Geopolitical risk dashboard

BlackRock

September 30, 2024

Geopolitical Risks – September update

Geopolitical risk remains structurally elevated, in our view. The world is entering the third geopolitical era after the Cold War and post-Cold War eras and is seeking a new equilibrium. Yet competition is ongoing, with a significant risk of conflict. Against this backdrop, we maintain our three geopolitical themes for the year: deeper fragmentation between competing geopolitical and economic blocs; a more volatile and less predictable world order and an acceleration of globalization rewiring.

2024 has been the biggest election year in history, with countries representing over half the global population voting. Many incumbents have lost power as voters express discontent with a variety of issues, including the lingering economic effects of the Covid-19 pandemic. The U.S. election will be a major geopolitical event. Polls suggest a tight race. We are tracking the implications of different scenarios in key areas such as taxes, trade, regulation and foreign policy.

Key highlights this month include:

- We highlight our *Middle East regional war* risk. Recent exchanges between Israel and Hezbollah, including the assassination of Hezbollah leader Hassan Nasrallah, have significantly increased tensions and could tip hostilities into a full-blown conflict. Additional involvement by Iran and its Resistance Front proxies would further escalate the situation. In Gaza, a ceasefire agreement for an exchange of hostages looks out of reach as the war between Israel and Hamas hits its one-year anniversary. The conflict is likely to extend into next year.

- We keep our *U.S.-China strategic competition* risk at a high level. Though the U.S. and China are stiving for stability ahead of the U.S. election, intense competition remains under the surface. We are especially focused on tensions in the South China Sea, where an accident or intentional escalation risks involving the U.S.

- We reaffirm our high *Russia-NATO conflict* risk rating. Ukraine's advance into Russia's Kursk region is the largest foreign incursion into Russia since World War Two. Russia has responded with continued pressure in eastern Ukraine and airstrikes across the country. Ballistic missile shipments from Iran mark a new escalation. We don't currently see the basis for a ceasefire or diplomatic solution.

Our dashboard features both data-driven market attention barometers and judgment-based assessments of our top risks. We show market attention to each risk, assess the likelihood of it occurring over a six-month horizon and analyze its potential market impact.

Our BlackRock Geopolitical Risk Indicators (BGRIs) track market attention to each risk using mentions in brokerage reports and financial news stories. They integrate natural language processing and machine learning techniques. This assessment helps determine when geopolitical risks start to appear on investors' radar screens – and when they start fading.

We also have developed a market movement measure that we believe gives us insights into how asset prices are responding to geopolitical risks. It integrates analysis from our Risk & Quantitative Analysis (RQA) team and its Market-Driven Scenarios (MDS) for each risk. The gauge's score is based on how similar the market environment is to the MDS assumptions and how much the MDS-related asset prices have moved over the past month. See the "How it works" section. We also list the three assets that we see as the key variables of each MDS.

We continuously update our risk scenarios and refine our methodologies. Our scenarios are hypothetical and do not reflect all possible outcomes. Our market movement analyses are not recommendations to invest in any specific investment strategy or product.

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Top 10 risks and our view

Risk	Description	Likelihood	Our view
U.S. China strategic competition	Tensions escalate meaningfully over Taiwan or in the South China Sea.	High	The U.S. and China are seeking stability. The two sides are maintaining open lines of communication across many dimensions, including in the military area. We could see a final meeting between President Joe Biden and President Xi Jinping this year. Yet a new normal of intense competition churns beneath the surface. Persistent and large-scale exporting of excess industrial capacity by China has become the next driver of friction with the U.S. and others. Technology competition remains front and center. See our *Global Technology decoupling* risk. In the military space, the U.S. is particularly focused on tensions in the South China Sea. Increased frictions between China and the Philippines over the Sabina Shoal and Second Thomas Shoal pose a meaningful risk of miscalculation or accident, and risk bringing in the U.S. as a treaty ally of the Philippines. Conflict over Taiwan remains a risk over the medium- and long-term and would have a significant global economic impact. The U.S. and its allies are focused on China's support for the Russian war effort, which could lead to additional U.S. sanctions, as well as the increased frequency of joint exercises between China and Russia.
Global technology decoupling	Technology decoupling between the U.S. and China significantly accelerates in scale and scope.	High	The U.S. and China are engaged in a long-term, zero-sum technological competition that is at the center of the U.S.-China relationship. They are pursuing targeted decoupling, focused especially on advanced technologies like AI, semiconductors, and quantum computing, as well as technologies with military applications. We are monitoring expected Biden administration action regarding digitally connected vehicles, bulk data security, AI reporting, updated chip export controls, and the first-ever outbound investment restrictions focused on key technologies, especially semiconductors and AI. We expect the U.S. to continue to leverage technoeconomic measures like tariffs, sanctions and export controls in either a Harris or second Trump administration. China has responded to date by investing in its own capabilities and building out self-reliance. It has tightened export controls on critical minerals and is considering retaliatory economic actions, particularly against Europe. We expect ongoing tension and the development of parallel, competing tech stacks as a result.
Russia-NATO conflict	The war in Ukraine becomes protracted, raising the risk of escalation beyond Ukraine.	High	Russia's invasion of Ukraine is the largest, most dangerous military conflict in Europe since World War Two. Ukraine went on the offensive in August when it launched a surprise ground assault into Russia's Kursk region and seized 500 square miles of territory. However, Russia continues its push in the Donbas and Ukraine remains in a vulnerable position. Russia is receiving significant military support from Iran, including drones and ballistic missiles, as well as major financial backing and dual-use items from China. Ongoing policy debates concern whether Western countries will permit and support long-range arms to be used to strike within Russia, and whether this can bring about some effort to resolve the conflict. We see a ceasefire or diplomatic solution as unlikely this year. For now, the war is likely to remain a continued war of attrition and battle between the two sides' industrial bases – while the risk of escalation and direct conflict between Russia and NATO remains.
Middle East regional war	Regional conflict escalates, threatening energy infrastructure and increasing volatility.	High	Tensions between Israel and Iran's Resistance Front allies continue to rise, with Israel's northern border with Lebanon the current flashpoint. Israel and Hezbollah's near-daily rocket exchanges have displaced people on both sides of the border, and a series of actions in September have significantly escalated the situation. These include an Israeli attack on Hezbollah communications systems, heavy Israeli airstrikes in Lebanon that caused the deadliest day there since the end of the country's civil war in 1990, and, most recently, the assassination of Hezbollah leader Hassan Nasrallah. Both sides have talked of a "new phase" in the fighting, and the risk of full-blown conflict is significant. Other potential sources of escalation are Iran's recent steps to accelerate its nuclear capacity and to deepen its collaboration with Russia. In Gaza, a ceasefire agreement for an exchange of hostages continues to be out of reach as the war between Israel and Hamas hits its one-year anniversary – and there is still no agreed plan for post-war governance and security in Gaza. Israeli operations in Gaza are likely to persist into next year.

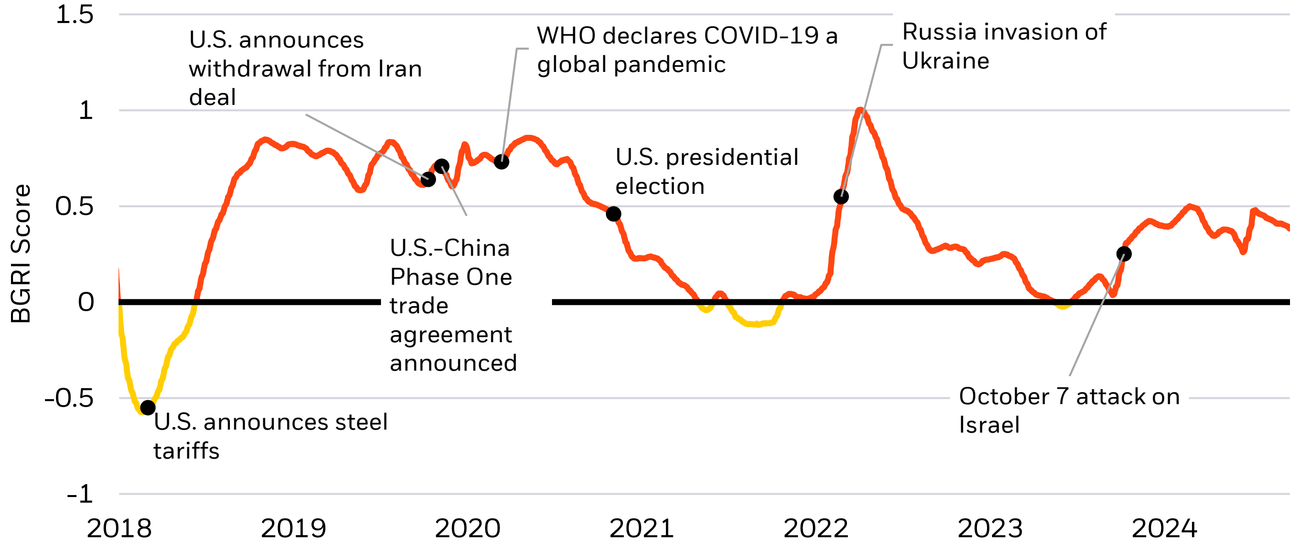
Risk	Description	Likelihood	Our view
Major terror attack(s)	A terror attack leads to significant loss of life and commercial disruption.	High	The threat of terrorism against U.S. interests is at an extraordinarily high level. U.S. law enforcement and intelligence agencies have cited violent extremists, lone actors, and the emergence of new terrorist hotspots as major areas to watch. The FBI has warned of terrorists drawing inspiration from events abroad to attack the U.S., and recent reports have flagged increased vulnerability in the West stemming from decreased investment in counterterrorism efforts. Al-Qaida and the Islamic State keep rebuilding their global reach, showing increased motivation and capability to conduct attacks abroad. The Sahel region is of particular concern as military takeovers have threatened the West's efforts to fight against terrorism. We see heightened risk of terrorism ahead of the U.S. presidential election.
Major cyber attack(s)	Cyber attacks cause sustained disruption to critical physical and digital infrastructure.	High	Market attention to cyber attacks has reached all-time highs this year. Mounting geopolitical competition will likely cause cyber attacks to increase in scope, scale, and sophistication, we think. Intelligence officials continue to uncover state-backed hackers who have been infiltrating and pre-positioning malware in critical national infrastructure – with the intent to cause disruption and destruction in the outbreak of future conflict. A June hack against a cloud storage company could be one of the biggest-ever data breaches and underscores the threat to cloud infrastructure. We see cyber activity increasing in conflict zones and particularly around elections. Iran has become more aggressive in its foreign influence efforts, and in August U.S. intelligence announced that Iran-based hackers targeted the Trump, Biden and Harris campaigns.
Emerging markets political crisis	Increased global fragmentation severely stresses EM political systems and institutions.	Medium	Emerging market (EM) economies have been boosted by central bank rate cuts and resilient developed market (DM) growth. Yet China's challenged economic activity and the long-term costs of fragmentation present risks to EM. We expect divergence in EM outcomes after a series of important EM elections in 2024 and are watching the U.S. election in November as a key signpost. While countries like India, Mexico, and Vietnam are likely to benefit from supply chain diversification, others with substantial short-term debt obligations like Argentina remain vulnerable despite domestic policy adjustment. We worry about a lack of international cooperation on debt relief and the impact of a record number of global conflicts around the world.
North Korea conflict	North Korea pushes ahead with its nuclear buildup and takes provocative actions such as missile launches.	Medium	In January, Kim Jong Un renounced peaceful reunification with South Korea as a key policy goal. Since May, North Korea has launched thousands of trash-filled balloons into South Korea. These ballons have disrupted flights and become a new source of tension. In the meantime, North Korea's nuclear program continues unabated. We see increased risk of further provocation or even military action as Kim looks to build leverage ahead of the U.S. elections. North Korea is growing notably closer to Russia, to which it has become a top arms supplier. This was underscored by President Vladimir Putin's June visit to Pyongyang for the first time in two decades. Russia and North Korea signed a strategic partnership agreement and signaled a deeper, more extensive defense relationship. In response, South Korea and Japan are bolstering their defenses and strengthening ties with each other and the U.S.

Risk	Description	Likelihood	Our view
Climate policy gridlock	Developed economies fail to increase public investment or take action to achieve net-zero emission targets.	Medium	The world is seeking to deliver on decarbonization commitments and energy security goals as damaging weather and heat-related incidents increase in frequency and magnitude. Clean energy will increasingly become a source of geopolitical competition, we think, benefiting those who can control and access it. In the U.S., the Inflation Reduction Act will help accelerate the development and deployment of low-carbon technologies, in our view. Countries may have to choose between cheap clean tech and more protectionist, security-oriented industrial policy. We think this year's U.S. election represents a pivotal point for the implementation of clean energy legislation.
European fragmentation	Subdued economic growth and persistent inflationary pressures amid fragile energy security lead to a populist resurgence.	Low	Market attention to European fragmentation is up sharply since last year. Europe remains largely united on key issues: increasing European Union (EU) competitiveness, building up its strategic autonomy, and supporting Ukraine. These themes are evident in Mario Draghi's recent competitiveness report. Disagreements are largely centered on execution and financing. Several issues could strain European cohesion going forward. These include migration, which last year reached the highest levels since 2016, and Europe's approach to China. Revision of the EU Stability and Growth Pact fiscal rules following their suspension during COVID could also put some individual national governments into conflict with Brussels. The latest EU parliamentary elections in June saw centrists retain power, with right-wing and anti-establishment parties gaining ground. In Germany, voters in two eastern states delivered a far-right party its best result since WWII. In July, the Labour Party won the UK election in a landslide. Following snap elections in late June, France's recently appointed minority government will face difficult 2025 budget negotiations this fall – with lingering question marks around government stability and EU budget clashes.

Sources: BlackRock Investment Institute. Views and data as of September 2024. Notes: The "risks" column lists the 10 key geopolitical risks that we track. The "description" column defines each risk. "Attention score" reflects the BlackRock Geopolitical Risk Indicator (BGRI) for each risk. The BGRI measures the degree of the market's attention to each risk, as reflected in brokerage reports and financial media. See the "how it works" section on p.7 for details. The table is sorted by the "Likelihood" column which represents our fundamental assessment, based on BlackRock's subject matter experts, of the probability that each risk will be realized – either low, medium or high – in the near term. The "our view" column represents BlackRock's most recent view on developments related to each risk. This is not intended to be a forecast of future events or a guarantee of future results. This information should not be relied upon by the reader as research or investment advice regarding any funds or security in particular. Individual portfolio managers for BlackRock may have opinions and/or make investment decisions that may, in certain respects, not be consistent with the information contained herein.

Geopolitical risk framework

BlackRock Geopolitical Risk Indicator



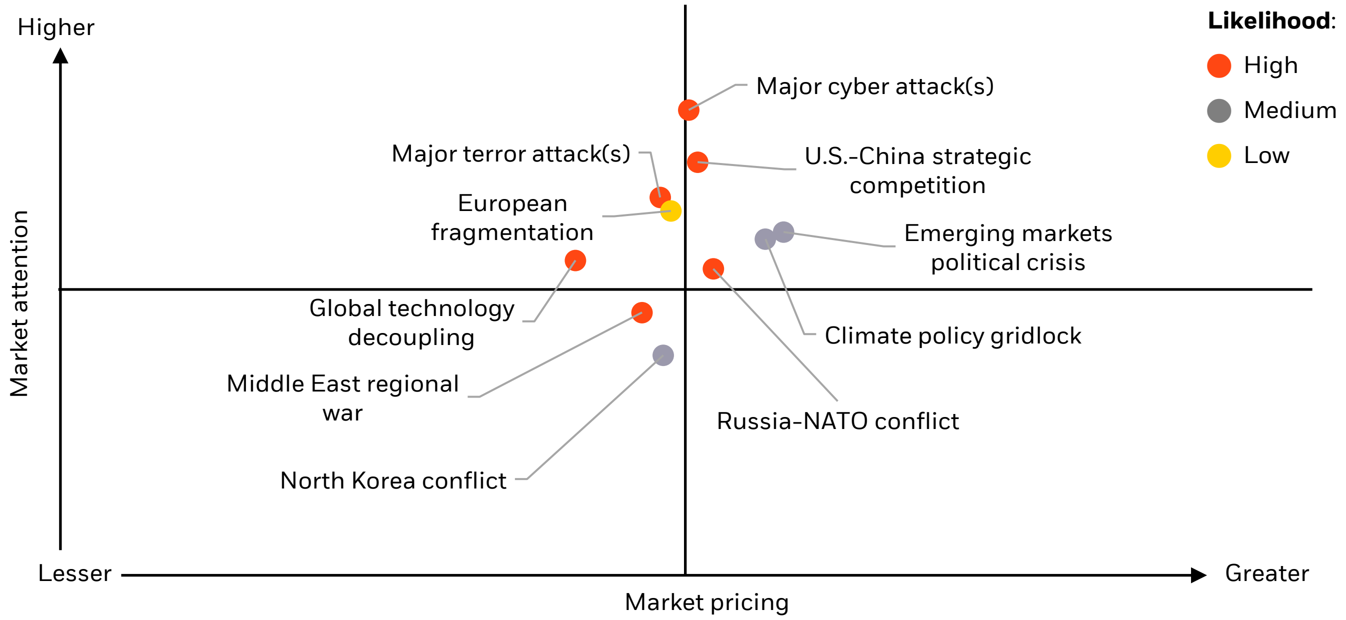
Forward-looking estimates may not come to pass. Source: BlackRock Investment Institute, September 2024. Notes: The BlackRock Geopolitical Risk Indicator (BGRI) tracks the relative frequency of brokerage reports (via Refinitiv) and financial news stories (Dow Jones News) associated with specific geopolitical risks. We adjust for whether the sentiment in the text of articles is positive or negative, and then assign a score. This score reflects the level of market attention to each risk versus a five-year history. We assign a heavier weight to brokerage reports than other media sources since we want to measure market attention to any particular risk, not public.

The BlackRock Geopolitical Risk Indicator aims to capture overall market attention to geopolitical risks, as the line chart shows. The indicator is a simple average of our top-10 risks. Markets are most focused on the risk of *Major cyber attack(s), U.S.-China strategic competition,* and *Major terror attack(s).*

We highlight our *Middle East regional war* risk as recent exchanges between Israel and Hezbollah have significantly increased tensions. We maintain a high *U.S.-China strategic tensions* risk given escalating tension between China and the Philippines in the South China Sea. And we reaffirm our high *Russia-NATO conflict* risk rating due to Ukraine's advance into Russia's Kursk region and Russia's strong response.

Risk map

BlackRock Geopolitical market attention, market movement and likelihood



Forward-looking estimates may not come to pass. Source: BlackRock Investment Institute, September 2024. Notes: The vertical axis depicts the market attention to each of our top-10 risks, as reflected in brokerage reports and financial media and measured by the BlackRock Geopolitical Risk Index (BGRI). The horizontal axis shows our estimate of the degree to which asset prices have moved in accordance with our risk scenarios (horizontal axis). See the "How it works" section on p.7 for details. The color of the dots indicates our fundamental assessment of the relative likelihood of the risk – low, medium or high, as per the legend. Some of the scenarios we envision do not have precedents – or only imperfect ones. The scenarios are for illustrative purposes only and do not reflect all possible outcomes as geopolitical risks are ever-evolving. The chart is meant for illustrative purposes only. This material represents an assessment of the market environment at a specific time and is not intended to be a forecast of future events or a guarantee of future results. This information should not be relied upon by the reader as research or investment advice regarding any funds, strategy or security in particular.

Key scenario variables

How to gauge the potential market impact of each of our top-10 risks? We have identified three key "scenario variables" for each – or assets that we believe would be most sensitive to a realization of that risk. The chart below shows the direction of our assumed price impact.

Risk	Asset	Direction of assumed price impact
U.S.-China strategic competition	Taiwanese dollar Taiwanese equities China high yield	▼ ▼ ▼
Global technology decoupling	Chinese yuan U.S. investment grade Asia ex-Japan electrical equipment	▼ ▼ ▼
Russia-NATO conflict	Russian equities Russian ruble Brent crude	▼ ▼ ▲
Middle East regional war	Brent crude oil VIX U.S. high yield credit	▲ ▲ ▼
Major terror attack(s)	Germany 10-year government bond Japanese yen Europe airlines sector	▲ ▲ ▼
Major cyber attack(s)	U.S. high yield utilities U.S. dollar U.S. utilities sector	▼ ▲ ▼
Emerging markets political crisis	Latin America consumer staples sector Emerging vs. developed equities Brazil debt	▲ ▼ ▼
North Korea conflict	Japanese yen Korean won Korean equities	▲ ▼ ▼
Climate policy gridlock	U.S. building products sector U.S. construction materials sector U.S. utilities	▼ ▼ ▲
European fragmentation	EMEA hotels & leisure Italy 10-year government bond Russian ruble	▼ ▼ ▼

Source: BlackRock Investment Institute, with data from BlackRock's Aladdin Portfolio Risk Tools application, July 2022. Notes: The table depicts the three assets that we see as key variables for each of our top-10 geopolitical risks – as well as the direction of the assumed shocks for each in the event of the risk materializing. The up arrow indicates a rise in prices (corresponding to a decline in yields for bonds); the down arrow indicates a fall in prices. Our analysis is based on similar historical events and current market conditions such as volatility and cross-asset correlations. See the "implied stress testing framework" section of the 2018 paper Market-Driven Scenarios: An Approach for Plausible Scenario Construction for details. For illustrative purposes only. The scenarios are for illustrative purposes only and do not reflect all possible outcomes as geopolitical risks are ever-evolving. This material represents an assessment of the market environment at a specific time and is not intended to be a forecast of future events or a guarantee of future results. This information should not be relied upon by the reader as research or investment advice regarding any funds, strategy or security in particular.

How it works

The quantitative components of our geopolitical risk dashboard incorporate two different measures of risk: the first based on the market attention to risk events, the second on the market movement related to these events.

Market attention

The BlackRock Geopolitical Risk Indicator (BGRI) tracks the relative frequency of brokerage reports (via LSEG) and financial news stories (Dow Jones News) associated with specific geopolitical risks. We adjust for whether the sentiment in the text of articles is positive or negative, and then assign a score. This score reflects the level of market attention to each risk versus a five-year history. We use a shorter historical window for our COVID-19 risk due to its limited age. We assign a heavier weight to brokerage reports than other media sources since we want to measure market attention to any particular risk, not public.

Our updated methodology improves upon traditional “text mining” approaches that search articles for predetermined key words associated with each risk. Instead, we take a big data approach based on machine-learning. Huge advances in computing power now make it possible to use language models based on neural networks. These help us sift through vast data sets to estimate the relevance of every sentence in an article to the geopolitical risks we measure.

How does it work? First we augment a pre-trained language model with broad geopolitical content and articles representative of each individual risk we track. The fine-tuned language model then focuses on two tasks when trawling though millions of brokerage reports and financial news stories:

- classifying the relevance of each sentence to the individual geopolitical risk to generate an attention score
- classifying the sentiment of each sentence to produce a sentiment score

The attention and sentiment scores are aggregated to produce a composite geopolitical risk score. A zero score represents the average BGRI level over its history. A score of one means the BGRI level is one standard deviation above its historical average, implying above-average market attention to the risk. We weigh recent readings more heavily in calculating the average. The level of the BGRIs changes slowly over time even if market attention remains constant. This is to reflect the concept that a consistently high level of market attention eventually becomes “normal.”

Our language model helps provide more nuanced analysis of the relevance of a given article than traditional methods would allow. Example: Consider an analyst report with boilerplate language at the end listing a variety of different geopolitical risks. A simple keyword-based approach may suggest the article is more relevant than it really is; our new machine learning approach seeks to do a better job at adjusting for the context of the sentences – and determining their true relevance to the risk at hand.

Market movement

In the market movement measure, we use Market-Driven Scenarios (MDS) associated with each geopolitical risk event as a baseline for how market prices would respond to the realization of the risk event.

Our MDS framework forms the basis for our scenarios and estimates of their potential one-month impact on global assets. The first step is a precise definition of our scenarios – and well-defined catalysts (or escalation triggers) for their occurrence. We then use an econometric framework to translate the various scenario outcomes into plausible shocks to a global set of market indexes and risk factors.

The size of the shocks is calibrated by various techniques, including analysis of historical periods that resemble the risk scenario. Recent historical parallels are assigned greater weight. Some of the scenarios we envision do not have precedents – and many have only imperfect ones. This is why we integrate the views of BlackRock’s experts in geopolitical risk, portfolio management, and Risk and Quantitative Analysis into our framework. See the 2018 paper Market Driven Scenarios: An Approach for Plausible Scenario Construction for details. MDS are for illustrative purposes only and do not reflect all possible outcomes as geopolitical risks are ever-evolving.

We then compile a market movement index for each risk.* This is composed of two parts:

1. Similarity: This measures how “similar” the current market environment is to our expectation of what it would look like in the event the particular MDS was realized. We focus on trailing one-month returns of the relevant MDS assets.
2. Magnitude: This measures the magnitude of the trailing one-month returns of the relevant MDS assets.

These two measures are combined to create an index that works as follows:

- A value of 1 would means that asset prices reacted in an identical way as our MDS indicated.
- A value of zero would indicate that the pattern of asset prices bears no resemblance at all to what the MDS for a particular risk would indicate.
- A value of -1 would indicate that asset prices are moving in the opposite direction to what the MDS would indicate. Markets are effectively betting against the risk.

*This material represents an assessment of the market environment at a specific time and is not intended to be a forecast of future events or a guarantee of future results. This information should not be relied upon by the reader as research or investment advice regarding any funds, strategy or security in particular. The scenarios are for illustrative purposes only and do not reflect all possible outcomes as geopolitical risks are ever-evolving.

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