

The Arctic Frontier

Geopolitical Chessboard of Major Powers?

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The Arctic region, once considered a distant and inhospitable corner of the world, is rapidly emerging as a focal point in global geopolitics. *Harvard International Review (HIR)* argues that “nations have begun to engage in a modern gold rush over the region’s unclaimed territory, natural resources and strategic position”.¹ This transformation is driven by a confluence of factors: the region’s substantial mineral wealth,² the strategic importance of newly accessible maritime shipping lanes,³ the unique opportunities for scientific discovery,⁴ and the broader implications for global politics.⁵ As the Arctic ice cover diminishes at an unprecedented rate due to climate change, the region’s significance is magnified, drawing the attention of major global powers and reshaping international relations. Its vast mineral resources are at the heart of the Arctic’s growing importance. Estimates suggest that the region harbours a significant portion of the world’s untapped reserves of oil and natural gas, with projections indicating that the Arctic could contain about 13 per cent (90 billion barrels) of the world’s undiscovered oil and 30 per cent of its undiscovered natural gas (USGC).⁶ These figures highlight the Arctic as a critical energy security and economic opportunity area, particularly as traditional reserves in more accessible regions become depleted.

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Beyond hydrocarbons, the Arctic is rich in rare earth elements and precious metals, crucial for various technological applications, including renewable energy technologies and advanced electronics (including coal, iron ore, zinc, lead, nickel, precious metals, diamonds and gemstones). As global demand for these resources increases, the Arctic's role as a source of critical minerals becomes increasingly vital. The melting of the Arctic ice has also opened up new maritime routes, transforming global shipping dynamics.⁷ The Northern Sea Route along Russia's Arctic coast and the Northwest Passage through Canada are becoming more navigable, offering significantly shorter transit times between Europe and Asia than traditional routes like the Suez Canal.⁸ This reduced shipping distance cuts fuel costs and accelerates global trade, making the Arctic a key player in the logistics and transportation sectors. Recent challenges have opened this space for thinking about alternative routes in the context of political instability and piracy in traditional routes.

The strategic importance of these new routes is evident in the increasing interest and investments from various countries and corporations aiming to secure their access and influence over these passages. However, this increased accessibility also brings new geopolitical tensions and competition over control and regulation of these vital corridors.⁹ In addition to its economic and logistical significance, the Arctic presents unique opportunities for scientific research. The region's rapidly changing environment provides a natural laboratory for studying the impacts of climate change, including shifts in ice cover, sea level rise and changes in Arctic ecosystems. Researchers can now access previously unreachable areas, offering valuable insights into the effects of global warming and the adaptation of species to extreme conditions. The Arctic's geological formations also provide a window into Earth's climatic history, helping scientists to understand past climate patterns and predict future changes. This scientific knowledge is essential for developing effective climate policies and enhancing our understanding of the planet's natural processes. The geopolitical implications of the Arctic's transformation are profound as the region becomes increasingly integral to global politics.

The Arctic is governed by a complex framework of international agreements and institutions, such as the United Nations Convention on the Law of the Sea (UNCLOS) and the Arctic Council.¹⁰ These agreements aim to balance the interests of Arctic and non-Arctic states, promoting cooperation and sustainable development while addressing territorial claims and environmental protection. However, as the Arctic's strategic value

grows, so does the potential for conflicts over these issues. The increasing competition for resources, access to shipping routes, and influence in Arctic governance reflect broader international relations and power dynamics trends. In this context, the Arctic policies of the major powers, such as the United States, China and Russia, offer valuable insights into the evolving geopolitical landscape in the region. The United States, an Arctic nation with significant strategic interests, has developed a multifaceted Arctic policy emphasising national security, military presence and cooperation with NATO allies.¹¹ The US aims to secure its Arctic territories and protect its strategic infrastructure while addressing the challenges of the region's changing environment. Despite not being an Arctic nation, China has articulated a growing interest in the region through its Arctic Policy and Belt and Road Initiative.¹² China's engagement in the Arctic includes scientific research, economic investments and diplomatic efforts to influence Arctic governance and access to new shipping routes. With its extensive historical presence and strategic investments in the Arctic, Russia views the region as central to its economic and geopolitical ambitions. Russia's focus on exploiting the Arctic's resources, enhancing its military capabilities, and developing infrastructure reflects its broader strategy to assert dominance in the region.¹³ As the Arctic evolves, its significance for global politics will only increase. The interplay between national interests, international agreements and the region's environmental changes will shape the future of Arctic governance and its role in the broader geopolitical landscape. Understanding the Arctic's importance in terms of mineral resources, shipping routes, scientific research and international politics is essential for comprehending the complex dynamics and anticipating this crucial region's future trajectory.

HISTORICAL CONTEXT AND STRATEGIC INTERESTS

To understand the current Arctic strategies of the United States, Russia and China, it is essential to consider the historical context and strategic interests that shape their policies. Historically, the Arctic was primarily seen as a challenging environment characterised by harsh climate conditions and limited accessibility. However, the dynamics have shifted dramatically over the past few decades. The United States became an Arctic nation upon the purchase of Alaska in 1867.¹⁴ It has long regarded the Arctic as crucial to its national security framework. During the Cold War, the Arctic was a strategic theatre for nuclear deterrence, with the region's icy expanse serving as a

natural barrier against Soviet threats.¹⁵ This historical context has influenced the US approach to the Arctic, emphasising security and defence.

In contrast, Russia's Arctic strategy has its roots in the Soviet era, when the region was a focal point for military and industrial development.¹⁶ The Soviet Union's extensive icebreaker fleet and the army installations in the Arctic reflected its strategic importance. Post-Soviet Russia has continued prioritising the Arctic, driven by its vast resource potential and military significance. China's interest in the Arctic is relatively recent, emerging in the early 21st century as part of its broader global strategy.¹⁷ China's rising economic power and quest for new trade routes and resources have led it to seek a stake in Arctic affairs. Although not an Arctic nation, China's approach is influenced by its aspirations for global influence and its strategic vision of the Arctic as a crucial component of its Belt and Road Initiative.¹⁸

THE UNITED STATES ARCTIC STRATEGY

The United States views the Arctic through the lens of national security and global power projection. According to the Department of Defense's 2024 Arctic Strategy, the region is integral to American defence and security.¹⁹ The strategy emphasises the protection of Alaska and the broader North American Arctic, highlighting the region's role in the North American Aerospace Defense Command (NORAD) operations.²⁰ This focus reflects the US commitment to safeguarding its Arctic territory, which includes critical defence infrastructure and strategic assets. The United States' Arctic strategy is multifaceted, incorporating defensive and offensive elements. The melting of Arctic ice has made maritime chokepoints such as the Bering Strait and the Barents Sea more navigable, heightening their strategic significance.²¹

The US seeks to secure these routes to prevent adversarial activities and ensure freedom of navigation. The US strategy also highlights the need for a robust military presence to address potential threats and maintain regional stability. In recent years, the US has bolstered its Arctic capabilities by enhancing its infrastructure and increasing its military presence. The deployment of advanced icebreakers and the establishment of new military bases underscore the commitment to maintaining a strategic advantage in the region.²² Furthermore, the US strategy emphasises cooperation with NATO allies, particularly following Finland and Sweden's accession to the alliance. This collaboration aims to strengthen the Western security architecture and

counter potential challenges from Russia and other actors. Despite these efforts, the US faces challenges in maintaining and upgrading its Arctic infrastructure. Much of the existing infrastructure dates back to the Cold War era and is increasingly vulnerable to the effects of climate change. The vast and remote nature of the US Arctic territory presents logistical difficulties, particularly in sustaining distributed forces and ensuring effective power projection.

RUSSIA'S ARCTIC AMBITIONS

Russia's Arctic strategy reflects its deep-rooted historical and strategic interests. The 2020 Arctic Strategy outlines an ambitious agenda for 2035, focusing on exploiting the region's vast natural resources and enhancing national security.²³ Russia views the Arctic as central to its national identity and economic future, with the Northern Sea Route (NSR) playing a crucial role in its financial and strategic plans.²⁴ The NSR, a critical maritime passage along Russia's Arctic coast, is central to Moscow's economic ambitions. The control and regulation of this route give Russia significant leverage over Arctic naval traffic, which has been a point of contention with other Arctic and non-Arctic states. Russia's strategy involves refurbishing Soviet-era military installations and expanding its regional capabilities to secure this vital corridor. Russia's Arctic strategy also emphasises the importance of its military presence. The Kola Peninsula, home to Russia's strategic nuclear forces, is pivotal in the country's Arctic defence posture.²⁵ The expansion of military infrastructure, including new bases and advanced weaponry, reflects Russia's focus on maintaining a solid regional presence. This military buildup is driven by concerns over potential threats and the need to secure Russia's Arctic claims.²⁶ Despite its assertive stance, Russia faces significant challenges in the Arctic. The ongoing conflict in Ukraine has strained Russia's resources and impacted its ability to invest in Arctic development. Additionally, Western sanctions have affected Russia's ability to develop offshore oil and gas projects, prompting the country to seek alternative partnerships, particularly with China. The economic viability of Arctic projects is also hampered by fluctuating oil prices and declining demand for fossil fuels.

CHINA'S GROWING ARCTIC INFLUENCE

China officially has defined itself as a "near-Arctic state" with ambitious plans to establish itself as a "polar great power" by 2035.²⁷ As articulated in its

2018 Arctic Policy, China's Arctic strategy reflects its ambitions to expand its regional influence.²⁸ China is not a privileged club of Arctic nations. As a "Near-Arctic State", China has sought to establish a foothold in the Arctic through scientific research, economic development and international cooperation. China's approach is driven by its broader global strategy, including its Belt and Road Initiative, which incorporates the concept of a "Polar Silk Road".²⁹ China's engagement in the Arctic is multifaceted.

The country has invested in Arctic research vessels and established research stations to deepen its understanding of the region's environmental changes. China's commitment to scientific research aligns with its broader goals of contributing to global knowledge about the Arctic's evolving climate and ecological impact. In addition to scientific research, China is focused on resource development and shipping routes. The melting ice has opened new possibilities for resource extraction and commercial shipping, central to China's economic interests. The Polar Silk Road envisions the Arctic as a crucial corridor for trade between Asia and Europe, facilitating the movement of goods and energy resources. China's Arctic strategy also emphasises participation in international governance frameworks. The country aims to influence Arctic affairs' rules and norms by engaging with existing international mechanisms such as the United Nations Convention on the Law of the Sea (UNCLOS) and the Arctic Council. China's narrative of the Arctic as a "global commons" reflects its broader strategy of challenging established norms and promoting its vision of global governance. While China's Arctic presence remains limited compared to the United States and Russia, its growing influence is evident. The deployment of icebreakers and the establishment of research stations demonstrate China's commitment to increase its regional operational expertise. However, China's lack of an Arctic coastline and its status as a non-Arctic nation limit its direct influence, leading to potential friction with the Arctic states.

COMPARATIVE ANALYSIS AND STRATEGIC IMPLICATIONS

The Arctic strategies of the US, Russia and China reveal distinct approaches shaped by their national interests, military capabilities and economic ambitions. Each country's strategy has strengths and vulnerabilities, which influence the region's broader dynamics of power politics. The United States' strategy is deeply rooted in its role as an Arctic nation with direct regional security interests. The focus on maintaining a robust military presence and cooperating with NATO allies reflects the US commitment

to securing its Arctic territory and countering potential threats. However, maintaining and upgrading Arctic infrastructure and logistical difficulties significantly hinder US objectives. Russia's strategy is characterised by its historical presence and deep integration of the Arctic into its national security framework. The emphasis on military capabilities and control of the NSR underscores Russia's focus on leveraging its regional advantages. However, the ongoing conflict in Ukraine and economic sanctions have strained Russia's resources and highlighted vulnerabilities in its Arctic ambitions. China's Arctic strategy, while still developing, shows the potential for significant influence. China's emphasis on scientific research, resource development and international cooperation reflects its global ambitions. The growing partnership between China and Russia in the Arctic adds a new dimension to the strategic landscape, with potential implications for US and allied interests. Environmental changes influence the interplay between these strategies and the broader geopolitical context in the Arctic. The rapid melting of sea ice has reshaped the strategic calculus of all three powers, creating new opportunities and risks. For the United States, the changing environment presents challenges for infrastructure and operational readiness. Russia faces vulnerabilities related to permafrost thaw and coastal erosion, while China's strategy is shaped by the opportunities and challenges presented by maritime access and resource extraction. The growing Arctic cooperation between Russia and China complicates the strategic landscape. Joint exercises and partnerships in energy projects signal a deepening alignment that could shift the balance of power in the region. This cooperation is driven by Russia's increasing isolation following its invasion of Ukraine and its need for Chinese investment. The partnership offers China a means to expand its influence without directly confronting established Arctic states.

FUTURE PROSPECTS AND GLOBAL POWER POLITICS

The Arctic will continue to be a critical arena for global power politics. The strategies of the United States, Russia and China will shape the region's future, with regional stability and international relations implications. The interplay between these strategies will influence the governance of the Arctic, including issues related to resource management, environmental protection and maritime security. The future of Arctic governance will depend on the key players' ability to manage competing interests and collaborate on shared challenges. Practical international cooperation and robust governance

mechanisms will be essential for addressing the environmental impacts of climate change and ensuring sustainable development in the Arctic. The Arctic's transformation presents opportunities for economic growth and strategic advantage but also poses risks and challenges. The strategic competition among the United States, Russia and China will continue to shape the region's dynamics, potentially impacting global power politics. As the Arctic evolves, the ability of these powers to navigate the changing landscape and adapt their strategies will be crucial for maintaining stability and promoting cooperation.

CONCLUSION

The Arctic strategies of the United States, Russia and China have profound global implications, reshaping world politics in several ways. Firstly, the competition for Arctic resources and maritime routes intensifies geopolitical rivalries. The melting ice opens new trade routes, such as the Northern Sea Route, which could shift global shipping patterns and impact significant trade hubs. The United States and its NATO allies are keenly interested in ensuring these routes remain open and secure. At the same time, Russia seeks to leverage its control over these pathways for strategic and economic gain. China's pursuit of the Polar Silk Road further complicates the dynamics, introducing a new layer of competition as it seeks to integrate the Arctic into its Belt and Road Initiative. Secondly, the growing cooperation between Russia and China in the Arctic affects global power alignments. The partnership between these two countries, driven by shared interests in Arctic resource development and strategic positioning, may lead to a realignment of global power structures. This collaboration can enhance their collective leverage over Western nations, challenging the traditional balance of power and potentially leading to increased geopolitical tension. Thirdly, the Arctic's environmental changes, driven by climate change, exacerbate these geopolitical tensions. The rapid thawing of ice opens up new areas for resource extraction and raises concerns about environmental degradation and its global impacts. The need for effective international governance to manage these changes is crucial, as the failure to address ecological issues could lead to conflicts over resource allocation and territorial claims. Overall, the Arctic strategies of the United States, Russia and China are reshaping global power dynamics, influencing trade routes, and highlighting the need for robust international cooperation to address emerging challenges in the region.

NOTES

1. 'Geopolitical Competition in The Arctic Circle', *Harvard International Review*, 2 December 2020, availbale at <https://hir.harvard.edu/the-arctic-circle/>.
2. 'Arctic Natural Resources', National Ocean Economics Program, available at <https://www.oceaneconomics.org/NOEP/Arctic/NaturalResources/>.
3. 'The Future of the Northern Sea Route - A "Golden Waterway" or a Niche Trade Route', The Arctic Institute, 15 September 2011, available at <https://www.thearcticinstitute.org/future-northern-sea-route-golden-waterway-niche/>.
4. 'Arctic Exploration', *Ocean Today*, available at <https://oceantoday.noaa.gov/arcticexploration/#:-:text=The%20Arctic%20is%20one%20of,considered%20a%20new%20scientific%20frontier>.
5. 'Geopolitical Competition in The Arctic Circle', n. 1.
6. 'Arctic Oil and Natural Gas Resources', U.S. Energy Information Administration, available at [https://www.eia.gov/todayinenergy/detail.php?id=4650#:~:text=The%20Arctic%20holds%2an%20estimated,U.S.%20Geological%20Survey%20\(USGS\)](https://www.eia.gov/todayinenergy/detail.php?id=4650#:~:text=The%20Arctic%20holds%2an%20estimated,U.S.%20Geological%20Survey%20(USGS)).
7. 'Melting Arctic Ice Could Transform International Shipping Routes, Study Finds', *Science Daily*, 22 June 2022, available at <https://www.sciencedaily.com/releases/2022/06/220620152119.htm>.
8. Halvor Schøyen and Svein Bråthen, 'The Northern Sea Route versus the Suez Canal: Cases from Bulk Shipping', *Journal of Transport Geography*, Vol. 19, No. 4, 2011, pp. 977–983, available at, <https://doi.org/10.1016/j.jtrangeo.2011.03.003>.
9. Esther Brimmer, 'Strategic Competition in the Arctic', Council on Foreign Relations, July 2023, available at <https://www.cfr.org/report/changing-geopolitics-arctic-0>.
10. E. Conde Pérez and M. Scopelliti, 'Arctic Region', *Oxford Bibliographies Online*, available at <https://www.oxfordbibliographies.com/display/document/obo-9780199796953/obo-9780199796953-0090.xml>.
11. 'DoD Announces Publication of 2024 Arctic Strategy', U.S. Department of War, 22 July 2024, available at <https://www.defense.gov/News/Releases/Release/Article/3846206/dod-announces-publication-of-2024-arctic-strategy/>.
12. 'China's Arctic Policy', White Paper, The State Council Information Office of the People's Republic of China, 26 January 2018, available at https://english.www.gov.cn/archive/white_paper/2018/01/26/content_281476026660336.htm. In addition to the association with the Belt and Road Initiative, the official document argues that "The Silk Road Economic Belt and the 21st-century Maritime Silk Road (Belt and Road Initiative), an important cooperation initiative of China, will bring opportunities for parties concerned to jointly build a 'Polar Silk Road', and facilitate connectivity and sustainable economic and social development of the Arctic".

13. 'Decree on Approval of the Foreign Policy Concept of the Russian Federation', President of Russia, 31 March 2023, available at <http://www.kremlin.ru/events/president/news/70811>.
14. 'The United States and the Arctic Region', Arctic Council, available at <https://arctic-council.org/about/states/the-united-states/>.
15. Elley Donnelly, 'No. 26 | NATO in the Arctic: 75 years of Security, Cooperation, and Adaptation', Polar Points, 3 April 2024, available at <https://www.wilsoncenter.org/blog-post/no-26-nato-arctic-75-years-security-cooperation-and-adaptation#>.
16. Eugene Rumer, Richard Sokolsky and Paul Stronski, 'Russia in the Arctic—A Critical Examination', Carnegie Endowment for International Peace, 29 March 2021, available at <https://carnegieendowment.org/research/2021/03/russia-in-the-arctica-critical-examination?lang=en>.
17. 'China and its Arctic Trajectories: The Arctic Institute's China Series 2020', The Arctic Institute, 17 March 2020, available at <https://www.thearcticinstitute.org/china-arctic-trajectories-the-arctic-institute-china-series-2020/>.
18. 'China's Arctic Policy', n. 12.
19. 'DoD Announces Publication of 2024 Arctic Strategy', n. 11.
20. 'Arctic and Homeland Defense', DoD, Homeland Defence Institute and the Ted Stevens Centre for Security Studies, 15 February 2024, available at <https://tedstevensarcticcenter.org/wp-content/uploads/2024/02/HDI-TSC-Symposium-Report-17-Oct-23.pdf>.
21. 'The Race to Lay Claim on the Bering Strait as Arctic Ice Retreats', *The Guardian*, 12 December 2019, available at <https://www.theguardian.com/environment/2019/dec/12/bering-strait-northwest-passage-arctic-ice-melts>.
22. Abbie Tingstad, 'U.S. Armed Forces Capabilities in Arctic Region Pose National Security Risks, Need Strengthening', RAND, 1 November 2023, available at <https://www.rand.org/news/press/2023/11/01.html>.
23. 'Decree of the President of the Russian Federation, № 645 "On the Strategy for the Development of the Arctic Zone of the Russian Federation and National Security for the period up to 2035", Official Publication of Legal Acts, 26 October 2020, available at <http://publication.pravo.gov.ru/Document/View/0001202010260033>.
24. 'Putin Approved the Foundations of State Policy in the Arctic Until 2035', *Kommersant*, 5 March 2020, available at <https://www.kommersant.ru/doc/4277362>.
25. Jyri Lavikainen, 'Strengthening Russia's Nuclear Forces in the Arctic: The Case of the Kinzhal Missile', Center for Strategic and International Studies, 14 September 2021, available at <https://www.csis.org/analysis/strengthening-russias-nuclear-forces-arctic-case-kinzhal-missile>.
26. 'The Militarization of Russian Polar Politics', Chatham House, 6 June 2022, available at <https://www.chathamhouse.org/2022/06/militarization-russian-polar-politics>.

27. Sanna Kopra, 'China's Arctic Strategy – A Comprehensive Approach in Times of Great Power Rivalry', *Scandinavian Journal of Military Studies*, Vol. 6, No. 1, pp. 239–253; DOI: 10.31374/sjms.196.
28. 'China's Arctic Policy', n. 12.
29. The Belt and Road Initiative, the official document argues that "The Silk Road Economic Belt and the 21st-century Maritime Silk Road (Belt and Road Initiative), an important cooperation initiative of China, will bring opportunities for parties concerned to jointly build a 'Polar Silk Road', and facilitate connectivity and sustainable economic and social development of the Arctic".