

Geopolitical Conflicts and Their Repercussions on Cargo Movement in Vital Chokepoints

- A Case Study: Suez Canal and Strait of Hormuz

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Abstract

This research examines the legal and economic implications of geopolitical conflicts on shipping traffic through key maritime chokepoints, with a particular focus on the Suez Canal and the Strait of Hormuz as case studies. It analyzes the impact of various geopolitical disturbances on global supply chains, oil prices, and shipping rates, and assesses the effectiveness of the international legal framework governing maritime navigation in addressing these issues. The study employs a descriptive-analytical approach, a case study framework, and quantitative analysis of statistical data related to shipping activity and oil prices. Observations suggest that geopolitical frictions cause significant disruptions to the flow of high-cost goods and test the effectiveness of various international laws. To address these challenges, the study proposes several solutions, including strengthening and improving maritime security, developing alternative infrastructure, enhancing and strengthening diplomacy, reviewing and revising the legal framework, and fostering international cooperation to address these issues. Ultimately, the research concludes that improving the security of key maritime chokepoints is impossible without establishing joint international measures that contribute to the sustainability and stability of global trade.

Keywords: Geopolitical; Strait of Hormuz; Suez Canal; Global Supply Chains; Oil Prices; Maritime Security.

JEL Classifications:F51; F52; F14; F63; L92; Q41; Q43; K33; R40; O19.

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Introduction

Given the importance of maritime chokepoints, particularly the Strait of Hormuz and the Suez Canal, which represent the main arteries of international trade due to their capacity to handle massive volumes of oil and transcontinental goods, these chokepoints are located in areas of high geopolitical tension. Therefore, they are vulnerable to the effects of regional and international unrest and conflicts. Consequently, this will impact the countries of the region and, by extension, the global economy as a whole, by disrupting the flow of goods and increasing shipping costs, which will negatively affect the prices of essential commodities, especially oil.

1.1. Research Problem and Question

Research Questions

Main Question:

What are the economic and legal implications of geopolitical tensions on the movement of goods through the Suez Canal and the Strait of Hormuz? And what are the mechanisms for mitigating these consequences?

Sub-Questions:

- Which geopolitical issues have the greatest impact on the Suez Canal and the Strait of Hormuz during the period (2015-2025)?
- What are the direct and indirect economic impacts of these conflicts on shipping, goods, and global supply chains? What is the international legal framework governing traffic through these crossings, and how do geopolitical rivalries affect the success of this framework?
- What measures do states and international organizations use to address the challenges posed by geopolitical risks to the movement of goods through these crossings?
- What potential future threats and opportunities might arise from the intensification or continuation of geopolitical rivalries within these sensitive regions?

1.2. Research Gap

Despite the existence of studies discussing the impact of geopolitical conflicts on global trade and maritime security, a significant gap remains in research offering in-depth legal and economic analyses of the effects of these conflicts on specific strategic maritime chokepoints such as the Suez Canal and the Strait of Hormuz, particularly during the period 2015–2025. Previous work lacks a precise link between statistical data on cargo traffic and oil prices and the geopolitical events that accompanied them, along with a detailed legal analysis of the international instruments available to address these challenges. This research aims to fill this gap by presenting a case study supported by documented figures, graphs, and analytical tables, along with up-to-date and accurate scholarly documentation of the references used.

1.3. Research Significance and Scientific Contribution

The scientific significance of this research lies in its comprehensive approach to addressing the impact of geopolitical tensions on strategic maritime chokepoints, thus contributing to the development of knowledge regarding the challenges of international trade. The study's value is evident in several key elements:

- 1) **Integrated Analysis:** The research combines a detailed economic analysis of the movement of goods and oil prices with a legal analysis of the framework governing international navigation within a single geopolitical context. This integration provides a broad picture that facilitates a deeper understanding of the global maritime landscape.
- 2) **Case Study Supported by Real Figures:** The research employs an applied analysis of the Strait of Hormuz and the Suez Canal, supported by statistical data and illustrative charts. This strengthens the findings and provides clear quantitative evidence.
- 3) **Identifying Gaps and Formulating Practical Recommendations:** The research identifies shortcomings in the current legal framework and policies and proposes practical solutions to benefit decision-makers and international organizations.
- 4) **Reliance on Up-to-Date References:** The study draws upon reliable scientific sources from 2015 to 2025 in both Arabic and English, ensuring its content remains relevant to current developments.
- 5) **Future prospects:** The research provides a vision of the upcoming challenges and opportunities that can be exploited, and opens up new research areas for those interested in the geopolitical, economic and legal aspects.

2. Research Methodology

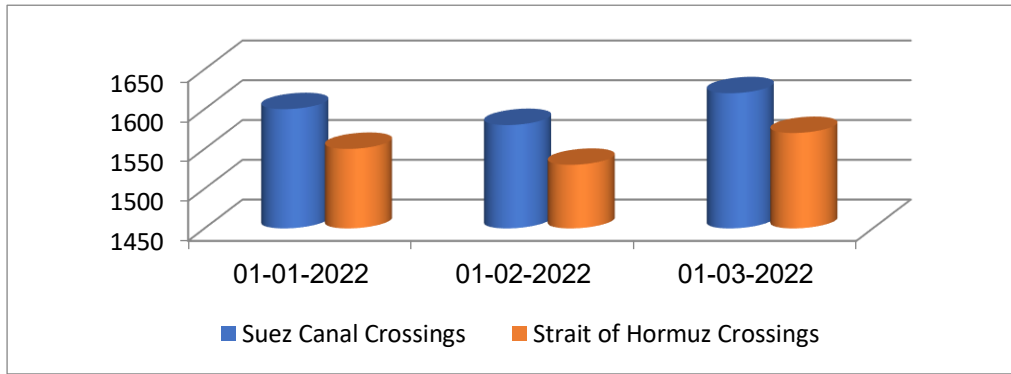
This study employs a composite methodology that provides a comprehensive view of the impact of geopolitical tensions on maritime traffic through the Suez Canal and the Strait of Hormuz. The research methodology is based on three main approaches:

- 1) **Descriptive-analytical approach:** This approach is used to analyze the nature of geopolitical conflict in the regions under study and to explain its direct repercussions on maritime trade and international navigation. This includes examining the international legal framework governing navigation in vital waterways and interpreting the legal mechanisms that govern the safe passage of ships.
- 2) **Case study:** The research focuses on the Strait of Hormuz and the Suez Canal as two strategic transit points that constitute a major artery for global trade and energy. The most prominent geopolitical events affecting these two waterways are discussed, and how the movement of goods and ships interacts with these events is analyzed.
- 3) **Quantitative approach and statistical analysis:** The research relies on the analysis of quantitative data on ship traffic and cargo flows through the two waterways, in addition to global oil price data from benchmark indices such as Brent crude and West Texas Intermediate. The analysis aims to highlight patterns and relationships between economic variables and the magnitude of geopolitical tensions. The data was collected from reliable sources including maritime statistics agencies and specialized data centers.

2.1. Statistical Analysis and Graphs

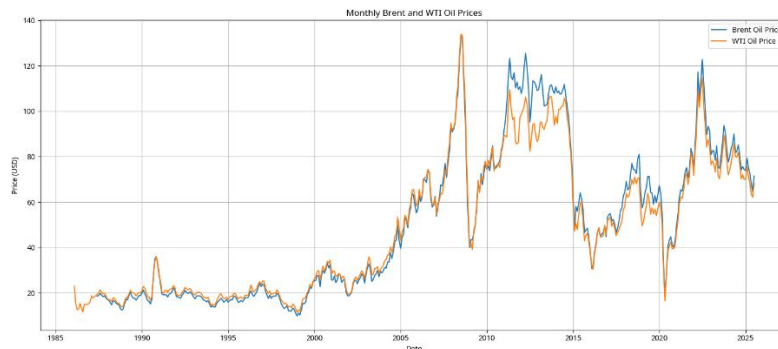
The study relied on collecting weekly data on ship transits through the Suez Canal and the Strait of Hormuz, in addition to daily data on Brent and West Texas Intermediate (WTI) crude oil prices. This data was converted into monthly indices to ensure a standardized timeframe and facilitate comparison and analysis.

Figure 1 shows the monthly evolution of transit traffic in the two waterways, as detailed in Table 1. Figure 2 illustrates the monthly trends in global oil prices during the study period, with further details provided in Table 2.

Figure 1: Monthly Passages of Ships along Suez Canal and Strait of Hormuz

Source: Adapted from:

- United Nations Conference on Trade and Development (UNCTAD). (2024). Review of Maritime Transport 2024. <https://unctad.org/publications-series/review-maritime-transport-2024>;
- Clarksons Research. (n.d.). Shipping Statistics and Market Intelligence. <https://www.clarkson.com/research>
- Organization for Economic Co-operation and Development (OECD). (2024). Main Indicators – Oil Prices. <https://data.oecd.org/energy/crude-oil-prices.htm>

Figure 2: Monthly Brent and WTI Oil Prices

Source: Adapted from: U.S. Energy Information Administration (EIA). (2025). International Petroleum Monthly. <https://www.eia.gov/opendata>

Table 1: Summary of Monthly Ship Crossing Data (Examples)

Date	Suez Canal Crossings	Strait of Hormuz Crossings
2022-01-31	1600	1550
2022-02-28	1580	1530
2022-03-31	1620	1570
...	...	...

Source: Adapted from:

- United Nations Conference on Trade and Development (UNCTAD). (2024). Review of Maritime Transport 2024. <https://unctad.org/publications-series/review-maritime-transport-2024>;
- Clarksons Research. (n.d.). Shipping Statistics and Market Intelligence. <https://www.clarkson.com/research>

- Organization for Economic Co-operation and Development (OECD). (2024). Main Indicators – Oil Prices. <https://data.oecd.org/energy/crude-oil-prices.htm>

Table 2: Summary of Monthly Oil Price Data (Examples)

Date	Brent Price (USD)	WTI Price (USD)
2022-01-31	85.00	82.50
2022-02-28	90.00	88.00
2022-03-31	105.00	102.00
...	...	...

Source: Adapted from: U.S. Energy Information Administration (EIA). (2025). International Petroleum Monthly. <https://www.eia.gov/opendata>

Initial statistical findings and graphs reveal significant changes in shipping traffic and oil prices, linked to periods of significant geopolitical events within the region during the study years. These relationships will be analyzed in greater depth in subsequent sections of the research, drawing on detailed case studies of the Suez Canal and the Strait of Hormuz.

3. Case Study:

3.1. Suez Canal

The Suez Canal is one of the world's most important trade routes, connecting the Red Sea and the Mediterranean Sea. A significant percentage of global shipping traffic passes through it annually—approximately 12% of total trade and a third of global container shipments. While it has weathered numerous geopolitical upheavals over the decades, the period between 2015 and 2025 witnessed a series of exceptional events, some sudden and others escalating, that directly impacted navigation through the canal and indirectly disrupted global supply chains.

3.1.1. Major Geopolitical Disputes and Their Influence on the Suez Canal (2015-2025)

Over the past decade, the Red Sea and Suez Canal region has transformed from a vital trade route into an arena of escalating tensions, where wars, crises, and accidental incidents have intersected to form a series of shocks that have disrupted global trade:

- 1) **The Yemen War and the Bab al-Mandab Strait Crisis since 2014:** Since 2014, the war in Yemen has been more than just a local conflict—its effects have spilled over into the Bab el-Mandeb Strait, the narrow waterway that serves as the southern gateway to the Red Sea and its access point to the Suez Canal. With the escalation of Houthi militia attacks on commercial vessels, the strait transformed from a safe passage into a dangerous area. By late 2023 and early 2024, the threats had reached their peak, prompting most major shipping companies to completely reroute their vessels around the Cape of Good Hope in Africa.[1] The result? Longer journeys by thousands of kilometers, soaring fuel and insurance costs, and delays in cargo delivery that have impacted millions of businesses that rely on on-time shipments. [5]
- 2) **Middle East Regional Tensions:** This wasn't the only dilemma. While ships were avoiding the Red Sea, regional tensions were escalating in the background. The escalation between Israel and Iran, and the outbreak of the Israeli-Palestinian conflict, all added another layer of instability. In most cases, no ship was directly targeted, but mere threats or reports of potential attacks were enough to disrupt shipping plans and force companies to make precautionary measures costing them millions of dollars. [3]

- 3) **COVID-19 Pandemic (2020-2022):** And amidst all this came the COVID-19 pandemic—not a war, but far more devastating in its unforeseen impact. Between 2020 and 2022, lockdowns and travel restrictions brought the world to a standstill, ports were clogged with stranded ships, and carefully planned shipping schedules collapsed. [27] When trade resumed, the Suez Canal found itself under immense pressure—as if it were the only remaining waterway—filling up with ships, becoming stuck, and having its capacity tested. [7]
- 4) **The 2021 Ever Given Incident:** Then came the moment the world suddenly ground to a halt in March 2021: the giant Evergreen, unlike any other ship in its size, ran aground in the middle of the canal, bringing traffic to a standstill for more than six days. There were no bombs, no missiles—just a sandstorm and human error. [8] But the consequences were catastrophic: billions of dollars in losses, hundreds of ships stranded, and global supply chains in turmoil. The incident not only demonstrated the world's dependence on the Suez Canal, but also its vulnerability—how a single accident, or a single stressful event, can reshape the global economy.

3.1.2. Economic Impacts on the Suez Canal

The Suez Canal is no longer just a waterway connecting two continents—it has become a vital artery through which the global economy breathes, and when this artery is disrupted, the whole world feels it. Over the past decade, tensions in the Red Sea and the Bab el-Mandeb Strait have not been mere news items on television screens; they have been decisions made in shipping company operations rooms, calculations recalculated in financial offices, and prices rising in consumer stores for reasons no one seemed to understand. When attacks on ships in Bab el-Mandeb began, and major shipping companies started avoiding the canal and rerouting their vessels around the Cape of Good Hope, the impact was not only on the profitability of the Suez Canal—but on Egypt's entire treasury. This canal is not just a passage; it is one of the most important sources of national income, and when ships reduce their transit, revenues decrease, development projects are threatened, and investments are postponed:

- **Forfeiture of Canal Revenues:** But the cost wasn't confined to Egypt. Every ship that travels thousands of kilometers longer uses more fuel and takes out more expensive insurance policies—because the risks are no longer just a possibility, but a daily reality. And these extra costs don't stay in the pockets of shipping companies. They are passed on, step by step, to store shelves, to the prices of vegetables and clothing, to consumers' bills in Europe, America, and Asia. Every item of merchandise that arrives late, or slightly more expensive, carries the imprint of these geopolitical tensions. [1]
- **Incurring Increased Shipping and Insurance Charges:** Even in the energy sector, where the canal doesn't transport crude oil in the massive quantities of the Strait of Hormuz, it's a vital route for refined products—gasoline, diesel, and liquefied natural gas—that fuel factories and homes. Any delay, even for just a few days, disrupts global energy markets and sends prices soaring at unexpected moments. [5]
- **Disruption of Global Supply Chains:** Supply chains are no longer just a technical term in management textbooks. They've become a daily reality: a factory in Germany waiting for spare parts from China, a consumer in Britain unable to find a favorite product on the shelves, a small business forced to postpone orders because a ship hasn't arrived. [26] All this as a result of a single disruption, a single route diversion, or the fear of a potential attack. [7]
- **Affect on Price of Oil:** Ultimately, the canal is no longer just a waterway. It's a barometer of global stability. And when it falters, it's not just the ships that rock—it's the confidence of the economy that falters, prices fluctuate, consumers complain, and we all realize: the world is still interconnected... and it's paying the price. [9]

3.1.3. Data Analysis Concerning the Suez Canal

In late 2023, something unusual began to happen in the Suez Canal: ships started disappearing. Not due to technical malfunctions, nor a slow season—but because a new fear had gripped the seas. With the escalation of Houthi attacks on ships in the Red Sea, the canal transformed from a bustling, vibrant waterway into an almost deserted route. Major shipping companies, which had once confidently traversed it, now preferred to circumnavigate Africa—even though it meant two extra weeks at sea, doubled costs, and increased carbon emissions.

Figure 1 in the methodology doesn't just show a decline... it depicts a void. The number of transiting ships plummeted, as if the waterway, once a bustling rush-hour thoroughfare, suddenly became an empty street in the middle of the night. And this decline wasn't just a dry statistic in a report—it was tangible. Between January and February 2024, trade through the canal fell by almost half. Half! This isn't just a decline; it's a fundamental shift in the course of global trade. This decline was not isolated from what was happening in the markets. As ships avoided the canal, oil prices rose—not because production stopped, but because the fear of supply disruptions put markets on edge. Figure 2 clearly shows: the more tension there was in the Red Sea, the higher the price rose on energy exchanges. The reason is simple: when a strategic waterway becomes unsafe, everything—from gasoline to medicine to spare parts—becomes more expensive and more prone to delays. [10]

This is not just a disruption to transportation. This is a shift in the dynamics of the global economy. The canal didn't close—but it stopped breathing. And the world, quite simply, began to feel suffocated.

3.2. Strait of Hormuz

The Strait of Hormuz is one of the most strategically important channels in the world, connecting the Arabian Gulf with the Arabian Sea and the Indian Ocean. Approximately one-third of the world's transported crude oil, as well as substantial volumes of liquefied natural gas, passes through it [11]. The region that borders the Strait is geographically at the core of Middle Eastern geopolitical rivalries, and it is a potential hot spot with global implications.

3.2.1. Significant Geopolitical Conflicts and Impact on the Strait of Hormuz (2015-2025)

The Strait of Hormuz is one of the most sensitive geographical points on the world map. This narrow waterway, separating the Persian Gulf from the Arabian Sea, is no more than 30 kilometers wide at its narrowest point—yet its importance extends to every corner of the global economy. Every day, roughly a third of the world's seaborne crude oil passes through it, along with enormous quantities of liquefied natural gas. Simply put: if the Strait of Hormuz were to close, the global economy would be paralyzed.

But this vital waterway is not located in a safe place. It lies at the heart of the geopolitical conflicts and rivalries that have plagued the Middle East for decades. From 2015 to 2025, the strait witnessed a series of tensions that made freedom of navigation through it a burning international issue.

- 1) **Iran - United States Tensions:** The most prominent of these challenges was the persistently tense relationship between Iran and the United States. The region never witnessed direct war, but it was always on the brink. Every time Washington imposed new sanctions or bolstered its military presence, Tehran responded with stark warnings: “If we cannot export our oil, neither can anyone else.” Such statements,[12] while often

interpreted as political pressure, are not mere rhetoric—they roil energy markets, unsettle businesses, and prompt countries to strengthen their naval presence to protect commercial vessels. [13]

- 2) **Regional Conflicts in the Gulf:** Over the past few years, the threats have not been mere words. The strait has witnessed a series of incidents: oil tankers subjected to mysterious attacks, some attributed to mines or drones, and ships suddenly detained under dubious legal pretexts. Each incident has driven up insurance costs, increased the need for military escorts, and forced some ships to take longer and more expensive alternative routes.
- 3) **Piracy and Terrorist Threats:** Regionally, other conflicts, such as the war in Yemen, have also had their impact. While the conflict may appear confined to the Arabian Peninsula, its security repercussions extend across the waters. Escalating maritime violence and Houthi attacks on ships are eroding confidence in the stability of navigation in the Gulf, making any further escalation capable of transforming the Strait into an undeclared battleground. [14]

Although piracy has declined in recent years—unlike the situation in the Indian Ocean years ago—terrorist threats or attacks on commercial vessels remain a possibility. The maritime environment in the region is still complex and fraught with tensions, where a single incident could ignite a larger crisis. In short, the Strait of Hormuz is not just a waterway. It is the nerve center of global energy and a barometer of stability in the Middle East. Whenever tensions flare in the region, oil markets are shaken, prices rise, and governments and companies begin preparing for worst-case scenarios.

3.2.2. Economic Impacts on the Strait of Hormuz

The geopolitical risk within the Strait of Hormuz doesn't just threaten ships — it threatens the architecture of global energy trade, exposing deep fractures in both economic resilience and international law:

- ↳ **World Oil Price Fluctuation:** The Strait isn't just a chokepoint — it's a psychological trigger. Under international law, it's a straits used for international navigation, protected under UNCLOS Article 38, which guarantees unimpeded transit. But law doesn't move markets — fear does. Even the mere suggestion of closure — whether from Tehran or Washington — sends oil prices soaring within hours. Why? Because the market doesn't wait for proof of disruption; it prices in the possibility of collapse. A single Iranian threat, a drone strike on a tanker, or a naval standoff — all are enough to fracture confidence. The Strait isn't just transporting oil; it's transporting global trust. And when that trust wavers, the price of energy spikes — not because supply vanished, but because the legal safety net feels paper-thin. [11]
- ↳ **Higher Cost of Shipping and Insurance:** Here, the economic and legal collide. International law guarantees freedom of navigation — but it doesn't guarantee safety. As threats escalate, insurers treat the Strait not as a legal right, but as a war zone. Premiums for oil tankers have surged by 300–500% during peak tensions, and many carriers now require military escorts or reroute entirely. These costs aren't absorbed by shipping firms — they're passed down, line by line, to the consumer. The legal principle of “freedom of the seas” becomes a hollow promise when the cost of exercising it becomes prohibitive. The result? A de facto privatization of risk — where the public pays for private security, and the law stands by, powerless. [13]
- ↳ **Impact on Oil-Based Economies:** For Gulf producers, the Strait isn't just a route — it's their economic constitution. Over 90% of Saudi and Emirati oil exports flow through it. Any disruption isn't an inconvenience — it's a constitutional crisis. Revenue forecasts collapse, budgets unravel, and social contracts fray. Meanwhile, importers — from India

to Germany — face a double blow: not only do they pay more for oil, but their energy security is now hostage to geopolitical whims. Legally, no state has the right to blockade the Strait — but economically, they don't need to. A threat alone is enough to destabilize markets. The law protects the right to pass — but it offers no protection against the economic coercion of fear.[15]

- ✦ **Explore Other Routes:** The search for alternatives isn't just logistical — it's a legal and economic admission of failure. Pipelines like the UAE's Fujairah route or Iran's proposed transit corridors sound like solutions, but they're Band-Aids on a hemorrhage. They lack the scale, flexibility, and speed of maritime transport. More critically, they expose new legal vulnerabilities: pipelines crossing borders invite new disputes over sovereignty, taxation, and liability — and they're even harder to protect than open seas. The law of the sea, for all its flaws, was designed for global access. Land routes? They're nationalized, politicized, and vulnerable to border closures — a far more fragile system. Investing in them isn't innovation — it's surrender to a world where the rule of law has been replaced by the rule of force. [16]

3.2.3. Data Analysis with Referenceto the Strait of Hormuz

Statistical records reveal a chilling truth: the Strait of Hormuz is not paralyzed by closures — it is held hostage by perception:

- ☑ **Market Reaction to Geopolitical Uncertainty:** Unlike the Suez Canal, where ships physically stopped, the Strait of Hormuz has never been fully shut — yet its waters tremble with every Iranian threat, every U.S. naval deployment, every intercepted tanker. The market doesn't wait for proof. It doesn't need a blocked channel. It only needs a whisper of risk. Within hours of a single statement — “We will close the Strait if pressured” — oil prices spike. (Figure 2). Why? Because the law guarantees freedom of transit under UNCLOS Article 38, but the market prices in the fragility of that guarantee. The legal right to pass is absolute — but the economic reality is conditional. The Strait operates not on rules, but on nerves. And when nerves fray, prices rise — not because a barrel disappeared, but because confidence vanished. [17]
- ☑ **The Illusion of Stability:** As of 2022, roughly 30,000 vessels — mostly oil tankers — transited the Strait annually, moving over 20 million barrels per day. That's more than a quarter of global oil. The numbers suggest stability. But they mask a deeper instability: the system is functioning despite the law, not because of it. Ships sail because the cost of rerouting is higher than the cost of risk — not because they feel safe. Every tanker that passes is a gamble. Every insurance policy is a bet that the next missile won't find its mark. [17] The law says: “You may pass.” The market says: “You may, but at what price?”

4. International Legal Framework for Navigation in Critical Chokepoints

In the world of global shipping, boundaries are drawn not only by maps but also by agreements. As ships flow through the Suez Canal or the Strait of Hormuz, they do not sail alone on open waters—they sail under the shadow of laws drafted decades ago, supposedly to protect them. But reality, as we know, does not always respect what is written on paper.

4.1. International Conventions and Laws

- 1) **United Nations Convention on the Law of the Sea (UNCLOS) of 1982:** The most important of these laws is the 1982 United Nations Convention on the Law of the Sea—the ocean's constitution, as it is often called. This document guarantees the right of every

ship, regardless of its flag or purpose, to transit through international straits without delay, inspection, or threat. At the heart of this freedom lies a fundamental principle: the sea is not land, and no state can close it off like a private street. [18].

- 2) **Constantinople Convention of 1888 on the Suez Canal:** The 1888 Convention of Constantinople didn't just declare the Canal "free" — it enshrined it as a neutral artery of global trade, immune to the ravages of war. No flag is barred. [19] No wartime belligerent may block it. No state may claim sovereignty over it as a strategic weapon. Legally, this was revolutionary: for the first time, a critical chokepoint was stripped of national privilege and elevated to the status of a common good, governed not by the sword, but by the ink of international agreement. Economically, this neutrality wasn't idealism — it was survival. It gave shipping companies certainty. It let insurers price risk rationally. It allowed capital to flow across continents without fearing that a war in Europe or a coup in Cairo would freeze trade. The Canal became more than a waterway — it became a financial instrument. A contract between nations that made global commerce possible.

4.2. Effect of Geopolitical Conflicts on the Effectiveness of the Legal System

Even with a robust framework of international law — from UNCLOS to the Constantinople Convention — geopolitical realities continue to test the gap between legal principle and economic consequence:

- ✓ **Undermining the Freedom of Navigation Principle:** International law enshrines freedom of navigation as an inviolable right, especially in strategic waterways like the Suez Canal and the Strait of Hormuz. Yet, in times of conflict, this right becomes conditional — not on legality, but on survival. During wartime, belligerents often treat merchant vessels as legitimate targets or bargaining chips, effectively nullifying their legal protections. The recent attacks by Houthi forces in the Red Sea are a stark example: despite no formal closure of the Canal, shipping companies rerouted around Africa because legal entitlement meant little against the threat of missiles. The market responded not to treaties, but to risk. When insurers refuse coverage and captains refuse passage, the law is rendered irrelevant — not repealed, but overridden by fear. The result? A de facto suspension of freedom of navigation, not through legal abrogation, but through economic self-preservation. [1]
- ✓ **Interpretation and Application of Laws:** One of the fundamental weaknesses of international law lies in its interpretive flexibility. While UNCLOS guarantees the right of transit passage, states exploit ambiguities during crises. Some, citing national security, impose restrictions on vessel movements, delay transits, or demand prior notification — practices that edge toward violations of the "continuous and expeditious" passage standard. Others uphold broad, liberal interpretations to preserve open seas. This divergence creates legal asymmetry: what one state calls "security," another calls "coercion." In practice, this means the same strait can be both free and restricted at once — depending on who's enforcing it. And in such ambiguity, markets falter, contracts break, and insurance premiums soar.
- ✓ **Inadequate Enforcement Mechanisms:** The authority of international law rests not on courts, but on consent. There is no global navy to enforce UNCLOS. No binding tribunal to sanction a warship that blocks a tanker. Enforcement depends on geopolitical will — which fluctuates with alliances, elections, and oil prices. During periods of high tension, powerful states may ignore rulings; weaker ones lack leverage to respond. Even when violations occur — such as unlawful detentions or attacks on commercial vessels — accountability is delayed, diluted, or abandoned altogether. The absence of immediate consequences emboldens actors to challenge norms, knowing that the cost of defiance is

often lower than the benefit of coercion. Legally, the rules exist. Economically, they are treated as optional.

- ✓ **Non-State Threats:** Perhaps the greatest legal anomaly is the rise of non-state actors like the Yemeni Houthis. Unlike sovereign states, these groups are not signatories to international maritime conventions. They do not recognize the legal distinctions between military and civilian vessels. And while states bear responsibility under international law for acts committed within their territory, holding them accountable — especially in failed or fragmented states — remains a legal gray zone. Attacking a ship via drone or missile from a rebel-held port does not trigger automatic state liability, creating a dangerous loophole. The law struggles to respond because it was designed for state-to-state conflict, not asymmetric warfare waged by militias with global reach. The result? A growing immunity gap — where violence occurs, but jurisdiction evaporates. [20]

4.3. Strategies and Recommendations

To shield global trade from the escalating volatility of geopolitical conflict, the world must move beyond wishful thinking — and build systems that account for the reality that law alone cannot protect ships when fear takes command:

- 1) **Improving Maritime Security:** Naval patrols and intelligence-sharing are necessary — but not sufficient. The creation of coalitions like Operation Prosperity Guardian signals political will, but not operational certainty. These initiatives work only when states share not just data, but risk. When a French frigate and a U.S. destroyer patrol together, it's not just about deterrence — it's about signaling to markets that the legal right to transit is backed by credible force. But when participation is fragmented, inconsistent, or politically selective, the message becomes noise. The economic cost? Higher insurance premiums, longer transit times, and rerouted cargo — all paid by consumers, not navies. [21].
- 2) **Fostering Alternate Infrastructures:** Building land corridors or oil pipelines to bypass chokepoints sounds like rational risk diversification — until you calculate the price. A single pipeline from the Gulf to the Red Sea costs tens of billions and takes over a decade to complete. And even then, it merely shifts vulnerability from sea to soil — exposing new points of failure: border disputes, sabotage, or political shutdowns. Economically, these alternatives are not replacements — they're expensive insurance policies with long waiting periods. Legally, they complicate matters further: who owns the pipeline? Who regulates its transit? International law has no clear framework for cross-border energy corridors in contested regions. The result? A patchwork of national interests, not a global solution. [16]
- 3) **Fostering Political Settlements and Diplomacy:** The most durable fix isn't a warship — it's a peace deal. But diplomacy is the least funded, most neglected tool in the toolbox. While billions are spent on naval deployments, diplomatic channels with Iran, Yemen, or Houthi intermediaries remain under-resourced and politically toxic. Yet history shows: when trust is built — even incrementally — navigation resumes. The 1988 U.S.-Iran maritime understanding after the Iran Air Flight 655 incident, or the 2022 Red Sea ceasefire talks, prove that dialogue, however fragile, can restore flow. The economic return on diplomacy is not immediate — but it is exponential. A single negotiated pause in hostilities can save the global economy billions in avoided rerouting and inflation. [22]
- 4) **Reinvigorating the international legal framework:** The laws governing the sea — UNCLOS, Constantinople Convention — were written for a world of states, not drones and militias. Today, a Houthi drone strike on a tanker isn't a violation of maritime law; it's a legal black hole. There is no tribunal to prosecute non-state actors, no mechanism

to hold states accountable for harboring them, and no clear definition of “armed attack” under commercial shipping law. Modernizing these frameworks isn’t bureaucratic housekeeping — it’s survival. We need binding protocols that treat attacks on commercial vessels as international crimes, not regional incidents. And we need enforcement — not just declarations. Without teeth, law is a monument, not a shield. [23]

- 5) **Exchange of Information and International Cooperation:** No single state can monitor 30,000 vessels a year through the Strait of Hormuz. No single port can track every suspicious drone. Real security requires shared surveillance, real-time threat alerts, and joint response protocols — not just NATO or the U.S. Navy acting alone. But cooperation is fragile. China won’t share data with the U.S. India won’t trust Saudi intelligence. The EU hesitates to join military coalitions. Yet, when ships are attacked, the cost is universal. The economic logic is clear: fragmented intelligence = higher premiums. Integrated systems = lower risk. But political distrust turns rational cooperation into a luxury. [24]
- 6) **Risk Management and Insurance:** Here, the market speaks louder than any treaty. Insurance companies are now pricing voyages through the Red Sea as if it were a war zone — with premiums up 500% and deductibles soaring. Shipping firms are diversifying routes, investing in AI-driven threat detection, and even chartering private maritime security teams. These aren’t corporate innovations — they’re adaptations to legal vacuum. When states fail to enforce law, markets create their own. But this privatization of security is unequal: only the largest firms can afford it. Smaller exporters, African and Asian traders, and emerging economies are priced out. The result? A two-tier global trade system — one for those who can pay for safety, and one for those who must risk it. [25]

5. Conclusion

These studies do not merely document disruptions — they reveal how the world’s most vital trade arteries have become battlegrounds not of tanks and missiles alone, but of legal credibility and economic trust.

5.1. Answer to the Research Question and Sub-Questions:

This study confirms a sobering reality: geopolitical confrontations do not simply disrupt cargo flows — they unravel the very foundations of global commerce. The Yemen conflict and the U.S.-Iran standoff, far from being regional disputes, have functioned as stress tests on the twin pillars of maritime trade: economic stability and international law.

In the Suez Canal, Houthi attacks didn’t just sink ships — they shattered confidence. The result? A 50% drop in transit volumes in early 2024. Not because the Canal was closed — but because the perception of risk became too high for insurers, captains, and shareholders to ignore. The economic fallout was immediate: Egyptian revenues plummeted, shipping costs surged, and inflation crept into global supply chains. Legally, the 1888 Constantinople Convention still guarantees neutrality — but when a drone strike can force a tanker to reroute around Africa, the law becomes a relic, not a shield.

At the Strait of Hormuz, the threat is even more insidious: no closure needed. Just the suggestion of one — a statement, a missile, a seized vessel — sends oil prices spiraling within hours. Why? Because the market doesn’t wait for physical disruption. It prices in the collapse of legal certainty. The law says: “Transit is guaranteed.” The market replies: “Only if you survive.” And when survival becomes uncertain, the price of oil — and everything derived from it — rises.

The sub-questions were answered not with abstract data, but with lived consequences:

- **Shipping costs** rose not from fuel alone, but from insurance premiums that now factor in war zones.
- **Commodity prices** climbed as delays rippled through factories from Germany to India.
- **Value chains** fractured, not because of production failure — but because the route failed.
- **The international legal framework** — UNCLOS, the Constantinople Convention — remains intact on paper, but its enforcement is hollow. States interpret “freedom of navigation” selectively. Non-state actors operate beyond accountability. And no court can stop a missile launched from a fishing boat.

The recommendations — enhanced security, alternative routes, diplomacy, legal modernization — are not policy suggestions. They are survival mechanisms. But let us be clear:

- You cannot outsource security to navies if you have no shared political will.
- You cannot build pipelines fast enough if you lack regional trust.
- You cannot update laws if you refuse to enforce them.

5.2. Future Issues and Potential Opportunities:

The challenges ahead are not diminishing. Non-state actors grow bolder. Technology empowers asymmetric threats. And the global order, once anchored in multilateralism, now drifts toward fragmentation. Yet within this instability lies opportunity — not in grand treaties, but in quiet, pragmatic evolution. We may not achieve global harmony — but we can build resilient systems. We may not be able to counter the aggressors' weapons - but we can make their attacks economically unfeasible. We may not force Iran to sign new treaties — but we can create coalitions that make its threats irrelevant.

The opportunity lies in redefining maritime security not as a state monopoly, but as a shared global infrastructure — one that integrates:

- ❖ Real-time intelligence networks between private firms and governments,
- ❖ Adaptive insurance models that reward risk-reduction,
- ❖ Legal innovations that hold non-state actors accountable through financial sanctions and maritime blacklists,
- ❖ And above all — trust. Not the kind built in summits, but the kind forged when a German insurer, a Chinese port authority, and an Emirati navy coordinate to protect a single tanker.

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