SUPPLY CHAIN RESILIENCY

The past few years have tested supply chain resiliency in extraordinary ways. To improve supply chain resiliency, decision makers must first understand the many complex contributing factors. This topic had already been receiving considerable attention in the years leading up to the pandemic, owing mostly to the prevalence of disruptive forces impacting global supply chains.

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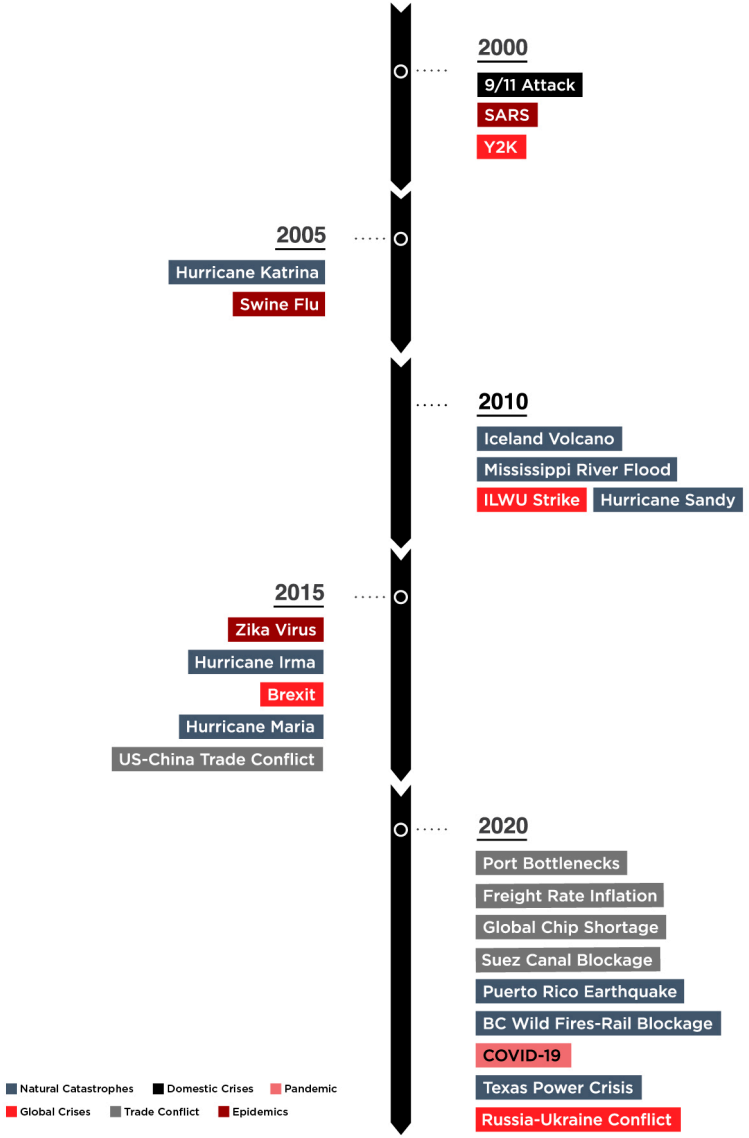

The timeline graphic highlights many of these disruptive forces over time. Over the past couple of decades, while many companies engaged in global manufacturing and/or trade have been taking steps to increase the resilience of their supply chains, a surprisingly large number have not.

Then COVID came along, and everything changed. Executives all over the world had their company's resiliency tested, and there was an overwhelming level of dismay over how ineffective their legacy plans proved to be.

Let's start by grounding ourselves in the meaning of the term "resilient."

To characterize a supply chain as resilient, it must do one of two things after a significant disruptive event:

- ***Absorb the impact of the event and regain its original form (and performance) within an acceptable timeframe.***
- ***Transform itself quickly enough to stay ahead of its competition in a modified form.***

Achieving a suitable level of resilience is a lofty goal for companies. It can require investments with uncertain or nebulous ROI, or it can increase operating cost that's difficult to justify. Much like buying insurance or investing in marketing, the investments require an element of faith that they'll deliver a return some day in the future.

Achieving resilience is not easy, precisely because of the number of drivers that impact it. The table below provides a list of drivers, along with a characterization of linkage between the driver and a company's resilience.

A best practice is for companies to rank themselves in each of these areas and create a plan to address identified gaps. By identifying what is known and controllable in a supply chain's systems and people, decision makers can better prepare for future disruptions.

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Key Drivers:

Risk Awareness

The ability to plan for contingencies relies on being able to recognize potential disruptions as early as possible. The disruptions can come in many forms (political, economic, regulatory, supply continuity, pandemic, geological, etc.). Some are "black swan" events, but many build up over time.

Distributed Supply

This driver is restricted to regionally focused disruptive events, such as trade wars, earthquakes, etc. Over-dependence on too few suppliers or having too many in the same country/region makes sourcing shifts a long and painful process. Having a more globally distributed supply base allows shifts to take place with relative ease. The second aspect to consider is the tier 2 supply. Many companies who focus only on their direct suppliers neglect the risk of over-dependence on the second tier, and overlook that their directs may be all sourcing from the same supplier or country/region.

Distributed Demand

Similar to the supply side, over-dependence on customers in too few countries/regions puts companies at greater risk in the event of a disruption. The second dimension of this is channel diversity, which became very evident in the face of COVID-19, when companies selling consumer goods with underdeveloped direct-to-customer channels found themselves losing ground to competitors who had invested in this channel.

De-risked Manufacturing Location(s)

When a company has its own manufacturing capabilities, the site locations themselves have associated risks (in multiple areas). Understanding those risks and having a plan to mitigate risks that result from an event that negatively impacts manufacturing is a critical aspect of resilience.

Distributed Manufacturing Footprint

When a company has its own manufacturing capabilities, over-dependence on too few sites exposes companies to a potentially massive risk of not meeting demand if a catastrophic event were to impact a site.

Distributed Inventory

Deploying inventory in too few stocking locations can be a problem if the disruptive event is narrowly focused on a primary stocking location. A great example is a fire that destroys a warehouse full of product.

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Agile Technology
The ability to modify technology to enable any level of transformation in an operating model is critical. Many companies find this to be the most significant hurdle in transformation.

Agile Partners
Companies depend on many service providers and business partners to operate. If those partners cannot keep pace with the need to transform, they will slow you down and/or make the change painful, negatively impacting performance.

Transportation Agility
Any shift in supply, demand, stocking locations or delivery model will force companies to rapidly alter their physical flows. If this process is slow or painful, it will interfere with the transformation.

Warehousing Agility
As with transportation, disruptions often compel companies to stand up new stocking locations quickly. If they have never outsourced, for example, learning this in the midst of a disruption is sure to slow things down and/or cause performance issues.

Advance Knowledge of Changing Trade and Other Regulations
Significant changes to trade regulations & tariffs can be very disruptive. Sensing this type of disruption early allows you to begin contingency planning. If it's significant enough to trigger a sourcing shift, getting a jump on securing available materials and manufacturing capacity may allow you a significant advantage over competitors.

Lean Decision Making Model
Companies with complicated governance models and an excessive need for consensus will have trouble making decisions quickly, which will interfere with transforming.

Effective Business Continuity Planning
Being able to activate a business continuity plan the instant a disruption happens is obviously a key driver. Making sure that people are safe and can continue to work overrides purely commercial considerations.

It's not a reasonable goal to seek perfection in each of these areas; not in the short term anyway. It is, however, important to begin with an assessment, followed by some reflection on the level of resilience you seek for your company. Many companies are already well down a few of these paths, while others have but scratched the surface. Whichever group you're part of, there's still work to do.

Many companies consider agility and resilience to be somewhat synonymous. An alternative view might be that resilience is achieved as a result of decisions made in the design of a company's operating model, whereas agility is more focused on execution. In other words, a certain level of resilience is baked into the operating model, providing what you may call the first level of resilience. When a disruption actually happens, the speed at which you can adapt is the very definition of agility.

Even the most agile company who doesn't have resilience baked into their operating model will fail to thrive in a disruptive environment.

This is exactly why we're advocating for a more holistic perspective on this critically important topic. As disruptions continue to manifest across the globe, resilience becomes increasingly important, and the time to act is now.

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