

Supply Chain 3.0

Prologis Supply Chain Intelligence Report



Inaugural Survey Reveals Executive Focus on Continuity, Sustainability, Automation and AI in Supply Chains

As we enter 2025, executives are at a pivotal moment in the global supply chain landscape with near-term uncertainties in the economy and geopolitics set against the long-term need to incorporate technology and meet sustainability goals. Leaders are losing sleep over supply chain issues, how to invest and what to prioritize to stay ahead of the competition.

We know this because The Harris Poll talked to and surveyed over 1,000 executives in the US, UK and Germany,¹ while Prologis Research augmented the poll's findings by mining internal data and insights from our ecosystem that sees 2.8% of the global GDP. The Harris Poll surveyed 1,025 business executives in the US, UK, and Germany, with a third of the participants representing organizations with more than \$2 billion in annual revenue.²

This inaugural report offers an insider's look at the mindset, challenges, and opportunities executives anticipate when it comes to the future of supply chains.

66% of executives report sleepless nights due to supply chain concerns.

1. The study was conducted from September 4-19, 2024.
2. The online survey is not based on a probability sample and therefore no estimate of theoretical sampling error can be calculated.

An Unmatched Polycrisis

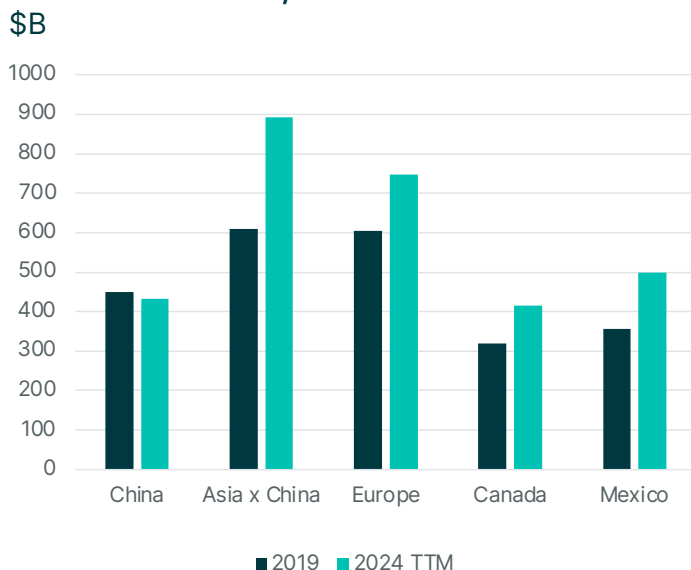
Global supply chains face an unmatched “polycrisis,” a web of challenges that span geopolitical tensions, economic instability, shifting regulatory pressures, fluctuating customer demands and pressing climate challenges. This crisis is compelling businesses to develop more flexible strategies to navigate constant disruption.

Geopolitics reshape supply chains

Rapidly changing trade policies, unexpected sanctions and tariffs, and unstable trade routes are forcing companies to reassess their global strategies. Consequently, 86% of executives report that economic instability and geopolitical pressures are influencing their manufacturing and storage decisions. As Ryan Petersen, CEO of Flexport, observes, “Tariffs and regulations are not just cost factors. They’re reshaping how and where businesses operate.”

In the U.S., tariffs implemented since 2017, combined with pandemic-related disruption, have prompted a China Plus One strategy, which [Prologis Research believes would continue if tariffs are expanded](#). As exhibited, U.S. companies have mainly diversified their sourcing to other Asian nations and Mexico, with barriers to onshoring expected to persist.

IMPORT VOLUMES, 2019 VS. CURRENT



Source: U.S. Census Bureau.

86% of executives cite economic instability and geopolitical pressures as impacting supply chain decisions.



Safeguarding against catastrophe

Ninaad Acharya, co-founder and CEO at Fulfillment IQ, emphasizes: “We’re prioritizing robust strategies to ensure that our operations can withstand the next black swan event,” and so are 87% of business executives. The goal is to ensure business continuity through agile, adaptable operations that can respond quickly to unexpected, rare, but potentially catastrophic, events.

While the pandemic was perhaps the ultimate disruption, supply chain executives also navigated congestion and labor actions on the East and West coasts of the U.S., Red Sea attacks, effects of drought on the Panama Canal and a bridge collapse in Baltimore, among others. [Prologis Research points to long-term drivers such as demographics,](#) geopolitical shifts and more frequent extreme weather as evidence that major supply chain disruptions will persist.

87% of executives prioritize strategies that safeguard against black swan events.

Unpreparedness puts performance at risk

Despite heightened awareness of supply chain vulnerabilities, many organizations remain underprepared. Only about 40% of executives feel their organizations have the tools, resources and strategies to tackle such challenges as cybersecurity attacks, technological disruptions and regulatory changes. Preparedness drops even further for issues like geopolitical instability, trade wars and climate crises, highlighting significant vulnerabilities. Lack of preparedness doesn’t just heighten risk: It directly compromises organizational performance and the ability to adapt to unforeseen disruptions.

PREPAREDNESS FOR POTENTIAL EVENTS

Cybersecurity attacks	42%
Technological disruptions	41%
Regulatory changes	40%
Supply chain consolidation	40%
Labor market fluctuations	39%
Economic downturn	37%
Geopolitical instability	37%
Trade wars	36%
Climate crisis	35%
Global pandemic	34%



Greener Supply Chains

In response to escalating climate concerns, intensifying regulatory pressures, and rapidly evolving consumer and investor expectations, executives are reexamining plans and taking decisive actions to make operations more sustainable.

Transition to renewable energy not happening fast enough

Recent disruptions highlight the need to [transition to alternative energy sources](#). Businesses also need to comply with new regulations and want to save on operational costs. Eight-five percent of executives are accelerating a transition to renewable energy to meet regulatory pressure and 71% feel pressure to do so. At the same time, 79% acknowledge they need to speed up the transition within the next 24 months. Lessons learned from Russia’s invasion of Ukraine, where, depending on the location, energy prices notched up to 10 times the volatility, underscore renewable energy as a method of cost containment, as well.

71% of executives feel regulatory pressure to transition to renewable energy sources.

GLOBAL PRICE OF NATURAL GAS, EU \$U.S./BTU (Real)



Source: International Monetary Fund, global price of natural gas, EU.



Green real estate at the forefront

Real estate with sustainable features is a key lever, with 87% of executives recognizing that adopting green real estate solutions is essential for sustainable supply chain operations, and 85% saying they are critical to the long-term viability of their business. By incorporating building-level solutions—such as [renewable energy](#), [battery storage](#), [energy-efficient heating/cooling systems](#), [EV charging](#) and [sustainable materials](#)—companies can reduce carbon emissions while boosting operational efficiency.

ROI: sustainability's uphill battle

Despite the benefits, 80% of executives cite unclear return on investment (ROI) as a major roadblock in allocating resources to green initiatives. Compounding the issue, 72% of executives admit their current sustainability efforts have fallen short of corporate objectives.

80% cite unclear ROI as a top barrier to sustainability investments.

Sustainability takes root in corporate culture

Despite the hurdles, 87% of executives plan to increase investments in sustainable supply chain practices when financial pressures ease. In fact, 88% of executives not only express a genuine desire to incorporate sustainability into their supply chains but also care personally about their organization's long-term sustainability goals. Their commitment reflects a deeper and ongoing shift in the corporate mindset. As Vogue Business's Executive European Editor Kirsty McGregor notes, "Sustainability has evolved from an optional enhancement to a central aspect of supply chain management."



A Tipping Point in Technological Transformation

The convergence of artificial intelligence and automation is creating unprecedented opportunities for supply chain optimization. By 2030, 81% of executives anticipate AI and the integration of automation in supply chain management will be a high priority. As McGregor notes, “AI and automation are beginning to unlock significant efficiencies in the supply chain, setting the stage for a decade of innovation.”

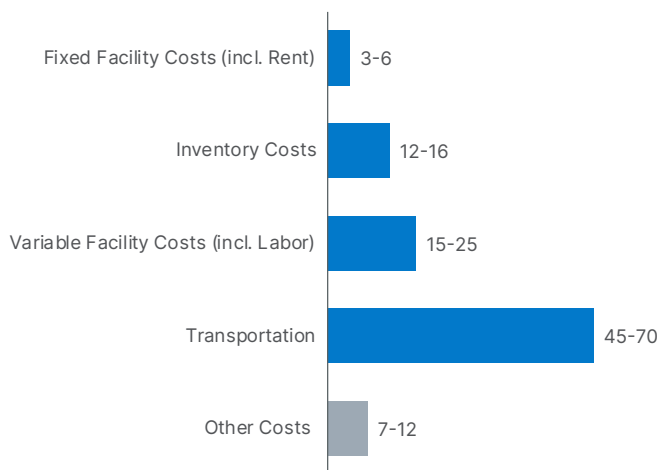


81% of executives see AI and automation transforming supply chains through the foreseeable future.

New tools for a new era

Cloud-based technologies, transportation management systems (TMS) and IoT solutions will emerge as the backbone of supply chains over the next decade, optimizing logistics operations in real time. This evolution will increase speed, flexibility and productivity. With transportation comprising more than 50% of supply chain costs, the potential impact of innovation is huge. Petersen highlights the economic impact, suggesting that even a 10% reduction in shipping costs could lead to a 1% decrease in overall goods prices, a change with significant implications for a global economy dealing with variable inflation trends.

DISTRIBUTION OF SUPPLY CHAIN COSTS %



Source: Deloitte, AT Kearney, IMS Worldwide, Prologis Research, CBRE Supply Chain Advisory.

Obstacles and optimism

While 70% of executives admit “It is difficult to identify where to allocate supply chain investment for maximum return,” there remains an undercurrent of optimism. As Acharya shared, “2025 could mark a significant turning point, where we start seeing the real benefits of our investments in automation and AI across the supply chains.” Moreover, as technologies mature and integration improves, the gap between expectations and outcomes will narrow.

TOP SUPPLY CHAIN SOLUTIONS IN THE NEXT 10 YEARS

AI-driven demand forecasting	40%
Cloud-based supply chain management platforms	39%
Flexible transportation management systems (TMS)	37%
Customer-centric order management systems (OMS)	37%
Real-time inventory management systems	37%
Collaborative supply chain networks	35%
Blockchain for supply chain transparency	33%
IoT-enabled supply chain monitoring	32%
Robotics and automated warehousing	30%
On-demand manufacturing	30%

Conclusion

Insights gleaned from business executives paint a picture of an industry at a crossroads, facing unprecedented challenges but also poised for transformative change. Ultimately, companies able to strike a balance, between pursuing short-term supply chain goals amid uncertainty and investing in shifts that may take decades, will stay ahead of what’s next.