Geopolitical Briefing

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Geopolitics Is Weaponizing Supply Chains and Creating a Lower-Trust Global Economy

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Introduction

The use of booby-trapped pagers and walkie-talkies is not only the latest chapter in the decades-long on-and-off conflict between Israel and Hezbollah, it is also one of the first times that rigged communications devices have been used in a large-scale attack. This is a step up from efforts in the past to disrupt supply chains for the purposes of espionage, sabotage, or targeted killings.

This incident also highlights the vulnerability of complex supply chains involving multiple stages of production and component suppliers in different countries. This will put even more pressure on companies to step up their security measures and either bring production back home or move it to allied countries.

While breaking into supply chains is hardly new...

Here are a few key examples:

- In the late 2000s, Israel, in cooperation with the United States, developed a cyberweapon called Stuxnet. It infiltrated Iran's uranium enrichment
 centrifuges, causing them to malfunction while making it look like an operator error. The virus, however, ended up accidently spreading to other
 computers around the world
- In 2013, National Security Agency whistleblower Edward Snowden revealed instances where U.S. intelligence agencies intercepted the supply chain
 of electronic devices in order to implant surveillance technology
- In 2018, Bloomberg reported that China had implanted a tiny chip in computer servers used by 30 companies and organizations, including Amazon,
 Apple, and the Pentagon. This chip allegedly allowed spies to manipulate servers and steal data¹

...it will only heighten suspicion between China and the United States

U.S. officials have long viewed the country's dependence on China for goods and services as a significant national security risk. This concern has driven recent efforts to rebuild critical supply chains, including initiatives such as subsidizing domestic chip production, banning Chinese telecom equipment, and proposing restrictions on Chinese software and components in autonomous vehicles.

Adding to these concerns is a reported Chinese intelligence operation to infiltrate U.S. power grids with malware that could disrupt essential services such as electricity and water. FBI Director Christopher Wray has warned that China has positioned cyber attackers to potentially "wreak havoc on our critical infrastructure at a time of its choosing," underscoring the looming cyber threats facing the United States.²

Meanwhile, China has been actively working to reduce its own reliance on foreign technology while tightening its focus on national security. Across Chinese cities, posters warning of espionage threats have become a common sight in public spaces such as sidewalks, subways, and college campuses. The Ministry of State Security regularly releases videos urging citizens to be vigilant against foreign spies.³

The weaponization of communications technology will raise further suspicions and is likely to spur both nations to take even more aggressive steps to reduce their economic dependence on each other in key sectors.

The challenge of protecting very complex supply chains

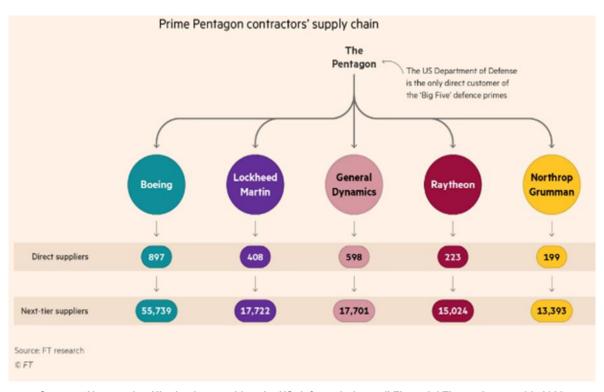
Many critical supply chains have tens of thousands of suppliers and span many countries. The U.S. defence sector provides a great example of this.

¹ "The Big Hack," Bloomberg, October 4, 2018

² "Exploding Pagers Raise Global Supply-Chain Security Concern," Bloomberg, September 20, 2024

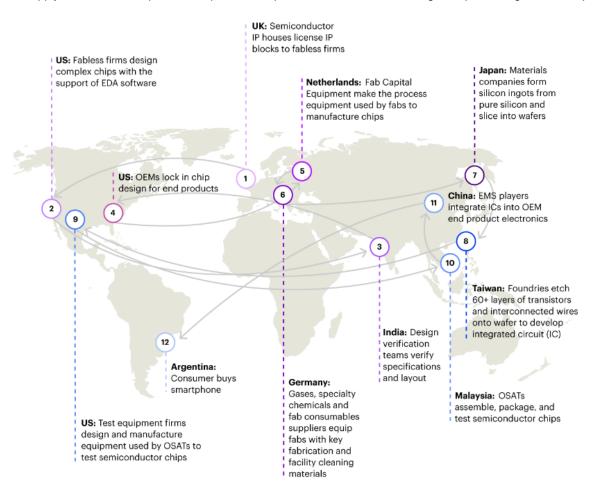
³ "China sees foreign threats 'everywhere' as powerful spy agency takes center stage," CNN, April 21, 2024





Source: "How arming Ukraine is stretching the US defence industry," Financial Times, January 31, 2023

The semiconductor supply chain is another prime example of a complex network, with different regions specializing in different parts of the process.



Source: "How to harness the power of the Semiconductor Value Chain," Qualcomm, February 20, 2022



These are just two examples of the many industries where the supply chain was set up at a time when geopolitical tensions were much lower and decisions about where to locate operations were driven primarily by factors related to efficiency/profitability. Even less complex products, like televisions and dishwashers, rely on production processes that source components from suppliers across multiple countries. This widespread sourcing creates numerous points of potential vulnerability between manufacturing and final delivery.

Because of the tenser geopolitical landscape, not only will companies have to fully map out their supply chains to comply with laws regarding sanctions, human rights violations and the environment, they will also have to tighten security measures to ensure that their production processes are not compromised.

Indeed, Russia has already been testing imported chips since at least 2022 to certify their quality and ensure they don't contain 'back doors' that could allow Western spying or sabotage.⁴

Conclusion: A trade-off between national security and efficiency

The weaponization of communications equipment has highlighted the vulnerability of supply chains in strategic sectors such as semiconductors, pharmaceuticals, and defense. In addition to protectionism and geopolitical tensions, this is yet another reason companies will increasingly be forced to relocate production either domestically or to allied nations. To protect their operations, they will also need to implement tighter security measures such as more sophisticated testing facilities and possibly develop separate, back-up supply chains. Needless to say, that these measures will come with significantly higher operating costs.

Many existing supply chains in countries like China have been perfected over the span of decades. Moving these operations to new regions often results in higher costs owing to stricter regulations, higher wages, the need to retrain workers and building ecosystems from close to scratch. This means that instead of maintaining a global supply chain in which each country focuses on its competitive advantages, many major nations are now trying to restructure supply chains in key sectors for national security reasons, even if they lack expertise in those sectors.

In this tense geopolitical landscape, investors need to evaluate whether companies can raise prices to offset operating costs involved in moving supply chains. If they are unable to do so, it will be essential for investors to assess the extent to which companies are able to secure government support in the form of subsidies or tariffs in order to remain competitive.

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 $^{^4}$ "As Russian missiles struck Ukraine, Western tech still flowed," Reuters, August 8, 2022



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