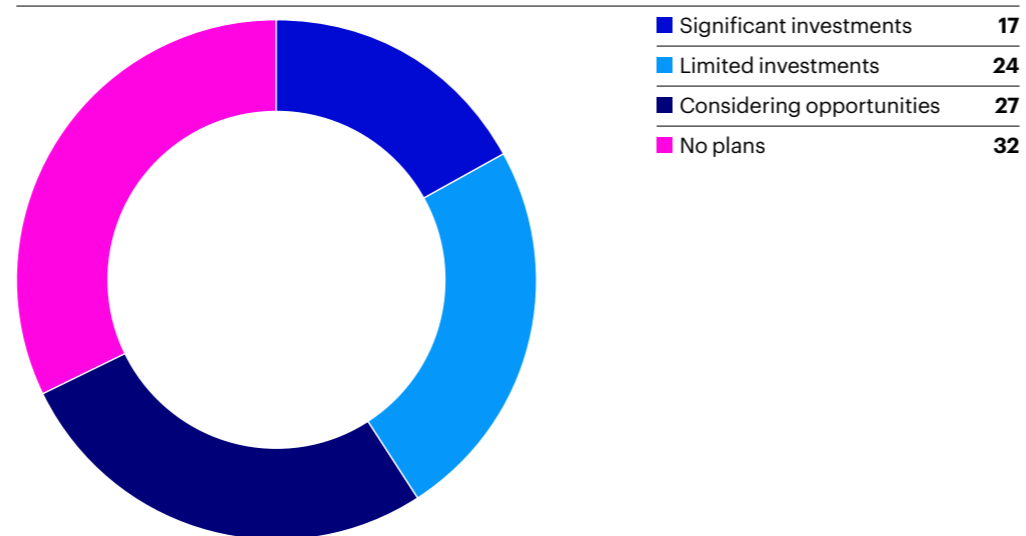
Carbon removal – the next frontier in the energy transition?

While renewable energy and green infrastructure investments are well-established and offer familiar investment options, carbon removal technologies are seen as a newer and less certain area of opportunity. These technologies, which aim to remove carbon dioxide from the atmosphere and store it permanently, are still in the early stages of development and commercialisation.

Despite the potential of these technologies to help mitigate climate change, sovereign investors are approaching the carbon removal market with caution. Only 41% of respondents currently invest in carbon removal technologies, compared to 57% who invest in renewable energy (figure 4.11). The main barriers to investment include the lack of proven track records, the uncertain policy and regulatory environment, and the high capital costs and long payback periods associated with many carbon removal projects. As a SWF from Asia explained, “Many of these technologies are still in the early stages of development, and there are questions about their scalability and cost-effectiveness.”

Sovereign investors are understandably wary of committing significant capital to unproven technologies, especially when there are more established alternatives available in the form of renewable energy. However, this hesitancy also presents an opportunity for those willing to take on more risk. As carbon removal technologies mature and demonstrate their effectiveness, respondents highlighted that early movers could be well-positioned to benefit from the growth of this market. This is where the long-term perspective of SWFs could be particularly advantageous, allowing them to invest in the development of these technologies and support their commercialisation over time.

Figure 4.11
Level of investment in carbon removal technologies (% citations, CBs and SWFs)



Do you invest in carbon removal technologies like direct air capture and carbon sequestration? Sample size: 75.

Many of these technologies are still in the early stages of development, and there are questions about their scalability and cost-effectiveness.

SWF
Asia

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Conclusion

The energy transition presents both challenges and opportunities for SWFs and central banks. As ESG considerations become increasingly mainstream, sovereign investors are raising their standards and expecting more from their investments. Climate change, once seen as a distant threat, is now seen as an immediate and pressing risk that demands action. SWFs and central banks are responding with a pragmatic and balanced approach, one that acknowledges the ongoing role of fossil fuels in the global economy while also accelerating investment in the technologies and infrastructure that will power a low-carbon future.

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Central banks navigate uncertainty in a global election year



Central banks bolster and diversify reserves amid uncertainty, with 53% planning an increase in the size of their reserves and 52% planning additional diversification



56% of central banks agree that the weaponisation of central bank reserves makes gold more attractive, while 48% believe that rising US debt levels have increased gold's appeal



Emerging market allocations are increasing; the proportion of central banks with an allocation of 5% or more is projected to rise from 7% 2022 to 34% in five years' time

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As the world enters a critical global election year, central banks find themselves navigating a complex and uncertain landscape. From the high-stakes US presidential race to pivotal contests in Europe, Asia, and beyond, the outcomes of these elections have the potential to reshape the global economic and political order.

In this context, the ongoing dominance of the US dollar as the world's primary reserve currency is coming under increased scrutiny, as central banks grapple with concerns about rising debt levels, the potential for a rival currency to emerge, and the risks associated with the weaponisation of dollar access. The election outcomes, particularly in the US, could have significant implications for the dollar's stability and its role in the global financial system.

A shift in economic policies, a further escalation of geopolitical tensions, or a loss of confidence in the US's ability to manage its debt could all contribute to a weakening of the dollar's position. As a result, there is unease among some central banks and a desire for diversification, as they seek to mitigate the risks associated with an overreliance on the dollar in an increasingly unpredictable world.

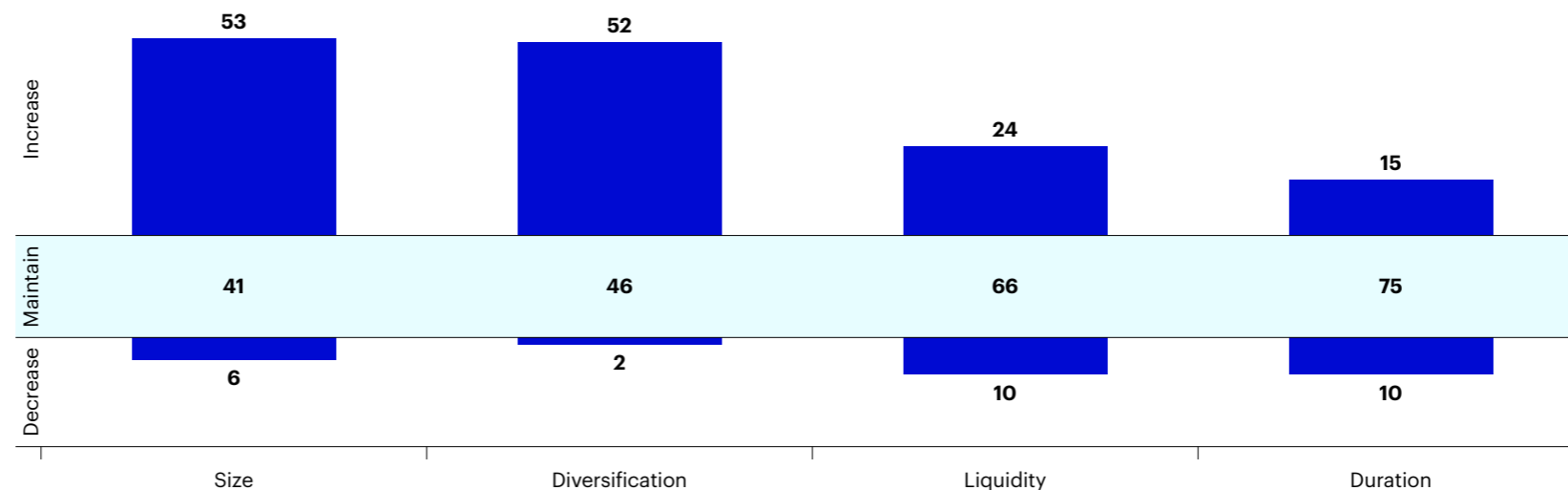
Growing reserves

One of the key findings of this year's study is the appetite among central banks to increase the size of their reserves as a means of mitigating potential risks and ensuring their ability to intervene in the event of market disruptions. A majority of respondents (53%) indicated their intention to increase the size of their reserves over the next two years, while only 6% were planning a reduction (figure 5.1).

This drive to bolster reserves is partly motivated by the high degree of uncertainty in the global economic and political environment, particularly in light of the upcoming global elections. Central banks were mindful of the potential for election outcomes to trigger market volatility, currency fluctuations, and shifts in investor sentiment. By building up their reserves, respondents revealed that they were looking

to create a buffer against these risks and ensure they have the necessary firepower in the face of potential shocks. As one central bank from the West noted, "Everything is currently very uncertain and this is reason to hold larger reserves." This sentiment is echoed by a central bank from the Middle East, which stated, "We have decided to enhance our reserves to account for any unexpected political or macro crisis."

Figure 5.1
Expectations for reserves over the next two years (% citations, CBs only)



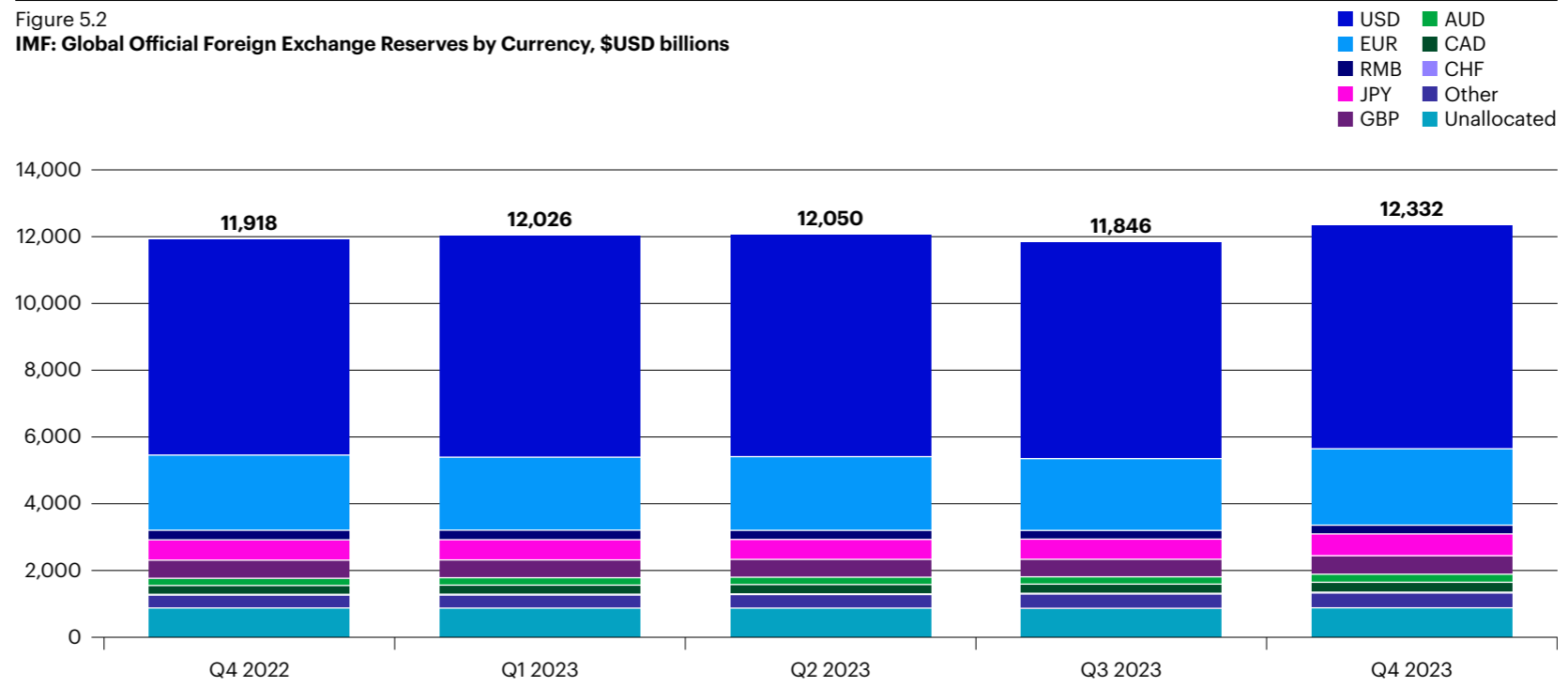
How do you expect your reserves to evolve over the next 2 years? Sample size: 53.

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The higher yield environment has provided an additional incentive for central banks to increase their reserves. With interest rates rising globally, central banks are seeing an opportunity to generate higher returns on their reserve assets. Central banks also noted that higher yields on Western reserve assets not only increase interest income, but also reduce the cost of carrying reserves, and that a structurally higher global interest rate environment implies that the cost of carrying reserves could be persistently lower than it was during the era of zero rates.

As one central bank from the Middle East said, “The higher yields available in the market today have made it more attractive for us to hold larger reserves. We are taking advantage of this opportunity to bolster our returns and strengthen our financial position.” Another central bank from Asia echoed this sentiment, stating, “The current high-yield environment has given us more flexibility to increase our reserves and diversify our portfolio. We are actively seeking out opportunities to generate higher returns.” This growth drive is evident in the latest data from the International Monetary Fund (IMF), which shows a 3% increase in global official foreign exchange reserves between the fourth quarter of 2022 and the fourth quarter of 2023 (figure 5.2).

Figure 5.2
IMF: Global Official Foreign Exchange Reserves by Currency, \$USD billions



Source: IMF.

The enduring dominance of the US dollar

Nearly two thirds of respondents believe rising US debt levels are negative for the global role of USD (figure 5.3, page 50). Meanwhile, 18% of central banks say that the position of USD as the world reserve currency will be weaker in five years’ time, up from 11% in last year’s study (figure 5.4, page 51).

However, despite the concerns about the US’s fiscal position and the potential for debt-related risks to undermine confidence in the dollar, most central banks remain sanguine about the currency’s near-term prospects. As one central bank from the West noted, “While the US fiscal situation is certainly a cause for concern, we don’t see it as an imminent threat to the dollar’s dominance. The US economy remains the largest and most dynamic in the world, and the dollar’s role as the global reserve currency is deeply entrenched.”

Moreover, when asked about the likely time horizon for a rival currency to emerge as a legitimate competitor to the US dollar, 17% of central banks believe it will take more than 20 years, while 37% think it is unlikely to happen in the foreseeable future (figure 5.5, page 51). This underscores the significant barriers to entry that any potential challenger to the dollar would face.

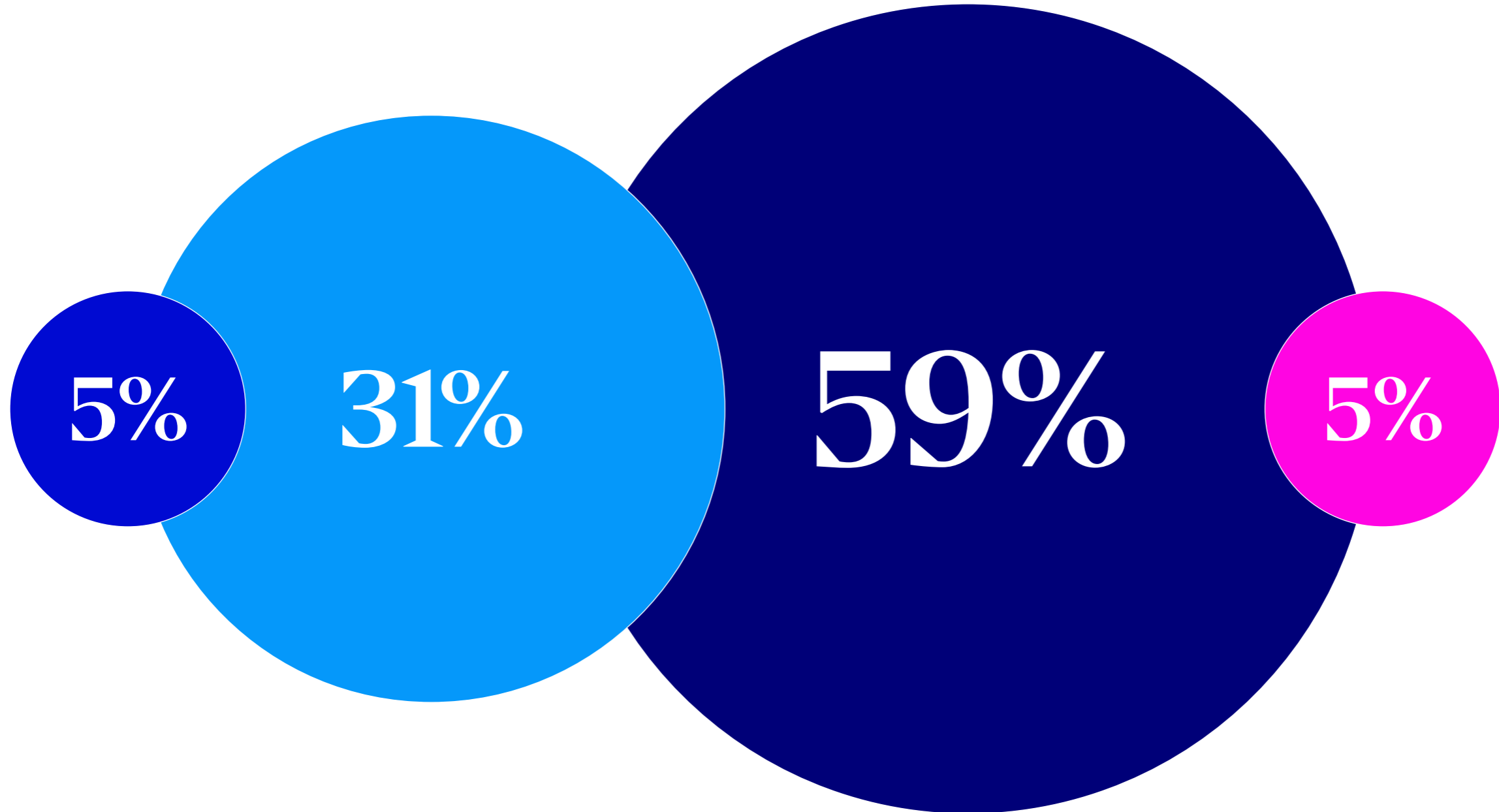
One of the key factors underpinning the dollar’s enduring dominance is the absence of a credible alternative. China’s economic and geopolitical power has grown rapidly in recent years, yet the study reveals that 9% of central banks expect the renminbi to become a true reserve currency in the next five years (figure 5.6, page 51).

The higher yields available in the market today have made it more attractive for us to hold larger reserves.

Central bank
Middle East

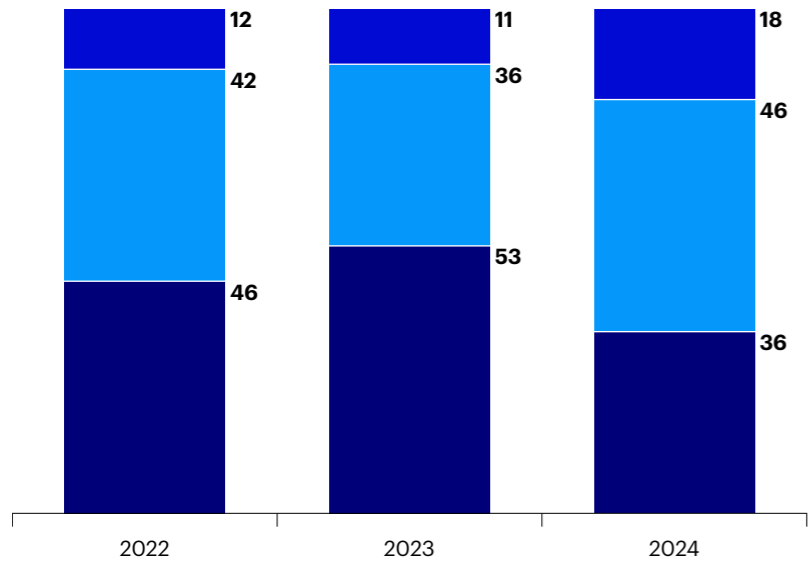
Figure 5.3
Impact of US debt levels and deficits on future of US dollar (% citations, CBs only)

Moderate positive	5
Neutral	31
Moderate negative	59
Significant negative	5



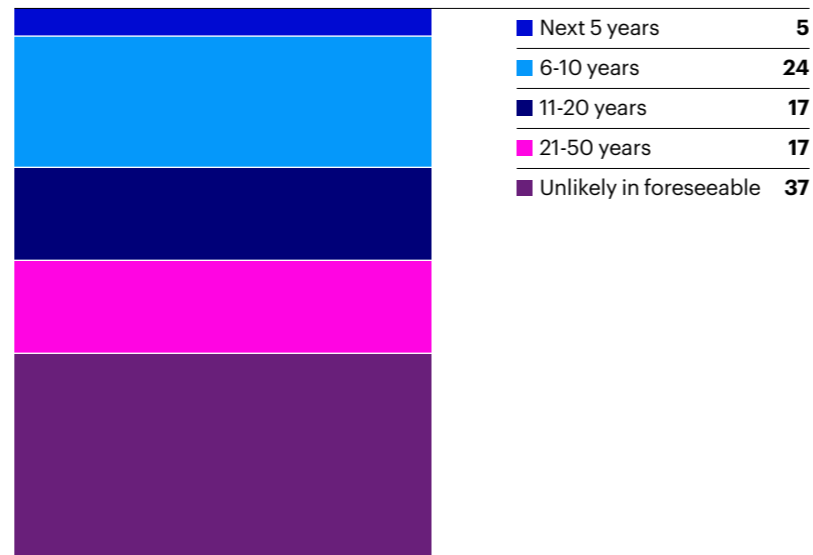
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Figure 5.4
Degree of belief that the position of the US dollar, as the world reserve currency, will be weaker in 5 years



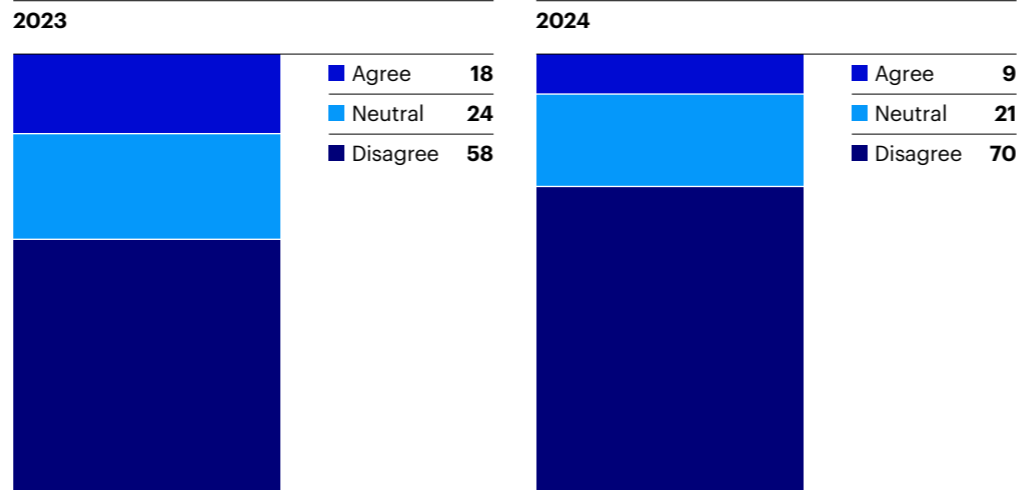
To what extent do you agree with the following statement: The position of the US dollar as the world reserve currency will be weaker in 5 years? Sample size: 55.

Figure 5.5
Time horizon for a rival currency to emerge as a competitor (% citations, CBs only)



What is the most likely time horizon for a rival currency to emerge as a legitimate competitor to the US Dollar as the dominant global reserve currency? Sample size: 42.

Figure 5.6
Degree of belief that the Renminbi will become a true reserve currency the next 5 years



To what extent do you agree with the following statement: The Renminbi will become a true reserve currency in the next 5 years? Sample size: 55.

China's economic growth trajectory, financial market development, and geopolitical risks may be factors influencing the outlook for global investors.

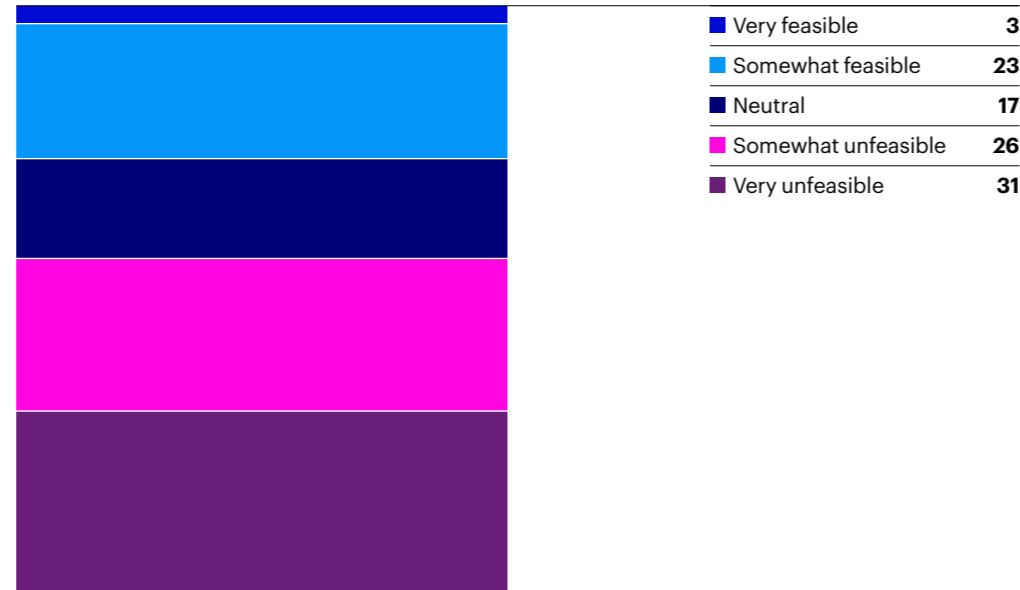
The lack of a clear successor to the dollar is further underscored by the scepticism among central banks about the prospects for a broader shift towards a multipolar currency system. When asked about the feasibility of a unified BRICS currency backed by gold, only 26% of respondents saw it as very or somewhat feasible in the next decade (figure 5.7, page 52). The divergent economic and geopolitical interests of the BRICS countries, as well as the practical challenges of coordinating a new reserve currency, were seen as major obstacles to such a development.

However, while the dollar's dominance appears secure for now, the study also reveals growing unease among some central banks about the risks associated with an overreliance on the greenback. The potential weaponisation of dollar access, in particular, has emerged as a significant concern, with 45% of respondents citing it as a key risk to the dollar's ongoing dominance. This risk was seen as particularly acute among central banks in Asia and in emerging markets (figure 5.8). Respondents indicated that their perspectives would likely be considerably reinforced if Russian reserve assets, currently frozen, were confiscated and allocated to Ukraine for reconstruction purposes, due to the potential precedent such an action could establish.

As one central bank from the Middle East noted, "The weaponisation of the dollar is a real concern for us. We have seen how the US has used its financial dominance to pursue geopolitical objectives, and this has made us more cautious about relying too heavily on the dollar in our reserves."

Despite these concerns, however, the study suggests that the dollar's dominance is likely to persist in the near to medium term, given the absence of credible alternatives. This is partly a function of the trade-off between the goals of growing reserves and diversifying reserves having been resolved in favour of growth (and the subsequent need for higher dollar holdings). As one central bank from the West summed it up, "The dollar may not be a comfortable haven, but it is still the best haven we have."

Figure 5.7
Feasibility of BRICS currency backed with gold in next decade (% citations, CBs only)

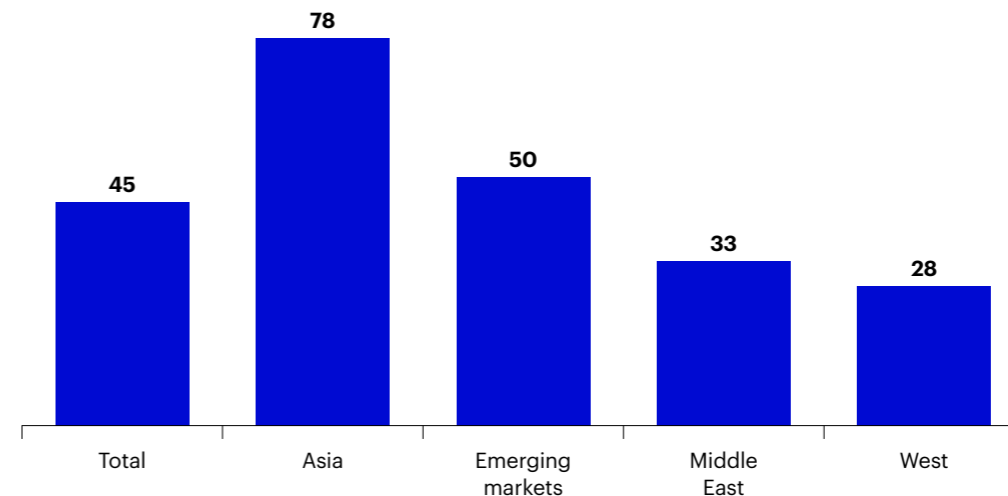


How feasible is the creation of a unified BRICS currency backed by gold in the coming decade? Sample size: 35.

The dollar may not be a comfortable haven, but it is still the best haven we have.

Central bank
The West

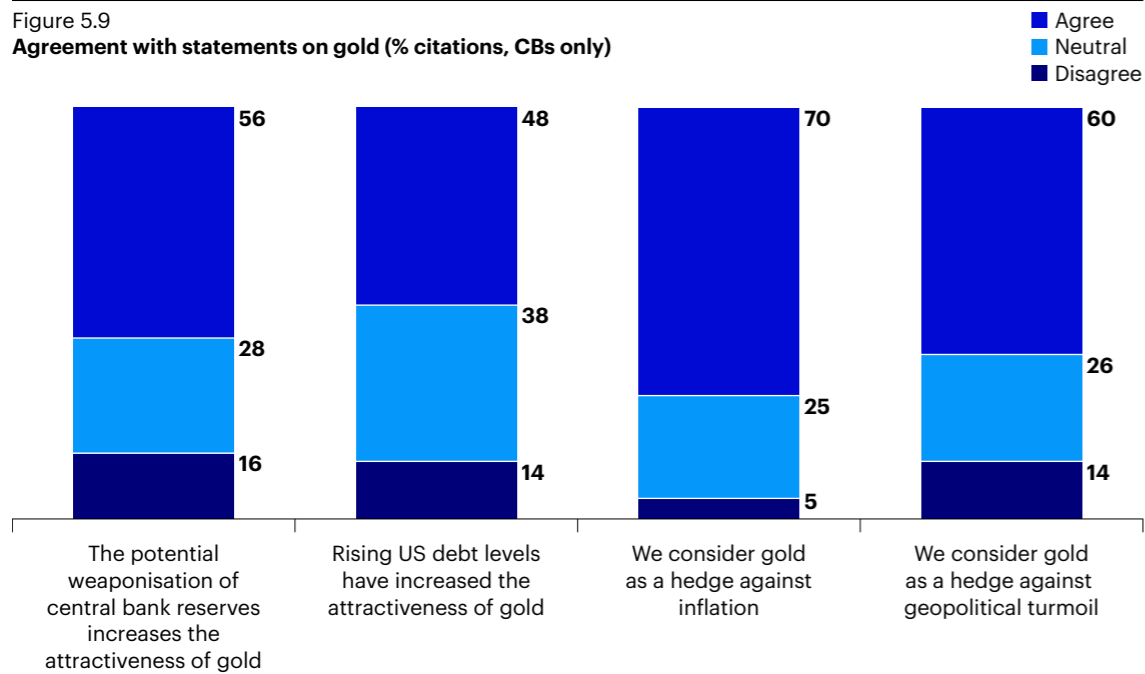
Figure 5.8
Weaponisation of reserves is risk to US dollar dominance (% citations, CBs only)



Do you see the weaponisation of dollar access for geopolitical goals as a significant risk to the ongoing US dollar dominance in global FX reserves? Sample size: 38.

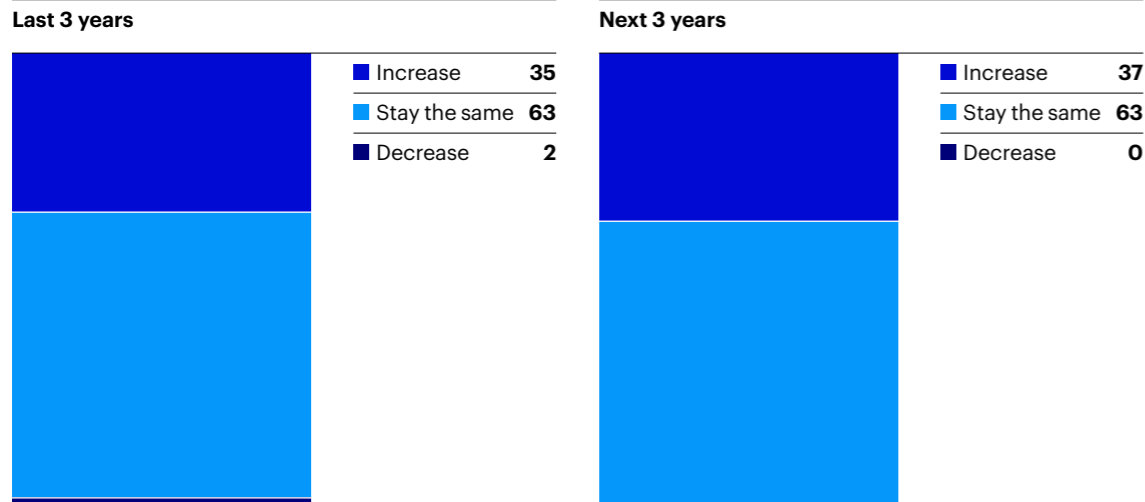
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Figure 5.9
Agreement with statements on gold (% citations, CBs only)



To what extent do you agree with the following statements? Sample size: 45.

Figure 5.10
Change in gold allocations (% citations, CBs only)



How has the allocation to gold changed over the last 3 years? How do you expect it to change in the next 3 years? Sample size: 51.

The allure of gold in an uncertain world

Amid the ongoing uncertainty and the challenges of finding viable alternatives to the US dollar, gold has emerged as an increasingly attractive option for central banks seeking to diversify their reserves and hedge against various risks. The study finds that 56% of central banks agree that the potential weaponisation of central bank reserves makes gold more attractive, while 48% believe that rising US debt levels have increased the appeal of the precious metal (figure 5.9). More than a third of central banks have been increasing gold allocations within their reserves (figure 5.10).

One of the key advantages of gold is its status as a tangible, apolitical asset that is not tied to any particular country or currency. As one central bank from Asia noted, "Gold is a non-volatile safe haven and confidence-building asset. It acts as a hedge against the weaponisation of currencies." This sentiment underscores the growing importance of gold as a strategic asset for central banks seeking to insulate themselves from geopolitical risks and market volatility.

The study also reveals that 70% of respondents see gold as a hedge against inflation and 60% see it as a hedge against geopolitical turmoil. This reflects increased concern among central banks of sustained inflation and the potential for geopolitical shocks to disrupt financial markets, both of which have the potential to undermine the value of traditional reserve assets. As one central bank from the Middle East put it, "Gold is not an obligation of any particular government or entity, which will enhance its perceived safety and reliability."

Interestingly, the Middle East stands out as a particularly bullish region for gold, with central banks there being far more likely to consider increasing their allocation and viewing gold as a hedge against various risks, including US debt levels, inflation, and geopolitical turmoil. This reflects the region's long-standing cultural and historical affinity for gold, as well as growing concerns about the potential for geopolitical shocks to disrupt oil markets.

As one central bank from the Middle East explained, "Gold is dominant. It's a long-term asset that we don't even think of selling." This underscores the unique role that gold plays in the region's economic and financial landscape, and the growing importance of the precious metal as a strategic asset for central banks seeking to preserve wealth and mitigate risk.

The resurgence of gold as a significant component of central bank reserve allocations, coupled with the inclination to hold onto the metal rather than sell it, has important implications. If this trend persists, it suggests that holdings of foreign exchange reserves denominated in Western fiat currencies are likely to continue expanding in absolute terms and that this growth may occur even if the portfolio weights allocated to these currencies decrease proportionally to other assets, such as gold.

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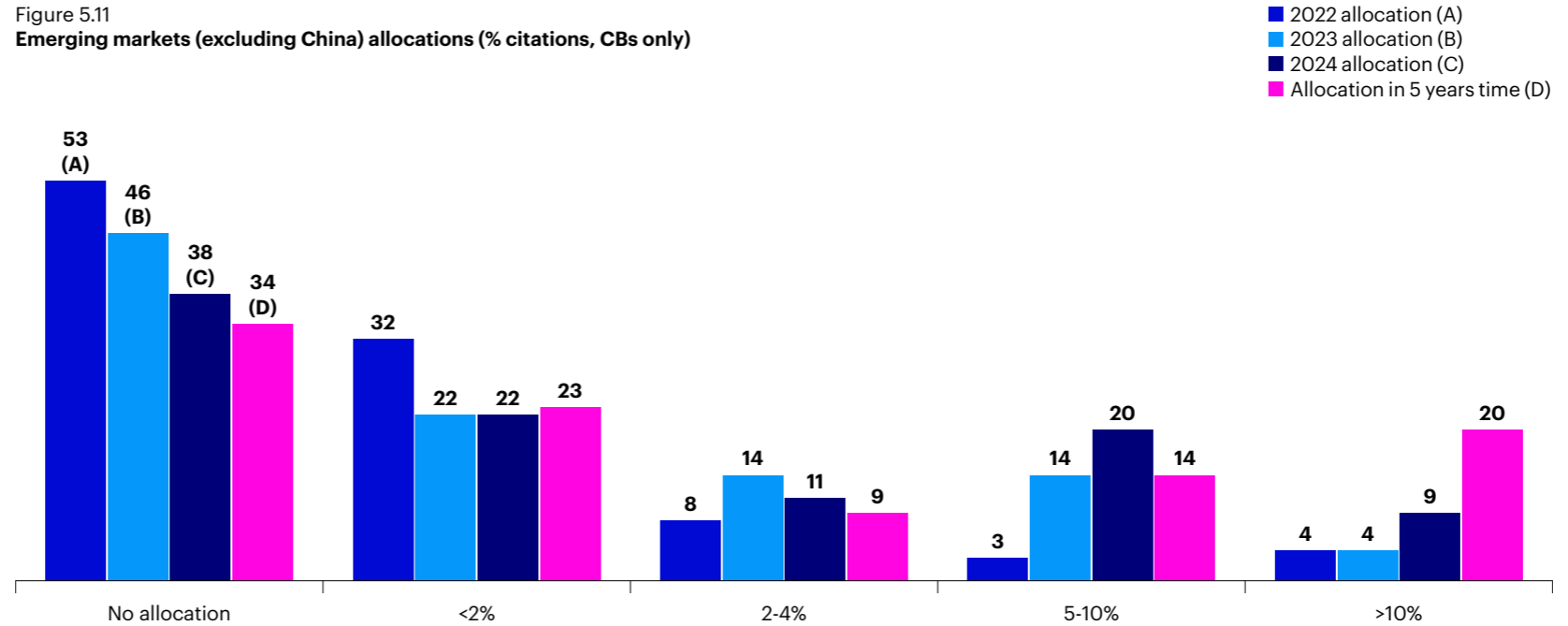
The rise of emerging markets: Asia leads the way

Another notable trend in this year's study is the growing interest among central banks in diversifying their reserves into emerging markets, particularly in Asia. The study findings reveal that the allocation to emerging markets (excluding China) is expected to grow significantly over the next five years (**figure 5.11**). While 53% of central banks had no allocation to emerging markets in 2022, this is expected to drop to 34% in five years' time. Conversely, the proportion of central banks with an allocation of 5% or more is projected to rise from 7% to 34% over the same period.

The intention to boost emerging market allocations in reserves is especially noteworthy considering the overall desire to expand reserves as a buffer against geopolitical turmoil. This suggests that emerging market assets are likely to constitute a growing portion of an increasingly larger total reserves pool.

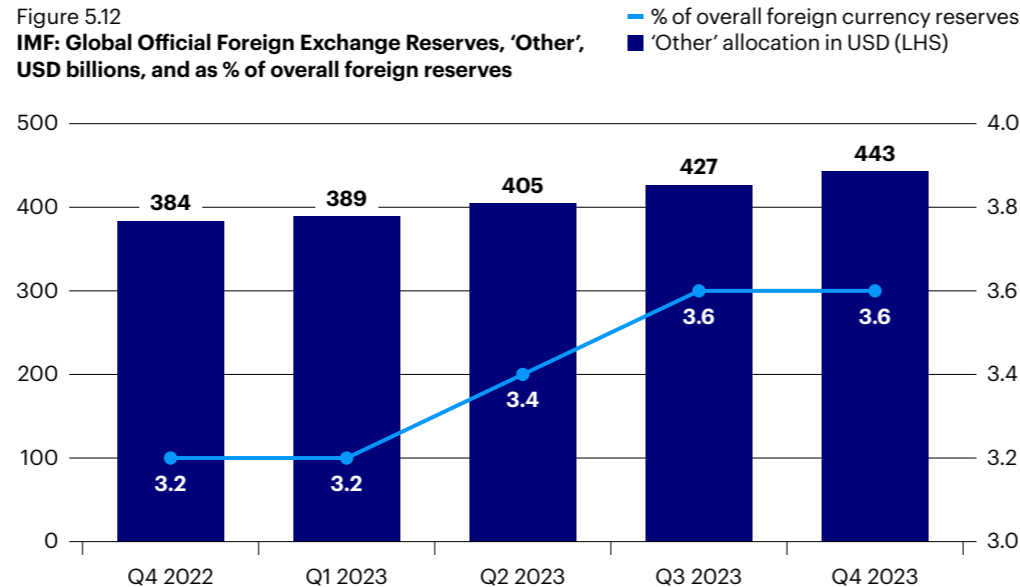
The growing interest in emerging markets is also reflected in the latest data from the International Monetary Fund (IMF), which shows a steady increase in the allocation to currencies outside of the traditional reserve assets. The 'other' category, which includes currencies not classified as the US dollar, euro, yen, pound sterling, renminbi, or Australian and Canadian dollars, has risen from 3.2% of total global FX reserves in Q4 2022 to 3.6% in Q4 2023 (**figure 5.12**).

Figure 5.11
Emerging markets (excluding China) allocations (% citations, CBs only)



What is your current allocation to emerging markets (excluding China) in your reserves? What do you think your allocation will be in 5 years' time? Sample size: 47.

Figure 5.12
IMF: Global Official Foreign Exchange Reserves, 'Other', USD billions, and as % of overall foreign reserves



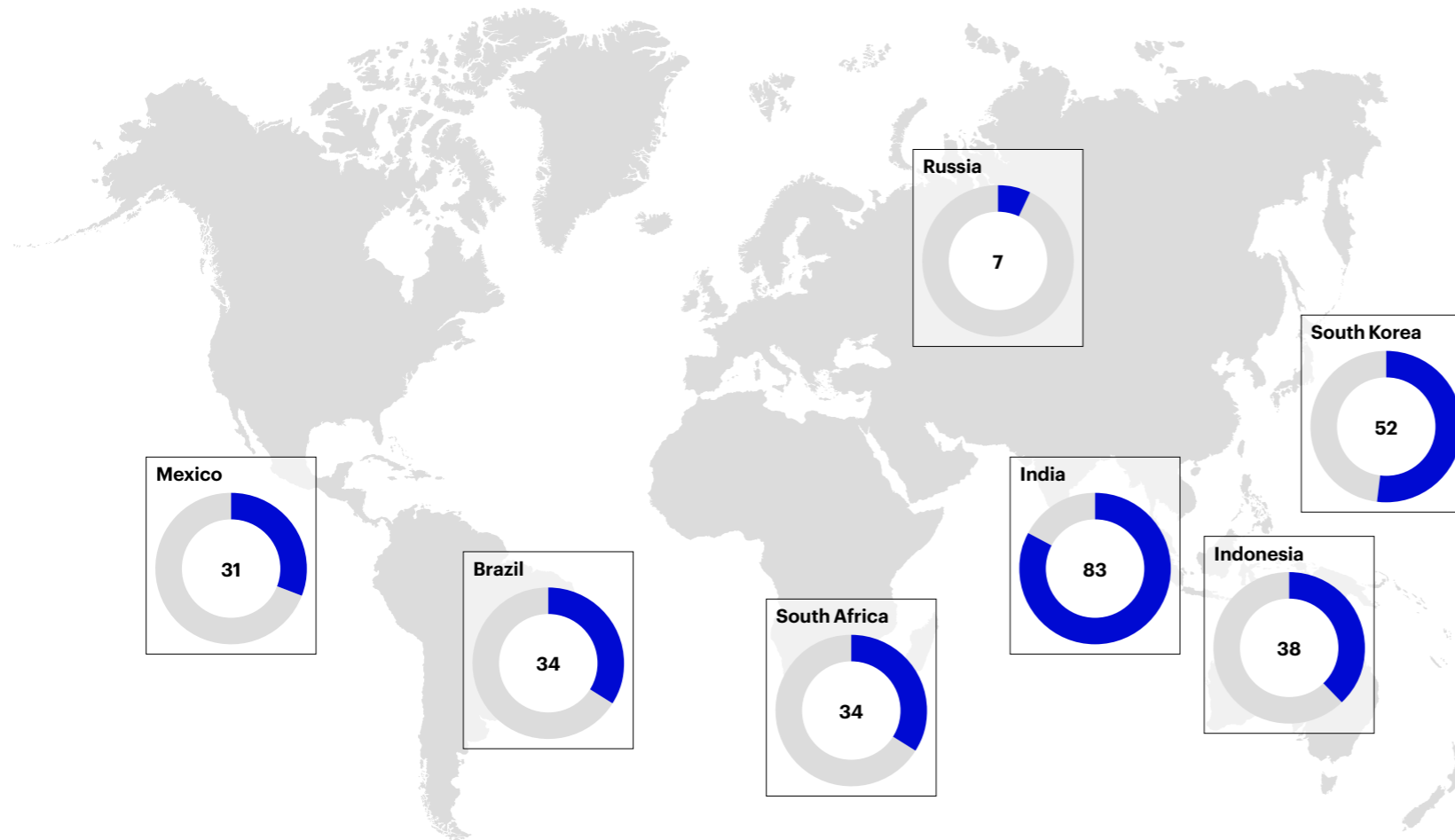
Source: IMF. 'Other' means not USD, Euro, Renminbi, Yen, Sterling, AUD, CAD, CHF, or unallocated.

By combining emerging market assets with our traditional reserve holdings, we believe we can create a more robust and resilient portfolio.

Central bank
Middle East

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Figure 5.13
Attractive emerging markets for increasing exposure (% citations, CBs only)



Which of the following emerging markets do you see as attractive for increasing your exposure? Sample size: 29.

This growing appetite for emerging market assets points to a recognition among central banks of the potential for these markets to deliver higher returns and additional diversification benefits when paired with traditional reserve assets. "By combining emerging market assets with our traditional reserve holdings, we believe we can create a more robust and resilient portfolio," noted one central bank from the Middle East.

Among the emerging markets, India, South Korea, and Indonesia are seen as the most attractive destinations for increasing exposure (**figure 5.13**). India, in particular, has emerged as a key focus for many central banks, with its strong economic growth prospects, expanding consumer market, and rising geopolitical influence making it an increasingly important destination for reserve allocations. As a central bank from the West explained, "India has a large and growing population, rapid economic growth, increasing domestic consumption."

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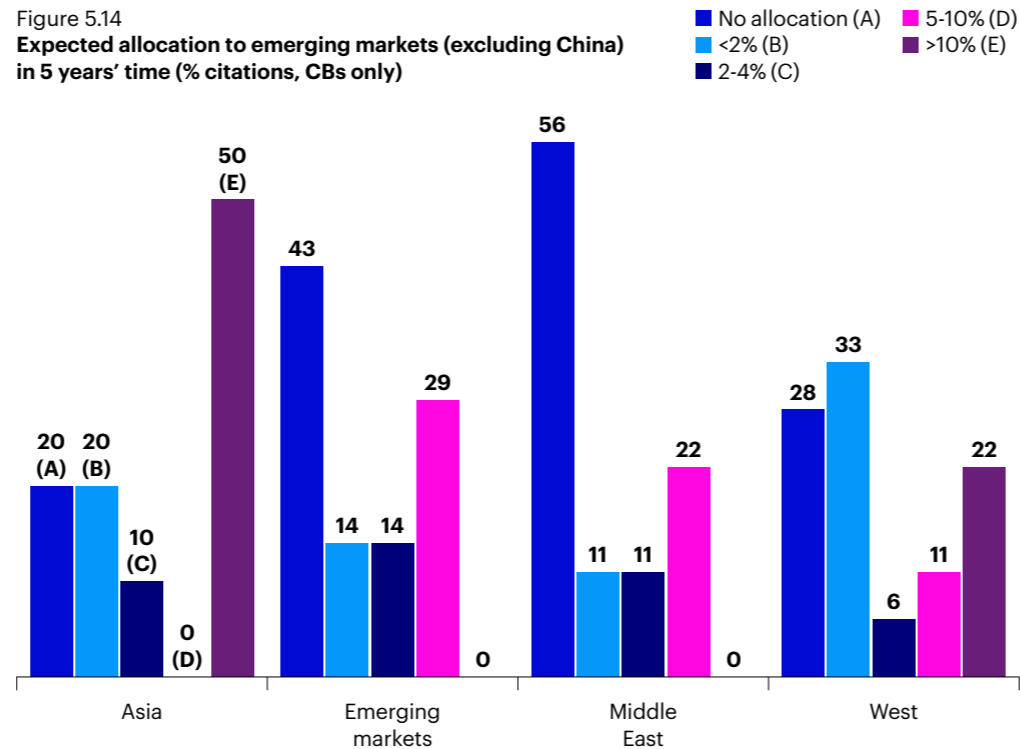
South Korea and Indonesia are also seen as attractive options for central banks seeking to diversify their emerging market exposure. South Korea's advanced economy, strong export sector, and world-class technology industry make it a relatively stable and low-risk option for reserve allocation, while Indonesia's large population, abundant natural resources, and strategic location in Southeast Asia make it an increasingly important player in the global economy.

Interestingly, the study reveals that central banks in Asia are the most likely to increase their emerging market allocations in the coming years (figure 5.14). This reflects a growing trend of intra-regional investment and economic integration in Asia, as countries in the region seek to reduce their dependence on developed market economies and build stronger ties with their neighbours.

As one central bank from Asia explained, "We see tremendous opportunities for growth and investment within Asia, and we are actively seeking to increase our exposure to the region's most dynamic and promising economies. By strengthening our economic ties, we believe we can create a more stable and prosperous future for all of us."

As these economies continue to grow and mature, and as their financial markets become more sophisticated and integrated with the global economy, they are likely to offer an increasingly compelling proposition for central banks seeking to diversify their reserves and achieve their long-term investment objectives.

Figure 5.14
Expected allocation to emerging markets (excluding China) in 5 years' time (% citations, CBs only)



What do you think your allocation to emerging markets (excluding-China) will be in 5 years' time? Sample size: 44.

We see tremendous opportunities for growth and investment within Asia, and we are actively seeking to increase our exposure to the region's most dynamic and promising economies.

Central bank
 Asia

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Conclusion

While the US dollar remains the dominant reserve currency, the study reveals some concerns about rising US debt levels and the potential risks associated with its continued dominance. However, finding viable alternatives has proven to be a challenge and the prospect of a unified BRICS currency is being viewed with scepticism.

Against this backdrop, gold is an increasingly attractive option for central banks seeking to hedge against various risks and diversify their reserves. The precious metal's status as a stable, reliable, and apolitical asset has made it particularly appealing in an uncertain world.

Meanwhile, the growing interest in emerging markets, particularly in Asia, reflects a broader trend towards greater diversification and the search for higher returns. While investing in these markets comes with its own set of risks and challenges, the overall trajectory is clear, with central banks increasingly looking beyond traditional reserve currencies to navigate a changing global landscape.

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Sample and methodology

The fieldwork for this study was conducted by NMG between January and March 2024. Invesco chose to engage a specialist independent firm to ensure high quality objective results. Key components of the methodology include:

- A focus on the key decision makers within SWFs and central banks, conducting interviews using experienced consultants and offering market insights rather than financial incentives.
- In-depth (typically 1 hour) face-to-face interviews using a structured questionnaire to ensure quantitative as well as qualitative analytics were collected.
- Results interpreted by NMG's team with relevant consulting experience in the global asset management sector.

In 2024, we conducted interviews with 140 organisations: 83 SWFs and 57 central banks. The 2024 overall sample is split into two core segmentation parameters: sovereign investor profile and region. Additionally, the SWF sample is broken down by size and the central bank sample is broken down by region.

Figure 6.1
Overall sample, by segment

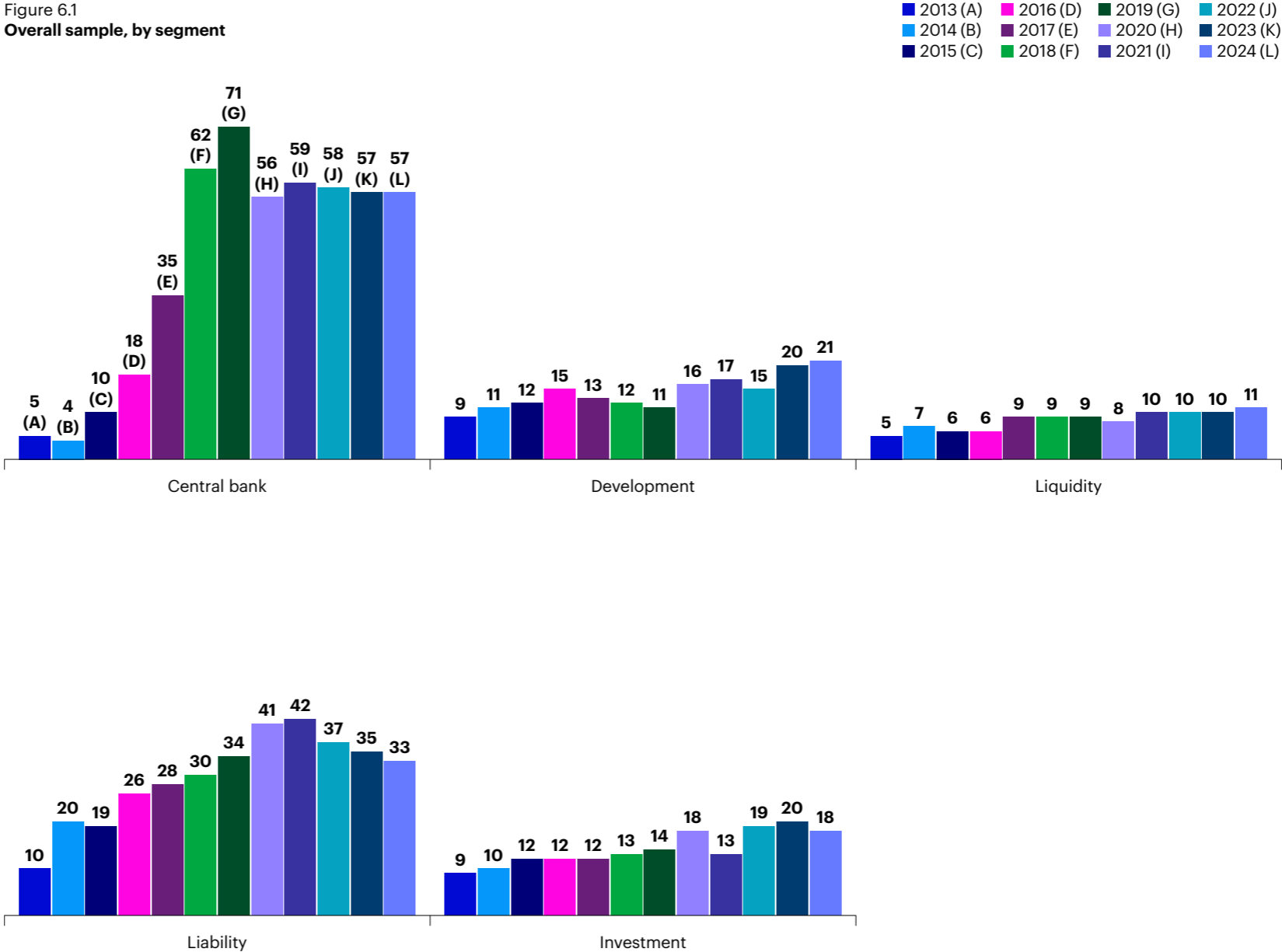


Figure 6.2
Overall sample, by region

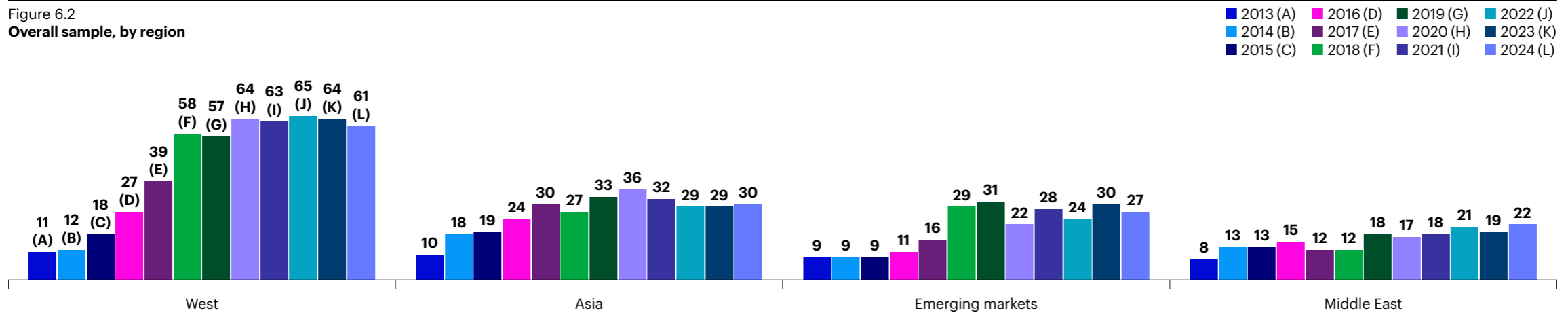


Figure 6.3
SWF sample, by assets under management

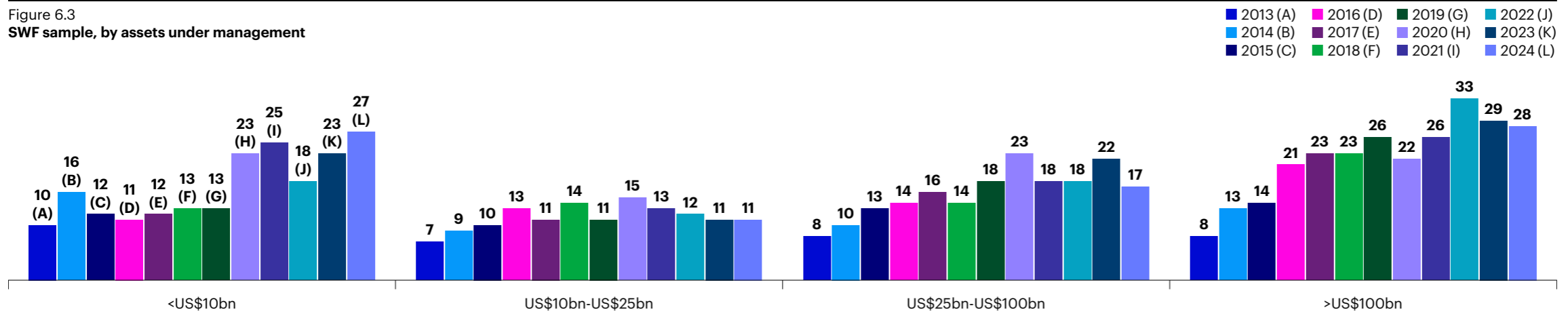
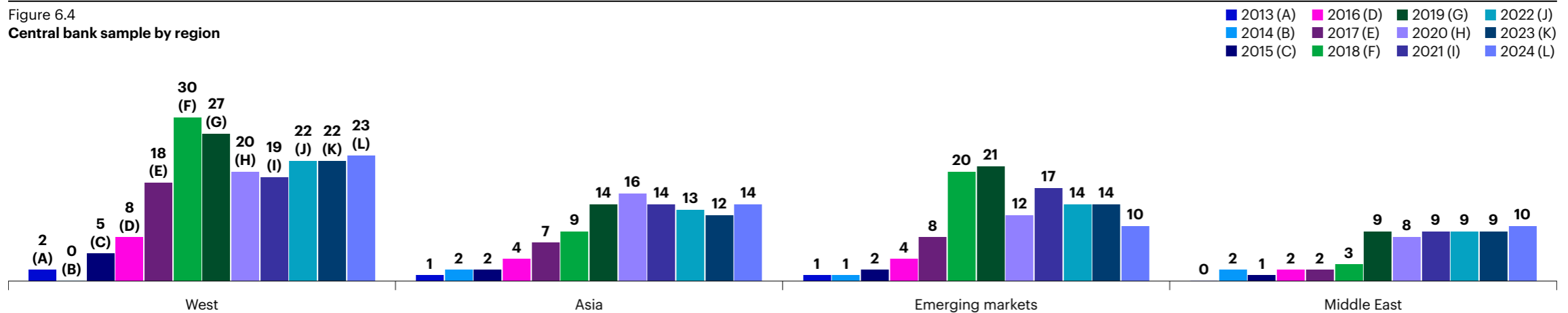


Figure 6.4
Central bank sample by region



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Defining sovereign investors

There are distinct segments of sovereign investors, determined in the first instance by their objectives. This framework is outlined below.

Investment sovereigns

Investment sovereigns have no specific liabilities that they are intended to fund. This typically means this segment invests with a particularly long-time horizon and high tolerance for illiquid and alternative asset classes. Long investment return objectives tend to be high, reflecting an ability to capture additional return premia.

Liability sovereigns

Liability sovereigns in contrast are intended to fund specific liabilities, liability sovereigns are sub-segmented into those which are already funding liabilities (current liability sovereigns) vs those where the liability funding requirement is still in the future (partial liability sovereigns). Liability sovereigns generally seek to match their portfolio with the duration of the liabilities they are funding. Those where funding requirements are still well into the future resemble investment sovereigns in their approach; those with significant current funding requirements tend to still have a diverse long-term portfolio but will be more liquid and higher yielding.

Liquidity sovereigns

Liquidity sovereigns operate so they can act as a buffer in the event of economic shocks. They are most commonly located in emerging markets which are prone to exchange rate volatility and / or in resource-based economies which are highly exposed to fluctuations in commodity prices. Because of the priority placed on being able to deploy capital predictably and at short notice. Liquidity sovereigns invest with a much shorter time horizon and with a focus on liquidity ahead of returns.

Development sovereigns

Development sovereigns are only partial portfolio investors. Their principle objective is to promote domestic economic growth rather than achieve an optimal risk / return portfolio trade-off. This is pursued by investing in strategic stakes in companies which make a significant contribution to the local economy to promote expansion and growth in employment. They pursue portfolio strategies with their other assets which are usually influenced by the size and characteristics of their strategic stakes.

Central banks

Central banks have a range of domestic roles in their economy – banking to government, issuance of currency, setting of short-term interest rates, managing money supply, and oversight of the banking system. Central banks also have a range of external facing roles, including managing foreign exchange rate policy and operations, including payments for imports / receipts for exports and government overseas borrowings. Central banks hold substantial reserves to support those functions and ensure they are seen as credible. Those reserves have traditionally been invested with a priority on capital preservation and liquidity.

Figure 6.5
Sovereign profile segmentation

Primary objective	Capital preservation & liquidity	Investment & liquidity	Investment & liability funding	Investment & development	Investment only
Global sovereign segment	Central banks	Liquidity sovereigns	Liability sovereigns	Development sovereigns	Investment sovereigns

Time horizon & illiquidity tolerance →

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Investment risk

The value of investments and any income will fluctuate (this may partly be the result of exchange rate fluctuations) and investors may not get back the full amount invested.

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