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Bart Gaens, Frank Jüris & Kristi Raik (eds.)

NORDIC-BALTIC CONNECTIVITY WITH ASIA VIA THE ARCTIC:

ASSESSING OPPORTUNITIES AND RISKS









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The idea for this research project was born in late 2019, as we discussed the increasingly popular concept of connectivity and the benefits and risks that connectivity as a foreign policy priority brings for the Nordic-Baltic region. The choice to focus on Arctic connectivity seemed particularly pertinent due to the ongoing changes in the climate conditions, economic opportunities as well as geopolitical weight of the region. As the interest and presence of major powers in the Arctic is growing, this unavoidably is having an impact on the Nordic-Baltic region. We therefore decided to bring together experts on the perspectives of Russia, China and other actors on Arctic connectivity, with the aim of making a comprehensive assessment of the opportunities and risks for the Nordic-Baltic region. The project benefitted greatly from the in-depth kickoff discussions involving most of the contributors to this volume during a seminar and workshop organised in Tallinn in November 2020—unfortunately in a Covidadjusted hybrid format, which certainly did not make the discussions any less lively and substantial. We are most thankful to all our colleagues who contributed their expertise, analysis, and insightful perspectives on numerous aspects of the topic.

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Bart Gaens, Frank Jüris and Kristi Raik Editors

Tallinn and Helsinki, 31 August 2021

LIST OF ABBREVIATIONS

AAGC Asia Africa Growth Corridor

AC Arctic Council

ADB Asian Development Bank

AEPS Arctic Environmental Protection Strategy
AIIB Asian Infrastructure Investment Bank

AMAP Arctic Monitoring and Assessment Programme

APG Associated Petroleum Gas
ArCS Arctic Challenge for Sustainability
ASEAN Association of Southeast Asian Nations
ASPI Australian Strategic Policy Institute

ATS Antarctic Treaty System

AZRF Arctic Zone of the Russian Federation

BC Black Carbon
BDN Blue Dot Network

BIT Bilateral Investment Treaty
BRI Belt and Road Initiative

CAI Comprehensive Agreement on Investment
CCCC China Communications Construction Company

CCP Chinese Communist Party
CCTV Closed-Circuit Television

CEEC Central and Eastern European Countries

CERD Committee on the Elimination of Racial Discrimination

CIS Commonwealth of Independent States

CLCS Commission on the Limits of the Continental Shelf

CNARC China-Nordic Arctic Research Centre
CNPC China National Petroleum Corporation

CTBT Comprehensive Test Ban Treaty

EBRD European Bank for Reconstruction and Development

EC European Commission

EEAS European External Action Service
EEC European Economic Community
EEZ Exclusive Economic Zone
EIB European Investment Bank

ENI European Neighbourhood Instrument

EP European Parliament

EPA Economic Partnership Agreement

ESA European Space Agency

EU European Union

FA Framework Agreement

FONOP Freedom of Navigation Operations

FYP Five-Year Plan

GDP Gross Domestic Product

GHG Greenhouse Gas

HSPD Homeland Security Presidential Directive
ICT Information and Communications Technology
IFIP International Federation for Information Processing

JAXA Japan Aerospace Exploration Agency
JBIC Japan Bank for International Cooperation
JICA Japan International Cooperation Agency

JOGMEC Japan Oil. Gas and Metals National Corporation

JOIN Japan Overseas Infrastructure Investment Corporation

LNGLiquefied Natural GasMDAMaritime Domain AwarenessMOUMemorandum of Understanding

NATO North Atlantic Treaty Organisation
NCPE North China Power Engineering

NDICI Neighbourhood, Development and International Cooperation Instrument

NDRC National Development and Reform Commission

NEXI Nippon Export and Investment Insurance
NGO Non-Governmental Organisation

NOCs Network Operation Centres
NSC National Security Council

NSDD National Security Decision Directive
NSPD National Security Presidential Directive

NSR Northern Sea Route
NTBs Non-Tariff Barriers

NUAA Nanjing University of Aeronautics and Astronautics

ODA Official Development Assistance

OPEC Organization of the Petroleum Exporting Countries

PDD Presidential Decision Directive

PQI Partnership for Quality Infrastructure

PRC People's Republic of China

PSR Polar Silk Road

SAP State Armament Programmes SLoC Sea Lane of Communication SOA State Oceanic Administration SPA Strategic Partnership Agreement SSBN Strategic Nuclear Submarine START Strategic Arms Reduction Treaty TFN-T Trans-European Transport Network TEU Treaty on the European Union

TRACECA Transport Corridor Europe Caucasus Asia

UNCLOS United Nations Convention of the Law of the Sea

UNFCCC United Nations Framework Convention on Climate Change

USD United States Dollar

CHAPTER 1

INTRODUCTION AND KEY FINDINGS

Bart Gaens, Frank Jüris, Kristi Raik

The Arctic region is of increasing strategic importance for the Nordic-Baltic countries. It is also becoming more and more an area of great-power competition, involving Russia and the US, and increasingly China. Furthermore, it is gaining importance as a region that connects Northern Europe with Asia. This volume focuses on the opportunities and risks involved in the increase in connectivity and interdependence between the Nordic-Baltic countries and Asia via the Arctic region. It analyses the interests of the Nordic-Baltic states and other major stakeholders in the region, looking especially at (potential) connectivity projects in different sectors and related security risks. Conceptually, the book builds on different definitions of connectivity and geoeconomics, paying particular importance to the use of economic resources and connections in power projection by states and, on the other side of the coin, vulnerabilities created by 'weaponisation' of interdependencies. An eclectic approach to the concept of geoeconomics directs our attention to, on the one hand, economic opportunities offered by increasing Arctic connectivity, but on the other hand, ways in which connections are intertwined with geopolitical interests of states.

THE CONCEPT OF CONNECTIVITY

While focusing on the Arctic region, the book places it in the framework of Asia-Europe connectivity, highlighting the relevance of extensive previous policy debates and research on connectivity with Asia, usually looking at more southern routes, for the study of connections via the Arctic. Of course, the conditions in the remote polar regions are unique, but many of the issues raised in European discussions on connectivity with Asia, such as environmental and socioeconomic sustainability, respect for international law, the impact of growing great-power competition and related security risks, have to be addressed also in regard to Arctic connectivity.

The concept of connectivity has been defined in the context of Asia-Europe relations a few years ago. The Asia-Europe Meeting (ASEM), a multilateral forum for dialogue and cooperation between 51 states from Asia and Europe that includes the European Union and the ASEAN Secretariat, reached a consensus on a definition of connectivity in 2017. The forum stipulated that, in general, connectivity is about bringing countries, people and societies closer together. The concept includes hard connectivity (infrastructure projects) but also soft connectivity (people-to-people or digital connectivity), and all links: land, sea, air, cyber, and educational connections, as well customs cooperation and trade facilitation. The ASEM also agreed that connectivity must be in line with international standards and based on full transparency, and that sustainability needs to be a quality benchmark, including a link to the implementation of the Sustainable Development Goals (SDGs).¹

This wide-ranging definition implies that connectivity has ramifications in multiple dimensions. Connectivity is key to regional

ASEM Pathfinder Group on Connectivity, 2017. The 13th ASEM Foreign Ministers' Meeting in Nay Pyi Taw in November 2017 followed this comprehensive definition. Cf. also Becker et al., 2018.

integration, such as for example in the Association of Southeast Asian Nations (ASEAN), an organisation that focuses strongly on connections and infrastructure development while avoiding the strong political undertone of EU-style integration. Even so, connectivity is obviously not free of political, security or development-related connotations. The building of infrastructure, for example, is heavily securitised, imbued with geopolitics, and linked to development cooperation. China's investments in Central Asia or in Europe as part of its Belt and Road Initiative (BRI) have important political and security implications. Development assistance, a key element in connectivity, has become increasingly securitised, and has turned into a key component of the geostrategic use of economic power.²

THE INCREASING STRATEGIC IMPORTANCE OF THE ARCTIC

The increasing strategic importance of the Arctic is a consequence of at least three interconnected developments. First, global warming is having a particularly dramatic effect in the Arctic, as the region is warming twice as fast as the rest of the world.³ Second, climate change opens up new economic opportunities to make use of the region's vast resources and develop the northern transport routes. Third, tightening great-power competition, especially between Russia and the United States but increasingly also China, is playing out in the Arctic region where major powers have important strategic interests at stake. Hence, hard security concerns have returned to the discussions on the Arctic, while economic competition is gathering speed.

The US and Russia continue to be the two main great powers engaged in the Arctic. China, although not an Arctic power, has signaled a

² Mattlin & Gaens, 2018.

³ Meredith et al., 2019.

strong desire to be more involved especially in developing economic opportunities in the region. The Belt and Road Initiative (BRI) includes the Arctic region where China is keen to pursue a "Polar Silk Road" that could potentially provide an alternative route to European markets. Increased tensions over the Arctic between the US on the one hand and Russia and China on the other were exposed in the speech by US Secretary of State Mike Pompeo at the Arctic Council Ministerial meeting in Rovaniemi in May 2019.⁴

The Nordic countries have cautiously welcomed the increased strategic importance and economic activity in the Arctic region. For them, environmental and social sustainability are of major concern. They supported the inclusion of a number of Asian countries – China, India, Japan, Singapore and South Korea – as observers in the Arctic Council in 2013. While they are interested in making use of the economic opportunities, they are firmly against securitisation of the Arctic and keen to mitigate geopolitical competition. At the same time, increased tensions and militarisation of the Arctic in recent years have forced the Nordic countries to pay more attention to their northernmost regions in their defence policies and defence cooperation.

Unlike their Nordic partners, the Baltic states are not Arctic countries and have only recently started to show more interest in the region. Of the three Baltic states, only Estonia has a rather strong tradition of polar research dating back to the Soviet era, but until recently its political interest in Arctic cooperation was limited. In November 2020, Estonia submitted an application to become an observer in the Arctic Council, motivated by the desire to enhance the country's international standing and utilise and develop its polar expertise

⁴ Pompeo, 2019a. Pompeo expressed fears that China would use its civilian research presence in the Arctic to expand its military presence, while voicing concerns over Russia's claims over international waters of the Northern Sea Route as well as Moscow's plans to connect it with China's Maritime Silk Route.

in this region of increasing strategic importance and emerging economic opportunities.⁵ Since developments in the Arctic inevitably affect the whole Nordic-Baltic region, this issue has great potential as a focus of Nordic-Baltic cooperation. The Nordic-Baltic cooperation format (Nordic-Baltic 8 or NB8), chaired by Estonia in 2020, made connectivity, including regional energy and transport projects, a key priority. Finland took on the chair in 2021, with digital connectivity as one of the focal points.

The European Union has also shown increasing interest in the Arctic region, taking into consideration the environmental vulnerabilities, economic opportunities and security risks. As noted above, the issue of connectivity, which is high on the EU's agenda vis-à-vis Asia, is also highly relevant in discussions related to the Arctic region. The concerns and goals identified by the EU in its Asia connectivity strategy, adopted in September 2018,6 deserve attention also in regard to connectivity in the Arctic, not least in light of the EU's emphasis on sustainable connectivity. It is a key question how the EU, not a formal observer in the Arctic Council nor a dominant player in the Arctic, will aim to increase connectivity, including political, diplomatic, economic, scientific, and people-to-people linkages in the region, while promoting climate-friendly policies as well as supporting economic and business interests. Furthermore, the arrival of a "geopolitical Commission" in Brussels seems to have resulted in more attention being paid to the Arctic region as a site of geostrategic contestation, something which will likely also be obvious in the EU's forthcoming revised strategy for the Arctic.⁷

⁵ Idarand et al., 2021.

⁶ European Commission, 2018.

⁷ Borrell, 2021.

CAN THE ARCTIC REMAIN AN AREA OF COOPERATION AND POSITIVE INTERDEPENDENCE?

One approach to the Arctic, perhaps natural for the EU and Nordic countries, is to pursue positive interdependence in a mutually beneficial manner for all stakeholders in the Arctic. The idea of positive interdependence, strongly represented in Western foreign policies after the end of the Cold War, was also reflected in the Arctic region. The bipolar world order of the Cold War era had divided the Arctic region into Soviet and Western parts. In the 1990s, bipolarity was replaced with a unipolar world where the US was the hegemonic leader of the expanding liberal international order.8 Suddenly, there were no notable contenders for different aspects of the liberal order, including the market economy, democracy and the rule of law. Economic globalisation expanded at an unforeseen speed. Global governance was also rapidly advancing with the emergence of new institutions and forms of cooperation encompassing states as well as non-state actors. Growing interdependence between states was broadly expected to have a positive impact on international cooperation and security. The Western approach to Russia was shaped by the same trends. Russia's European partners in particular aimed to reject the geopolitical logic of confrontation and draw Russia into the paradigm of positive interdependence and norms-based cooperation. Russia seemed to embark on a path of political and economic liberalisation. On the European side, pragmatic engagement was expected to promote mutual trust, peace and stability.

The Arctic became one of the areas of Western-Russian cooperation. New initiatives of Arctic states emerged in the early 1990s, leading to the establishment of the Arctic Council (AC) in 1996. Membership of the Council is limited to states that have territory in the Arctic: Canada, Russia, the United States and the five Nordic countries. The

⁸ Ikenberry, 2018.

Council has developed into a central arena for multilateral cooperation among these states in matters concerning the Arctic. In addition to full members, the number of observer states has gradually grown, indicating the increasing importance of the Arctic in terms of both commercial opportunities and geopolitical considerations.⁹

Since the early 1990s, Arctic cooperation has been characterised by a strong focus on environmental protection and norms-based cooperation in accordance with the United Nations Convention on the Law of the Seas (UNCLOS) and other relevant international legislation. The overarching aim of the institutional and normative framework has been to mitigate conflict and favour cooperation. Within the Arctic Council, the eight Arctic states have negotiated three legally binding agreements in the fields of maritime search and rescue (2011), marine oil pollution (2013) and Arctic scientific cooperation (2017). While excluding military security, the AC has a number of projects and working groups on indigenous peoples and local communities, biodiversity, climate, marine environment, pollution and emergencies. In addition to the Arctic Council, cooperation on sustainable development takes place in the intergovernmental Barents Euro-Arctic Council (BEAC) and the interregional Barents Regional Council (BRC). Furthermore, the Northern Dimension is a policy instrument to facilitate cooperation between the EU, Russia, Norway and Iceland.

The increased interest and activity of Asian states including China, Japan and Korea in the Arctic have contributed to a higher priority given by the EU as well as the Nordic countries to the region, and have further boosted Europe's interest in developing Europe-Asia connectivity, including in the digital arena. During Finland's chairmanship

The permanent observer states are China, France, Germany, India, Italy, Japan, Republic of Korea, Netherlands, Poland, Singapore, Spain, Switzerland and the United Kingdom. The European Union and Turkey have also applied for permanent observer status but have only been admitted as 'ad-hoc observers' that have to apply for attendance before each AC meeting. In addition, the Council has not yet taken a decision on more recent applications by the Czech Republic, Estonia and Ireland.

of the AC in 2017-2019, digital connectivity, telecommunications and availability of broadband services in the Arctic was one of four priority areas. This follows up on ongoing work in the Arctic Economic Council (AEC), an independent organisation with private sector representatives from Arctic states, on broadband interconnectivity in the Arctic, for example. It also built on the recommendations of the Task Force on Telecommunications Infrastructure in the Arctic (TFTIA) within the Arctic Council. One concrete example of an ongoing project is Arctic Connect, an initiative launched and lobbied for by Finland, to construct a Europe-Asia trans-arctic telecommunications cable link based on Chinese technology, with alleged investments by Russia, Nordic countries, Japan and an unnamed international investment bank, which brings the question of the project's transparency to the fore. 10 The 13,800 km long fibre-optic cable would connect Kirkenes in Norway with Japan and China, along the Russian Arctic zone. An MOU was signed in June 2019 by Nordic, Russian and Japanese companies, but the project is currently on hold.¹¹ If implemented, Arctic Connect would allow for a faster internet connection between financial hubs such as London and Frankfurt in Europe, and Tokyo and Hong Kong in Asia, a salient issue especially in the context of the need for high-speed trading. While the potential economic benefits of the Arctic Connect project have often been highlighted, there has been less discussion thus far on the related security risks such as potential improved intelligence gathering capabilities for China and implications for data privacy.¹²

¹⁰ The same issue can also be raised in the context of the Talsinki tunnel project, led by the Finnish private sector. See Estonian Foreign Intelligence Service, 2020, p. 76.

¹¹ Nilsen, 2019a; Staalesen, 2021c.

¹² See Jüris, 2020b.

GROWING GEOPOLITICAL AND GEOECONOMIC TENSIONS IN THE ARCTIC

The growing strategic importance of the Arctic suggests that the region may become yet another area of zero-sum geopolitical and geoeconomic struggle dominated by great powers. Global great-power relations are certainly affecting developments in the Arctic, with the US, Russia and China in pivotal roles. Both Russian-Western and Sino-Western tensions are increasingly visible in the Arctic region, having an adverse impact on cooperation. This is in line with the security strategies of the US, China and Russia that embody realist assumptions about great-power competition. The US sees China and Russia as its adversaries whose influence must be contained, whereas the latter two countries strive to undermine the US hegemony and promote a multipolar world order.

Contestation over territories and competition over resources (classical sources of inter-state conflict according to the realist theory) contribute to tensions in the Arctic. Russia is claiming sovereignty over a large territory (1.2 million km2) reaching the North Pole, based on the claim that the underwater Lomonosov Ridge and Mendeleev Ridge are extensions of the Eurasian continent. Norway, Canada and Denmark have also submitted claims to the UN Commission on the Limits of the Continental Shelf (CLCS) concerning territories beyond their exclusive economic zones. Furthermore, Russia claims that the Northern Sea Route is under Russian jurisdiction. The other Arctic countries as well as China refuse to formally recognise such claims. The US insists that these are international waters where the right of transit passage must be applied.

¹³ Granholm et al., 2016.

¹⁴ Raik et al., 2018.

¹⁵ European Parliament, 2017.

Great-power competition has increased hand-in-hand with more connectivity of the Arctic to the rest of the world. While the liberal internationalist view on connectivity and interdependence suggests a win-win logic of open and inclusive networks, a realist approach acknowledges the increased importance of connections, but stresses the need for states to control networks and use them as instruments of power. The liberal view on networks as "paths to freedom" is challenged by an understanding that connections are "new sets of chains" that function as sources of "vulnerability, competition and control". To

Russia

Russia is a traditional Arctic great power that places great emphasis on its sovereign control over its polar regions, the role of the Arctic in its defence strategy and the vast economic importance and potential of the region. Russia started to rebuild its military activity in the Arctic in the 2000s, against the backdrop of increasing tensions in Russian-Western relations. It became evident that Russia viewed the world through the prism of realist power politics, not liberal interdependence as some in the West had hoped for, and made efforts to reestablish its great power status which had crumbled in the 1990s. It took steps to strengthen its sphere of influence and revise the European security architecture accordingly. The geopolitical tensions surged over Ukraine in 2014, ushering in a new era of mutual distrust and sanctions between Russia and the West. Militarisation of the Arctic by Russia gathered speed. Moscow justified this by the need to tackle growing threats to Russia's interests in the Arctic while Russia's own actions in Ukraine had harmful consequences for these interests. The Western sanctions imposed in 2014 seriously damage Russia's ability to further explore the Arctic hydrocarbon resources which are of major importance for Russia's economy. Russia's wish to maintain the Arctic as its "sphere of privileged interests"

¹⁶ Ramo, 2016; cf. Slaughter, 2016, pp. 204–206.

¹⁷ Farrell & Newman, 2020.

and maximise its control in the region due to security interests may work against its aim to develop commercial activities in the region.¹⁸

The US

For the US, the Arctic region was not a priority during the post-Cold War era. In recent years, however, reactivation of the Russian military role and the growing interest of China have pushed the US to take a stronger interest in the Arctic. Arguably, the US has indicated that it is willing to counter the growing presence of China and approach the Arctic as another area of US-China great-power competition. In 2019, the US Department of Defense unveiled its Arctic Strategy, emphasising the region's importance to homeland defence. The paper points out Russia's beefed up military presence along the Arctic coastline, and China's potential future military presence including the deployment of submarines in the region.¹⁹ For the US, both "Russia and China are challenging the rules-based order in the Arctic". 20 The US's enhanced interest in the Arctic as a site of great-power competition goes hand in hand with cooperation with allies and partners. This includes strengthening the role of NATO as an instrument of strategic deterrence and collective defense, for example, through military exercises such as Trident Juncture.21

China

This book pays particular attention to the growing role of China in the Arctic which changes the economic outlook as well as the geopolitical and security dynamics in the region. China emphasises a cooperative approach, but its increasing economic presence is creating concern about potential Chinese political influence and its military

¹⁸ Granholm, 2016, p. 15; Baev in this volume.

¹⁹ Department of Defense, 2019. p. 4.

²⁰ Ibid., p. 6.

²¹ Lawrence, 2018.

role. China's vulnerable northern flank is situated in the Arctic, because the intercontinental ballistic missiles targeting China will transit through the Arctic and key US missile defence systems are located there. This is why, as early as 1959, China set the goal of developing submarines capable of operating in the Artic to have a secondstrike capability for nuclear deterrence.²² The 2019 Defense White Paper: "China's National Defence in the New Era" states that overseas interests are a crucial part of China's national interests and the People's Liberation Army's (PLA) job is to protect overseas Chinese people, organisations and institutions. To protect China's national interests, it is necessary to build far seas forces and overseas supply points supporting power projection abroad.²³ China's participation in the Arctic Connect underwater data cable project connecting Europe with Russia and Asia along the Northern Sea Route could justify a People's Liberation Army Navy (PLAN) permanent presence in the Arctic to protect its strategic infrastructure on the seabed from outside interference.²⁴

Even though the most recent Chinese military white paper did not directly mention the goal of establishing a PLAN presence in the Arctic, it is nevertheless likely considering the gradual development of the Chinese Navy from a near to far-sea, and in the future to a polar-sea force. To successfully run nuclear deterrence patrols in the Arctic, the PLA Navy needs to improve its underwater acoustic capabilities, because the acoustic environment depends on a multitude of factors from temperature to depth and salinity, not to mention background noise created by drifting ice. Chinese scientists from the CAS Institute of Acoustics and Harbin Engineering University, which has close links to the PLA, have been conducting acoustic research in the Arctic since 2014.²⁵ Sino-Russian cooperation in polar acoustic

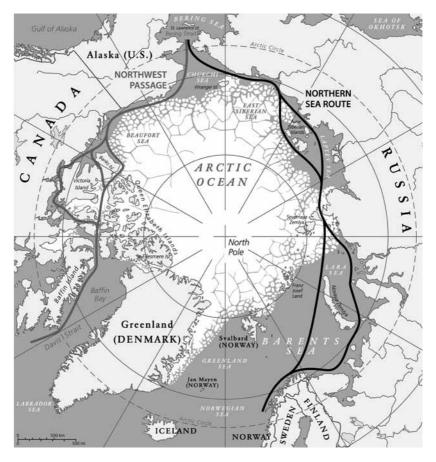
²² Brady, 2019.

²³ Erickson, 2019.

²⁴ Jüris, 2020b.

²⁵ Martinson, 2019.

research has dual-use potential, where Russia wants to improve its nuclear deterrence capabilities and China hopes to gain a foothold.



Map of Arctic Ocean Sea Routes. Source: Scanpix.

Nordic countries

Like many other EU member states, the Nordic countries have aimed to navigate the US-China geopolitical rivalry and maintain an ambivalent position. In Sweden, bilateral trade with China and incoming investments have grown exponentially, but public opinion and media discourse have turned negative, and the government is focusing more on the challenges posed by the Chinese presence.²⁶ For Finland as well, China plays an important role as a trade partner, even if the US remains a key partner in security and defense.²⁷ Denmark has a Comprehensive Strategic Partnership with China, but has preempted Chinese investment plans in Greenland and banned Huawei from being part of the Danish 5G infrastructure.²⁸ In spite of this ambivalent position, it seems clear that among the Nordics, an interest in engaging China in developing Nordic-Baltic connectivity with Asia has been overshadowed by concerns about the political and security impact of growing Chinese influence. Likewise, at the EU-level discourse on connectivity, emphasis is gradually shifting to geopolitical and security concerns when dealing with China as a "systemic rival".

OVERVIEW OF THE CHAPTERS

The chapters are grouped according to the actors involved in Arctic connectivity. The conceptual chapter is followed by three different perspectives on the role of Russia as the traditional Arctic great power. These are followed by five chapters analysing the growing role of China and the interactions of China with Russia, the Nordic countries and other actors. Subsequently, one chapter is devoted to the efforts of the US to respond to the growing great-power competition in the region, and another looks at the approaches of the EU and

²⁶ Jerdén, 2020, p. 163.

²⁷ Gaens & Kallio, 2020, p. 63.

²⁸ Forsby, 2020, p. 49.

Japan and explores their (potential) cooperation. The final two chapters focus on the Baltic states' perspective on increasing connectivity with China and Sino-Russian interaction.

The chapter by Wigell and Mikkola introduces theoretical approaches to Arctic connectivity. Even though traditional geopolitics will continue to define the geostrategic importance of the Arctic, geoeconomics is an additional, and increasingly important, theoretical vantage point that can help explain the contours of connectivity endeavours from Asia to the Nordic-Baltic region via the Arctic. According to Wigell and Mikkola, three key analytic perspectives determine the definition of geoeconomics, each of which have a focus on economic security, but understand geoeconomics as economic statecraft, as economic geography, or as discourse.

Taking a classic realist perspective, economic statecraft is based on the idea that states try to leverage their economic power for strategic gain. According to this analytic perspective, states approach economic exchanges in the first place as a zero-sum competition (i.e. one side's gain is another's loss), and economic interdependence results in increasing asymmetric dependencies. Power politics through economic means is the name of the game.

The analytic perspective of geoeconomics as economic geography, rather, focuses on how connectivities, supply chains, flows and networks are increasingly challenging traditional territory-based geopolitics and security. This perspective places focus on the integrative dynamics of geoeconomics, in other words how connectivity and economic geography can drive forward integration and cooperation. The economic geography vantage point emphasises liberal interdependence, in which connectivity offers opportunities for international cooperation and positive-sum dynamics.

The third analytic perspective is geoeconomics as discourse, shaping and reproducing worldviews of security strategists and foreign policy-makers. Geoeconomic discursive productions, therefore, can advance and/or mask economic restructuring and securitisation projects, often having harmful ramifications for other state actors, indigenous peoples, or for sustainable development in general. This perspective, rooted in constructivism, sees discourse as a way of imagining and reimagining a certain geographical space, and entrenching it in state practices.

All three paradigms have economic security at the core: through economic weaponisation above all by major powers in the first perspective; through flow security and resilience against disruptions in the second; and through discourse legitimising state actions in the third approach.

The chapter by Pavel Baev argues that Russia's traditional focus on building up military assets and infrastructure in the High North has been reinforced in the past years, even if it has a negative impact on economic and human development of the Arctic and is detrimental for international cooperation, and even if it is not underpinned by a solid strategic rationale or funding. Modernisation of the nuclear arsenal, military dominance in the Barents Sea, and an expansion of military infrastructure and activities towards the East are all key priorities for Putin's Russia, based on a conflict-centric rationality and an existential struggle with an inherently hostile West.

The chapter by Helge Blakkisrud focuses on economic statecraft and the political and economic processes that shape Russia's agenda for the Arctic. Despite a few success stories in utilising the region's economic potential, notably in the development of new oil and gas fields and the development of the Northern Sea Route, challenges, also pointed out in the chapter by Baev, remain. These include climate change and the cost of climate adaptation, underdeveloped and

outdated transport infrastructure, shortage of human resources in the region, and budget constraints.

Veli-Pekka Tynkkynen's chapter explores the implications of Russia's energy policy in the Arctic. He sees Russia as a "great power of flows" and argues that Russia's hydrocarbon culture, i.e. the country's energy-political system and its specific energy-culture mentality rooted in oil and gas dependency, has detrimental effects on the fragile region. Furthermore, it prevents opportunities for international cooperation in climate change mitigation and positive-sum dynamics. Importantly, Tynkkynen focuses on the third analytical perspective outlined above, namely geoeconomics as discourse. A political hydrocarbon economy linked with the identity construction needs of the regime results in a regime-favouring and self-preservation narrative in which hydrocarbons and their societal effects are viewed in an overly positive light. The narrative excludes the harmful effects of climate change as well as the negative economic, social and environmental effects of deep sociocultural dependence on hydrocarbons.

The chapter by Marc Lanteigne zooms in on China's version of economic statecraft through the Belt and Road Initiative, in particular the Polar Silk Road (PSR). Lanteigne assesses China's strategy as only moderately successful. Cooperation with Russia in the LNG sector can be seen as a success, but economic uncertainty has strongly affected other joint investments in the Russian Arctic. In the Nordic countries, China's assertive geoeconomic strategy and investment plans have resulted in local pushbacks, notably in Finland, Sweden and Denmark. Tensions have increased between China and the US. Even so, China is likely to continue to aim to translate its self-perception as a "near-Arctic state" into successful strategic influence by applying economic statecraft.

The chapter by Frank Jüris focuses on Chinese security interests in the Arctic and analyses Beijing's attempts to cooperate with Nordic-Baltic

and Russian partners from the perspective of economic statecraft, through which China is aiming to convert economic power into strategic gain in a geo-strategically important region. The chapter argues that scientific cooperation with China in sensitive fields has the potential to be used for Chinese military capacity building, that has ramifications for nuclear deterrence as well as NATO's northern flank's defence.

The chapter by Yulia Yamineva examines China's approach to climate change and its effects on the Arctic. It applies the analytic perspective of geoeconomics as economic geography, including its focus on how connectivity can foster cooperation in the field of climate change. It stresses the potential to engage China in scientific cooperation on climate, especially in the framework of the Arctic Council, while pointing to the risks involved from military as well as commercial perspectives and the contradictory actions of China in regard to global climate change.

Agne Cepinskyte's chapter assesses the normative risks involved in the development of connectivity as economic geography, asking whether the European Arctic is sufficiently safeguarded against potential human rights abuses by foreign investors such as China. The EU and its members states are torn between taking advantage of China's interest and investments in the European Arctic, on the one hand, and neglecting foundational values and undermining their norm-setting power, on the other. Cepinskyte calls for unequivocal support for human rights requirements and accountability on the part of foreign investors.

Aimar Ventsel's chapter provides another critical perspective on connectivity as economic geography, focusing on the Chinese impact on local communities in the Russian Far East, including Arctic and more southern regions. There has been a limited increase in connectivity across the Sino-Russian border. Even so, cooperation projects in

Russia's Far East often fail because of mistrust and Sinophobia from the Russian side. Furthermore, Chinese entrepreneurs have tended to hire Chinese workers rather than locals, and insufficient profits have gone to the local communities.

In the chapter by Tõnis Idarand geopolitics plays a key role. Growing geopolitical tensions, including China's ambitions in the Arctic have led the US to raise the relative priority of the Arctic. As climate change is altering the strategic balance in the Arctic, the US is increasingly anxious about ensuring freedom of navigation to protect the flow of commerce and safeguard the security of supply chains. Over decades, with a partial disruption during the presidency of Donald Trump, there has been continuity in the US emphasis on research, environment and freedom of navigation in the Arctic, but the importance placed on the region has varied according to the level of geopolitical tensions. The increased focus by the Trump administration on security concerns and economic rivalry continues during the Biden administration, but is accompanied by renewed efforts to tackle climate change.

The chapter by Bart Gaens argues that China's large-scale infrastructure investments in Asia as well as Europe have resulted in increased competition over connectivity, but have also led to cooperation in the form of connectivity partnerships. The Japan-EU partnership on sustainable connectivity and quality infrastructure of 2019 is an example of the latter. The chapter argues that synergies in the EU's and Japan's connectivity strategies, convergence in policy areas such as development, as well as shared values and priorities, can result in increased cooperation in the Arctic, including in fields such as scientific research, green economy, civilian use of space and dialogue on soft security issues.

The chapters by Konstantinas Andrijauskas and Liudas Zdanavicius both offer insights into how the Baltic states' approach to connectivity with China as economic geography has become increasingly overshadowed by concerns about Chinese economic statecraft. Andrijauskas describes recent changes in perceptions of China in the Baltic states, arguing that before 2019 a cautiously enthusiastic stance dominated, as the Baltic trio aimed to highlight strengths in logistics and/or high-tech to attract Chinese investments and cargo flows through bilateral as well multilateral means, including by joining the BRI. In the past few years this attitude has changed, and a major rethink of the Sino-Baltic relationship has taken place. Unfulfilled investment promises by China, novel threat perceptions and political instability and/or rising authoritarianism in neighbouring post-Soviet countries have resulted in an increased focus on a north-south axis, including the Arctic. Future cooperation with China will remain limited to non-sensitive fields.

The chapter by Zdanavicius takes economic statecraft as starting point to examine in detail the Russian and Chinese involvement in connectivity in the Baltic states, in the traditional transportation, energy and communication sectors, but also the high-tech and financial-technological sectors. Based on a comparative analysis, the author argues that both countries are actively using their full political warfare arsenal to achieve their foreign policy and economic goals, including investments in strategic sectors, sanctions and the co-optation of elites. Both Russia and China make wide use of economic dependence as a leverage to influence the foreign and domestic policies of other countries. Weakening the influence of the United States and the EU in the Baltic states is a common, collateral goal.

KEY FINDINGS OF THIS VOLUME

Multiple chapters in this volume attest to Wigell and Mikkola's argument that the geostrategic importance of the Arctic will likely remain based on geopolitics rather than on geoeconomics, as economic

development in the region remains difficult and expensive, infrastructure is still inadequate and great-power rivalry is intensifying. Realist geopolitical rivalry is particularly dominating Russia's approach to the Arctic, but is also visible in US policy and Chinese thinking. Baev has argued that Russia's conflict-centric rationality and existential struggle with the West has led to a build-up of military assets and infrastructure in the High North. Also, the chapter by Tonis Idarand shows that a new emphasis on geopolitics, as Russia's as well as China's ambitions in the Arctic have led the US to raise the relative priority of the region. Especially during the Trump administration, the focus shifted from climate and environmental issues to economic and security issues. Furthermore, according to Blakkisrud, in spite of Russia's strong "geoeconomics as economic statecraft" approach, military security interests will always trump geoeconomic interests. Chinese security interests in the Arctic are more subtle, but significant, as shown in the chapter by Frank Jüris.

Several chapters in this volume focus on geoeconomics as economic statecraft. This approach is key to understanding China's increasing activity in the Arctic, but is also present (although overshadowed by geopolitical considerations) in Russia's efforts to use and develop Arctic economic resources. Blakkisrud argues that Russia plays a zero-sum game, with power politics and control over routes, resources, and infrastructure remaining at the core. China's Belt and Road Initiative, including the Polar Silk Road (PSR), is perhaps the best example of geoeconomics as economic statecraft even if Beijing's strategy has run into roadblocks in the Russian Arctic and in the Nordic-Baltic countries.

Furthermore, various chapters shed light on how the increased relevance of geoeconomics as economic statecraft pushes aside and constrains mutually beneficial connectivity, or geoeconomics as economic geography. The attitudes of Nordic and Baltic states to connectivity with Asia, notably China, via the Arctic have moved from a

focus on expected economic benefits towards increasing attention to mitigating security risks, improving resilience and avoiding vulnerabilities created by asymmetric dependencies. The shift in Nordic-Baltic approaches is described in chapters by Lanteigne, Andrijauskas, Zdanavicius and (with a focus on human rights) Cepinskyte.

While geoeconomic statecraft is to some extent an alternative strategy to geopolitical rivalry that ultimately relies on military force, this volume also shows how the use of economic tools for power projection by major powers is underpinned by their geopolitical goals. Investments in infrastructure and technology may have direct links to military strategies such as dual use purposes or may more indirectly serve the goal of strengthening the state's great power position. Both geoeconomic statecraft and geopolitical influence build on the realist logic of zero-sum competition and spheres of influence. China primarily relies on economic tools, while for Russia economic instruments are secondary to military power, but both major powers are motivated by the aim to maximise their great power position and weaken the influence of the US and the EU in the Arctic.

However, this volume also includes numerous examples of geoeconomics as economic geography, or how connectivity and economic geography can drive forward integration and cooperation. Yamineva argued for cautious (bilateral as well as multilateral) cooperation with China in the field of climate change mitigation in the Arctic, in particular through scientific cooperation. The Japan-EU partnership on sustainable connectivity and quality infrastructure of 2019 is an example of an incipient form of bilateral cooperation that could also bear fruit in the Arctic. Ensuring freedom of navigation, enabling mutually beneficial and safe connectivity and developing cooperation on climate have also been important priorities of the US Arctic policy.

Increased tensions and competition can bring other players together, leading to connectivity partnerships. This can be said of the EU-Japan

partnership, driven forward both by competition from China and US transactionalism and unilateralism under the Trump presidency. The chapter by Ventsel argued that growing geopolitical tensions between the West on the one hand and China and Russia on the other, could result in increased cooperation between the latter two in the field of connectivity. However, the chapters by Jüris and Ventsel also showed that, in spite of joint advocacy for multipolarity and their attempts to counterbalance USA hegemony, cooperation between China and Russia is hindered by mutual distrust. According to Jüris, this is most visible in the development of infrastructure along the Northern Sea Route, where China prefers to interact with local authorities, bypassing the Kremlin. Nevertheless, joint infrastructure projects like the Arctic Connect, Sino-Russian scientific cooperation in Arctic underwater acoustics and plans to co-develop an early warning system should not be ignored from the viewpoint of the defence of NATO's northern flank and based on the existing pretext of distrust.

In terms of geoeconomics as discourse, Russia is a good example of how geoeconomic discursive productions can advance a state agenda (hydrocarbon culture) and mask harmful ramifications (sustainable development). For Putin's Russia, the Arctic is one of the central discourses linked to geopolitical, national identity and state construction. The chapter by Cepinskyte also examined the struggle to reconcile values and normative discourse on the part of the EU with potential human rights abuses by foreign investors.

Given its global importance but also its exacerbated effects in the Arctic in particular, climate change mitigation is a key area of potential and highly needed cooperation. However, the jury is still out on how fruitful such cooperation can be. For Tynkkynen in this volume, the Arctic will likely remain "exceptional", especially given Russia's dependence on a hydrocarbon culture which is dependent on Arctic resources. This provides a window of opportunity for cooperation and détente, and to promote more socially and environmentally

responsible policies and practices. For others, such as Baev in this volume, increasing great-power competition, the security dilemma and fundamental distrust of the West have driven forward Russia's military build-up in the Arctic, even if it is detrimental for international cooperation. From a neorealist perspective, therefore, intensifying great-power rivalry will impede cooperation in issues such as climate change and sustainable development, and will eventually lead to the end of "Arctic exceptionalism".

This book follows Wigell and Mikkola in their assertion that there is a need to apply an eclectic analytical approach, bridging different research traditions. The chapters in this volume confirm the need to explore Arctic connectivity from diverse and flexible frameworks of analysis. Different conceptual approaches to connectivity provide complementary insights into the Arctic policies of states and highlight tensions between their goals in different areas, including security, economy, climate, energy and human rights. Needless to say, there is vast scope for future research on Arctic matters. Considering the growing presence of China in the Arctic and its reliance on economic statecraft, further research is needed on the mechanisms, goals and impact of Chinese activity. The interaction between Russia and China also deserves to be further explored. Another topic of growing importance is obviously climate change in the Arctic, where a balanced study of the cooperation potential as well as the complex motivations of different actors could be helpful to show the possibilities and limits of further cooperation.

CHAPTER 2

GEOECONOMICS AND ARCTIC CONNECTIVITY: AN INTRODUCTION TO THEORETICAL APPROACHES

Mikael Wigell & Harri Mikkola

The concept of connectivity has become a buzzword in recent years. According to Parag Khanna, a global connectivity revolution has begun with a massive global commitment to infrastructure building. As these mega-infrastructure projects take shape, political borders are giving way to a world of intense functional connections. In this new functional space, the nature of great-power competition is changing. The territorial frame of traditional geopolitics is increasingly being complemented or, according to some, even replaced by the more commercial lens of geoeconomics. This notion entails that controlling borders and political territory matter less than controlling the functional geography of the global supply-chain system. Power is derived from the ability to provide connectivity, to tap into and leverage global and regional flows of capital, goods, resources and data.

¹ Khanna, 2016.

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The European Union has taken up on the idea of connectivity, particularly by highlighting it in the 2018 Connecting Europe and Asia strategy.2 According to the document, global interdependence is an opportunity for increased cooperation and improved relations between Europe and Asia. "To make a further step change in ... cooperation and to unlock opportunities within the global economy", the strategic text then argues, "the EU and Asia should ensure an efficient and sustainable connectivity". It outlines three specific forms of connectivity that comprise the "European way": sustainable connectivity, international rule-based connectivity and comprehensive connectivity. The latter highlights the importance of various types of physical networks and transport links - ranging from railways and waterways to airports, ports, digital networks and energy connectivity platforms - and flows of people, goods, information, services and finance that pass through them. The Arctic is increasingly seen as an important region for enhancing Europe-Asia connectivity, as the Finland's presidency of the Council of the European Union in 2019³ and subsequent EU analysis4 have recently pointed out.

As the Arctic region is warming up and its ice cover is receding at an accelerating pace, new deposits of natural resources, notably natural gas, oil and minerals, are becoming available for extraction, and new time and cost-saving maritime routes are opening up so that the extracted resources can be transported to markets in Europe and Asia. This is especially the case with the Northeast Passage that connects resource-rich areas in Northern Europe (e.g. the Norwegian and Barents Seas) and the Russian Arctic (e.g. the Yamal Peninsula and the Kara Sea) to East-Asian markets. Fishing fleets and tourist ships, as well as military vessels, are also expected to benefit from increased manoeuvrability in and through the opening trans-Arctic maritime area.

² European Commission, 2018.

³ Finland, 2019.

⁴ Dolata & Ikani, 2020.

⁵ The prospects of trans-Arctic container shipping, however, remain more uncertain.

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On land, railway projects in Russia (Belkomur railway) and Finland (from Rovaniemi to Kirkenes, Norway) and the Helsinki-Tallinn tunnel project between Finland and Estonia (with a further link to the Rail Baltica), just to mention few key examples, are all envisioned as possible ways to support the connectivity and trade flows between Europe, Russia and East-Asian countries. There are also plans to establish a submarine telecommunications cable, Arctic Connect, across the Arctic Ocean, from Finland via both Northern Norway and Northwest Russia towards the Bering Strait and from there to China and Japan, with potential links to North-America and Eastern parts of Russia after the Bering Strait.

Yet, this newfound focus on Arctic connectivity raises a number of questions. How and when will various forms of Arctic connectivity actually be realised and adopted to (commercial and other) use in the future? What will increased connectivity mean for the sustainability of the Arctic region? How will it affect the relations between the Arctic states themselves and with extra-Arctic powers such as China? What risks and opportunities are involved with increased Arctic connectivity?

The increasingly open and active Arctic has become a region of increased strategic importance, not only for a number of small states in Northern Europe, but also for the great powers such as Russia, the United States and increasingly also the (self-proclaimed) "near-Arctic" state of China. Baltic states, such as Estonia, are among the latest countries that have started to pay an increasing amount of attention to the changing Polar region. As such, the analysis of intensifying Arctic connectivity and its effects is not only of academic interest, but can also be of practical and strategic importance insofar as increased understanding can inform, in the medium to long term, the way activities, practices and connections of various kinds develop (or fail to do so) in the region.

⁶ Nilsen, 2020b; Ministry of Transport and Communications, 2019.

⁷ Cinia, 2019; see also Lanteigne in this volume.

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This chapter first discusses the potential for the Arctic region to become a globally important and connected geoeconomic space. It investigates how different elements of geoeconomics may (or may not) manifest themselves in the region. To provide tools for making sense of geoeconomic developments and dynamics in the region, the chapter then elaborates on the emergence of geoeconomic theory in general, and three existing geoeconomic research paradigms in particular. The three paradigms discussed are geoeconomics as economic statecraft, as economic geography and as discourse. Empirical references to the Arctic are presented to illustrate the theoretical elaboration. The chapter concludes by suggesting an eclectic geoeconomics approach, whereby the combinatorial logic of analytic eclecticism can be utilised to generate new insights.

THE GEOECONOMIC ARCTIC AND CONNECTIVITY

As noted above, the expectation that the Arctic region will be increasingly connected with the global network economy is first and foremost grounded on changes in the physical environment. Global climate change is expected to make new natural resource reserves and maritime routes increasingly accessible. As a result, the Arctic is expected to transform into a globally important geoeconomic space. However, in reality several factors hinder this transformation, which in turn raises questions about the validity of expectations. While the Arctic will develop economically, the pace and scope of developments are likely to remain moderate due to a complex set of challenges. Consequently, the geoeconomic importance of the region may in fact be exaggerated.

The key hindering factor is that the Arctic remains a harsh and remote operating environment, where economic activities are expensive and difficult to conduct. At the same time, various market conditions

have remained unfavourable. The fluctuating global price of oil discourages investments in offshore energy development, whereas inadequate infrastructure and scarcely populated areas above the Arctic Circle are factors that work against substantial growth in maritime transit shipping, especially when it comes to container traffic.⁸

Furthermore, various spill-over effects of external geopolitical dynamics, such as the deteriorated relationship between Russia and the West, or the great-power rivalry between the United States and China, are also likely to adversely affect the realisation of the Arctic's geoeconomic potential. As a result, the Arctic is not as stable an investment and operating environment as assumed even a decade ago.

Given these various challenges, it is no wonder that experts have been relatively modest about the economic expectations of Arctic development. Already eight years ago, Keil came to the overall conclusion that various optimistic analyses on the Arctic region's economic importance "are somehow at odds with Arctic reality" and "there is little reason to expect huge short- to mid-term benefits". Also Larusson argued around the same time that "[e]ven though the Arctic is expected to hold large amounts of resources, the economic viability of developing the Arctic region is questionable", while Humpert maintained more specifically that the Northern Sea Route (NSR) along Russia's northern coastline – the highway with most potential for maritime transport up until today – "is primarily utilised as a domestic supply and export route for Russia and much less as an international transportation corridor by countries in Europe or

⁸ On Arctic shipping, see e.g. Ørts Hansen et al., 2016.

⁹ Keil, 2013.

¹⁰ Larusson, 2014, p. 1.

Asia". Thus, on a global scale, it "remains a niche trade route with limited numbers of true transits ...". These analyses are still valid. 13

In fact, one could argue that the Arctic region's increasing importance in international affairs is not actually driven by geoeconomics. It is instead driven by "old-school" geopolitics, where especially traditional military dynamics (including growth in capabilities, exercising and strategic signalling) continue to play an important role with regard to the region's geostrategic importance.¹⁴

This being said, the Arctic does have the potential to be more important in geoeconomic terms on a global scale. Key actors in the region remain determined to pursue economic opportunities. Russia is highly dependent on revenues from the hydrocarbon sector and is resolute in moving forward with its Arctic energy and maritime route development projects despite structural economic challenges, fluctuating energy prices, Western sanctions and global climate action. During President Donald Trump's term, the United States showed renewed interest in hydrocarbon production in Alaska. Although President Joe Biden will likely turn the US focus back on combatting climate change and environmental protection, the economic potential of the region remains and the next administration may once again be more inclined to try tapping into that. Nordic states, such as Norway and Finland, also approach the Arctic with a socio-economic outlook. For Norway, the key is to balance investments in fossil fuel extraction at sea with sustainable development on land, whereas for Finland the focus is currently on developing innovative and sustainable forms of economic activity, such as sustainable tourism or

¹¹ Humpert, 2014; see also Blakkisrud in this volume.

¹² Ihid

¹³ For example, despite the "record number of sailings through Arctic in 2020", NSR maritime activity remains modest in comparison to other major international maritime routes; see Saul, 2020. For a comprehensive analysis, see Gosnell, 2018.

¹⁴ Mikkola, 2019.

bioenergy, in Finnish Lapland. In addition, Finland aims to play a key role in the development of the first trans-Arctic submarine telecom cable between Europe and Asia, the Arctic Connect. This would in turn facilitate Finland's plans to become a major hub for data centres in the future.

The region's geostrategic importance is, furthermore, lifted by the fact that the Arctic is globalising. Most importantly, non-Arctic states in Asia – including China, Japan and South-Korea¹⁵ – have energy, logistical and trade interests that have brought them to support regional economic development. China's recent investments in Russia's energy sector (e.g. Yamal LNG)¹⁶ and its aspiration to establish the so-called "Polar Silk Road"¹⁷ through Arctic maritime routes, are prime examples. In addition to economic expectations, China's aspirations and growing presence in the region have raised concerns related to new forms of political influence and ecological footprint.

In many ways, the Arctic transformation is a complex long-term process. The realisation of the geoeconomic potential of the region is difficult to forecast. The Arctic has many potential trajectories that may, or may not, be realised due to a number of uncertainties and challenges. These include factors such as fluctuations in future hydrocarbon demand and price, developments in global trade dynamics, the future of traditional maritime routes, potential environmental catastrophes, global effects of climate change, technological development, and domestic or international political dynamics – the latter involving, most notably, the great-power competition between Russia, China and the US, each with their own, diverging Arctic interests.

¹⁵ See e.g. Lanteigne, 2014; Su & Lanteigne, 2015; Ohnishi, 2016.

¹⁶ Reuters, 2016.

¹⁷ Reuters, 2018.

To sum up, it is fair to argue that the geoeconomic importance of the region has often been exaggerated in policy formation, public discourse and popular imagination. In a short- and mid-term perspective, it seems likely that the geoeconomic importance of the Arctic remains limited. In the long-term perspective, however, possibilities do exist, whether in terms of the more traditional (natural resources, maritime transport, fishery) or newer and less talked-about prospects (e.g. data centres, bio- and blue economies, cold climate testing, creative industries, circular economy solutions and sustainable tourism). However, they can all be easily undermined by various regional or global dynamics.

In fact, precisely because the Arctic is not encapsulated from the rest of the world and has the potential to become more connected and geoeconomically important even on a global scale, it is key to outline and analyse in some detail different ways of conceptualising and understanding geoeconomics in the region. What will follow is a categorisation of the different geoeconomic approaches as they emerge from a review of the literature. The analysis will illustrate how the different approaches relate to each other, and how they can provide useful perspectives on Arctic connectivity, helping to shed light on the questions raised in the introduction and throughout this chapter.

CONCEPTUALISING GEOECONOMICS

In a seminal article, Edward Luttwak used the term "geoeconomics" to describe how in the post-Cold War international system the main domain for inter-state rivalry would be economic rather than military. In a similar vein, Huntington observed how "in a world in which military conflict between major states is unlikely economic power will be increasingly important in determining the primacy or

¹⁸ E.g. Stepień, 2016.

¹⁹ Luttwak, 1990.

subordination of states".²⁰ In the view of these early geoeconomists, the end of the Cold War did not mean the "end of history".²¹ Instead, they foresaw a transformation of the way strategic conflict would likely be played out in the future "with disposable capital in lieu of firepower, civilian innovation in lieu of military-technical advancement, and market penetration in lieu of garrisons and bases".²² In the new geoeconomic era, states would thus still be pursuing adversarial goals, but chiefly through economic rather than military means.

Geoeconomics quickly fell out of fashion though, as the "New Global Order" seemed to have entrenched a more cooperative international system in which all major powers bought into globalisation and the long period of economic growth created mutual benefits that lessened the chances of serious conflict.²³ The classical realist and neo-mercantilist assumptions inherent in the early geoeconomics paradigm did not seem useful for understanding this neoliberal era, in which economic integration and cooperation, not conflict, seemed the most dominant features of international relations.

Yet, at least since the 2008 financial crisis, economic interdependence has increasingly been seen as carrying risks and challenges, often asymmetric ones, many of which are geoeconomic in nature. These risks include disruptions in global supply chains, illicit trade flows, economic sanctions, and more generally vulnerabilities associated with the asymmetric aspects of interdependence and the way this entails a source of power in bargaining relationships between states. These vulnerabilities inherent in the interdependent nature of the contemporary international system are propelling economic security to the centre of the global agenda for the foreseeable future, and thus geoeconomic issues have become paramount to both major

²⁰ Huntington, 1993, p. 72.

²¹ Fukuyama, 1992.

²² Luttwak, 1990, p. 18.

²³ Mandelbaum, 2002; Slaughter, 2004.

and minor powers alike in their strategic calculus.²⁴ The COVID-19 pandemic has accelerated these concerns with a newfound focus on self-sufficiency and resilience, especially as it pertains to global supply chains.

In short, the concept of geoeconomics has become increasingly fashionable in policy debates. Yet, reviewing the literature on geoeconomics, few exact definitions of the concept can be found. Instead, what emerges from such a review is a loose usage of the term in which some common elements tend to emerge, but with different emphasis placed on these elements depending on the analytic perspective in question. Three such analytic perspectives can be identified: geoeconomics as economic statecraft, geoeconomics as economic geography, and geoeconomics as discourse. What they all have in common is a focus on economic security. However, they all understand economic security in very different ways, thus providing different perspectives on the questions brought up in the introduction to this chapter.

Geoeconomics as Economic Statecraft

In many analyses, economic statecraft or strategy emerges as a central element of geoeconomics. These analyses look at how states try to leverage their economic power for strategic gain. They are rooted in (neo)mercantilist theory and a classic realist perspective, both emphasising how states continuously compete with each other for scarce resources. States, it is argued, see economic exchanges largely as a zero-sum competition in which one side's gain is another's loss. Their focus will thus be on relative gains, i.e. on outcomes in which a particular state in question gains (and continues to gain) more at the expense of its competitors, and not on maximising absolute gains that could be shared by and would benefit all parties.²⁵

²⁴ E.g. World Economic Forum, 2016; Wigell, 2016.

²⁵ Scholvin & Wigell, 2018a.

As a result, interdependencies and interconnectivities are viewed with suspicion. In contradiction to neoliberal claims, these analysts argue that increased interdependence and connectivity will not produce a "flat" world of more symmetric power relations and cooperation. Instead, according to them, economic interdependence tends to generate ever more asymmetric dependencies that can be manipulated, exploited and weaponised for strategic leverage by the less vulnerable parties in these relationships. ²⁶ In such a situation of "competitive interdependence", states that fail to consider relative gains and losses run the risk of having their strategic autonomy circumscribed and, by extension, become pawns in the game of power politics.

For instance, some scholars have been looking at how Russia is manipulating energy flows (which, interestingly, originate to an increasing extent in Russia's Arctic region) to further its broader geostrategic interests in Europe.²⁷ Others have investigated how the United States is using its formidable economic power, most notably in the form of economic sanctions, as an aggressive leverage to coerce other states (among others, Russia in the Arctic).²⁸ Yet others have focused on how China is using finance, investment, but most dominantly loans by state owned banks and trade relations, not least the Belt and Road Initiative (BRI), launched in 2013 (and subsequently expanded to include the "Polar Silk Road" in the Arctic), to cement political alliances and create political leverage.²⁹

In these studies, geoeconomics is understood as a form of power politics, wielded not by traditional military but economic means. In this new power politics, "the trick is to make your competitors more dependent on you than you are on them – and then use that

²⁶ Leonard, 2016; Scholvin & Wigell, 2018b.

²⁷ Vihma & Wigell, 2016; Wigell & Vihma, 2016.

²⁸ Sinkkonen, 2019.

²⁹ Blackwill & Harris, 2017; Wigell & Soliz Landivar, 2018.

dependency to manipulate their behavior".³⁰ Engineered linkages, hubs and networks – e.g. the opening up of new transport routes, data cables and ports – thus become means of statecraft that states attempt to use to their strategic benefit. The functional control over these man-made environments provide concrete means of asymmetric power exertion.³¹

Hence, unlike classical geopolitics³² and structural realist international relations (IR) theory³³, this geoeconomic perspective does not give precedence to timeless geographical features or the anarchic structure of the international system over states' abilities to manipulate their external environment. Instead, the focus is on states' agency in shaping the structural environment to their own favour, in line with classical realism's assumption that statecraft matters in international politics.³⁴

From this geoeconomics perspective, the Arctic region and increasing connectivity therein involves opportunities as well as risks that cannot be disregarded. The situation between Russia, the United States and China provides an illustrative example. As discussed above, Russia views the Arctic as a key national resource reserve and a vital geoeconomic opportunity. Consequently, the country has been active in developing its northern regions as a means to maintain and improve its national prosperity, military capabilities and international influence. The Arctic is important to Russia also as a connective gateway to both Europe and Asia, the two key markets where its natural resources (will likely) continue to be sold and transported to, at least in the short and medium term.³⁵

³⁰ Leonard, 2016.

³¹ Aaltola, Käpylä, Mikkola & Behr, 2014; Aaltola, 2019.

³² E.g. Scholvin, 2016.

³³ E.g. Waltz, 1979; 2000.

³⁴ See Kirshner, 2015.

³⁵ E.g. Baev, 2015, pp. 51-52.

However, these aspirations have exposed Russia to new geoeconomic risks in an increasingly adversarial international environment. Moscow has faced severe challenges as Western actors – the US as well as the EU, including its Arctic member states – decided to react to Russia's illegal annexation of the Crimean Peninsula in 2014 in part by using their geoeconomic clout in the form of sanctions.

Part of these sanctions were targeted to influence the future of Russian Arctic development that had been premised on continuing international cooperation on difficult projects on the continental shelf – in the pre-2014 era particularly between Russian and Western energy companies and service providers. In July 2014, the US and the EU decided to prohibit the export of Western technology for the development of Russia's offshore oil prospects in the Arctic.³⁶ Later on, in September 2014, the prohibition was broadened to include the export of Western goods, services and technology for Russian offshore oil development in the Arctic. In addition, the US and the EU also placed financial sanctions that have restricted the access of major Russian energy companies (as well as banks) to Western capital.³⁷ This has made it very difficult for Russian actors to execute and finance their complex, highly expensive fossil fuel development projects in the Arctic. Concretely, Rosneft and Exxon-Mobil were forced to pause their joint venture to conduct exploratory drillings in the Kara Sea, whereas Western technology and service provision companies, such as North Atlantic Drilling Ltd, also had to halt their cooperation with Rosneft in the region.³⁸

Subsequently, Russia has been forced to turn increasingly towards China and other Asian actors not only to diversify its customer base for its energy products, but also to secure new financial investments

³⁶ Baker et al., 2014.

³⁷ Baker & Higgins, 2014.

³⁸ Staalesen, 2015; Nilsen, 2015.

and technological know-how to make exploratory and development projects possible in the first place.³⁹ This has provided China with an opportunity to flex its geoeconomic muscles, for example in the form of much-needed financing to Russia's Arctic energy projects but on terms that have arguably been beneficial to Beijing. For example, unlike in the past, Chinese entities – such as the China National Petroleum Corporation (CNPC) and the Silk Road Fund – have managed to secure significant ownership positions (20% and 9.9% respectively) in a Russian Arctic energy project, in this case the Yamal LNG project.⁴⁰

Geoeconomics as Economic Geography

Another perspective on geoeconomics is found in analyses that more explicitly focus on economic geography. Whereas the above-analysed perspective mainly treats economic geography implicitly as a result of economic statecraft (agency shaping structure), for the economic geographers the causal argument is the reverse (structure shaping agency).

In this vein, studies have looked at how the new geography of global connectivities, flows and networks are challenging traditional geopolitical paradigms of power and security.⁴¹ The dependence of many societies on the fluid global circulations of capital, data, goods and resources have increased, bringing into focus new notions of security which are more oriented towards "flow" security, the security of supply and ensuring resilience with regard to potential vulnerabilities connected with these flows. As the former Swedish Prime Minister, Carl Bildt, had argued already in 2010: "Without necessarily making territorial security less important, I would argue that 'flow security' is the true challenge for the decades to come".⁴²

³⁹ Trenin. 2020.

⁴⁰ Reuters, 2016.

⁴¹ Aaltola, 2014; Aaltola et al., 2014; Brattberg & Hamilton, 2014; Khanna, 2016.

⁴² Bildt quoted in Aaltola, 2014, p. 67.

In these accounts, the growing global economic interdependence is rendering traditional territory-based geopolitics increasingly limited (territory and borders matter but so do transnational flows) or even obsolete (transnational flows trump territoriality). Instead, the need for a new geoeconomic approach is highlighted, centring on managing this interdependence by securing access to positive global flows while ensuring the resiliency towards the negative or even illicit shadow flows, such as the narcotics and counterfeit trades, as well as cyber threats. While analyses highlighting the increasing importance of these global flows do not always refer to "geoeconomics" as such, they nevertheless form a vital part of geoeconomic theory-building, in that they clearly highlight a changing economic geography, its new security repercussions and the way it changes the premises of statecraft.

In essence, these studies connect (though not necessarily agree in toto) with liberal-institutional perspectives in highlighting the integrative dynamics of geoeconomics – how economic geography, broadly understood as the global flows of capital, data, goods and resources, shapes international or regional integration, often spurring cooperative dynamics. From this perspective, it becomes imperative for states to adopt an increasingly network- or flow-centric strategic mindset and connect to the flows of goods, resources, capital and data that are criss-crossing the globe. Traditional state-solutions, such as national self-sufficiency, are rendered increasingly ineffective by this global interconnectivity. Even critical infrastructure benefits from being globally spread in order to maximise cost efficiencies provided by the global value chains.⁴³ The image becomes one of "complex interdependence"⁴⁴ in which states will focus on positive-sum dynamics and absolute gains.

In the Arctic context, the notion of liberal interdependence has been a traditional starting point in this regard. According to this view,

⁴³ See Fjäder, 2018.

⁴⁴ For the seminal analysis, see Keohane & Nye, 1977.

the economic geographical potential of the Arctic - its potential as a transport route or its oil and gas resource potential - has induced, if not necessitated, cooperation rather than competition between the major actors in the region. As the realisation of that potential in large part depends on maintaining cooperation and increasing connectivity, the Arctic stakeholders have usually been careful to avoid competition and the sort of conflicts that might jeopardise the economic prospects of the Arctic. For example, the five Arctic coastal states sought to de-escalate growing geopolitical tensions in 2008 through the adoption of the Illullissat Declaration, in which they reaffirmed the applicability of and their commitment to the law of the seas⁴⁵ in an area that was expected to be opening up for economic activity. Another notable example of cooperation instead of conflict was the agreement on the longstanding dispute on the maritime border between Russia and Norway in 2010 in a resource-rich area of the Barents Sea.

Subsequently, a similar ethos was illustrated by the establishment of the Arctic Economic Council during the 2013–15 Canadian chairmanship of the Arctic Council to facilitate "Arctic business-to-business activities and responsible economic development through the sharing of best practices",⁴⁶ as well as by work done in an Arctic Council taskforce on the improvement of telecommunications infrastructure in the Arctic region.⁴⁷

From this perspective, increased Arctic connectivity becomes an opportunity. By reducing the physical barriers inherent in its

⁴⁵ According to the 2008 Declaration, "the law of the sea provides for important rights and obligations concerning the delineation of the outer limits of the continental shelf, the protection of the marine environment, including ice-covered areas, freedom of navigation, marine scientific research, and other uses of the sea. ... This framework provides a solid foundation for responsible management by the five coastal States and other users of this Ocean through national implementation and application of relevant provisions."

⁴⁶ Arctic Economic Council, 2020.

⁴⁷ Arctic Council Task Force on Telecommunications Infrastructure in the Arctic, 2017.

geography, Arctic connectivity may spur international cooperation and positive-sum dynamics. According to this still quite common and influential view, the increased links and networks, and the economic benefits they bring, will result in reciprocal incentives for all stakeholders involved to uphold cooperative diplomacy.

Geoeconomics as Discourse

While the above approaches share a meta-theoretical basis in the essentialist research tradition, adherents of constructivist perspectives on geoeconomics concentrate on discursive practices, which offer possibilities for imagining and reimagining geographical space, such as the Arctic. As such, geoeconomics as a discourse is a variant of the broader social constructivist approach to territory: "territory is not what it used to be, namely stable, objective and immune to human thought ...; even physical objects such as territory, are (re)created in and through the human discourse". 48 Scholars who stand in this tradition look at how geoeconomics operates as a discourse, shaping and reproducing the worldviews of security strategists and foreign policy-makers, and how it becomes entrenched in state practices. For these often-critical analysts, the geoeconomic discourse masks neoliberal restructuring and securitisation projects. Essex and Sparke, for example, deconstruct the ideological underpinnings of transnational governance imperatives that they summarise as geoeconomics.⁴⁹ In Domosh's words, "the term geoeconomics does not describe a situation; rather, it conjures up a range of meanings, cultures, and places through which description can happen. Geoeconomics, in other words, does not refer simply to a description of economic spatial strategies but instead encompasses a way of seeing the world in which those strategies come to be seen as plausible and desirable".50

⁴⁸ Forsberg, 2003, p. 7.

⁴⁹ Essex, 2013; Sparke, 2007.

⁵⁰ Domosh, 2013, p. 945.

These perspectives draw on critical geopolitics, not taking geoeconomic claims at face value but rather seeing them "as representational power moves which, notwithstanding their discursive inventiveness, can still have powerful real world effects".⁵¹ Adherents of critical geopolitics, which emerged in the 1990s, see essentialist versions of geoeconomics and geopolitics as "an ideological exercise which ... pits geographically defined political organisations against one another".⁵² For them, Luttwak's geoeconomics equals "extending the same realist assumptions [that have] underpinned and legitimised Cold War militarism".⁵³ Hence, critical scholars ought to promote "interpretations of world events that are counter to dominant government and media representations".⁵⁴

Constructivists have also interpreted geoeconomics as a securitising discourse. The concept of securitisation, as developed particularly by the Copenhagen School of IR, highlights how security risks often become appropriated – or even discursively constructed as threats – so as to legitimise extraordinary countermeasures. For example, Morrissey suggests that the grand strategy of the United States in the Middle East has revolved around "the discursive identification and positing of the Persian Gulf as a precarious yet pivotal geoeconomic space". He argues that it is this perpetual scripting of the region as being "pivotal for the effective functioning and regulation of the global political economy [that] legitimises a strategic argument for the necessity of military interventionism". For

⁵¹ Sparke & Lawson, 2003, p. 316.

⁵² Dalby, 1990, p. 39.

⁵³ Ó Tuathail, 1998, p. 107.

⁵⁴ Flint, 2006, p. 16.

⁵⁵ E.g. Buzan, Wæver & de Wilde, 1997.

⁵⁶ Morrissey, 2011, p. 874.

⁵⁷ Ibid., p. 879.

In sum, these critical insights, in one form or another, add the crucial – and from the perspective of traditional approaches, a missing – element of discourse to geoeconomic theory, highlighting the close connection between political space and conceptual understandings of it. This helps reveal the non-essentialist side of geoeconomics, the way geoeconomic "space is a product of political and cultural imagination, not a natural or objective phenomenon".⁵⁸ Rather than simply referring to a description of economic spatial strategies, geoeconomics is thus seen as a discursive field itself, where these strategies come to be seen as natural within the context of a particular way of imagining the world. Any particular geoeconomic space, such as the Arctic, thus becomes a product of political imagination.

Using this approach, formulations of "Arctic connectivity" can thus be seen as a set of geoeconomic discursive productions that may advance and/or mask economic restructuring and securitisation projects with harmful consequences for other state actors, the indigenous population(s) or for sustainable development in the region in general. Arctic connectivity may also be seen as recasting citizenship and social forms in the Arctic, providing for some kind of emerging "geoeconomic social" in which territorial security and development is reframed to accommodate these transnational flows, recast security in economic terms, and reframe the region as a transnational market place. As such, it may help deconstruct ideological and power-political underpinnings of the Arctic connectivity debate.

To illustrate the approach in more concrete terms, the Arctic has been subject to various discursive productions involving geoeconomics that have either securitised or desecuritised the region. For a long time during the Cold War confrontation, large parts of the Arctic were often constructed as internationally disconnected and extremely securitised areas, with only a limited number of concrete

⁵⁸ Tsygankov, 2007, p. 46.

⁵⁹ Cowen & Smith, 2009; Moisio & Paasi, 2013.

activities in terms of large-scale economic development, such as the pioneering exploration and development projects in the Russian Arctic and Alaska. With the end of rivalry between the US and the USSR, this started to change as the region was perceived to have lost most of its geostrategic relevance even if actual strategic military assets, such as nuclear submarines, strategic bombers and bomber/ballistic missile detection technology, remained in the region. In fact, the geopolitical environment in the Arctic had already started to transform during the latter years of the Cold War as a result of an increase in interaction and cooperation in "non-strategic" areas of scientific research and environmental protection. Even more importantly from a geoeconomic perspective, it was the influential speech by Soviet Secretary General Mikhail Gorbachev in 1987 in Murmansk⁶⁰ that called for joint energy projects between Western and Soviet actors, increased Arctic connectivity via the opening up of the Northern Sea Route for international maritime transport, international cooperation on environmental protection, and more broadly laid down the vision of the Arctic as a zone of peace and cooperation in various fields. Through this discursive act that involved notable geoeconomic and connective aspects, many of which are relevant even today, Gorbachev ended up initiating the gradual process of "desecuritisation" of the Arctic as an element of the broader Soviet reorientation. 61

There are also alternative examples where geoeconomic discourse has arguably contributed to securitising dynamics in the region. During the 2000s, the Arctic re-emerged as a component of contemporary strategic landscape as expected growth in openness, connectivity and (geo)economic prospects were linked to growth in adversarial hard security dynamics. The key driver behind this development was, of course, the growing awareness of the rapid and exceptional warming of the area that resulted in a continuous reduction and thinning of the Arctic sea ice cover. Supported by advances in technology, this

⁶⁰ Gorbachev, 1987/2012.

⁶¹ Åtland, 2008, pp. 289–311; see also Trenin, 2020; Heikkilä, 2016.

meant that the previously secluded geopolitical frontier was perceived to be opening up and substantial natural resource bases as well as new maritime routes in the area were seen to be within grasp for future utilisation. Contrary to Gorbachev's desecuritising vision of decreased tension and increased cooperation, growing discourse on securing access to, and control of, the opening Arctic and its potentially lucrative natural resources heightened the strategic atmosphere in the region. The resulting political dynamics in the opening Arctic were increasingly characterised in expert literature⁶² and influential media representations⁶³ by growing great-power competition, the absence of adequate regulatory frameworks and fears of a new arms race or even "New Cold War" in the region. As one often quoted scholar put it at the time, the Arctic was in danger of going through an "Arctic Meltdown" that could even involve an "armed mad dash for its resources".⁶⁴

CONCLUSION: TOWARDS AN ECLECTIC GEOECONOMICS APPROACH

This chapter has used the concept of geoeconomics as a gateway into the question of Arctic connectivity. Reviewing the various literatures on geoeconomics, we have put forth the analytic distinction between three perspectives on geoeconomics: a) as economic statecraft; b) as economic geography; and c) as discourse. What all three perspectives have in common is a focus on economic security. Though they all take a different view of economic security, they all argue that economic security has been elevated on most states' scale of strategic priorities. Before, national security threats were largely seen as a function of military-oriented geopolitics and security thus meant military security and ensuring preparedness for war. As a result, national security

⁶² Borgerson, 2008; Cohen et al., 2008.

⁶³ Macalister, 2012; Fox News, 2012.

⁶⁴ Borgerson, 2008.

required the accumulation of military power. Now, as a consequence of the growing global and regional interconnectedness, and the changing threat scenario that it entails, military power has lost some of its relevance for pursuing national security, and instead economic security and power have become increasingly important.

From the first (statecraft) perspective, concern for national economic security is the motivating factor for geoeconomic action, understood as economic statecraft. These scholars posit a state of economic weaponisation between major powers, whereby national security hinges on successfully managing it. National security strategy thus involves tools of economic statecraft to generate geoeconomic power and reduce economic dependence on external powers.

From the second (geographic) perspective, securing access to vital flows and resources while protecting against illicit and disruptive flows is paramount to national security. Economic geography plays a vital role for a nation's security interests by defining the nature of its vulnerabilities. Security of supply concerns vary according to the nation's own stockpiles relative to its foreign supply needs. Its location in the global economic geography affects its ability to interlink with the vital global flow access-points as well as its vulnerabilities to potentially disruptive flows, such as the narcotics trade, money-laundering and organised crime, toxic waste, massive immigration waves or systemic economic shocks.

From the third (discursive) perspective, economic discourse may, at best, encourage more peaceful forms of cooperation, but may also mask insidious securitisation projects, as elaborated to some extent above. In the latter case, security concerns are discursively produced to legitimise neoliberal restructuring or military interventionism. The reframing of security as economic security may from this perspective enable the growth of geopolitical power via a geoeconomics expansion. This kind of "economic securitisation" is also at display in

the way state sovereignty and territory is discursively recast in terms of networks and flows, turning security from a national need into a global or regional characteristic.

Assuming that no particular research tradition is inherently superior to another, we have made use of the insights generated in these various geoeconomic approaches to examine the question of Arctic connectivity. Our analysis points to the usefulness of adopting an eclectic geoeconomic view of Arctic connectivity, whereby both opportunities and risks with increased connectivity can be examined from these various angles. Several scholars have called for more eclectic international relations research, emphasising "the virtues of an 'eclectic combination' of diverse theoretical perspectives in making sense of cases, cautioning against the excessive 'simplifications' required to apply a single theoretical lens to grasp the manifold complexities on the ground". 655

Indeed, we urge scholars to build on the various geoeconomic approaches reviewed above to outline distinctively eclectic analytical frameworks, seeking to bridge the different research traditions and combine them so as to allow for more diverse and flexible frameworks of analysis. Figure 1 shows one such tentative possibility for exploring the diverse mechanisms posited in these competing research traditions, how they might interact with each other and be combined to affect outcomes of interest to both scholars and practitioners. According to Sil and Katzenstein, analytic eclecticism is about "exploring substantive relationships and revealing hidden connections among elements of seemingly incommensurable paradigmbound theories, with an eye to generating novel insights that bear on policy debates and practical dilemmas".

⁶⁵ Sil & Katzenstein, 2010a, p. 412.

⁶⁶ Sil & Katzenstein, 2010b, p. 2.

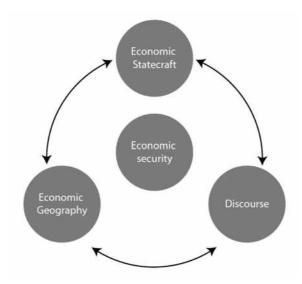


Figure 1. Geoeconomics as an Analytical Framework

The analytical framework schematically represented in Figure 1, apart from identifying economic security as the common core of the geoeconomics research, conveys this eclectic looking-glass at geoeconomics as a research programme. It suggests several lines of enquiry for the study of topics such as Arctic connectivity. Firstly, using the combinatorial logic of analytic eclecticism, scholars may investigate the various causal mechanisms between statecraft, geography and discourse depicted in Figure 1. For instance, one may investigate the discursive origins of economic geography, the way geoeconomic representations produce economic geographies. One may take the case of China's "Polar Silk Road" as an illustration of the way geoeconomic discourse may promote, not only a new spatial imaginary, but a new "material" economic geography. So, while the evolving new economic geography is discursively produced, nonetheless, it has some materialist consequences, e.g. helping to legitimise Chinese

clout and new cross-border infrastructure, which in turn feeds back into further strengthening the discursive aspects and imaginary of the project. Alternatively, one may start from the perspective of economic statecraft and view the discursive elements as just another way to drive Chinese national interests with regard to security-of-supply concerns and the subsequent need to diversify maritime trade routes.

In any case, the analytical framework depicted in Figure 1 urges us to explore the "connections among clusters of analyses that are substantively related but normally formulated in separate paradigms",⁶⁷ holding forth the promise of generating novel insights and discovering causal mechanisms hitherto hidden because of the segregation between these clusters of analyses. This does not mean that paradigm-bound studies of geoeconomics should be reflexively by-passed or made obsolete. However, it is key to recognise how connecting them may generate useful insights.

⁶⁷ Sil & Katzenstein, 2010b, p. 2.

CHAPTER 3

RUSSIA'S SECURITY INTERESTS AND MILITARY BUILD-UP IN THE ARCTIC

Pavel K. Baev

The Arctic is a region of huge domestic and international importance for Russia, and its leadership grants it the due priority, but its policies are at best unhelpful, and often counter-productive for advancing national interests. Moscow has approved numerous doctrinal documents aimed at tying various guidelines together, but in fact, it has never been able to develop a coherent and feasible approach, which could ensure the necessary progress of its vast northern periphery. It is the traditional and recently reinforced emphasis on building up military assets and infrastructure in the High North that distorts economic and human development of this area and is detrimental for international cooperation, which remains a major goal reconfirmed by Russia's chairmanship in the Arctic Council in 2021–23.1 Russia could have benefitted greatly from prioritising economic connectivity and cross-border ties in the Arctic, but the obsession with sovereignty and the desire to guard it by military means undercut these potential benefits and affect international efforts at enhancing connectivity.

The incompatibility of the strong drive toward militarisation of the Arctic and the desire to engage international partners in joint ventures of various character, from resource extraction to scientific

On the ambitious but ambivalent intentions related to this chairmanship, see Korchunov, 2021.

cooperation, is obvious.² What is less apparent is poor coordination between numerous programmes of military build-up that are underpinned by dissimilar and often dubious strategic rationale and progress with uneven success.³ The inevitable contraction of financial base for these programmes caused by the protracted economic stagnation aggravated by the spasm of recession in 2020, puts them in competition with one another.⁴ The accumulating underfunding also produces multiple disbalances in the military structures, which tend to increase the risks of technical accidents and human errors. This analysis aims at examining these discrepancies between inflated strategic ambitions and unevenly upgraded capabilities and at outlining the range of options available for the Russian high command.

THE NUCLEAR SUPER-PRIORITY

Modernisation of the nuclear arsenal is a matter of supreme importance for President Vladimir Putin, which determines its top priority in resource allocation in the two consecutive State Armament Programmes (SAP-2020 approved in 2011, and SAP-2027 approved with delay in 2017).⁵ The Arctic occupies a prominent place in these plans because the Kola Peninsula is the main base for strategic nuclear submarines (SSBN), the crucial component of the "nuclear triad", which is supposed to ensure its invulnerability against preemptive strikes. The second base for these submarines is maintained on the Kamchatka Peninsula, and in operational and logistical matters it is closely connected with the infrastructure of the Northern Fleet. Facing the need to retire and utilise dozens of nuclear submarines built in the 1970s.

One useful update analysis is Zysk, 2020; my examination of this clash of objectives is Baev, 2019a.

³ Careful evaluation of these programmes is Boulegue, 2019.

⁴ This trajectory of stagnation is examined from several perspectives by top Russian economists in the Zastoi-2 report; see Rogov, 2021.

⁵ The nuclear projects in SAP-2027 are thoroughly examined in Cooper, 2018.

Russia already in the late 1990s embarked on the plan of building a series of Borei-class submarines (Project 955) armed with Bulava (SS-N-32) intercontinental missiles, and this endeavour stands out as the single most expensive project in both 2020 and 2027 SAPs.

The implementation of this project was delayed by a sequence of failed tests of Bulava, but as of spring 2021, the fourth submarine K-548 Knyaz Vladimir has joined the Northern Fleet, with four more hulls in different stages of construction, and two more keels contracted to be laid. 6 Concentration of efforts on this project caused serious delays with the second high-priority project – the Yasen-class cruise missile nuclear submarines – so that only the pilot vessel (K-560 Severodvinsk) is commissioned, while the second sub (K-561 Kazan) is still undergoing trials, and five more hulls are under construction.7 What aggravates problems with this project is the parallel efforts at designing and developing a whole range of non-strategic nuclear weapon systems, including the long-range nuclear-propelled underwater drone Poseidon, advertised by Putin in his famous 2018 address to the Federal Assembly.8 The strategic rationale for this as yet untested weapon system is highly uncertain, and the carrier-submarine K-329 Belgorod (modernised Oscar-II class) is delayed with sea trials, but Putin's word is taken by the Navy command as an inviolable order to get results.9

This policy-driven fragmentation of investments and operational activities over a far wider range of old, new and prospective nuclear weapons systems rather than a common strategic approach has adverse and dangerous consequences for the Arctic region. The most immediate problems concern the maintenance of such technically-complicated assets as submarines, and the fire on board the nuclear-powered submersible AS-31 (with a funny nickname Losharik), which

⁶ On the cancellation of the *Borei-B* modification, see Starchak, 2020.

⁷ This on-going setback is scrutinised in Beckhusen, 2020.

⁸ Putin's colourful presentation necessitated changes in the SAP-2027; see Baev, 2019b.

⁹ Contrasting evaluations of this design are Schneider, 2020; Boltenkov & Ramm, 2021.

resulted in an explosion claiming the lives of 14 officers, was clear evidence of that. A greater disaster was averted by the closure of its connection with the transport vessel – nuclear submarine BS-64 Podmoskovye (converted Delta IV-class) – but the unique deep-diving submersible was damaged most probably beyond repair. Another set of problems involve testing of new weapons systems, and it is the nuclear-propelled cruise missiles and underwater drones that are the most dangerous, because every test necessarily involves crash-landing or a nuclear reactor or dumping it in deep water. The explosion of a prototype nuclear-propelled 9M730 Burevestnik cruise missile at the Nyonoksa test range near Severodvinsk in August 2019 with seven lives lost exemplified these risks. It took great effort by investigative journalists to breach the wall of secrecy around that tragedy, but President Putin declared that tests would continue "no matter what".

The main problem with the political choice for placing such a heavy strategic priority on nuclear weapons is, nevertheless, the near impossibility to turn this high-value asset into a useful instrument of foreign and security policy. Deterrence is guaranteed without such extravagant shows as the surfacing of three strategic submarines near the North Pole, and nuclear blackmail cannot yield any tangible fruit. This problem is particularly apparent in the relations with the US, where the swift resolution of the issue of the extension of the New START Treaty during the first month of President Joe Biden's administration has reduced the urgency of addressing a set of other nuclear dossiers, very much against Moscow's preferences. As for the Arctic, the heavy concentration of nuclear warheads, reactors and waste on the Kola Peninsula generates a plethora of complications and risks, including social and ecological matters, but hardly any political dividends. The Nordic neighbours are deeply concerned

¹⁰ This tragic accident on 1 July 2019 is described in Sutton, 2020.

 $^{^{\}rm 11}$ For the exposed details, see Dobrynin & Krutov (2019); on Putin's stance, see Golts, 2019.

¹² Strategic rationale for that feat of nuclear arms is dubious; see Tarasov, 2021.

about this high-risk nuclearisation of the Barents region, but cannot contribute even to the management of nuclear waste, as these issues are again covered by the heavy veil of secrecy.¹³

THE POSITION OF POWER IN THE BARENTS REGION

Nuclear assets on the Kola Peninsula certainly need protection, but Russian military build-up goes far beyond the parameters dictated by this imperative. The Northern Fleet does not have enough ships in combat order to establish a Soviet-style "bastion" in the Barents Sea, in which the strategic submarines would be able to perform patrols without hostile harassment, but the present-day thinking and planning go more in the air-space direction. The key weapon system that Russian military authorities rely upon is the S-400 Triumph surfaceto-air missile system, upgraded for severe conditions and deployed in combination with shorter-range S-300/350 and Pantsyr-S1 missile/artillery systems. New bases on the Franz Josef Land and Novaya Zemlya host these batteries, and a squadron of MiG-31BM interceptors makes frequent visits, so that control over the airspace is perceived as firmly established.14 As for control over the sea, it is the Bal-E (SSC-6) and Bastion-P (SSC-5) coastal defence missile systems armed with new anti-ship missiles Kh-35 and P-800 Onix that are supposed to provide effective coverage of the eastern part of the Barents Sea.15 The interoperability of these assets with the air defence means and with naval platforms is, however, far from perfect, so the Russian version of the Anti-access/Area denial (A2/AD) "bubble" has significant shortcomings.16

¹³ Careful monitoring of these issues can be found in *The Barents Observer*; see, for instance, Nilsen, 2020a; 2020b; 2020c.

 $^{^{\}rm 14}$ An update on this deployment is Lavrov & Kretsul, 2021.

¹⁵ On the new deployments, see Nilsen, 2019b.

¹⁶ Useful evaluation of this concept is Kofman, 2019.

The central element of the strategic plan for integrating all multi-service means of conventional operations in the Barents region is the organisation of the joint Arctic command, which was announced in 2015 and finalised only in 2021, when the status of the Northern Fleet was elevated to the military district.¹⁷ The fleet continues to prepare for such traditional missions as deployment of submarines into the North Atlantic, but its capacity for effectively interrupting the trans-Atlantic sea lines of communications are significantly below the high mark of the Soviet Navy in the 1980s. 18 Its main new capability is projecting power on shore, first of all by the Kalibr (SSN-27) long-range cruise missile, which is operational with various platforms, from submarines to frigates and small-displacement corvettes. The ability to hit targets on shore is supplemented by the significant capabilities for amphibious operations, provided by the 61st naval infantry brigade, which has gained combat experience in Donbass and in Syria. The arrival to the Northern Fleet of the Petr Morgunov landing ship (modified Ivan Gren class) in 2021 augments these capabilities.¹⁹ The Arctic brigade established in 2015 (Alakurtti, near the border with Finland) and the 200th motor rifle brigade (Pechenga) are trained and equipped for performing offensive operations in coordination with naval amphibious operations, so that the numerical superiority over Norwegian forces in the Kirkenes region (where the Soviet army performed a successful operation in 1945) cannot be effectively counter-balanced by any amount of NATO reinforcements.²⁰

This significant and regularly demonstrated military dominance is a matter of concern for the Nordic states, which have expanded their military cooperation, while Finland and Sweden have also increased their ties with NATO. Russia is eager to present these activities as

¹⁷ This organisational change is assessed in McDermott, 2021.

 $^{^{\}mbox{\scriptsize 18}}$ One professional opinion of this threat is Woody, 2021.

¹⁹ Two more ships of this class are under construction, but they may be destined to the Pacific Fleet; see Lavrov & Ramm, 2021.

²⁰ One useful assessment of these capabilities is Aliyev, 2019.

threatening its security and has made it a matter of principle to interfere in every "hostile" exercise, which are never actually staged anywhere close to its borders. Jamming the JPS signals (which Russia denies despite technical evidence) is effectual only in the northernmost districts of Norway, Finland and Sweden, but staging missile tests inside the declared NATO naval exercise areas is even more impactful.²¹ For that matter, Moscow responded to the arrival of US B-1B bombers to the Ørland base near Trondheim in February 2021 by performing missile tests in the Bear Gap close to the North Cape.²² Moscow is unable, however, to gain any political advantage from this position of military power, much the same way as with nuclear modernisation. The only result of Russian shows of force is that the claims regarding commitment to peaceful international cooperation in the High North, which are going to be reiterated during its forthcoming chairmanship in the Arctic Council, are compromised by its own military activities.

THE STRATEGIC SHIFT TO THE EAST

The heavy concentration of nuclear and conventional capabilities on the Kola Peninsula is a typical feature of Russian military posture in the Arctic theatre, but the expansion of infrastructure and activities along the vast seaboard of the Kara, Laptev, East Siberian and Chukchi Seas constitutes an important strategic shift. The Northern Sea Route (Sevmorput) functioned for delivering supplies to and transporting cargo from many settlements, including Norilsk, since the 1950s, but the Northern Fleet was prepared primarily for operations in the Northern Atlantic. The task of operating along the Sevmorput is a difficult challenge, since the Northern Fleet does not include any ice-class surface combatants or landing ships in its combat order, but

²¹ On the capabilities of the Center for Radio-electronic Warfare of the Northern Fleet, see Ramm, Stepovoi & Kretsul, 2019.

²² Nilsen, 2021a.

it has been performing an annual cruise in this direction since 2013. This task has become less challenging with the arrival of a diesel icebreaker Ilya Muromets (Project 21180) in late 2017, which is the first ever icebreaker in the Northern Fleet roster, but no more ships of this class are expected.²³ With the support of this icebreaker, the old Ropucha-class landing ships are now able to travel as far East as Chukotka and stage tactical amphibious exercises.²⁴

A chain of new bases has been built along the course of Sevmorput, starting with the Temp base (also called Northern Shamrock) on the Kotelny Island in 2013, and expanding from the Nagurskoe base (Northern Trefoil) on the Franz Josef Land to Wrangel Island and Cape Schmidt.²⁵ These bases could have been useful for supporting navigation on this treacherous sea route, but they have no capabilities for, for instance, search-and-rescue activities, and are designed and equipped primarily for air defence with added elements for antiship missile strikes. It means that to all strategic intents and purposes, most of the year the troops on these bases remain idle, finding some useful occupation in such activities as clearing the accumulated Soviet-era garbage (especially barrels), while awaiting for the US Navy to conduct a "Freedom-of-Navigation" (FONOP) operation in the Chukchi Sea.²⁶ Delivering supplies to these bases, supporting garrisons and rotating personnel are difficult tasks for the Northern Fleet, which can perform only one Sevmorput cruise a year and has very limited transport aviation capabilities.

With the beginning of natural gas production on the new fields on the Yamal Peninsula and opening of the Sabetta terminal, the volume

²³ The official presentation of this ship can be found on the Defence Ministry website, http://mil.ru/ec/info/more.htm?id=12152961@egNews (accessed 3 May 2021).

²⁴ Tsygankova, 2020.

²⁵ In-depth research on these bases can be found in the *Ice Curtain* series of reports by the CSIS; see, for instance, Conley, Bermudez & Melino, 2020.

²⁶ Uncertain rationale for such operation is examined in McCleary, 2021.

of maritime traffic along the Sevmorput has significantly increased. The plans for turning this route into a major international transit corridor are still unfulfilled, but the destination shipping, and first of all the delivery of LNG by ice-class tankers to the European and Asian markets is set to grow further.²⁷ Russia has set very strict rules for foreign ships coming into its Arctic ports and even travelling in international waters along its northern shores, seeking to establish and enforce its sovereignty over Sevmorput, and China – the main stake-holder in the Yamal LNG enterprise – has so far raised no formal objections against these unilateral regulations.²⁸

Beijing is content following Moscow rules, which make perfect sense in terms of ensuring maximum possible safety for maritime traffic, particularly since Russia has scant capacity for rescuing ships in distress and is suspicious about plans for building icebreakers in US and China. At the same time, China tends to treat the Arctic more as a "global common" than as an area where Russia and the five littoral states have exclusive rights to set the rules in their sovereign domains. While expanding carefully its "footprint" in the High North (some features of which are of the "dual-use" character), Beijing also implicitly signals to Moscow its preference for peaceful commercial development rather than militarisation of the High North.²⁹ Russia is in no position to object to Chinese plans for progressing from a "near Arctic" state to one of the "polar great powers", but it comes to understanding that in the mid-term, these plans constitute a greater threat to its ambition for asserting sovereignty over the large part of the Arctic than any NATO exercises - and that it can rely only on military instruments for advancing these ambitions.³⁰

²⁷ Humpert, 2021.

²⁸ Moe, 2021.

²⁹ One thoughtful examination of these disagreements is Trenin, 2020.

³⁰ Chinese plans are thoroughly researched in Doshi, Dale-Huang & Zhang, 2021.

CONCLUSION: PROSPECTS AND IMPLICATIONS

Assuming the rotating chairmanship in the Arctic Council for 2021-2023, Moscow must not only decide on the priorities in its agenda, but also face the disturbing dilemma of incompatibility of its desire to strengthen leadership in international institutions governing the Arctic and the commitment to building up its military might in the High North. The conclusion from deliberating on this dilemma, which the Russian leadership remains reluctant to arrive to, is that the determined course on strengthening the nuclear and conventional power projecting capabilities is counter-productive for advancing Russia's various and vital interests in the Arctic, including even the security interests. Indeed, its massive efforts in modernising and upgrading military assets and infrastructure have compelled its Arctic neighbours and NATO to start increasing their efforts at containing the threat emanating from Russia, thus setting in motion an arms race, which Moscow finds increasingly difficult to sustain.

The problem of sustainability of ambitious and costly programmes for strengthening the grouping of forces under the command of admirals of the Northern Fleet looms large for the Russian government, which has to curtail expenditures of the state budget, badly affected by the contraction of income from the export of hydrocarbons. Many high-priority rearmament goals, including even the introduction of the Borei-class strategic submarines, are re-evaluated and prolonged in execution. Some ambitious propositions, like deploying an Arctic brigade on the Yamal Peninsula, are quietly abandoned. The plan for constructing military infrastructure along the Sevmorput is presented as successfully accomplished, so no more bases are under construction or mapped as forthcoming in the foreseeable future.

This downsizing of some military preparations can be encouraged by Russia's Arctic neighbours and partners and is definitely welcome by the apparently mercantilist China, which cherishes high geopolitical ambitions, but its continuity by no means can be taken for granted. Russian diplomats are eager to make a success out of the opportunity to preside over the Arctic Council, where Western criticism over such sensitive matters as human rights and democratic freedoms in Russia is traditionally downplayed. Their influence over the decision-making in the Kremlin is, however, pitifully low, and the sober voices of budget-managers in the government also carry only that much weight. Strategic choices in Putin's tight circle of trusted aids and top Siloviki are informed and driven by the assessments of risks to the regime survival in the existential struggle with the inherently hostile West, and this conflict-centric rationality is often incomprehensible for Western advocates of dialogue and cooperation.

For once, there is a heavy inertia of half-accomplished high-cost projects, like constructing six more Yasen-class nuclear submarines, and presidentially advertised new weapon systems, such as the Poseidon nuclear-propelled underwater drone, even if their designs are untested. The more money is allocated to this rearmament, the more difficult becomes the question about the returns from these investments. It looms particularly large regarding nuclear weapons, which are portrayed as the ultimate guarantee of Russia's security, but are in fact useless for addressing the real security challenges it is facing in Ukraine, the Caucasus or the Middle East. Political usefulness of the strategic arsenal is further diminishing as the US administration seeks to reduce their prominence, including by the swift extension of the New START Treaty. Nuclear weapons constitute the main substance of Russia's claim for the status of "great power", so Moscow cannot afford their marginalisation in international relations and needs to find a way to push them into the centre of global attention – and not by the means of non-proliferation. One feasible way to do it is the resumption of nuclear testing, and it has direct relevance for the Arctic, because the only possible test site is located on the Novaya Zemlya. This proposition might appear far-fetched, but there

is evidence of modernisation of this facility.³¹ Moscow can justify its breaking of this taboo by referring to the fact that the Comprehensive Test Ban Treaty (CTBT) has not entered into force because neither the US nor China has ratified it, and by inventing the need to act pre-emptively in the face of escalating threats.

Moscow faces a similar (albeit non-nuclear) problem of investing heavily into building a position of military strength and struggling to convert it into a useful political leverage in the Barents region. Even without further additions to the numerical strength and infrastructure, the upgraded conventional capabilities are heavy in terms of maintenance and mostly idle in terms of performing policy-relevant tasks. Regional tensions are set to remain manageable, but if the high command would feel hard pressed to make a pro-active move against NATO, the Arctic theatre presents the best available and relatively low-risk opportunity. The Norwegian archipelago of Svalbard is demilitarised according to the Spitsbergen Treaty (1920) and hosts a Russian settlement, Barentsburg, which can serve as a convenient bridgehead for a rapid deployment of special forces.³² The Russian Foreign Ministry has notably increased the accusations against Norway in violating the provisions of the treaty, and the official propaganda amplifies this pressure.33 The archipelago has scant economic but significant symbolic value, and Moscow may find it tempting to test NATO resolve to support Norway against a "hybrid" aggression, camouflaged, for instance, by disputes over fisheries.

Norway and its allies do take this risk seriously, but NATO proceeds along a path of tricky choices, where every attempt to engage Russia in substantive dialogue is perceived by "hawks" in Moscow as a sign of weakness, and every increase of containment capabilities as a provocation. What may help in optimising these choices is, paradoxical as

³¹ Schneider, 2019.

³² Russian analysis of such operations in the High North can be found in Gumelev et al., 2020.

³³ Vasilyev, 2020.

it may sound for many policy-planners in Washington DC, cooperation with China. Geopolitical competition, and perhaps even rivalry, is a reality of global affairs in the 2020s and beyond, but as far as the Arctic is concerned, China finds it convenient in the short-term to behave as a model citizen, emphasising peaceful cooperation, science-based development and true concern about climate change. These goals are incompatible with militarisation of the Arctic, and if there is one position that Moscow takes into serious account, it is the one Beijing takes.

Russia is compelled to expand cooperation with China in the Arctic, and it may be useful to explore opportunities for making these bilateral ties into means for upgrading wider geo-economic connectivity in the region. Connecting with the implementation of China's currently moderate aims for expanding its footholds in the Arctic and making sure that they remain strictly non-military may be the best policy for Western stakeholders in the region for preventing the security dilemma of necessary defensive preparations prompting Russia to increase its military activities from gaining unstoppable dynamics. Domestic developments make Putin's regime prone to manipulating conflicts and wielding military instruments, so collective efforts and innovative thinking are necessary for preserving the environment of cooperation and connectivity in the Arctic.

CHAPTER 4

THE IMPACT OF DOMESTIC POLITICS ON RUSSIA'S ARCTIC AGENDA

Helge Blakkisrud

In discussing the potential for improved East-West connectivity across the Arctic, it is vital to bring into the equation the political and economic processes that shape the vast landmass lying between North-East Asia and North-Western Europe: that of the Russian Federation.

Since the end of President Putin's second term (2004–8), Moscow has increasingly been looking east and north. Whereas the turn toward the Asia-Pacific is frequently presented as a means to offset the dependence on European markets and investments,¹ it also has an important domestic component, with Moscow seeking to transform the Russian Far East from a peripheral outpost to a gateway and commercial hub.² Also in the parallel (re)turn to the North, to the Russian Arctic,³ it is the international dimension that has caught most attention, fuelled by an alarmist discourse about a "race for the Arctic" based on misconceived perceptions of the Arctic region as a no-man's land that is up for grabs.⁴ Even more so than in the case of the Russian Far East, however, the renewed emphasis on the Arctic

¹ See, for example, Karaganov, 2014; Trenin, 2015; Lee & Lukin, 2016.

² Blakkisrud & Rowe, 2018.

³ Soroka, 2016.

⁴ Duxbury, 2020.

is largely a matter of domestic priorities and concerns:⁵ about transforming Moscow's frozen backyard into a "strategic resource base" for the development of the Russian Federation.⁶

Russia's turn to the Arctic has been characterised by lofty ideas and grandiose plans. This chapter takes stock of Russia's ambitions for domestic Arctic development as well as some of the constraints and challenges – the harsh climate, dwindling population, underdeveloped infrastructure and lingering budget constraints – in order to assess what ramifications domestic Russian developments may have for the expansion of East–West connectivity.

RUSSIA'S GROWING ARCTIC AMBITIONS

For much of the 20th century, the Arctic was "a focal point for Soviet military and industrial activity". With the break-up of the Soviet Union, however, the region fell into relative neglect. Only towards the end of President Putin's second term did the Russian authorities start developing a post-Soviet, post-planned economy approach to domestic Arctic development. Since then, however, the political significance of the Russian Arctic has grown steadily. This renewed attention has been accompanied by a territorial redefinition of the region, the publication of a series of white papers, strategies and state programmes, and attempts at administrative-institutional innovation.

In the Soviet period, the northern territories were officially referred to as the "Far North" (Krainiy sever), a legal-administrative definition

⁵ Blakkisrud, 2019; Lagutina, 2019; Sergunin & Konyshev, 2019.

⁶ Government, 2008. The two "turns" partly overlap in the northeast, where northern Sakha and Chukotka are included in both the Far Eastern Federal District and in the Russian definition of the domestic Arctic, the Arctic Zone of the Russian Federation (AZRF).

⁷ Soroka, 2016, p. 360.

⁸ Blakkisrud & Hønneland, 2005.

that entailed a range of economic and social benefits for the regions included. In the 1990s, economic hardship led to pressure of including more and more territories in the "Far North": by the turn of the millennium, 11.9 million km2, or some 70% of the total territory of the Russian Federation, was defined as belonging to this category. This made the term "Far North" useless for addressing the specific needs and challenges of Russia's northernmost territories. In 2014, after having rejected several proposals for redefining the region, the Russian authorities decided to redraw the map, introducing what would be called "the Arctic Zone of the Russian Federation" (AZRF).

The AZRF cuts across the northern territories from Murmansk in the west to Chukotka and the Bering Strait in the east. Since its establishment, the southern border of the AZRF has been adjusted twice to add new territories. It currently encompasses approximately 4.9 million km2 – slightly less than 29% of the total landmass of the Russian Federation.

Table 1. Territories included in the Arctic Zone of the Russian Federation

Federal subjects fully included	Federal subjects partly included
Murmansk	Republic of Karelia: 3 municipalities
Chukotka Autonomous Okrug	Komi Republic: Vorkuta city
Nenets Autonomous Okrug	Sakha Republic: 13 municipalities
Yamal-Nenets Autonomous Okrug	Arkhangelsk: 7 municipalities
	Krasnoyarsk: Norilsk city and 2 municipalities

The authorities also started the process of redefining domestic Arctic priorities. In 2008, the government presented the first post-Soviet White Paper on Arctic priorities since the breakup of the Soviet Union, the "Basic Principles for Russian State Policy in the Arctic

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⁹ Klüter, 2000, p. 12.

for the Period toward 2020 and Beyond".¹⁰ In 2013 came the adoption of an Arctic strategy, "Strategy for the Development of the Arctic Zone of the Russian Federation and Ensuring National Security toward 2020",¹¹ later operationalised and implemented through a specially designated state programme from 2014 onwards, the "State Programme for the Socio-Economic Development of the Arctic Zone of the Russian Federation toward 2020".¹²

By 2020, the main policy documents and guidelines for Russia's domestic Arctic policy were due for revision. This led to a complete overhaul. In March, President Putin signed a revised and updated version of the "Basic Principles", now with a 15-year timeframe up to 2035.13 Reflecting the growing Russia-West rivalry and the increasing militarisation of the Arctic,14 where the 2008 edition had emphasised "developing the Arctic Zone as a strategic resource base" as the number one national interest, that was now relegated to fourth place, with the new list featuring "ensuring the sovereignty and territorial integrity of the Russian Federation" in the top slot. 15 The new White Paper was followed by a new version of the "Strategy for the Development of the Arctic Zone of the Russian Federation" in November,16 and a thoroughly revised "State Programme for the Development of the Arctic Zone for 2021-2024", adopted in April 2021.17 The latter document rounds off the review of Russian domestic Arctic priorities, containing a short-term operationalisation of the longer-term goals.

¹⁰ Government, 2008.

¹¹ Government, 2013.

¹² Government, 2014.

¹³ Kremlin. 2020a.

¹⁴ See Pavel Baev's chapter in this volume.

¹⁵ Ibid. While none of the "national interests" as defined in the 2008 version were dropped (beyond developing the resource base, that document had highlighted "maintaining peace and cooperation," "preserving the Arctic ecosystem" and the "utilization of the Northern Sea Route"), the 2020 edition also included "ensuring high quality of life and the well-being of the population in the Arctic Zone."

¹⁶ Kremlin, 2020c.

¹⁷ Kryuchkova, 2021.

Institutionally, responsibility for the development of Russia's northernmost regions has in the post-Soviet decades alternated between specialised structures tasked with coordinating the whole range of Far North/Arctic policies and this portfolio being divided between "regular" ministries. 18 In 2015, following the adoption of the first state programme, the Kremlin tried to spur a revival of the Russian Arctic by establishing a State Commission for the Development of the Arctic.19 This body brought together federal and local decision- makers, commercial interests and other stakeholders - in the Russian context, an institutional innovation. However, its success proved shortlived. In 2019, in response to the State Commission's alleged failure to set the agenda and promote Arctic development, responsibility was transferred back to the government structure, with the Arctic now added to the responsibilities of the Ministry for the Development of the Far East. The State Commission continues to operate – since 2020 partially duplicated by an interdepartmental commission under the Security Council "On Questions Related to Ensuring the National Interests of the Russian Federation in the Arctic"20 - but the main responsibility for coordinating and implementing Arctic domestic policies rests with the Ministry for the Development of the Far East and the Arctic.

As Russia is about to enter a new phase of Arctic development with the new, updated strategic documents for the period up to 2035 now in place, it is time to take stock. The rest of the chapter explores some major achievements that have been made in recent years and the main challenges that Russia faces in further efforts to develop the AZRF.

¹⁸ Blakkisrud & Hønneland, 2005.

¹⁹ Blakkisrud, 2019; Sergunin & Konyshev, 2019.

²⁰ Kremlin, 2020b.

WHAT HAS BEEN ACHIEVED SO FAR?

The most important success stories have come from the two sectors widely seen as the potential key drivers of domestic Arctic development: the exploitation of the natural resource base, and the prospects of developing a new East-West transport artery. Whereas the Kremlin initially concentrated on facilitating the expansion of the oil and gas sector into the Arctic, the focus has now shifted to include the Northern Sea Route and the potential economic dividends from commercial exploitation of this transport corridor.

The development of Arctic hydrocarbon resources

When in 2008 the US Geological Survey released estimates indicating that one quarter of the world's undiscovered hydrocarbon resources could be located in the Arctic (about 30% of the world's undiscovered gas and 13% of undiscovered oil), politicians and media began talking of an "Arctic resource race". Substantial shares of these resources are located in the Russian Arctic, where geologists had made major discoveries already in the late Soviet period. Oil and gas production have provided more than 60% of Russia's export revenues. With production at the major fields in Western Siberia then in decline, Moscow was looking for ways to replenish output. Cognisant of the new international interest in the Arctic as a prospective new energy region, Moscow turned its attention northwards.

Initially, the Shtokman gas field served as a key driver. Located in the Barents Sea 600 km off the coast of the Kola Peninsula, Shtokman is among the world's largest offshore gas fields, with reserves estimated at 3.8 trillion m3. In 2007, Gazprom teamed up with Norwegian Statoil-Hydro and French Total to develop the field. However, with the US shale revolution, prices on the global market plummeted and the project was soon mothballed.

In addition to the continuing uncertainty about future demand, and thus profitability, Arctic offshore activity has been hard hit by the Western sanctions imposed on Russia after 2014, some targeting this sector specifically. The main advances thus far have therefore been achieved onshore, on North-Western Siberia's Yamal Peninsula in particular. The main field here is Gazprom's Bovanenkovo field, Russia's third largest gas field (with estimated reserves of 4.9 trillion m3). It entered production in 2012, supplying natural gas through Russia's pipeline system to European markets.

Another key development on the Yamal Peninsula is Novatek's construction of Yamal LNG, Russia's first Arctic plant for producing liquefied natural gas (LNG). The plant was opened in 2017, and the LNG is shipped via the newly constructed port of Sabetta, (mainly) to the Asian market. Yamal LNG has opened up new possibilities for the Russian Arctic gas extraction industry: whereas dependence on pipeline infrastructure locks the production to a specific market, liquifying the gas turns it into a global commodity. The LNG production on Yamal – soon to be accompanied by a second plant, Arctic LNG-2, located across the Ob Bay on the Gydan Peninsula and due to start production in late 2022²¹ – thus represents a major breakthrough, opening new markets in the Asia-Pacific.²²

Northern Sea Route

The commercial development of the Northern Sea Route (NSR) – the transport artery stretching from the Kara Gates (the narrow strait between Novaya Zemlya and Vaigach Island) along the Arctic Coast all the way to the Bering Strait – can also be construed as a

²¹ Humpert, 2020.

Novatek is the majority owner in both Yamal LNG and Arctic LNG-2 (with 50.1% and 60%, respectively), but Chinese, French and Japanese companies also have stakes in these two plants: Total and the China National Petroleum Corporation (CNPC) hold 20% each and China's Silk Road Fund holds 9.9% in Yamal LNG; in Arctic LNG-2 Total, CNPC, the China National Offshore Oil Corporation and a Japanese consortium hold 10% each.

success story. This approximately 5,600 km long sea route was originally developed by the Soviet authorities to serve the Arctic ports and Siberian great river systems. After a heyday in the late Soviet period, the NSR fell victim to the Russian authorities' neglect of the Arctic region in the 1990s, and a considerable amount of port and navigation infrastructure fell into disrepair.

With the revived interest in the Arctic after the turn of the millennium, Moscow has sought to revitalise the NSR. Initially, the focus was primarily on domestic needs: the 2008 "Basic Principles" described the NSR as a "national unified transport system" for Russia in the Arctic.²³ However, with new forecasts of rapidly melting sea ice and the prospects of a longer sailing season, Moscow started promoting the NSR as an alternative to the Suez route, arguing that the NSR offered a considerably shorter transport distance (30–50% less) and reduced sailing time (14–20 days).²⁴ In the new, revised "Basic Principles" adopted in 2020, the NSR is presented as a "national transport system competitive on the global market".²⁵

In current plans for further development of the AZRF, the NSR has become a main priority. This is reflected in the ambitious goals the Kremlin has set for the increase in cargo volumes. In his May Decrees, a set of executive orders issued in 2018 to stake out the course for his current six-year presidential term, Putin ordered a sharp rise in annual tonnage: from around 20 million tons in that year to 80 million tons by 2024.²⁶ In the 2020 revised Arctic Strategy, the bar was raised even higher, with an annual target of 130 million tons by

²³ Government, 2008. The NSR had been closed to foreign vessels in the Soviet period, but was officially opened for international shipping in 1991. Up until around 2010, however, only a handful of international commercial transits were undertaken; see Gunnarsson & Moe, 2021.

²⁴ Gunnarsson & Moe, 2021.

²⁵ Kremlin, 2020a.

²⁶ Kremlin, 2018.

2035.²⁷ By comparison, during the Soviet heyday, annual volumes had peaked at 6.5 million tons per year; by the mid-1990s, that number had dropped to 1.8 million tons.

In recent years, the NSR can present some impressive growth figures: between 2017 and 2019, the total annual volumes almost tripled, from 10.7 tons in 2017 to 31.5 million tons in 2019.²⁸ Even in crisis-ridden 2020, with COVID-19 and the slump in international trade, the NSR recorded modest growth, with the total annual volume reported as 32.9 million tons.²⁹ However, growth is based on an increase in destination shipping into and out of the Russian Arctic, with Novatek's shipments of LNG being responsible for the lion's share.³⁰ So far, the NSR has failed to develop into a competitive alternative for East-West international transit. As a result, the official target of reaching 80 million tons by 2024 seems increasingly unrealistic.

Russian authorities are nevertheless pushing ahead. Aleksey Chekunov, Minister for the Development of the Far East and the Arctic, argues: "navigation can be made year-round and we're not waiting until it happens climate-wise". To facilitate a lengthening of the navigation season, Moscow has embarked on an ambitious programme to increase its icebreaker capacity. *Arktika*, the first of five Project 22220 nuclear icebreakers, was put in operation in October 2020 (the four others are in various stages of completion). This is currently the world's largest and most powerful icebreaker class, but is to be surpassed later in the decade by the even more powerful Project 10510 *Lider* icebreakers, the first of which is expected to be completed in 2027. In 2020, record-low sea ice, combined with a strengthened Russian icebreaker fleet, meant the season was the longest ever, from

²⁷ Kremlin, 2020c.

²⁸ Staalesen, 2020d.

²⁹ Staalesen, 2021a.

³⁰ Ibid.

³¹ Quoted in Lombrana, 2021.

May to February.³² According to Vyacheslav Ruksha, Director of Rosatom's Northern Sea Route Directorate, all-year navigation along the NSR will be feasible with *Lider* in place.³³

DOMESTIC CHALLENGES

Although Moscow may accordingly note some impressive success stories in realising its Arctic ambitions, Russia faces formidable challenges as regards the further development of the Arctic region. Some of the most important of these are related to climate change, poorly developed infrastructure, continued population loss due to out-migration, and securing the necessary funding for developing the region into the envisioned "strategic resource base" for the 21st century.³⁴

Climate change and the cost of climate adaptation

In recent years, the Arctic has been warming substantially faster than the rest of the world. Whereas average temperatures in Russia have risen at 2.5 times the global rate since the 1960s, Arctic temperatures have risen at three to four times the global rate since 2000.³⁵ The future success of the Northern Sea Route is premised on such global warming – less ice and a longer navigation season – but there is growing recognition that once we move from offshore to onshore, the

³² Ibid.

³³ Rosatom, 2019. After the reorganisation of the administration of the NSR in 2018, the Russian nuclear energy state corporation Rosatom is, through its subsidiaries the Northern Sea Route Directorate and Atomflot, responsible for the day-to-day operation of the NSR and its associated port facilities as well as being a major commercial stakeholder through its control over the nuclear icebreaker fleet. The corporation has also announced plans for developing its own international container shipping business, apparently intending to develop a *de facto* transit monopoly (Moe 2021, p. 222).

³⁴ Government, 2008.

³⁵ Moscow Times, 2020b.

detrimental effects of climate change definitely outweigh any potential gains.³⁶

In the AZRF – and beyond – housing and infrastructure have for decades been constructed based on an understanding of permafrost as a permanent feature.³⁷ This can no longer be taken for granted, as the Arctic climate is changing rapidly. In 2020, the city of Verkhoyansk in northern Sakha, known for its extreme winter temperatures – it is a contender for status as the "Pole of Cold" of the Northern Hemisphere – noted an all-time high record summer temperature of 38 degrees Celsius.³⁸ Such temperatures have a serious effect on the permafrost.

In official plans for adapting to climate change, the Russian authorities acknowledge that climate change will "have a significant and growing impact on the country's socioeconomic development, living conditions, human health, and on the economy". Today, some 90% of Russia's gas and diamonds and 30% of its oil are produced in areas covered by thick permafrost. However, a recent report issued by Morgan Stanley notes that, as a result of global warming, "the bearing capacity of structural foundations in key hydrocarbon production regions [has been reduced] by 25–75% compared to 1965". 40

An early warning of what may be in store came with the major diesel spill near Norilsk, the second-biggest Russian city above the Arctic Circle, in spring 2020. Thawing permafrost caused pillars supporting a fuel storage tank belonging to the Norilsk Nickel conglomerate to collapse, releasing 21,000 tons of diesel fuel into the Ambarnaya River. The Kremlin's response was harsh, and the company had to

³⁶ Obviously climate change may also have detrimental effects on traditional fish stocks. As a result, commercial fisheries, a major economic sector in the Western Arctic, are facing an uncertain future.

³⁷ Almost two-thirds of Russia's total landmass is covered by permafrost.

³⁸ Luxmoore, 2020.

³⁹ Kremlin, 2020a.

⁴⁰ Moscow Times, 2020b.

pay a record 146 billion rubles fine (€1.62 billion)⁴¹ – but that sum is a drop in the ocean compared to the estimated cost of adapting existing infrastructure and installations in the AZRF to the melting permafrost. According to the Ministry for the Development of the Far East and the Arctic, "The most optimistic prognosis, with marginal warming, is 2 trillion rubles by 2050, while the most extreme damage, if the intensity of the warming increases, will amount to 9 trillion [€99 billion] by 2050".⁴²

The thawing permafrost is not the only problem. Along the Arctic coast, warmer, wetter and wilder weather is leading to increased coastal erosion. By some estimates, the Arctic is eroding three to four times faster than more temperate regions of the world,⁴³ with Arctic islands and coastal lines disappearing into the sea.⁴⁴ Moving inland, global warming has been linked to more frequent wildfires and to flooding.⁴⁵

Infrastructure

Another serious constraint on implementation of the Kremlin's Arctic ambitions is the region's underdeveloped and outdated transport infrastructure. Russia's Arctic communities are poorly interconnected with the rest of the country. For example, Yakutsk, the capital of the Sakha Republic, with a population of more than 320,000, has no permanent road connections. It is served by an ice road in the winter and ferries in the summer, but transport is interrupted for lengthy periods each spring and autumn, due to ice conditions. Further north, infrastructure is even less developed.⁴⁶

⁴¹ Kommersant, 2021.

⁴² Quoted in Staalesen, 2020a.

⁴³ Hermann, 2016.

⁴⁴ Gertcyk, 2016.

⁴⁵ Moscow Times, 2020c.

⁴⁶ Yakutsk is the largest city in the world built on continuous permafrost. It is not, however, included in the AZRF, which covers only the 13 northernmost municipalities of Sakha.

As for new infrastructure projects, besides the NSR, Moscow's main focus has been on developing railway capacity – to the extent that communities in the Russian Arctic are served by railways, usually connected by a southward link. Now there are plans for interconnecting the existing grid, such as the 707km-long Northern Latitudinal Railway, cutting across Yamal-Nenets Autonomous Okrug and linking the Northern and Sverdlovsk Railways. This project, approved by the government in 2018, is funded jointly by the Russian government, the regional authorities in Yamal-Nenets, Russian Railways, and Gazprom. Eventually, the line may be extended with a branch via Bovanenkovo to Sabetta (the "Northern Latitudinal Railway-2"), a 170km stretch that would provide access to the NSR.

Once completed, the Northern Latitudinal Railway is to carry more than 20 million tons of cargo annually. However, construction has encountered financial problems, and the final completion date is not set.⁴⁷ This is not unusual: several such large-scale strategic infrastructure projects have remained blueprints. One example is the Belkomur railway, envisaged to connect Perm and Western Siberia with the port of Arkhangelsk. This project has figured in various governmental transport infrastructure plans from the mid-1990s onwards, and is intended "to not only accelerate the development of Russia's North and the Ural region but also to form an international transportation corridor in the direction of China".⁴⁸ An agreement on Chinese investment was signed during Putin's visit to Beijing in 2015,49 but so far, no concrete steps have been taken towards realisation of the project. In general, there are far more infrastructure plans than there is feasible funding – state or private.

⁴⁷ Sergeev, 2020.

⁴⁸ Chair of the Federation Council, Valentina Matvienko, quoted in *Parlamentskaya gazeta*, 2017.

⁴⁹ Komiinform, 2015.

Demography

Human resources are also in short supply. If the AZRF were an independent country, it would be the world's seventh biggest state in a territory (smaller than Australia, but considerably larger than India), but it has a population of only 2.4 million. Moreover, since the breakup of the Soviet Union, the population of the AZRF has declined dramatically.

In Soviet times, people had been lured to the Arctic with promises of "northern benefits" (severnye l'goty): higher salaries, longer vacations and lower retirement age. With the partial breakdown of state capacity in the first, chaotic post-Soviet years, people voted with their feet and left the region in large numbers: Chukotka Autonomous Okrug, Russia's easternmost territory, lost some two-thirds of its population during the first post-Soviet decade. Although the economic situation began to improve after the turn of the millennium, the negative demographic trend has continued. According to Aleksandr Kozlov, then Minister for the Development of the Far East and the Arctic, the AZRF has lost 300,000 residents over the past 15 years.⁵⁰ With the exception of Yamal-Nenets Autonomous Okrug in Western Siberia, which due to the development of its vast hydrocarbon deposits has seen a population growth, all federal subjects fully or partially included in the AZRF have lost a significant share of their populations as compared to the late Soviet period.

The 2020 revised version of the "Basic Principles" highlights population decline as among the main challenges now facing the Russian Federation in the AZRF.⁵¹ In the accompanying 2020 Arctic Strategy, Moscow has stated its ambition of turning the tide: the goal is to achieve balance by 2030, and positive net in-migration into the AZRF by 2035.⁵²

⁵⁰ Kozlov, 2019.

⁵¹ Kremlin, 2020a.

⁵² Kremlin, 2020c.

One measure proposed for attracting new residents has been to extend the "settler programme" developed for the Russian Far East to the Arctic Zone: to transfer one hectare of land for free to anyone who decides to settle in the AZRF. The programme was launched in 2021, and thus far it applies only to Murmansk, Nenets Autonomous Okrug and Yamal-Nenets Autonomous Okrug – that is, the federal subjects located along the Arctic coast from the border with Norway to Western Siberia – as well as to 23 municipalities scattered across four other Arctic regions, namely Arkhangelsk, Karelia, Komi and Krasnoyarsk.⁵³ Judging from the disappointing results of the "Far Eastern hectare" in the climatically far more hospitable Russian Far East, ⁵⁴ however, this "land-for-residence" scheme alone is unlikely to break the trend.

More importantly, the Russian authorities have realised that they need to persuade those already settled in the region to stay. Wages are higher in the Arctic – but so is the cost of living, and the AZRF scores far below average on everything from life expectancy to housing conditions. In 2019, Putin called for measures to ensure that key socioeconomic indicators and the living standards in the AZRF approach – or surpass – the national average. A main goal of the 2020 Arctic Strategy is therefore, according to Kozlov, to improve the quality of life for residents of the AZRF: if the Russian authorities want people to come to work and live in this harsh region, we must ensure a high standard of living. The strategy features a smorgasbord of promises, including the construction of modern and affordable housing,

⁵³ Karelia News, 2021. In the Arctic, unlike in the Russian Far East, most plots of land are likely to be offered near to larger town and cities. Up until 1 December 2021, the programme will be limited to local residents only. After that, all Russian citizens, as well as Russian compatriots abroad willing to resettle in the Arctic, may apply.

⁵⁴ From its introduction in 2016 and until the summer of 2020, only 83,000 people had availed themselves of land in the Russian Far East – and most of them were locals.

⁵⁵ Government, 2019.

⁵⁶ Kremlin, 2019b.

⁵⁷ Kozlov, 2019.

improvement of the range of healthcare services and the quality of the educational system, as well as development of social infrastructure.⁵⁸ However, a history of underfunding and failed promises makes it doubtful whether sufficient resources will be allocated to enable Moscow to live up to these promises.⁵⁹

Budget constraints

This brings us back to budget constraints and prioritising limited resources. While the AZRF represents a treasure trove of untapped natural resources, the cost of developing these is also very high. Moscow has discussed various development models for creating new growth in the AZRF. For some time, the main emphasis was on developing "support zones" (opornye zony), and all Arctic federal subjects were to identify priority projects/clusters that were to serve as incubators for economic growth in the wider region. More recently, however, it seems that this approach has been partly abandoned in favour of across-the-board tax breaks applicable throughout the AZRF. 61

In 2020, the Russian parliament adopted a series of economic incentives for potential Arctic "residents", companies that invest at least 1 million rubles (£11,144) or more in an Arctic locality. ⁶² The package includes zero federal income tax for the first 10 years after the business in question starts to operate at a profit. According to Russia's Arctic "Czar", Deputy Prime Minister Yuriy Trutnev, ⁶³ "almost the entire Russian Arctic becomes a special economic zone with a set

⁵⁸ Kremlin, 2020c.

⁵⁹ Kluge & Paul, 2020.

⁶⁰ Blakkisrud, 2019; Lagutina, 2019.

⁶¹ See Kozlov, 2019.

⁶² Kommersant, 2020.

⁶³ In addition to having the Arctic as part of his portfolio in the government, Trutnev doubles as chair of the State Commission for Arctic Development and as Presidential Plenipotentiary to the Russian Far East (the latter includes the easternmost part of the AZRF).

of tax incentives".⁶⁴ These incentives would, according to the former Minister for the Development of the Far East and the Arctic, contribute to creating up to 200,000 new jobs in the AZRF within the next 15 years.⁶⁵

Although it is understandable that Moscow cannot and will not foot the bill alone, the reliance on public-private partnerships casts some doubt about the realism of many of the proposed projects. The Russian authorities have sought to amplify the effects of their budget allocations by inviting both domestic and foreign investors. For the latter, however, the lingering uncertainties related to the sanctions regime have lessened the attractiveness of investing in the AZRF. Moreover, given the region's strategic importance, Moscow is reluctant to cede control over strategic assets such as port infrastructure. For example, Chinese investors were welcomed in minority positions in Yamal LNG and Arctic LNG-2, but were not allowed to invest in the new port facilities in Sabetta (the latter funded solely by the Russian government).66 Moreover, despite considerable hype around how Chinese investment in the "Polar Silk Road" may benefit Russian infrastructure development and natural resource exploitation, beyond the above-mentioned examples from the LNG sector, these discussions have resulted in very few specific projects thus far.⁶⁷

In order to strengthen Russia's "fiscal sovereignty", government spending since 2014 has featured various austerity measures. In 2019, in his annual address to the Federal Assembly, Putin declared that, for the first time ever, cash reserves were greater than the country's external debt. 68 However, with the COVID-19 pandemic and the need

⁶⁴ Quoted in Berezina, 2020.

⁶⁵ Kozlov, 2019.

⁶⁶ Sun. 2020.

⁶⁷ Gao & Erokhin, 2020, pp. 362–363. As long as Russia seeks only investment, but is reluctant to grant ownership and access, Chinese investors are likely to remain sitting on the fence: see Hsiung, 2020.

⁶⁸ Kremlin, 2019a.

to restore state finances, there is no reason to expect the austerity line to be abandoned anytime soon.⁶⁹ Many projects currently included in the government's plans for further development of the AZRF are therefore likely to be postponed – or, more likely, filed and forgotten.⁷⁰

CONCLUDING DISCUSSION: ARCTIC OPPORTUNITIES – AND ARCTIC INSECURITIES

The Russian authorities are again talking about "mastering" (osvoenie) the Arctic. Putin has given the marching orders: "The Arctic is opening up a new page in our history, one that we may call the era of industrial breakthrough. Intensive development of new gas and oil fields is underway, large transport and energy facilities are being constructed, and the Northern Sea Route revived". As noted, Moscow has indeed achieved some impressive breakthroughs. According to the former Minister for the Development of the Far East and the Arctic, "Now, with a little more than 1.5% of the country's population, the Arctic Zone provides almost 10% of Russia's GDP due to oil and gas production, 10% of all investments, and demonstrates high growth rates of labour productivity and wages". The Arctic Zone provides almost 20% of Russia's GDP due to oil and gas production, 10% of all investments, and demonstrates high growth rates of labour productivity and wages".

However, despite great ambitions, there are even greater challenges as regards opening up this "treasure trove" of frozen natural riches. Many plans peter out in the encounter with harsh Arctic realities of vast distances, inhospitable climate, and patchy and underdeveloped infrastructure.

⁶⁹ Moscow Times, 2020a.

⁷⁰ In 2020, parallel to the adoption of the revised White Paper and Strategy, funding for the state programme was cut by 50 billion rubles – from 190 billion to 140 billion (Aliyev, 2020). After further changes (cuts and outsourcing of activities to other budget lines), the new, revised state programme for 2021–24, adopted in April 2021, was allocated only 19.5 billion rubles (Kryukova, 2021).

⁷¹ Putin, 2013.

⁷² Kozlov, 2019.

The rapid warming of the Arctic opens new prospects for East-West connectivity. Less ice and a longer sailing season could make the NSR more competitive as a commercial alternative to the Suez route. As yet, however, the volumes of international transit remain very low. Moreover, the recent introduction of protectionist legislation, making it compulsory for vessels transporting oil and gas to sail under the Russian flag, as well as requiring that all new tankers engaging in this business are to be built at Russian yards, 73 is likely to dampen the interest of international companies as regards developing destination shipping. The continued steep growth in annual tonnage forecast in the 2020 revised Arctic Strategy therefore seems highly unrealistic.

Moscow's approach to the development of the Russian Arctic is clearly informed by what Mikael Wigell and Harri Mikkola in their contribution to this volume refer to as "geoeconomics as economic statecraft." This is not a matter of "win-win", but of power politics and control. Russia wants to maintain national control over routes, resources, and infrastructure. Moreover, as pointed out by Pavel Baev in his contribution, security issues loom large in the background. Ice has traditionally covered Russia's back, but climate change is now exposing this flank. When the commercial interests connected with the further development of the NSR – or the potential future exploitation of offshore hydrocarbon resources – clash with military security interests, the former are likely to draw the short straw.

In sum, the ice keeps melting, but the transformation of the Russian Arctic from a frozen backyard to a global transport artery still remains a distant prospect.

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⁷³ Moe, 2021.

CHAPTER 5

RUSSIA AND THE ARCTIC ENVIRONMENT – FLOWS OF HYDROCARBON CULTURE¹

Veli-Pekka Tynkkynen

This chapter examines how the Russian hydrocarbon culture manifests itself in the Arctic. By hydrocarbon culture I mean the current energy-political system and its specific energy-culture mentality that is both unable to get Russia detached from oil and gas dependency, as well as unwilling to see the inevitable systemic change that is approaching, brought about by global climate change. Moreover, I aim to reveal how the oil and gas dependent regime impacts the environment in the region and how this political tangle frames the way resource, commodity and knowledge flows are imagined and acted upon. I use the concept of flows here, referring to Manuel Castells' original definition that understands flows as spaces in flux.² Flows can be material or non-material, but what unites these spaces of flows is the fact that they tend to be in opposition to inhabited and everyday places of people, communities and nature. Spaces of flows are equipped with power that typically push aside and repress spaces of places. Thus, the analysis below approaches geoeconomics and connectivity³ from a human geography and spatially-informed social science perspective.

¹ This chapter draws on the book Tynkkynen, Veli-Pekka (2019). *The Energy of Russia. Hydrocarbon Culture and Climate Change*. Cheltenham, Edward Elgar Publishing.

² Castells, 1999.

³ See Wigell & Mikkola in this volume.

Furthermore, the chapter also queries what role the Russian North, a central geopolitical direction of Putin's Russia, plays in safeguarding the future of the regime and its chosen economic and political trajectory. I shall explain how the Russian hydrocarbon culture contributes to environmental problems ranging from the local to the global, and in fact functions as a "geological force" that is transforming the Arctic environment to serve the needs of this very culture. However, in doing so the culture relies on three Arctic paradoxes: local, national and global. The hydrocarbon culture is unable to address these paradoxes, and instead they are implicitly defined as societal taboos. The inability to communicate these problems is a central obstacle on the path towards a resilient and sustainable Arctic, and Russia.

ARCTIC FLOWS AS TOOLS OF THE HYDROCARBON CULTURE

Russia is a Great Power of flows and connectivity. Russia is central when it comes to global commodities and resources originating from the country. We can list many areas where Russia is pivotal: oil, gas, coal, uranium, grain (wheat), fertilizers, diamonds, gold, metals, etc. In addition, due to the size of its territory and geographical location between Europe and Asia, Russia is in a position to influence and even control many regional and global flows that traverse its area. And here the Arctic context plays an important role, due to the maritime transport potential on the Northeast Passage alone. However, when it comes to other flows, Russia's Arctic as a global route is becoming more pronounced. For example, the planned Arctic Connect data cable, linking Europe and Asia, allowing faster and thus money saving transactions and Internet connections, is to follow approximately the Northeast Passage route, thus passing through Russia's 200-nautical-miles Exclusive Economic Zone (EEZ). The cable has been on the EU and the Nordic countries' Arctic agenda, and a Finnish state majority-owned company Cinia Ltd, with Russian, Norwegian and Japanese partners, is proceeding with the project. They define the cable as "neutral infrastructure",⁴ which is in itself a geopolitisised act – an attempt to remain below the high-politics radar and to reassure investors and future users that data flows are secure and safe. Still, in order to carry out construction as planned, starting in 2022, Russia must consent with the project as for the most part the cable will traverse Russia's EEZ, and in some points also its territorial waters.

Just like these future potential data flows, Russia has leverage in the Arctic via other traffic flows. Control over maritime traffic is high on the Russian agenda, crystallised for example via granting the state nuclear corporation Rosatom sole rights to master the Arctic waters.⁵ Airline traffic between Europe and Asia is also an Arctic affair. Although airline traffic over Russia is not per se an Arctic policy issue, symbolically the Arctic plays a role here, as the flights follow a very northern route. Without Russia's permission, planes would have to fly over the North Pole, as they did prior to the 1990s, thus emphasing Russia's leverage in the area. For example, the Finnish airline company Finnair has been highly dependent on flights over Northern Siberia, as the company's strategy relies on Helsinki's position as an air-traffic hub linking China and Japan to Europe and North America. The potential for Russia to use these flows as leverage was seen after the break-out of the war in Ukraine in 2014, when Russia threatened to cancel transit flights over Russia in response to Western reactions over Russia's aggression. This was, of course, noticed in Europe. Finnish reactions surely pleased Moscow, as many pondered whether Finnair could continue flights over Siberia, since a bilateral agreement between Finland and Russia came into existence in 1993.6 No restrictions on air traffic followed, yet the episode definitely left an impression that if Russia's position is not respected in Ukraine, in the Arctic or elsewhere, the issue may appear again. This is the way

⁴ Pfeiffer & Khennikov, 2019.

⁵ Atomflot, 2021.

⁶ Soisalon-Soininen, 2014.

modern Russia views its leverage: for the most part Vladimir Putin's Russia has used these flows in a malign fashion by persuading, pressuring and extorting both domestic and international actors. What followed after the outbreak of war in Ukraine and Syria showed yet another flow-as-a-tool that typically is not considered as leverage, at least not in the Arctic context: Russia suddenly opened its northern borders for refugees and migrant workers residing in Russia to enter Norway and Finland in 2015–16. Thus, even refugee crises and the related human-trafficking business is part of Russia's repertoire to exert control on the international arena.⁷

For Putin's Russia and its hydrocarbon culture, both internal and transnational strategic flows of commodities, data and people are instruments of control and power, in other words economic statecraft.8 Whilst I do not believe that without this high fossil-energy dependence Russia would stop using such leverage tools altogether, I argue that it is much more likely that the present hydrocarbon culture uses them in a malign fashion as tools enabling coercion. The whole logic of power of Putin's regime is based on using "sticks" that are at its disposal - the material and semiotic dimensions of these flows are used to produce an effect. Except for military power, Russia does not have much influence internationally. Russia could better use different sorts of flows for the good of humanity, and fare well economically and socially in a more sustainable manner. These positive "green flows" are primarily related to environmental services, deployment renewables and promotion of energy transition, where Russia could play a pivotal role in the future. For example, Russia has large deposits of rare-earth metals needed in building solar power, yet these metals are not widely exploited. Moreover, Russian territory possesses a multitude of resources that can help to curtail negative global flows - Russia could dam flows of carbon, as the carbon storage potential in the country's forests, swamps and permafrost is significant.

⁷ E.g. Nerg & Järvenkylä, 2019.

⁸ See Wigell & Mikkola, this volume.

Yet to actively protect them asks for national environmental and climate mitigation policies that are thus far lacking. A climate-adaptation strategy saw the daylight in Putin's Russia, but this reactive, not proactive, political stance is the best one can expect, alas, from a hydrocarbon culture. In addition, Russia's green flows of the future – fresh water, sustainably grown grain, fertilizers, and nature protection areas as "biodiversity incubators", that is, safe havens enabling future flows of flora and fauna in climate-impacted world – are all such assets that enable Russia to fare well economically as well as attain (soft) power via respect and admiration, not by coercion and fear as is the case today. Next, I shall analyse how Putin's hydrocarbon culture views the Arctic and treats its environment.

PATH DEPENDENCY AND NATION-BUILDING IN AN "EXCEPTIONAL" ARCTIC CONTEXT

Marlene Laruelle proposed that the Arctic is one of the central discourses linked to geopolitical, national identity and state construction in Putin's Russia. Arctic objectives and ideals are discussed in the context of history, since this discourse is constructed by referring and appealing to achievements of the Soviet state in the High North. The state-building geopolitical discourse of Putin's Russia is thus partly dependent on the selective utilisation of history from the Tsarist and Soviet eras. And it naturally aims at and looks into the future, where achievements in the Arctic will pave the way for the strengthening of national economic power.

The geopolitical discourse on the Arctic that began in Russia during the last decade is, nevertheless, a consequence of several global, regional and national processes. One of the most important drivers is

⁹ Praviteľstvo Rossiiskoi Federatsii, 2019.

¹⁰ Laruelle, 2013.

¹¹ Tynkkynen, 2016a.

climate change that is advancing at an accelerated pace in the region. The vision of an ice-free Arctic Ocean as well as the estimates of rich hydrocarbon deposits located on the Russian Arctic continental shelf have been pivotal in pushing economic activity in the region. The expectations that the loss of sea ice will transform the Northeast Passage into a key route linking Europe and Asia, forming an interface between the geopolitical discourses of Eurasia and the Arctic, highlights how the economic and political needs of the governing regime are intertwined.¹² Domestic and foreign policy needs that are partly symbolic and partly compulsive force Putin's Russia to be an increasingly military presence in the Arctic and emphasise its sovereignty in the region, for example, via territorial claims.¹³ In addition, the emphasis on hydrocarbon sector development, chosen both for economic and power-related reasons, is compelling Russia to expand its Arctic activity. However, this is not a choice in the original meaning of the word, but rather a path dependency caused by hydrocarbon culture and its spatial logic: it creates favourable conditions for oil and gas to the detriment of other sectors of the national economy, and also accentuates large-scale, state-led projects with the help of authoritarian rule. This path dependency is not limited to the sphere of Russian economics and politics; in the spirit of building the hydrocarbon culture, it also encompasses society and culture.14

For the time being, many Arctic mega-projects have been put "on hold" due to the relatively low price of oil. The large-scale plans to turn the Russian Arctic into a patchwork of off-shore oil rigs and gas pipelines, as envisioned in the Energy Strategy of the Russian Federation in 2009, have not materialised, despite the fact that Russia tried to influence the price of oil by striking a deal with OPEC to cut oil production in late 2016. The two energy complexes envisioned before the oil price drop in 2014 and subsequently carried out – the

¹² Medvedev, 2018.

¹³ See Baev in this volume.

¹⁴ Tynkkynen, 2016a; 2016b.

Prirazlomnaya oil field at the Kara Sea and the Yamal LNG production and transport facilities on the Yamal Peninsula - may prove to be risky investments both for the Russian state and private investors. International companies participating in Arctic energy projects are scarce at the moment, primarily because of low oil prices but also due to sanctions imposed by Western countries on Russia due to its aggression against Ukraine.¹⁵ The sanctions specifically target Russia's future hydrocarbon developments in the Arctic. Given the importance of the Arctic for Putin's vision of the Russian future, it cannot be anticipated that the large-scale plans to exploit the Arctic, now firmly locked in the drawers of the governing regime, will be scrapped. However, without energy technologies of Western origin – which are now subject to sanctions - Russia's Arctic energy conquest is not going to be easy, if it is even possible at all.¹⁶ Hence, the importance of Arctic cooperation is underlined in Russian foreign policy discourse, which claims that the Arctic forum is actually an arena of like-minded actors and thus insulated against conflicts elsewhere - in the Ukraine, Syria and beyond. At the same time, however, the domestic discourse and rhetoric targeting the Russian people have defined the Arctic as a territory where Russia's interests are at odds with those of others, especially Western actors, whose aim is to plunder Russia's natural riches.¹⁷ Therefore, framing of the Arctic as an "exceptional" context - one in which all actors emphasise the rule of law and play by the international norms – fits in well with the uncompromising trajectory of a Russian political elite that is compulsively clinging to hydrocarbons.

For some Western and Asian actors, it may be appealing to nurture this exceptionalism in the hope of quick economic returns, even to the point of naivety. Arctic cooperation in the field of energy, environment and culture is a good candidate to become a source for

¹⁵ Aalto, 2016.

¹⁶ Ibid.

¹⁷ Gritsenko & Tynkkynen, 2018.

advancement that leads to détente between Russia and the West. This should be nurtured, while still keeping in mind the political and environmental risks that potentially accompany such a choice. At this moment, therefore, it is worth asking explicitly: What objectives are being promoted in the name of "Arctic exceptionalism"? Does the global community want to foster a Russia that nestles in and around hydrocarbons, strengthening the hydrocarbon culture and dooming it to a deeper resource dependency that further erodes its democratic institutions and maintains a centralised and unpredictable rule? Or is it able to see Russia and its northern expanses as a context where local livelihoods are a central component in a flourishing and sustainable economy, and mitigation of and adaptation to climate change is taken seriously, including a bold investment programme targeting the vast potential in renewable natural resources and energy?

PARADOXES OF AN ARCTIC-CENTRED HYDROCARBON CULTURE IN RUSSIA

Russia's Great Power ambitions coalesce in the Arctic through a combination of traditional sovereignty staking out a "new" territory, economic rents captured from the region's natural resources and sea routes, and strengthening of the global energy superpower image. Despite all this Russian blustering Lebensraum thinking, ¹⁸ the Arctic policy of the future will also be defined by cooperation. However, the present trajectory poses several paradoxical risks to Russia as it reaches towards its Arctic.

The "Global Arctic Paradox", which describes the situation when the changing climate enables the exploitation of new northern energy resources and further intensifies climate change¹⁹ seems to be ignored

¹⁸ Laruelle, 2013.

¹⁹ Heininen, 2018.

as the world fixes an intense gaze on the Arctic mineral riches.²⁰ The global Arctic paradox is in fact an ethical problem, since the greenhouse gases released from hydrocarbon extraction and use have a particularly strong impact in the Arctic. In addition, the uncertainties related to the rapidly melting sea ice and thawing permafrost are being covered up, while the economic prospects of Arctic industrialisation are exaggerated.²¹ These global tendencies seem to be particularly true in Russia, where the Arctic is actively being turned from an "uninhabitable" periphery²² into a geopolitically central area interwoven with nation-building and Great Power political identity construction in a novel way.

The "Russian Arctic Paradox" is of less profound nature than the ethical problem raised by the global Arctic paradox - climate change melts the ice and further accelerates the exploitation of Arctic hydrocarbons – as this national paradox is linked to the fluctuating global price of oil and potentially changing ideas about Russia as a Great Power. The Russian Arctic paradox is caused by the need for Russia to be visibly present in the Arctic and along the Northern Sea Route in order to enhance its Great Power status, as well as the fact that Russia has, in an economic, political and even cultural sense, become chronically dependent on hydrocarbons.²³ These factors push the Russian state to promote and finance non-viable oil projects in the Arctic for the time being, and to do everything in its power to influence the price of oil via its energy diplomacy and foreign policy in the global arena in order to make Arctic oil projects profitable and increase budget revenues. At the grassroots level, in contrast, we see the "local Arctic Paradox": hydrocarbon-based workers' towns are well maintained and indigenous communities are "subsidised", or compensated for the economic losses produced by the industries,

²⁰ Gritsenko, 2018.

²¹ Gritsenko & Tynkkynen, 2018; Palosaari & Tynkkynen, 2015.

²² See the section on the definition of sustainability below.

²³ Gustafson, 2012.

but the long-term economic and sociocultural strategies that reach beyond the time frame of hydrocarbon industries are missing.²⁴ This local Arctic paradox mirrors the general paradox facing Russian society: how to prosper after oil? Unlike the global Arctic paradox, the local Arctic paradox in the Russian High North is easier to act on, for example, via corporate social responsibility practices that are monitored²⁵ in the Yamal Peninsula. However, as long as this activity is labelled as "charity" – as it predominantly is by major actors in the High North such as Gazprom, Rosneft and Novatek – this paradox is unable to be resolved on a strategic level. In this respect, internationally agreed supply chains and commodity certificates could play a decisive role. After all, it is us in the EU, Japan and China who are the primary consumers, and India and South Korea the gathering consumers of Russia's energy resources, and it is in our interest to increase responsibilities along the energy supply chain.

By approaching Russia's Arctic paradoxes from different disciplinary traditions, we are able to draw a more nuanced picture of the factors and path dependencies behind these paradoxes. First, seen from the perspective of political economy, the agenda and decisions concerning industrialisation of the Russian Arctic seem legitimate, at least in the short term. Arctic hydrocarbons are pivotal in the quest to maintain high levels of oil and gas production, and the related incomes. The resource rents are central to Putin's popularity; along with boosting military capabilities and the domestic security structures, these rents have been utilised for the benefit of Russian citizens in social transfer schemes and via the economic trickle-down effect. The link between energy rents and the regime's popularity seems to be holding for now, despite the fact that during the Putin era that began in 2000, the affluence of the Russian nation - the energy-linked capital - has accumulated in fewer and fewer hands than ever before, while a significant share of the population persistently remains below the

²⁴ Henry et al., 2016.

²⁵ Tynkkynen et al., 2018.

poverty line. ²⁶ Control over these rents is also vital to the self-preservation of the governing regime, as the political and economic elite – first and foremost the oligarchy – is kept loyal through "carrots" and "sticks" derived from energy flows and rents. Thus, the entanglement of economic interests and those of the political elites and the resulting absolute priority of the natural resource sector is a key reason why Putin's Russia cannot avoid leapfrogging to the Arctic "big fish" with its major virgin and greenfield deposits of oil and gas. ²⁷ As a result, the excessive leakage of carbon that has grave effects on the environment from the local to global scales, play a pivotal role in defining not only Arctic futures, but also the future of a Russia that is clinging to a hydrocarbon culture.

Secondly, from the perspective of politics of identity and culture, Russia's Arctic paradoxes do not seem as permanent as the political economy of the Russian Arctic would entail. However, the way in which the governing regime constructs identities and promotes certain cultural forms does pose challenges for sustainable Arctic development. The manner in which Russian political discourse on the Arctic is constructed, and the way in which the Arctic is intertwined with nation-building efforts, 28 is very much related to how Russian territory and its resources in general have been operationalised by the regime as parts of national identity and culture. I refer here to the efforts by the governing regime and its central actors, such as Gazprom, Rosneft and Lukoil, to use the spatialities and materialities (infrastructures, flows and connectedness) of energy to construct a specific form of identity that views the nation's deep dependence on natural resources, especially fossil energy, as a strength that enhances Russia's role as a Great Power. Trying to sell this hydrocarbon culture and Energy Superpower identity to the Russian people²⁹ is thus

²⁶ Shorrocks et al., 2016.

²⁷ Bridge, 2011; Tynkkynen, 2010, 2014.

²⁸ Medvedev, 2018.

²⁹ Bouzarovski & Bassin, 2011; Rutland, 2015.

fundamentally linked to selling the Arctic as a central geopolitical direction for the development of the Russian state and its sovereignty, as demonstrated by Laruelle.³⁰

This identity tangle amalgamating the Arctic and its resources is therefore also a pivotal factor influencing, if not determining, the way economies, cultures and the environment are treated at the level of policies and underlying politics. In order to understand why the question "What comes after hydrocarbons?" has been pondered so little in Russia, we must be aware of the cultural and identity dimensions of the issue. Among other things, constructed identities of hydrocarbon culture, coupled with meta-level processes in the sphere of political economy, explain why indigenous communities are kept in line and their livelihoods maintained through "artificial respiration" taking place via subsidies provided by the hydrocarbon industries in compensation for pollution and loss of habitat. The practice of "milking the oil men", which means distributing crumbs of wealth in the form of consumer goods and some social services instead of long-term strategic planning to enhance the Northern (indigenous) economies and cultures, has evolved because the regional and local administrations in the Russian Arctic are also part of a game that puts the hydrocarbon industry in the driver's seat.³¹

Thirdly, when examining the political ecology in the Russian Arctic, the problematic directions set by the political economy in Putin's Russia and the cultural and identity practices tied to it become even more evident. Russia's hydrocarbon industries pollute the air, waters and soil in the sub-Arctic and Arctic regions, first and foremost, to the detriment of Arctic ecosystems and the health of local populations. Since Russia's oil industry has been renationalised – following the privatisation of Russia's oil industry in the 1990s, the state has acquired control of two-thirds of oil production – the state is to

³⁰ Laruelle, 2013.

³¹ Henry et al., 2016.

blame for the insufficient environmental policies in this field.³² The official amount of oil that is reported as spilt annually is 1.5 million tonnes, yet it is estimated that at least 1% of Russia's oil production, or 5 million tons of crude oil, is released into the environment during extraction and transport and 500,000 tons of hydrocarbons enter the Arctic Ocean via rivers.³³ The annual number of spills from failing oil pipelines ranges between 10,000 and 20,000,³⁴ but the exact number is unknown due to lack of transparency in the business and the state's lax attitude concerning environmental consequences.³⁵ Therefore, official figures concerning oil spills are not available and the numbers provided by energy companies are for the most part unreliable.³⁶

Moreover, approximately 20 billion cubic metres (bcm) of associated petroleum gas (APG), which is equivalent to 3% of Russia's annual gas production and 10% of the volume that EU countries import from Russia, is burnt in flares at Russia's oil production rigs.³⁷ The increased level of APG utilisation that has fortunately occurred since 2008 is the unintended result of the electricity sector reform carried out in Russia since 2008. Oil companies have been producing electricity from APG in mini-power plants and thus avoiding both capacity and retail electricity market payments, which has made them more energy efficient.³⁸ However, even after this drastic reduction in APG flaring from over 50 to just 20 bcm, Russia is still by far the biggest polluter and accounts for one-fifth to one-quarter of all APG flaring globally even though it only accounts for 13% of the world's oil production.³⁹ Russia's APG flaring is exceptionally detrimental to

³² Shapovalova, 2017; Shvarts et al., 2016.

³³ Hese & Schmullius, 2009; Greenpeace Russia, 2020.

³⁴ Ministry of Natural Resources, 2020.

³⁵ Vasilyeva, 2014.

³⁶ Shvarts et al., 2016.

³⁷ Korppoo, 2018.

³⁸ Vanadzina et al., 2015.

³⁹ Elvidge et al., 2018.

the Arctic environment in two ways: gas flaring accounts for about 1% of global energy-related greenhouse gas (GHG) emissions, 40 and the black carbon (BC), also known as soot, emitted during flaring accounts for half of all BC settling on and melting Arctic ice and snow. Recent research⁴¹ suggests that BC is responsible for roughly one-third to one-half of all climate forcing in the region, thus contributing significantly to the double-pace warming the Arctic has experienced compared to lower latitudes. The root causes for the global Arctic paradox are global GHG emissions, to which all nations and economies contribute. However, the climate warming impacts of BC emissions from the Russian hydrocarbon industry account for a significant share of the overall climate impacts of Russia's emissions, and even a pivotal share of the warming in the Arctic. To put it bluntly, the Russian hydrocarbon industry, backed by the political economy of Putin's hydrocarbon culture, is speeding up the warming of the Arctic and its subsequent exploitation. This is where a significant share of its future wealth is located, and it is as if the Russian hydrocarbon culture had turned into a "geological force" transforming and forcing the Arctic natural ecosystem to serve the needs of the chosen culture. Oil and gas extraction is literally melting the ice to uncover yet another virgin deposit of Arctic oil and gas.

When the above-mentioned factors are taken into consideration, the way in which Arctic environmental change and global warming have been framed by the Russian elite for the general public comes as no surprise. There is consensus that Russia has not been at the fore-front of global climate governance, but it has not openly tried to fore-stall international climate agreements either. Russia was part of the Kyoto Protocol and signed the 2015 Paris Agreement, and ratified it in 2019. However, the way that climate change in general, especially in relation to the Arctic, has been communicated by the state and its media tells a story of increased scepticism and outright denial of

⁴⁰ Tynkkynen, 2019.

⁴¹ Shapovalova, 2017; Stohl et al., 2013.

anthropogenic climate change and its negative impacts on Russia and especially its Arctic expanses. ⁴² I argue that a political economy tied to hydrocarbons and the identity construction needs of the governing regime concerning the Arctic and its energy resources leads to a regime-favouring and self-preservation narrative in which hydrocarbons and their societal effects are viewed in an exorbitantly positive light. In this narrative, the negative economic, social and environmental effects of deep sociocultural dependence on hydrocarbons turns into a social taboo, as does climate change and its negative impacts on Russia and its Arctic expanses.

THE ENVIRONMENT IN RUSSIA'S POLICY STORIES ON THE ARCTIC

In general, the story told by Russia about the Arctic is schizophrenic: the Russian people hear a message about how Russia the "Fortress" is threatened by forces from outside, whereas the narrative uttered by official Russia at foreign arenas and forums depicts Russia as an ideal law-abiding citizen of the global community aiming for mutual benefit via economic and political cooperation.⁴³ Every country tries to define itself as a do-gooder on the international scene: all nations and states have a tendency to communicate in a different manner internally than with the outside world. However, the Russian doublespeak⁴⁴ is flagrantly beyond comparison among industrialised nations, and on a par with highly authoritarian governments like China. I argue that this doublespeak is a product of the hydrocarbon culture: in order to avoid jeopardising its legitimacy, the Putin regime has no option other than to securitise environmental issues and exaggerate security threats to the Russian people.

⁴² Palosaari & Tynkkynen, 2015; Poberezhskaya, 2014.

⁴³ Gritsenko & Tynkkynen, 2018.

⁴⁴ Gessen, 2017.

Interestingly, a similar difference between the external and internal communication can be found in the sphere of the environment. While the domestic policy narrative is understandably broader than external communication, the fact that the natural environment is discussed more often in domestic media (Rossiskaya Gazeta newspaper) than in the foreign policy announcements (Ministry of Foreign Affairs documents) may appear counterintuitive, as the environment is usually considered an ideal candidate for international cooperation. On the one hand, this demonstrates that environmental issues are important for the Putin regime - at least rhetorically - when it discusses the Arctic and its exploration. This emphasis can be explained as a central legitimising component in the otherwise economic-utilitarian discourse: by promising to clean up the environmental consequences of past Arctic exploitation and protect Arctic nature during the new rush, the regime is "buying hearts" to support its Arctic nation-building effort. The relative lack of attention to international environmental cooperation in the Arctic in the official foreign-policy documents can be attributed to the overall diplomatic orientation, which focuses on procedures via international organisations and international law. In the absence of an Arctic environmental convention and the overall downplaying of climate change on the Russian Arctic policy agenda - climate change is treated as a source of opportunities and recognition of the local impacts of climate change is limited - relative ignorance regarding the environment in the external communication is understandable.

The environment, however, is used in the domestic story to legitimise the chosen policies of hydrocarbon culture: the environment is one of many tools used to move ahead with exploitation of Arctic hydrocarbons. The agenda of *The Year of the Environment 2017*⁴⁵ in Russia is telling: the Arctic environment is discussed only in terms of solving the problems of littering and pollution caused by economic

⁴⁵ Ministry of Natural Resources, 2017.

and military activities of the Soviet state in the High North, as well as providing the energy companies and authorities with means to tackle future spills from the extraction of oil and gas in the Arctic. Importantly, fully in line with the later climate-adaptation strategy of Russia, 46 none of the projects addressed climate mitigation. This indicates that environmental change that is visible for Russians, such as urban waste issues and local air pollution, also catches the attention of the regime, but the global environmental change that will cause much more severe effects for Russians and Russia does not. Environmental change in the Russian Arctic, partly caused by the actions of the hydrocarbon culture, remains in the realm of a taboo for the regime, whereas the environment is defined to serve the needs of the culture. Therefore, this story cannot include protecting the Arctic environment through climate mitigation, as that would challenge the rationality of the whole Arctic enterprise of Putin's Russia.

CONCLUSION

In light of the Arctic paradoxes facing Putin's Russia that were outlined above, we are very likely to see a balance between emphasising "hard" and "soft" topics and approaches in Russia's Arctic policies: they are used in tandem for the benefit of the hydrocarbon culture, which is itself dependent on Arctic resources. However, as the High North is so central for Putin's Russia, there is a window of opportunity in the Arctic allowing the promotion of more socially and environmentally responsible policies and practices. Therefore, it is more likely that Russia will be more susceptible towards ambitious environmental policies within Arctic cooperation, as the Arctic needs to be kept "exceptional" for the simple reason that the success of the Putin regime is tied to the fossil energy futures of that region. The problem in engaging with Putin's hydrocarbon culture in the Arctic is

⁴⁶ Pravitel'stvo Rossiiskoi Federatsii, 2019.

the difficulty of promoting practices that push Russia away from that culture and discouraging actions that are adding fuel to the fire for a regime that thrives on hydrocarbons. Thus, the Russian hydrocarbon culture maintains its power via materialities (flows, infrastructures and connectedness) of energy, including the environmental dimension, in a very selective way.

This environmental "cherry-picking" needs to be confronted. This should be done by Russians, and in the domestic context especially the cultural and identity related arguments and justifications of the hydrocarbon culture need to be challenged. However, this is ineffective unless the main consumers of Russia's energy – the EU, China and others – do not challenge these unhealthy practices via energy trade agreements and through economics. The whole spectrum of the environmental effects of Russian energy, impacting first and foremost on the fragile Arctic, need to be revealed and politicised, and turned into a tool that discourages investments in (Arctic) hydrocarbons and enhances a transition towards a carbon-neutral Russia that can thrive as a Great Power of "green flows". The Arctic and global environment would benefit immensely if Russia could gradually shift from a hydrocarbon culture to one based on benign flows.

ONLY CONNECT? THE POLAR SILK ROAD AND CHINA'S GEOECONOMIC POLICIES

Marc Lanteigne¹

A ROAD LESS TRAVELLED (SO FAR...)

Once the newly-installed government of Xi Jinping began to piece together the components of the Belt and Road (—常 Yidai Yilu) Initiative in 2013, it was a question of when, rather than if, the trade routes which Beijing was envisioning would reach the Arctic, given the growing prominence of the far north in international discourse and Chinese interests in developing stronger cross-regional diplomacy with Arctic governments and institutions. Although Beijing had placed a priority on developing maritime trade in the Indian and Pacific Oceans through various bilateral and multilateral partnerships, the possibilities of an Arctic free of ice and far more open to resource development and sea transits were unlikely to escape China's notice indefinitely. This was due not only to the attraction of regional energy supplies (oil and gas) and raw materials, but also the potential for shorter transit routes between Northeast Asia and key markets in Europe and North America as more polar ice erodes

¹ The author would like to thank Lynn Gardenier, Francesca Rán Rositudóttir and Mingming Shi for their assistance in the preparation of this chapter.

² Lanteigne, 2015.

during longer periods per year. Beijing is also anticipating that the Central Arctic may become useable for summertime maritime transits in the coming years.³

Moreover, unlike other regions with which China has engaged in "resource diplomacy", the Arctic had the advantage of being comparatively peaceful, politically stable, and largely predictable and settled in regards to rules and regimes. Despite a lack of clarity as to when the Arctic will fully develop into a sea lane of communication (SLoC), Beijing has demonstrated a willingness to take a longer-term view of the region. In the interim, it has been a priority for the Xi government's polar policies to define China as a "near-Arctic state" (jin beiji guojia 近北极国家), if not necessarily geography, at least in terms of interests,⁴ in order to better ensure a voice from Beijing on emerging areas of Arctic governance, including in the areas of environmental, economic, and potentially strategic policies.

By far the most tangible example of Chinese economic interests in the Arctic has been the emergence of the "Polar Silk Road" (PSR) (Bingshang Sichou Zhilu 冰上丝绸之路), which would act as a major focus for Beijing's economic, political and scientific interests in the Arctic.⁵ At the core of the PSR is the emerging maritime trade link along the Northern Sea Route (NSR), connecting Asia and Europe via Siberia and with the potential to considerably shorten transit times between the two regions.⁶ Since 2013, Chinese vessels have been experimenting with summer transits of the NSR, hoping the route will eventually see more traffic to a level where it will become a secondary corridor for Chinese cross-regional trade. At present, the Polar Silk Road remains primarily a Sino-Russian concept, but Beijing has expressed hopes, including in its 2018 Arctic White Paper, that as more of the Arctic

³ Bennett et al., 2020.

⁴ Jian, 2018.

⁵ Xia & Xie, 2018; Chih, 2020.

⁶ Guan, Yang & Liu, 2015; Kobzeva, 2020.

Ocean becomes accessible, other routes may also be added to the PSR in the coming decades, including the Canadian Northwest Passage, and possibly via the Central Arctic. China is seeking economic benefits from these routes, but in the nearer term aspires to develop the PSR as a cornerstone to Beijing being accepted, at least by the eight Arctic states, as a regional partner and stakeholder. In addition, while Beijing has stressed the roles of non-Arctic states in addressing emerging far northern issues, it has also frequently affirmed its support for the legal structures which govern the Arctic. As well, China has sought to develop the norm of the Arctic being considered an international space with room for engagement from actors outside of the region.

However, as with other threads of the Belt and Road, China has found its role in the Arctic beset by contradictions, and occasional conflicts, between economics and politics. Beijing has stressed that the Polar Silk Road is strictly a financial and developmental exercise, yet political and indeed security concerns from some Arctic governments, traditional and non-traditional, have begun to hamper the progress of the PSR. Opposition to the PSR was especially acute under the Donald Trump administration in the United States, which took great pains to present a narrative of China's Arctic interests as being spurious and representing revisionist policies. Trump government sought to dislodge the perception of climate change as the primary challenge facing the far north, in favour of great power competition caused by assertive Chinese and Russian policies.

In the Nordic region, governments had begun to express wariness of the potential for "dual use" PSR-related projects in Northern Europe, including plans for a research station, with accompanying airstrip, in

State Council Information Office of the People's Republic of China, 2018; Bennett et al., 2020, pp. 1–15.

⁸ Lanteigne, 2017, pp. 117–130.

⁹ Sangupta, 2019; Kinling, 2021.

northern Finland which was reportedly blocked by Helsinki in 2018, and a decision made the same year by the Danish government, with much prompting by Washington, to offer financial assistance to airport refurbishing projects in Greenland after a Chinese firm initially placed a bid for that contract.¹⁰ Thus, there is the question of whether cooling Sino-European relations, notably with Sweden, could also adversely affect the expansion of the PSR beyond Siberian shores. One major reason for these roadblocks has been Beijing's frequent use of "geoeconomic" practices, defined as the use of economic policies in the service of promoting or defending one's national interests, 11 with some Arctic governments, including in the Nordic region. This raises questions about Beijing's longer-term economic, as well as strategic goals in the circumpolar north. This chapter will examine the development of the Polar Silk Road within the greater BRI, paying special attention to the question of geoeconomic policies, and debate how political and economic constraints, as well as security concerns, may affect its evolution.

CHINA'S APPROACH TO THE BRI AND ROLES OF GEOECONOMICS

Ever since the period of "deep reform" in the Chinese economic policy commenced in the 1990s, the country was preparing to become a strong economic player and competitor within an increasingly globalised world economy.¹² However, in the wake of the change in government from Presidents Hu Jintao to Xi Jinping in 2012–13, China's foreign policy shifted from perceiving China's rising power in a conservative fashion, with an emphasis on "peaceful development" (heping fazhan 和平发展), to pursuing a greater interest in, and confidence with, expanding Chinese power, including in the economic

¹⁰ Wormdal, 2020; SVT, 2019; YLE, 2021; Henshaw & Page, 2019.

¹¹ Blackwill & Harris, 2017; Lu, 2004, pp. 11-16; see also Wigell & Mikkola in this volume.

¹² Yingyi, 2006, pp. 229-249.

realm, as exemplified by Xi's concept of *Zhongguo meng* (中国梦) or the "Chinese dream".¹³ The expansion of Chinese economic diplomacy under Xi comprised the pursuit of cross-regional diplomacy in a far wider array of arenas, including the Polar Regions.

The development of the two major components of the Belt and Road, with the "belt" being overland trade, transportation and communication routes, and the "road" acting as the maritime counterpart, is the latest and largest manifestation of China's interest in transforming its economic power into different forms, including for strategic purposes. With the development of the Polar Silk Road since 2017, it is apparent that the Arctic, and adjacent regions, are being considered by Beijing as tributaries of the Maritime Silk Road. However, the northern area differs from the other emerging sea routes within the BRI, such as those in the Indian and Pacific Oceans, since the Arctic is in a process of environmental transformation, as climate change is altering its environmental, and potentially its legal, milieu.

Although the BRI was conceived as an exercise in trade and development, linking Chinese markets with others in anticipation of achieving mutual economic benefit, connections between the Belt and Road and Chinese political and security interests are numerous and easily identifiable, with the BRI often acting as a key component in China's expanding geoeconomic capabilities, including protecting overseas assets and promoting the country's interests in global economic governance. Although Chinese policymakers have been wary of comparisons between the Belt and Road and the US-backed Marshall Plan for Europe's post-World War II recovery in the 1950s, the two initiatives share attributes, including their ambitious economic scopes, but also their roles in promoting some strategies while countering others. The Belt and Road was created at a time when the global economy was still recovering from the post-2008 financial crisis and shortly after

¹³ Zhao, 2021, pp. 45–46; Mu, 2013, pp. 45–51.

¹⁴ Brown, 2018, pp. 213–222; Mingjiang, 2020, pp. 169–187; Liu, 2021, pp. 107–128.

the United States had embarked on its "pivot to Asia" / "rebalancing" strategies under the Barack Obama administration, designed to reestablish an American security presence in the Pacific out of concerns about Chinese power projection. Thus, there is a reactive aspect to the creation of the Belt and Road, given Chinese concerns about US-led economic containment (for example, Chinese media and scholarship often referred to the pivot as a "return to the Asia-Pacific" (fanhui YaTai 重返亚太) strategy, taking a more pragmatic view of the policy shift). The BRI was also viewed as serving to cement the country's economic interests in several key regions, as well as establishing China as a true financial pole in the global economy.

As one of the first major academic studies of the geoeconomics concept noted, the post-cold war emergence of globalisation forced a shift in common strategic thinking towards addressing an "admixture" of security concerns and international commerce. This practice becomes central to debates about international strategies when China is the first rising power to do so within this milieu. Due to the country's growing economic weight, China has been in a position to make use of that strength not only to influence both trade and associated regimes but also to translate economic power into strategic gains. This includes the ability to balance more effectively against the West and its allies and to develop a more mature cross-regional foreign policy.

China is the second-largest economy in the world, and despite the financial damage caused by the coronavirus pandemic of 2020–21, the country is recovering its economic footing faster than is the West, with one December 2020 report suggesting China may assume the number one position as early as 2028, should its post-Covid-19

Yong Wang, 2016, pp. 455–463; Jin, 2015, pp. 70–83; Deng, 2019, pp. 31–33; Campbell, 2016, pp. 11–32.

¹⁶ For example, see Ma, 2013, pp. 77–92, 137–138; Xinhua, 2016; Rong, 2013, pp. 39–62.

¹⁷ Luttwak, 1990, pp. 17-23.

recovery be maintained.¹⁸ In addition to giving Beijing more compulsory power, referring to direct control over other actors,¹⁹ China's economic growth has produced a great deal of "structural" power, meaning the ability to affect formal and informal structures within the international system, and within the international economy. As well, China now has the ability, via geoeconomic policies, to use its economic capabilities in the form of carrots and sticks / incentives and punishments. As will be explained below, Arctic states have been the recipient of both approaches in recent years.

PREPARATION AND PRECURSORS

After the country became a formal observer at the Arctic Council in 2013, China maintained a cautious approach to developing its far northern strategies, including elucidating the connection between the Arctic and the emerging Belt and Road. In 2015, the Chinese government announced it was expanding its security laws to include outer space, the world's sea beds and the Polar Regions, 20 which was an early signal the Arctic was assuming a more formal role in China's expanding foreign policy interests. During May 2017, in the midst of hosting its first summit of the Antarctic Treaty System (ATS) in Beijing, the government of China published its first White Paper on Antarctic policy, entitled "China's Economic Activities" (Zhongguo de nanji shiye《中国的南极事业》). The document affirmed Chinese interests in multilateral cooperation at the South Pole, the integrity of the ATS (which China ratified in 1983), and the pursuit of joint scientific research, including in the areas of climate change.²¹ As with the circumpolar north, China's interests in Antarctica have also been subject to much recent international scrutiny, especially in relation

¹⁸ Deutsche Welle, 2020; Yifan Xie, Eun-Young & Cherney, 2021.

¹⁹ On the concept of compulsory power, please see Barnett & Duvall, 2005, pp. 13–15.

²⁰ People's Daily, 2015.

 $^{^{\}rm 21}$ Government of the People's Republic of China, 2017; Liu et al., 2019, pp. 9–24.

to potential future economic interests.²² Thus, Beijing saw the ATS meeting as another outlet in which to advertise a Chinese cooperative approach to the Polar Regions.

In June 2017, a nondescript paper was published, co-written by China's National Development and Reform Commission (NDRC) and the then-State Oceanic Administration (SOA), which established the first formal linkage between the Arctic and the BRI. The document, entitled "Vision for Maritime Cooperation under the Belt and Road Initiative" identified the Arctic, along with the Indian Ocean/Mediterranean and the Pacific Ocean, as three "blue economic passages" (lanse jingji tongdao 蓝色经济通道) vital for expanded maritime trade under the auspices of the BRI. It asserted that "China supports efforts by countries bordering the Arctic in improving marine transportation conditions and encourages Chinese enterprises to take part in the commercial use of the Arctic route".²³

The 2018 Arctic White Paper served to both formalise the inclusion of the Arctic within the Belt and Road frameworks, and to clarify the specifics of the Polar Silk Road. The PSR was envisioned as an Arctic trade route but also a means to bring together elements of both the Maritime Silk Road and Silk Road Economic Belt under the aegis of the PSR as an economic endeavour through the development of partnerships with regional governments, in the spirit of "respect, cooperation, win-win results and sustainability" (zunshou, hezuo, gongying, kechixu 遵守、合作、共赢、可持续). ²⁴ Even before the White Paper was announced, Chinese and Russian officials had begun to lay the groundwork for a "Silk Road on the Ice", included in remarks by then-Russian Prime Minister Dmitri Medvedev and Xi Jinping during a November 2017 Beijing meeting. ²⁵ At this time, Russian President

²² Nengye Liu, 2021, pp. 61–78.

²³ Xinhua, 2017.

²⁴ Xinhua, 2018.

²⁵ Belt and Road Portal, 2019; Zhang & Zhang, 2017.

Vladimir Putin had promoted his interest in a "Pivot East" policy, which not only acknowledged the economic growth potential of East Asia (especially China), but was also expanded in the wake of the post-2014 diplomatic downturn with the West over the annexation of Crimea and the deliberate destabilisation of Ukraine by Russia. ²⁶ At the same time, for the past two decades, Moscow has been seeking to further bolster economic development in its Siberian and Far Eastern regions, especially in the areas of energy and shipping, with the anticipation that Russia's Arctic lands would assume a greater importance within the country's economy. ²⁷

The 2018 White Paper served to further elucidate the PSR concept, stating that Beijing sought to develop the Polar Silk Road via the development of shipping routes as well as associated infrastructure projects. However, along with this emphasis within the paper on Arctic shipping, other facets of the PSR have appeared, with some being retroactively included in the Road's framework. These include energy cooperation, infrastructure and bilateral and multilateral initiatives, as well as scientific cooperation. It can also be argued that there is a strategic element to the PSR which has emerged, with one example being the inclusion of Chinese military forces in the Russian Vostok military manoeuvres in 2018,28 as well as the aforementioned concerns about Chinese dual use initiatives. At present, however, the bulk of the PSR's endeavours have coalesced around the Sino-Russian partnership, with projects outside of Russia being much more tentative and at times subject to countervailing political winds in the form of political opposition or economic complications. At the beginning of 2020, commerce between China and Russia was affected by the global pandemic, with their mutual border being closed in January of that year.²⁹ Thus, questions remain as to how quickly the bilateral

²⁶ Lo & Hill, 2013; Lukin, 2018.

²⁷ Godzimirski & Sergunin, 2020, pp. 22–46. See also Blakkisrud in this volume.

²⁸ Carlson, 2018.

²⁹ Reuters, 2020a.

economic relationship will rebound once the coronavirus crises abate. A "V-shaped" global financial recovery may signal short-term rapid jumps in energy prices, making Russian Arctic energy more attractive even though pre-2020 production levels are seen as unlikely, and during an incident in March 2021 when a cargo vessel became temporarily trapped in the Suez Canal, Russian officials wasted little time in playing up the PSR as an emerging safer alternative for global maritime shipping. Even looking beyond the economic aftershocks of the pandemic, however, there are questions of what will be the potential of the PSR to affect Sino-Russian relations, and what are the possibilities of the PSR expanding significantly beyond Russia, including into the Nordic-Baltic region? The answers to these questions are very much tied to China's geoeconomic policies and capabilities.

ROADBLOCKS AND REPOUTING?

The roadblocks currently facing Chinese policies related to the PSR have reflected both economic and political constraints. For example, some fiscal limitations have been created by events well outside of the Arctic, including the "double blow" of the post-2018 Sino-American "trade war" and the COVID-19 crisis. In some cases, PSR projects have sought to shrug off global economic pressures in the hopes of being in a position to take advantage of an improved situation in the longer term. Case in point, the Yamal liquified natural gas project in Siberia has been viewed as the most successful enterprise attached to the Polar Silk Road to date. The facilities are overseen by the Russian firm Novatek, with the China National Petroleum Corp (CNPC) holding a 20% stake and China's Silk Road Fund possessing a 9.9% share in the projects.³¹ Despite the ongoing uncertainty around how long fossil fuel prices will remain depressed, both China and Russia are counting on future demand, as evidenced by an announcement in January

³⁰ Digges, 2021; Koslov, 2021.

³¹ Astrasheuskaya, 2019.

2021 that the Chinese shipping firm Cosco was seeking to invest in the construction of three LNG carriers which would be attached to the Yamal project. The following month, the fuel carrier *Christophe de Margerie* successfully undertook a winter transit of the NSR, representing the earliest such voyage in a given year and reflecting the widening window for such transits to take place due to climate change.³²

However, the situation is different in regards to supporting infrastructure, as evidenced by the delayed status of the Belkomur railway project, and associated port facilities, in and around Arkhangelsk. Despite being touted since 2015 as a key addition to the PSR framework, connecting the White Sea with the inland Komi region via the Ural Mountains, and representing another potential source of Chinese investment, the timetable of its construction remains hazy at best.³³ There is also the question of how post-2020 economic uncertainty will affect other potential joint investments in the Russian Arctic. In June 2018, on the sidelines of a meeting of the Shanghai Cooperation Organisation in Qingdao, an agreement was struck between the China Development Bank (Guojia Kaifa Yinhang 国家开发银行) and Russia's Vnesheconombank for the former to provide approximately \$\begin{align*}
\$=600 \text{ billion} (US\$9.5 \text{ billion}) in funding for joint ventures, including along the Northern Sea Route.34 The question here will be which of these projects will come to fruition under changed economic conditions, including the unpredictability of global energy demand.

Chinese PSR infrastructure ambitions have also run into obstacles in Northern Europe, (although the successful 2018 opening of the Halogaland Bridge in the Norwegian town of Narvik was viewed as a regional success for the Chinese firm which built it).³⁵ A similar set of cost versus benefit questions has beset the

³² Lanteigne, 2021; *Seanews*, 2021; Staalesen, 2021b.

³³ Staalesen, 2016; TASS, 2020a.

³⁴ Investinfra, 2018; Staalesen, 2018b.

³⁵ Li, 2018.

perpetually-on-paper-napkin situation with transportation projects in the Baltic-Nordic region, which were at times conceived as connecting to greater PSR projects, specifically the Arctic Railway and the FinEst Bay Helsinki-Tallinn ("Talsinki") tunnel project. Both of these proposals, seen as possibly benefitting from Chinese financial support, involve linking Russia, and potentially China, with Northern Europe in the hopes of promoting regional trade and tourism, but both also encountered serious opposition on both central governmental and local levels, out of concerns both for their financial viability and their environmental impact, as well as considerable security concerns.³⁶ The Arctic Railway was conceived as a rail link connecting the Norwegian Arctic town of Kirkenes to Rovaniemi, Finland and potentially on to other parts of Europe and Russia. While local policymakers in the Finnish and Norwegian north have continued to back the project, the proposal's feasibility was questioned by the central governments of the two countries, including in an assessment published in February 2019, and condemned by local Sámi populations as representing a socio-environmental threat to the region.³⁷

The Talsinki tunnel was proposed as a faster, but considerably more expensive, alternative to the current ferry system which connects the Estonian and Finnish capitals. One proposal, FinEst Bay, which was solidified in 2019, involves the construction of an undersea tunnel connecting the two cities, which would be the longest such structure in the world, with Chinese funding, state owned companies' implementation, and with the potential to link up to the planned Arctic railway, and with an ambitious completion date of 2024. This private proposal stood in contrast to "FinEst Link", which is a tunnel construction plan backed by the Helsinki-Uusimaa Regional Council, partnered with government agencies in both Estonia and Finland.³⁸

³⁶ Haavala, 2020.

³⁷ Northam, 2020; Staalesen, 2018; Government of Finland, 2019; Nilsen, 2020a.

³⁸ Jüris, 2019; Information on the FinEst Link plan can be read at http://www.finestlink.fi/en/projects/finestlinkproject/ (accessed 4 May 2021).

As with the railway, however, questions were raised about FinEst Bay's commercial feasibility by both governments, and a February 2020 report by the Estonian Foreign Intelligence Service (*Välisluureamet*) poured more cold water on the proposal by pointing to the economic, political and security risks of going forward, and in August of that year, then-Estonian Minister for Public Administration, Jaak Aab, publicly expressed doubts about the China-backed tunnel financing option. However, the coordinating firm for the project (FinEst Bay Area), later maintained that the scheme may still be salvageable with a completed positive environmental impact report.³⁹ Both the Arctic Railway and the FinEst Bay Baltic-Nordic projects illustrate the limits of Chinese geoeconomic approaches in the PSR outside of Russia.

There has also been a growing number of instances of political pushback from Arctic governments against various elements of the PSR. Much of this countervailing pressure emanated from the then-Trump government, which tended to view the Arctic as yet another forum for emerging Sino-American competition. In a highly controversial speech to the Arctic Council Ministerial meeting in Rovaniemi in May 2019, then-US Secretary of State Mike Pompeo slammed China's "near-Arctic state" concept and suggested that China and Russia were the main sources of insecurity in the Arctic, as opposed to climate change. During the same month, the annual US Report to Congress on Chinese security issues attempted to draw a line between the PSR and regional insecurity, especially in terms of potential dual use operations whereby scientific diplomacy could be used to assist in China's strategic interests.⁴⁰

A perceived zero-sum game with Beijing over Arctic influence was also the rationale behind the American efforts in 2018 to pressure Denmark into taking steps to prevent the Beijing-backed China Communications Construction Company (CCCC) – which had also

³⁹ Virki, 2019; Estonian Foreign Intelligence Service, 2020; Quinn, 2020; ERR News, 2020.

⁴⁰ Pompeo, 2019a; US Department of Defence, 2019.

joined with the FinEst Bay group to potentially develop the Talsinki tunnel – from successfully bidding on a contract to refurbish civilian airport facilities in Greenland. 41 Greenland remains important for the United States' national defence in that it maintains an Air Force base at Thule which is seen by Denmark as essential for countering Russian military activities in the Arctic. Concerns over China's increasing presence in the Arctic was also a factor in the 2016 Danish decision to block an attempt by a Hong Kong firm to purchase an abandoned naval facility at Grønnedal (Kangilinnguit) in southwest Greenland. 42 Then, in August 2019, the Trump government actually mooted the idea of purchasing Greenland outright from Copenhagen, in contravention of the 2009 Danish-Greenlandic Self-Rule Act which granted Nuuk the right of self-determination. The Danish government quickly scotched the idea, but Washington did reopen its consulate in Nuuk and offered further financial cooperation with the Greenlandic government. These moves were seen as at least partially motivated by the desire to keep Greenland away from the PSR and to prevent Beijing from creating an economic beachhead on the island.⁴³

Chinese firms are currently partners in potential Greenland mining operations, including an ambitious uranium and rare earths project at Kvanefjeld (Kuannersuit) which was placed on hold after the country's elections in April 2021, after incoming Prime Minister Múte Bourup Egede promised to halt the project on environmental grounds. However, given growing unease from both Denmark and the United States over China becoming an alternative economic partner for Nuuk, the possibility of Greenland becoming more fully integrated into the PSR is far from certain, especially since the Danish government remains wary of China and its geoeconomic capabilities, even unwittingly acting as a wedge which may affect Greenland's

⁴¹ Hinshaw & Page, 2019.

⁴² Matzen, 2017.

⁴³ Shi & Lanteigne, 2020; Lau & Elmer, 2019.

⁴⁴ Lanteigne & Shi, 2019; Hui, 2021; Schøler, 2021.

status within the Danish Kingdom. Greenland is arguably the only major segment of the Arctic with a potentially changeable political status in the short term, given public support for eventual independence (albeit with differences of opinion as to the timeframe) and therefore the island is especially relevant to Chinese regional geoeconomic policies.⁴⁵

This tilt towards security concerns in the Arctic, including increased American interests in Greenland, by the Trump administration ended up being a costly signal to Beijing that the United States would view the PSR as detrimental to regional security. This also meant that expanding the Polar Silk Road into Northern Europe, especially via links with American friends and NATO allies, would face more direct resistance, even with the replacement of Trump with Joe Biden in January 2021, with the new government initially appearing ready to take a comparatively less bellicose line on relations with Beijing. Even factoring in US resistance, however, it is unlikely that China will be dissuaded from continuing to deepen its own Arctic economic diplomacy despite it being placed under a far brighter spotlight in recent years, given the growing status of the far north to Chinese interests.

There has also been a growing instance of "spillover" of Chinese policies outside of the Arctic, including in regards to geoeconomic interests, into the far north, creating further problems for the potential expansion of the PSR. One major example of this issue has been the ongoing question of potential Chinese involvement in the "Arctic Connect" fibre-optic project which would see an underwater cable connect Northern Europe and Northeast Asia via the Siberian coastal waters along the PSR. The project has been spearheaded by the Finnish firm Cinia, with planned participation from companies in Norway, Russia, Japan and China. Huawei Marine, a subsidiary of the Chinese telecommunications firm Huawei until it was sold in

 $^{^{\}rm 45}$ Xiao, 2017, pp. 108–123; on support for Greenlandic independence, see Breum, 2019 & Kristiansen, 2021.

2019 to Hengtong Optic-Electric, had been chosen as the platform for the Arctic Connect project, raising questions about whether the Arctic would also become integrated into Beijing's planned "Digital Silk Road" (Shuzi Sichou Zhilu 数字丝绸之路). Although Huawei Marine and its former parent have officially parted company, there remains the looming question of growing global concerns, spearheaded by Washington and shared by EU member states, about the security of Chinese-built communications networks.⁴⁶

In the diplomatic realm, in addition to cooler Sino-American relations affecting Chinese Arctic interests, Beijing's relations with two other Arctic states have soured due to non-Arctic disputes. The December 2018 arrest in Vancouver of Meng Wanzhou, Chief Financial Officer of Huawei, on charges of fraud and conspiracy to commit fraud, in order to circumvent US sanctions against Iran, on behalf of the US government, resulted in a sharp cooling of Chinese relations with Canada, restrictions on Canadian imports, and the detainment of two Canadian nationals in China in what was widely seen as a retaliatory move. An Arctic-based casualty of this diplomatic downturn was the cancelation by Ottawa in December 2020 of a proposed sale of the Hope Bay gold mining facilities in Nunavut to a Chinese company, a purchase which would have significantly increased China's economic presence in the Canadian North.⁴⁷ This diplomatic rift echoed that of the six-year diplomatic freeze, as well as trade disruptions, between China and Norway after the 2010 Nobel Peace Prize was awarded to a Chinese dissident, which resulted in a downgrading of bilateral contacts as well as selective punitive trade measures, which ultimately did little to affect bilateral trade figures, save for delaying free trade talks. 48 However, Track II (sub-governmental) meetings on Arctic issues, such as via the Arctic Frontiers conference

⁴⁶ Delaunay & Landriault, 2020, p. 231–248; Jüris, 2020b; Communication Industry Network, 2019.

⁴⁷ Bishop, 2021; Strong, 2020.

⁴⁸ Sverdrup-Thygeson, 2018, pp. 77-100.

in Tromsø and the Shanghai-based China-Nordic Arctic Research Centre (CNARC) were amongst the few outlets at the time for Chinese and Norwegian regional discussions until the rift was resolved in late 2016, and Oslo did not exercise its veto when Beijing was accepted for Arctic Council observer status in 2013.⁴⁹

Chinese relations with Sweden also saw a downward spiral after 2015 in the wake of protests from Stockholm of the arrest and detainment of a Swedish national, Gui Minhai, and subsequent harsh responses from Chinese officials. Subsequent bilateral strains, including over China's Xinjiang policies, have threatened bilateral trade and resulted in the blacklisting of Swedish firms in China. ⁵⁰ In the Swedish Arctic, the construction of a Chinese-built, Swedish owned satellite tracking facility near Kiruna also raised security concerns about the installation's dual-use capabilities. 51 In each of these cases, China used "sharp power", in the form of economic punishment or coercion, to affect foreign policy via the country's growing geoeconomic capabilities. However, the cases of Canada and Sweden have also demonstrated that such policies can be counterproductive to Beijing's aims of being seen as a partner in polar development and research, while expanding the Polar Silk Road into sections of the Arctic beyond active Sino-Russian partnerships.

At present, an examination of the various forms of connectivity being created via the Polar Silk Road could best be analysed both in regards to Sino-Russian Arctic relations, and Chinese policies of expanding the PSR in other parts of the Arctic Ocean. Although headway in the development of closer economic ties between Beijing and Moscow in the Arctic have slowed due to the pandemic and accompanying global financial uncertainty, the compatibility of both states' Arctic interests suggests that momentum may have slowed but not

⁴⁹ Lanteigne & Sverdrup-Thygeson, 2016.

⁵⁰ Olsseon, 2019; Xiao, 2021.

⁵¹ Hutt, 2020; Bilasz, 2020.

stopped. By contrast, Beijing's progress in building the PSR outside of the Russian Arctic has been limited at best, frequently entangled in economic and strategic concerns including in the Baltic-Nordic region. The question now is whether the PSR will eventually establish itself as a regime across the circumpolar north, or evolve as strictly a forum for enhanced Sino-Russian cooperation, especially if the United States and its fellow NATO members accelerate the process of trying to balance Chinese and Russian policies in the Arctic.

SIGNAL TO NOISE: The Future of the Polar Silk Road

Although the onset of the global pandemic, and the resulting economic crises, have been a major detriment to the development of the Polar Silk Road at present, as explained above it is hardly the only obstacle which the PSR has needed to overcome. At the beginning of 2021, the Xi Jinping government, buoyed by early signs of Chinese economic recovery began to call for a renewal of multilateralism as the world moves away from the coronavirus crisis. Figures released in late 2020 / early 2021 suggested not only that China was experiencing a slow but steady financial rebound, but may also be one of the few large economies to make an early recuperation from the worst of the pandemic, and to have a window of opportunity to further influence global economic affairs.⁵² Beijing's increased foreign policy space was in evidence during the Chinese leader's speech at the Davos World Economic Forum in January 2021, when he pressed for increased global cooperation, further advances in globalisation, and the seeking of new methods of mutual sustainable development, while at the same time warning against governments seeking out their own "individual supremacy" (weiwoduzun 唯我独尊).53 This could have an impact on the future state of the PSR, and when Beijing released its

⁵² Tenzi, 2021; Cheng, 2021.

⁵³ Xi, 2021.

14th Five Year Plan in March 2021, the Polar Silk Road was included as a policy priority.⁵⁴

Many aspects of the Belt and Road have been paused as opposed to facing a radical redirection. Nonetheless, it is unlikely that the pandemic will have only a negligible effect on the Belt and Road's development, including the Polar Silk Road. For example, hopes were raised in 2019 that the BRI had entered into a deepening phase as a result of a growing number of projects as well as economies agreeing to sign on to the initiative, or as government commentators phrased it, moving from "abstract, freehand painting" (daxieyi 大写 意) to more "meticulous strokes" (gongbihua工笔画). However, both the pandemic and its associated longer-term political and economic effects, including ongoing cooled Sino-American relations, the temptation towards greater protectionism, growing concerns about Chinese economic nationalism, and a recent push by Beijing towards a "dual circulation" (shuang xunhuan 双循环) policy, meaning a focus on developing the domestic economy in addition to enhancing trade, may adversely affect many elements of the BRI, at least in the short term. 55 The difficulties that Chinese interests have run into in both Arctic and Arctic-adjacent states in seeking to develop PSR partnerships outside of Russia are proof of this. China's use of geoeconomics will be essential to addressing the question of the Polar Silk Road's future, and as this northern connectivity endeavour continues to be further embedded within the greater BRI framework, Beijing will be under still further pressure from both domestic and foreign quarters to further clarify the specifics of the PSR and its overall Arctic policies. As well, China's growing adeptness in translating its economic power into successful strategic influence will continue to be witnessed in the far north, as Beijing continues to translate its "near-Arctic state" thinking into becoming one of the region's largest stakeholders.

⁵⁴ Hale & Sun, 2021; Xie, Jeong & Cherney, 2021; Lanteigne, 2021.

⁵⁵ Min, 2021, pp. 65–95; Huang, 2019; Li, 2021, pp. 4–17.

CHAPTER 7

CHINESE SECURITY INTERESTS IN THE ARCTIC: FROM SEA LANES TO SCIENTIFIC COOPERATION

Frank Jüris

In "China's Arctic Policy" white paper, China states its interests in exploiting the natural resources of the Arctic region and improving the supporting infrastructure to operate the Northern Sea Route on a regular basis. China sees cooperation possibilities with Arctic states in scientific research, logistics, exploration, exploitation of natural resources and the building of ice class vessels.¹

The white paper published by the State Council Information Office (the government nameplate for the Central Propaganda Department) describes the Chinese approach in the Arctic using all the necessary buzzwords meant for foreign consumption: governance, connectivity, sustainable development, and liberal interdependency.² However, in China's case, the information space is something that needs to be controlled and left out topics are of equal importance.

¹ The State Council Information Office of the People's Republic of China, 2018.

² Lulu, Jirouš & Lee, 2021.

Therefore, this chapter focuses on Chinese security interests in the Arctic and analyses China's attempts to cooperate with Nordic-Baltic and Russian partners from a strategic viewpoint. Based on empirical evidence, this chapter sheds light on China's strategic calculations in the region and the potential threats that cooperation with China could entail. In addition, China's image creation process of itself as a responsible stakeholder, a necessary pre-condition for cooperation in the region, is scrutinised.

This chapter sheds light on Chinese cooperation with Nordic-Baltic and Russian partners in the Arctic to determine if, in addition to declarative announcements, there is any real substance to their relations in the far North. First, it looks into Chinese interests in the Nordic-Baltic region and how they correlate with Chinese strategic interests in the Arctic by also considering the region's reaction to an increased Chinese presence. The second part of the chapter looks into Sino-Russian cooperation in exploiting Arctic resources and developing infrastructure for the Polar Silk Road. Finally, Sino-Russian academic cooperation is explored, along with its implications for the region's security.

CHINESE STRATEGIC INTERESTS IN THE NORDIC-BALTIC REGION

Chinese interests regarding the Arctic must be analysed in the context of China's broader strategic interests. With its Belt and Road Initiative (BRI), China plans to promote cross-border trade through Central Asia which would increase the development of its backward western regions and through economic cooperation limit the spread of terrorism from the Middle East. The BRI would also enable the quick transport of Chinese goods to their final destination in Europe and secure much needed energy supplies for the Chinese economy. Investments in infrastructure would help China deal with

overcapacity in steel and cement production and maintain jobs in the construction industry.

From a strategic viewpoint, a land-based economic corridor through Central Asia and Russia to Europe would provide China with an alternative route to transport its goods to European markets and secure the energy supplies in case of a maritime blockade by the US and its allies.³ The Polar Silk Road, announced by Xi Jinping in January 2018, could serve a similar strategic purpose by providing an alternative route for China to reach its target markets in Europe and guarantee supplies of natural resources from countries in the Arctic – which, as a politically stable region, is a more reliable source of resources than the turmoil-prone Middle East.⁴ Chinese scientists also stress the importance of the Arctic from a nuclear deterrence viewpoint, and the development of submarines that can operate in the Arctic Ocean has been a priority of China since 1959.⁵

Chinese strategic thinking in regard to national defence is based on geopolitics and has been greatly influenced by US 19th century naval officer and strategist Alfred Thayer Mahan. According to Mahan, a state's international standing depends on the might of its navy and in order to become a hegemon, China must be capable of posing a challenge to the US not only in the East and South China Sea, but in all international waters, including in the Arctic.⁶

China's Military Strategy 2015 white paper, in the spirit of Mahan, set the goal of becoming a global maritime power, capable of defending its development interests (sea lanes and foreign investments).⁷ The 2019 military white paper specified the previously set target of being

³ Brands, 2019.

⁴ Koivurova et al., 2019.

⁵ Brady, 2019.

⁶ Huebert, 2019b.

⁷ The State Council Information Office of the People's Republic of China, 2015.

able to defend its interests abroad by building a navy that can operate far from home ports thanks to overseas supply points.⁸

China has stakes in around 12 European ports. In the Baltics, it has been interested in Tallinn and Klaipeda ports for over a decade now.9 In Nordic countries, China has shown interest in Kirkenes and Lysekil ports. In addition, China has been interested in the Talsinki tunnel and Arctic railway projects connecting the Northern Sea Route with the European railway system. In the Nordic-Baltic region, China has so far been unsuccessful in gaining a foothold due to security, feasibility and environmental concerns. 10 In 2016, under pressure from the Danish government, Greenland opposed selling an old military port to a developer from Hong Kong, and in 2019, refused an offer from Chinese state-owned enterprise China Communications Construction Company (CCCC) for the reconstruction of the Nuuk and Illuisat airports.¹¹ The same company also signed an MOU with the developer of the Talsinki tunnel project and is on the US' entity list for building an artificial island in the South China Sea and has close relations with the state and the PLA.¹² In 2018, Finland refused for security concerns to sell or lease Kemijärvi airport to the Polar Research Institute of China, because it is a strategic infrastructure in close proximity to the Rovajärvi firing range.¹³

Based on geo-economic considerations, the Estonian Foreign Intelligence Service pointed out that strategic infrastructure projects and investments pose a security risk due to economic dependence, that a

⁸ The State Council Information Office of the People's Republic of China, 2019.

⁹ Roonemaa, Eesmaa & Liepina, 2019.

¹⁰ Jüris, 2019; Haavala, 2020.

¹¹ Robinson, 2020.

¹² Jüris, 2019, pp. 7–11; US Department of Commerce, Bureau of Industry and Security, 2020; RWR Advisory Group, 2020

¹³ YLE, 2021.

foreign power might exploit for political reasons. ¹⁴ Previously, China has used economic sanctions to punish Norway after it gave the Nobel peace prize to Chinese dissident Liu Xiaobo, and also Estonia and Lithuania for hosting the Dalai Lama. ¹⁵

Many Eastern European countries have no need to be afraid of China imposing an export ban. For example, Estonian exports to China are just 1.7% of its total exports, despite joining the 16+1 format in 2012 and BRI in 2017. Neither is Lithuania afraid of Chinese countermeasures as, in 2021, it became the first country to step out of the 16+1 format. The same applies to international trade heavyweight Sweden which refuses to bend under Chinese pressure as its leading global brand H&M faces difficulties in China after the company voiced concerns about the use of Uyghur forced labour, which was followed by a Chinese boycott. It would not be wise for China to continue the pressure on H&M for too long, because it would cause harm to the Chinese economy and increased unemployment, as some 621 Chinese companies depend on H&M as a buyer.

According to Chinese military experts and officers, the next phase of the PLA Navy development takes it to the polar regions. Nuclear deterrence capability in the Arctic can be developed only with the help of world class polar science which involves environmental research from the deep sea to atmospheric phenomena. Acoustic research is especially important from the viewpoint of submarines and this kind of research has been carried out in the Arctic since 2014.²⁰

 $^{^{\}rm 14}$ Estonian Foreign Intelligence Service, 2021; Ibid., 2020.

¹⁵ Storey, 2020; Roonemaa, Eesmaa & Bērziņa, 2019; Andrulevičiūtė, 2015. Please see also Wigell & Mikkola in this book.

¹⁶ Zenglein, 2020.

¹⁷ Statistics Estonia. 2020.

¹⁸ Brant, 2021.

¹⁹ Pei, 2021.

²⁰ Martinson, 2019.

The Finnish led Arctic Connect project is an example of how improved connectivity may increase security risks. The project which is based on Chinese technology is meant to join internet users of Europe, Russia and Asia by constructing an undersea fibre-optic cable system along the NSR. At the same time, Chinese intelligence gathering and cyber defence capabilities would improve. In addition, the construction of Arctic Connect would enable China to implement underwater surveillance capabilities it has been developing domestically through military-civilian fusion in the strategically important Arctic Ocean for the acoustic detection of adversary's submarines. However, the project is currently halted, because the only publicly known financer Japanese Sojitz Corporation has failed to provide co-financing.

China has made great progress in polar science and it operates or has access to Arctic space ground stations in Kiruna (Sweden), Karholl (Iceland), Ny-Ålesund (Svalbard), Longyearbyen (Svalbard), Sodankylä (Finland) and plans to develop one in Nuuk (Greenland). Space ground stations are dual use facilities, because they enable command and control of satellites and facilitate data transfer related to missions, intelligence etc.²³ Data collected at foreign ground stations is likely to be subject to National Cybersecurity Law according to which personal or important information must be stored in China.²⁴

In 2019, the Swedish Defence Research Agency (FOI) expressed concern that data collected in Kiruna could be used for military purposes. ²⁵ In 2020, the Sweden Space Corporation said it will not prolong its cooperation agreement with China over its ground stations in Australia, Chile and Sweden due to the changed geopolitical environment. ²⁶

²¹ Jüris, 2020b.

²² Staalesen, 2021c.

²³ Robinson, 2020; Xinhua, 2018.

²⁴ Stokes, Alvarado, Weinstein & Easton, 2020, p. 93.

²⁵ VT, 2019.

²⁶ Barrett & Ahlander, 2020.

According to a Norwegian 2020 intelligence report, Chinese intelligence has shown interest in its dual use space technology and underwater and deep sea technologies which China has been able to have access to on several occasions. From a counterintelligence viewpoint, a US congress report linked China with the 2007 and 2008 hacking that involved the Svalsat ground station in Svalbard and cut communications with US satellites Terra AM-1 and Landsat-7.²⁷ In 2021, an Estonian marine scientist whose research involved the Arctic and who had national and NATO security clearance was sentenced to three years in prison for spying for China.²⁸

China is also interested in exploiting the natural resources of the Arctic which similar to the NSR could become important alternatives for energy and raw material security. China has been interested in maintaining a dominant position in the mining and processing of rare earths which due to their importance for green, military and electronics industries have been declared strategic resources by the EU and the USA. In 2018, six out of 31 overseas Chinese rare earths advanced stage projects were in the Arctic (one in Alaska, three in Canada and two in Greenland).29 The Chinese funded Greenland Kvanefield rare earth and uranium mine project with 15 years of history made the Greenland government step down in February due to discord about environmental issues regarding the project. The April 2021 Greenland elections was lost by the Siumuti party (29%) who supported the mining project with the aim to achieve greater economic independence from Denmark. The Ataqatigiit party won the elections with 37% of votes. It opposes the project and values clean environment.30

The future will show if an increased Chinese presence in Greenland

²⁷ Wormdal, 2020: Wolf, 2011.

²⁸ Roonemaa & Weiss, 2021.

²⁹ Dolata & Ikani, 2020, p. 14.

³⁰ BBC, 2021.

and in the wider region will mean an increase in Chinese influence which raises obvious concerns for the US and its allies, as NATO's northern flank's defence starts from the Arctic. While the Nordic-Baltic region serves as the necessary foothold for China to have access to the Arctic and to Europe, the operability of the Northern Sea Route (NSR) and Chinese long-term interests in the Arctic depend on the goodwill of Russia, which due to western sanctions is looking towards its Asian partners in regard to development in the Arctic.

SINO-RUSSIAN COOPERATION IN THE ARCTIC

There are conceptual differences regarding the usage of the Northern East Passage between Russia and China. The former considers it sovereign jurisdiction and sets requirements on its usage (48-hour notice and Russian polar-pilot on board), while the latter holds to the principle of freedom of navigation, similar to the USA, the UK, France, and Germany. Nevertheless, both countries seem to be interested in jointly developing the Arctic transport corridor. Chinese experts have highlighted that both countries face common threats and have the advantage of complementary markets – Russia as the largest exporter of oil and gas and the Chinese energy hungry exportoriented economy.

In 2017, Valery Mitko, the president of the Arctic Academy of Sciences, currently under house arrest accused of treason, explained in a co-authored article with Chinese colleagues from Dalian Maritime University that the Northern Sea Route is not only important for China to escape a Western siege, but also to Russia as it is the latter's only direct access point to blue water. The Article suggested that China and Russia joined by advocacy for multipolarity in international relations should work together to counterbalance the US

³¹ Soare, 2020.

³² Guo & Yang, 2019.

maritime hegemony and resist its pressure from the sea to protect both countries core maritime rights and interest from infringement.³³

In 2019, at the BRI summit in Beijing, Putin said that Russia was considering linking the development of the Northeast Passage with the Maritime Silk Road to improve the connectivity between East- and South-East Asia with Europe. Russia is interested in attracting outside investments to develop the infrastructure along the Northeast Passage, because Putin aims to increase the annual total shipping on the route by 2024 to 80 million tons.³⁴

This would be an optimistic four-fold growth compared to 20 million tons in 2018.³⁵ According to Russia's Northern Sea Route Administration, in 2019, 31.5 million tons of goods were shipped along the NSR of which over two thirds was natural gas from Novatek's Yamal LNG plant.³⁶ Despite the shorter distance and the promise of shortening the travel time (to 14–20 days) from China to Europe via the NSR, the transit still takes roughly a month similar to the southern route currently widely in use.³⁷

In addition to long-lasting fears of the far east slipping to China, Russia has become increasingly worried about China's increased interest in the Arctic.³⁸ In particular, Russia's inability to finance the infrastructure projects necessary for the construction of the NSR is making it vulnerable to Beijing advances. Beijing is interested in building docks in the Arctic ports (Murmansk, Sabetta, Arkhangelsk, Tiksi and Uelen) to meet the future needs of increased transit volumes and facilitate expected cargo traffic.³⁹

³³ Li, Wang & Mitko, 2017.

³⁴ Staalesen, 2019a. See also Blakkisrud in this volume.

³⁵ Astrasheuskava & Fov. 2019.

³⁶ The Maritime Executive, 2020.

³⁷ Centre for High North Logistics Information Office, 2019.

³⁸ See also Ventsel in this volume.

³⁹ Goble, 2021.

According to Chinese scholars' analysis, these support ports (zhidian gangkou支点港口) are most suitable for the construction of the Polar Silk Road based on geographical location, development potential (already existing infrastructure), environmental conditions (length of navigation season), population size (or accommodation capacity) and prospects for Sino-Russian cooperation (existing or planned joint projects).⁴⁰

The same scholars argue that the construction of support ports in the Russian Arctic will enable cargo distribution, ship maintenance and energy access along the NSR. Furthermore, they argue that opening the local markets will enhance development which, through established local level connections, will ensure unimpeded trade along the Polar Silk Road by transforming the relations between the countries along the route. In Mahan's spirit, support ports are seen as the embodiment of transportation politics because they enable the expansion of geopolitical space due to the embedded strategic effects to the economy, military, energy and culture.⁴¹

For the best possible outcome, Chinese experts recommend a custom-made approach be followed in the form of "one port, one policy" (一港一策). For example, as Uelen is at the choke point of the NSR facing the USA across the Bering Strait, a free port approach like Singapore should be pursued. Tiksi as a former military centre should be built into a search and rescue service centre and Sabetta into an industrial development zone focused on liquefied natural gas (LNG) projects. Murmansk and Arkhangelsk should be developed as joint venture projects by exchanging capital for control like the Port of Sydney.⁴²

⁴⁰ Wang, Chen, Zhang & Guan, 2018.

⁴¹ Ihid

⁴² Wang, Chen, Zhang & Guan, 2018.

Developing infrastructure in Russia is more complicated and lack of planning and attention to specifics have not always led to the expected outcomes, for instance, expensive infrastructure developed for the Winter Olympics and the World Cup is currently unused. In addition, big infrastructure projects are often accompanied by systemic corruption and prioritisation of politics, as in the case of the Crimean Bridge, where politics take priority over actual needs. Additional obstacles in the Arctic are lack of support services (search and rescue, maintenance), human resources and technology, and concerns over feasibility. One example is the "Big Port of Zarubino" project in Primorsky Krai in Trinity Bay in close proximity to China and North Korea, where the landlocked Chinese city Hunchun was supposed gain improved access to the sea. The Russian developer Summa Group invested 562 million dollars into the project in the hope of Chinese cargo flows, but the rest of the 1.4-billion-dollar bill was not picked up by the Chinese investors. In addition, in 2018, the Summa Group's owner, Ziyavudin Magomedov, was detained with embezzlement charges. 43 Grand joint projects often fail, because the Russian side is afraid of economic dependence on China and the Chinese side is unwilling to make compromises in regard to project terms. 44

Russia's fears are heightened in the Arctic as China has launched a pair of modern indigenous icebreakers and is designing a third one which will increase Chinese independence in operating in Arctic waters and decrease Russian revenue in providing support services. China might also have a chance to slow down Russian construction of nuclear-powered icebreakers as the procurement for the necessary floating dock which was won by a Turkish company was challenged by China with the claim of offering a better deal. No Russian company wanted to participate in the bid as the money offered made making profit impossible.⁴⁵

⁴³ Connolly & Ferris, 2020.

⁴⁴ Bigold, Chey & Gim, 2020; Piirsalu, 2019.

⁴⁵ Goble, 2021.

Russia's willingness to co-develop the Northern Sea Route and link it with the Polar Silk Road does not necessarily mean that Russia is handing over the keys to its Arctic territories without being cautious, especially considering the region's importance to Russia's defence. To avoid putting all eggs in one basket, Russia has invited European and East and South Asian countries to jointly develop the energy sector of Russia's Arctic.

One example is the Yamal LNG plant, situated on the Yamal Peninsula in the gulf of Ob at the Ob River which became operational in 2017. Annually, 16.5 million metric tons of LNG is shipped by icebreaker tankers along the Northern Sea Route to target markets in Europe and Asia. The Yamal LNG plant's shares are divided in the following way: Russian Novatek (50.1%), French Total (20%), Chinese SOE China National Petroleum Corporation CNPC (20%) and Silk Road Fund (9.9%).⁴⁶

In addition, the Arctic LNG 2 project is planned to start in 2023 and reach its full capacity of 19.8 million tons of LNG per year, to be shipped along the Northern Sea Route to Asia and Europe, by 2026. Participants in the project include Novatek (60%), Total (10%), CNPC (10%) and the former's subsidiary CNOOC (10%). Furthermore, in 2019, Japanese companies Mitsui & Co. and Japan Oil, Gas and Metals National Corporation joined the Artic LNG 2 project by buying a 10% stake in it through the jointly established Dutch company Japan Arctic LNG.⁴⁷

India has shown interest in the region, in the Rosneft led Vostok Oil project.⁴⁸ The project involves the construction of 800 kms of pipeline connecting the reservoirs in northern Siberia that potentially hold five billion tons of light-quality oil to the coast of Taymyr Peninsula, where it could be shipped on the Northern Sea Route to international

⁴⁶ TotalEnergies, n.d.

⁴⁷ Mitsui & Co, 2019.

⁴⁸ Staalesen, 2020a.

markets. The project also includes the construction of a seaport, two airports and supporting infrastructure. Rosneft hopes the project will be operational in 2024 with a capacity of 25 million tons and reach its peak performance by 2030 with 115 million tons. ⁴⁹ Indian companies are already present in northern Siberia: ONGC Videsh Ltd., Oil India Limited, Indian Oil Corporation and Bharat Petroresources own a 49.9% stake in the joint venture Vankoneft with Rosneft. ⁵⁰

This does not mean that the energy cooperation between Russia and China is slowing down. Russia is the world's biggest oil producer and China is the world's biggest oil consumer. In 2019, Chinese company SOE China National Chemical Engineering signed a four-year framework agreement with Russian Neftegazholding (NNK) to develop the Payakha Oilfield on the Taymyr Peninsula. The project includes the construction of six processing plants, pipelines of a total length of 410 km and a crude oil docking station with the annual capacity of 50 million tons to facilitate oil transport on Northern Sea Route. Payakha Oilfield is believed to hold 420 million tons of 2P category oil and 2 billion tons of 3P category oil.⁵¹

SINO-RUSSIAN ACADEMIC COOPERATION IN THE ARCTIC

In addition to energy and transport, China and Russia have been actively cooperating in Arctic science which to large extent has been a neglected topic. Collaboration in this area is important to China for soft power projects supporting economic engagement and capacity building which has, beyond the realms of science and economy, also impacted on defence and security.

⁴⁹ Staalesen, 2020b.

⁵⁰ Staalesen, 2019b.

⁵¹ China Chemical Engineering, 2019. The 3P category of oil stands for proven, probable and possible reserves, while 2P oil indicates only proven and probable reserves.

China has been active in building people-to people connections through academic exchanges and interactions with local level leaders. For example, Ocean University of China (OUC 中国海洋大学)⁵² has since 2012 co-organised with St. Petersburg State University an annual China-Russia Arctic Forum 中俄北极论坛 which is the only academic exchange platform dedicated to the Arctic between the two countries. The founder of the event is OUC political science professor Guo Peiqing 郭培清, a leading Chinese expert on polar politics and law.⁵³ Guo Peiqing is also member of the China-Nordic Arctic Research Center (CNARC was established in 2013 with a secretariat at the Polar Research Institute of China) executive committee which is the only Chinese platform for academic exchanges between polar researchers of China and Nordic countries. CNARC, like the China-Russia Arctic Forum, holds annual symposiums with Nordic partners.⁵⁴

In 2009, Guo together with Li Zhenfu 李振福 wrote that to withstand the "China threat rhetoric" that hinders China's participation in polar affairs, the Chinese government needs to create a self-image of a peaceful and cooperative state. 55 According to Dalian Maritime University scholars Li Zhenfu and Li Shiyue 李诗悦, the concept of a "near-Arctic state" serves this purpose and it is the responsibility and duty of Chinese Arctic research to make the concept internationally acknowledged, as acceptance of it is the pre-condition for dialogue on equal footing. They find it necessary to declare that China is a "near-Arctic state", because China as a great power has responsibility over the Arctic's worsening geopolitical security 地缘安全 situation comprising of environmental, military, energy, transportation, economic and trade security. 56

⁵² For additional information on OUC and its involvement in military-applicable research please see: https://unitracker.aspi.org.au/universities/ocean-university-of-china/ (accessed 31 August 2021).

⁵³ Ocean University of China, n.d.

⁵⁴ Ibid.; China-Nordic Arctic Research Centre, n.d.; Additional reading on the impact of the format Yang, 2021.

⁵⁵ Brady, 2017, p. 39.

⁵⁶ Li & Li, 2020.

According to Professor Sun Kai 孙凯 from the School of International Affairs and Public Administration of Ocean University of China, China's participation in Arctic governance is divided and decentralised, comprising of relevant government bodies, local governments, companies, non-governmental organisations, and related academic groups, each with their unique role to play. On official occasions it is important to propagate Chinese discourse to countermand "threat theory" or "panic theory" by clearly explaining the Chinese positions and principles on Arctic affairs. Sun finds that China has been successful in constructing the image of a responsible stakeholder and international discourse of itself as a "near-Arctic country" and a "contributor to Arctic affairs" which he believes has helped China to become an observer of the Arctic Council and has created a good international public opinion in relation to China's participation in Arctic governance. In addition, eight Chinese academic institutions have become members of the Arctic University Alliance 北极大学 联盟 which enables China, in addition to capacity building, to also build a presence in the region and generate soft power "软实力".57

The positive image creation process is also visible in the China-Russia Arctic Forum which has been held annually since 2012 and targets Russian Arctic scholars, government officials, local level leaders, international organisations etc. At the 9th online forum in 2020 which attracted more than 100 participants from China, Russia and France, four major themes were discussed: science and education, medicine, environmental protection, and economic development in the form of constructing the "Polar Silk Road". In concluding remarks, founder of the forum Guo Peiqing said, that by jointly developing the Arctic, China and Russia can meet their internal needs. The deepening of Arctic cooperation between the two countries can achieve complementary advantages and become another growth point for Sino-Russian bilateral cooperation.⁵⁸

⁵⁷ Sun, 2018.

⁵⁸ Polar and Ocean Portal, 2020.

At the 7th forum in 2018, in addition to the usual participants, representatives from COSCO shipping company, Yamal-Nenets Autonomous Region, and Sakha (Yakutia) Republic visited the event held in Qingdao. Professor Sun Kai found that increased Sino-Russian economic relations in the Arctic should be supported by more cultural connections and "people-to-people diplomacy" (民间外交).59 This was in line with China's Arctic Policy white paper that emphasised the promotion of Sino-Russian cultural exchanges in the Arctic. The holding of forums, summer camps and other (forms of) second-track diplomacy was expected to help promote "soft" relations ("软"联系) between China and Russia in the Arctic, and better serve both sides in economic cooperation.

Besides soft power projections, the Chinese side has been interested in developing the Irtysh River in the framework of BRI. The Irtysh River starts in Northern Xinjiang in China and flows through landlocked Kazakhstan and Russia and at Khanty-Mansiysk in Western Siberia merges with the Ob River which flows into the Arctic Ocean. The Ob-Irtysh river system encompasses most of Western Siberia and the Altai Mountains and forms the main drainage basin in Asia. At the 5th China-Russia Arctic Forum, OUC professor Guo Peiqing 郭培清 said that in addition to the horizontal trade routes connecting the Eurasian land mass, a vertical route along the Ob-Irtysh river system should be developed for the benefit of Russia, China and India. 61

⁵⁹ "People-to-people diplomacy" (民间外交) activities are meant to influence foreign societies outside state-to-state channels. The most active institutions in the Chinese foreign affairs system which carry out non-governmental diplomacy are the International Liaison Department (ILD, 对外联络部) and the Chinese People's Association for Friendship with Foreign Countries (CPAFFC, 中国人民对外友好协会). Source: https://sinopsis.cz/en/fao/. To find out more about ILD and CPAFFC read: https://cids.ee/en/chinas-influence-activities-in-estonia/ and https://sinopsis.cz/en/ep/. To find out about the difference between people's diplomacy 人民外交, public diplomacy 公共外交 and people-to-people (non-governmental) diplomacy read: https://archive.ph/jZz5d (accessed 18 August 2021).

⁶⁰ Zhang, 2018.

⁶¹ Tan & Chang, 2016.

For almost a decade, the China-Russia Arctic Forum has facilitated exchanges between China and Russian scholars and local leaders from Yamalo-Nenets Autonomous Okrug and the Republic of Sakha (Yakutia). Via the forum, China has aimed to generate necessary soft power for economic cooperation. However, the prospects of such cooperation might not be perceived as favourably by the Kremlin. Two of the preferred ports (Sabetta and Tiksi) for the construction of the Polar Silk Road are from the aforementioned administrative regions and are highly valued for their access to the Ob-Irtysh and Lena rivers, which have the potential to become cargo distribution hubs spreading development deeper into Russia's heartland, and with it inevitably also Chinese influence.⁶²

Sino-Russian academic cooperation in the Artic extends beyond the forums and has borne fruit with visible results. In 2016, the Russian Far Eastern Federal University (FEFU) and the Chinese Harbin Polytechnic University / Harbin Institute of Technology (HIT)⁶³ founded the Russian-Chinese Polar Engineering and Research Center with the aim to promote industrial development of the Arctic by finding technical solutions to extreme weather and ice conditions.⁶⁴

In April 2018, Harbin Engineering University (HEU)⁶⁵ and Northern (Arctic) Federal University established the Arctic Blue Economy

⁶² China Ocean Development Research Center, 2019; Zhang, 2018; Wang et al., 2018.

⁶³ Harbin Polytechnic University merged in 1995 with Harbin Institute of Technology which is run by the Ministry of Industry and Information Technology and due to its close connection with the Chinese military and defense industry is known as one of the 'Seven Sons of National Defence' (国防七子). For more information please see: https://unitracker.aspi.org.au/universities/harbin-institute-of-technology/ (accessed 18 August 2021).

⁶⁴ The Arctic, 2016.

⁶⁵ Harbin Engineering University is one of China's top defence research universities, which is subordinate to the Ministry of Industry and Information Technology and one of the 'Seven Sons of National Defence' (国防七子). The university is a leading centre of research and training on shipbuilding, naval armaments, maritime technology and nuclear power. In 2007, the PLA Navy became the supervising agency of the university. For more information please see: https://unitracker.aspi.org.au/universities/harbin-engineering-university/ (accessed 18 August 2021).

Research Center (ABERC) with the aim to establish in collaboration with Nordic countries, the Arctic Blue Economic Corridor and cooperate in the fields of sustainable development, marine engineering and navigation along the Northern Sea Route. 66 In February 2018, HEU's College of Underwater Acoustic Engineering and FEFU's School of Engineering conducted joint research on sea ice acoustics in Vladivostok. The two sides conducted research on polar shallow water underice acoustic environment and under-ice underwater communication. HEU has advantage over it peers in the latter. Vladimir Korotchentsev from FEFU said that to gain a foothold towards exploiting Arctic resources, research on shallow water acoustic environment is necessary, and suggested that Russian and Chinese researchers can achieve breakthroughs by combining their relevant strengths in data collection and data analysis. 67

In April 2019, the Chinese Qingdao National Laboratory for Marine Science and Technology (QNLM) and the Shirshov Institute of Oceanology of the Russian Academy of Sciences (IOARAS) signed an agreement to create a Russian-Chinese Arctic Research Center in Moscow with a branch in Qingdao for joint expeditions in the Arctic exploring resources and monitoring changes in the ecosystem. The Chinese side hopes through joint research, expeditions and training, sharing of research equipment and data, to support the construction of the Polar Silk Road. Haugust 2019, the centre conducted its first joint expedition to the Laptev Sea to study the Siberian Arctic shelf, conducting research in marine geology, topography, physical oceanography and marine chemistry. The previous year, QNLM and IORAS organised a joint expedition to the Barents Sea, and their

 $^{^{\}rm 66}$ The University of the Arctic (UArctic), 2018.

⁶⁷ Jin & Zhang, 2018; Ocean Circle, 2018.

⁶⁸ TASS, 2019a.

⁶⁹ China Daily, 2019. More information about the signatories: https://archive.ph/GqhsS; https://ocean.ru/en/ (accessed 18 August 2021).

⁷⁰ TASS, 2019b.

cooperation dates back to at least 2015, when both sides signed an MOL^{71}

On its website under the achievements section, QNLM highlights research on fibre-optic hydrophones (FOH) and stresses their importance for national defence as FOH-based systems can be used for target detection at strategic locations like ports, straits and the seabed.⁷² FOHs are underwater acoustic sensors which use fibre-optic cables as the medium for signal transmission and sensing. Due to its high sensitivity, large dynamic range, small size, light weight, immunity to electromagnetic interference etc., FOHs have applications in civilian and military fields: underwater target detection, prospecting, earthquake inspection etc.⁷³ QNLM scientific cooperation with IORAS is significant, because both China and Russia have stakes in the Finnish led Arctic Connect project that would enable jointly built capacities in underwater sensing to be put into use in the strategically important Arctic region for the detection of adversaries' submarines.⁷⁴

Even if the Arctic Connect project remains stalled, NATO has every reason to closely monitor Sino-Russian capacity building in this field as it has ramifications to nuclear deterrence and NATO's northern flank's defence. At the end of 2019, Chinese scholars Guo Peiqing and Yang Nan 杨楠 from OUC welcomed the news that Russia was helping China to build a missile defence system and hoped that by combining both countries early warning systems, China would also have access to information from Russian Arctic ground stations.⁷⁵

In July 2019, a China-Russia Polar Acoustic Symposium was co-organised by HEU and FEFU at HEU to exchange knowledge on under-ice

 $^{^{71}}$ Laboratory of Mineral Resources, 2018; Sun, Xingwei, 2018.

 $^{^{\}rm 72}$ Chinese Qingdao National Laboratory for Marine Science and Technology, n.d.

⁷³ Meng et al., 2021.

⁷⁴ Jüris, 2020b.

⁷⁵ Guo & Yang, 2019.

acoustic research and technology, to facilitate the construction of the Polar Silk Road.76 The symposium brought together more than 100 experts from over 30 Chinese and Russian academic institutions and companies with 23 presentations on polar acoustic research. The event from the HEU side was co-hosted by the National Key Laboratory of Underwater Acoustic Science and Technology (UAST 水声技术重点实验) and the Key Laboratory of Marine Information Acquisition and Security Industry and Information Technology (MIASIIT) 海洋信息获取与安全工业和信息化部重点实验室.77

The UAST has conducted research on underwater acoustic technology for naval weapons development. UAST has four main research areas: underwater acoustic physics, target detection and localisation, underwater acoustic transducer technology and communication technology. Currently it is undertaking 202 projects with a total value of 222.64 million yuan (29.0 million euros). MIASIIT is China's most advanced platform for research and development of marine information technology with four main research directions: information transmission, big data and its application, sensors and data protection. The development level of these research fields can support the transformation of China's navy into a blue water navy and China into a maritime power. Since its establishment in 2017, MIA-SIIT has undertaken 130 projects from the navy, provinces, and ministries with a total value of 150 million yuan (19.6 million euros). Property of the property of the property of the provinces of the property of the prope

The risks seen by Russia in such cooperation can be observed in the case of Professor Valery Mitko's arrest in February 2020 by the Russian authorities. Valery Mitko, a leading Russian Arctic expert with decades long military experience and an academic career in hydroacoustics, taught at Dalian Maritime University (DMU) in

⁷⁶ Jin. 2019.

⁷⁷ Meng, 2019.

⁷⁸ Harbin Engineering University, 2017; 2020; Ibid., n.d.(b).

⁷⁹ Harbin Engineering University, n.d.(a).

China from 2016 as a visiting professor. He is accused of collecting sensitive information about hydroacoustics, submarine design and submarine detection methods for Chinese intelligence since spring 2017 and handing it over during one of his bi-annual visits to China in spring 2018. The case is supposed to go to court in September 2021. Another reason for falling out of grace with the Kremlin could be Mitko's advocacy for greater interaction between Russian and Chinese local level authorities and ports, bypassing the central government. The impact of this arrest to academic cooperation between Russia and China is yet to be determined, but most likely will hamper Russian scientists' willingness to travel to China and might complicate scientific cooperation in the future.

CONCLUSION

Chinese interests in the Arctic, in addition to the often-declared energy, transportation and scientific cooperation also include a security dimension. The development of the NSR would enable China to escape a possible maritime blockade imposed by the US and its allies. Furthermore, increased presence in the Arctic is important for China from a nuclear deterrence viewpoint.

China has been interested in gaining access to Nordic-Baltic and Russian ports, with limited success so far, and greater resistance by the former. Access to the region's ports is important for the expansion of geopolitical space and to assist China in building a blue water navy that can pose a challenge to the USA not only in the South and East China Seas but also in the Arctic Ocean.

Merzlikin, 2020; TASS, 2020b; Kuznetsova, 2020; Ampelonskaya, 2021; More information about Dalian Maritime University and its links to the PLA: https://unitracker.aspi.org.au/universities/dalian-maritimeuniversity/; DMU is also member of the China-Nordic Arctic Research Centre https://archive.ph/s7fzc.

⁸¹ Li et al., 2017.

Chinese assertive foreign policy has not gone unnoticed and Nordic-Baltic countries, and to some extent Russia, are increasingly worried about economic and scientific cooperation with China and its potential security risks. Russia is just caught in a delicate balancing act due to a limited choice of partners with which to develop its Arctic regions.

Academic cooperation and exchanges between Chinese and Russian local level leaders are seen by Chinese scholars as fostering good will for the construction of the Polar Silk Road which through regional development is believed will guarantee unimpeded trade along the NSR. Joint development of the NSR so far has been restrained by systemic issues with infrastructure development in Russia and the Kremlin's concerns about an increased Chinese presence in the Arctic attempting to bypass the central authorities.

Scientific cooperation is also important for China for capacity building which, in addition to commercial use, can be used for the improvement of the PLA Navy. China and Russia have been actively cooperating in the field of acoustic sensing which can be used for target detection and anti-submarine warfare. Despite the mutual distrust in Sino-Russian relations, jointly build capacities either for early warning systems or underwater surveillance are motivated by joint advocacy for multipolarity and the attempt to counterbalance US hegemony which should not go unnoticed by the USA and its allies in the Nordic-Baltic region.

To sum up, it is necessary to look beyond Chinese rhetoric in assessing China's interests in the Arctic as Chinese scholars in Mandarin stress the strategic importance of the Arctic for developing an alternative route to European markets, and Chinese scientists are also working together with their Russian counterparts towards building the scientific capacity necessary for nuclear deterrence.

CHINA IN THE ARCTIC: CLIMATE AGENDA AS A SPACE FOR MULTILATERAL COOPERATION AMIDST GREAT POWER COMPETITION

Yulia Yamineva¹

Global climate change and how China – as the country with the largest emissions of greenhouse gases – responds to it have dramatic effects on the Arctic region. This chapter assesses how and why China has evolved into a global leader on low-carbon action, what it means for the country's engagement in the High North, and how addressing global and regional warming provides a space for multilateral cooperation in the Arctic.

It is now well-established that the Arctic region is warming much faster than the global average and there is also evidence that the Arctic Ocean may be ice-free in summer as early as the late 2030s.² Such a drastic transformation poses serious challenges for the region's vulnerable ecosystems and for nature-based livelihoods of people living in the Arctic. Moreover, the melting of ice and permafrost in the

Research for this chapter was undertaken under the project entitled 'Slowing Down Climate Change: Combining Climate Law and Climate Science to Identify the Best Options to Reduce Emissions of Short-Lived Climate Forcers in Developing Countries (ClimaSlow)', funded by the European Research Council (1 January 2017 – 31 December 2021; project number 678889).

² Arctic Monitoring & Assessment Programme, 2017; 2019.

High North further accelerates climate change globally and regionally.³ At the same time, the changing climate also enables economic development and various types of connectivity in the Arctic region through opening access to natural resources and sea routes.

China plays a key role in the global effort to stabilise the climate as it is responsible for the largest share – 27% – of global emissions of greenhouse gases.⁴ ⁵ This implies that China's policy actions have a significant impact on the global climate – and the future of the Arctic region. In addition, China's air pollution has a warming impact on the climate through emissions of black carbon (soot).⁶ These emissions have been shown to have a particularly strong effect on the warming and snow-ice cover loss in the Arctic, where a significant role is attributed to non-Arctic states including China.⁷

China, in turn, is set to experience serious effects from global climate change. Rising sea levels for instance threaten China's low-lying coastal areas: a rise of 50 centimetres would affect more than 30 million people in 15 of China's port cities including assets worth 10.8 trillion US dollars.⁸ Recently, scientific evidence has emerged that Arctic sea ice loss contributes to severe haze pollution in China and that future warming of the Northern hemispheric cryosphere will further deteriorate ventilation conditions and increase the frequency and severity of haze pollution.⁹

³ Arctic Monitoring & Assessment Programme, 2017.

⁴ Olivier, Schure & Peters, 2017.

⁵ China's per capita emissions are lower than those of, for instance, the United States, Canada or Russia, close to those of EU-27, and higher than India's emissions (Ritchie 2019). The data refer to production-based emissions and do not account for emissions from traded goods.

⁶ Bond et al., 2013.

⁷ AMAP, 2015.

⁸ Hao, 2019.

⁹ An et al., 2019; Zou et al., 2017; Hui-Jun, Huo-Po & Jiping, 2015.

CHINA AS A NEW LOW-CARBON CHAMPION?

China's approach to dealing with climate change domestically and internationally has transformed over time. Domestically, consideration of global warming has evolved from a policy issue area to an overarching policy goal, which is now mainstreamed into major economic and energy policy strategies. Experts agree that the gradual strengthening of climate policy in China has been caused less by concerns over global climate change and more by acute domestic challenges, such as energy security, health impacts of air pollution, and limits of economic growth model. Low-carbon development is therefore seen as a win-win strategy to respond to these challenges.

The phenomenal growth in industrial production and motor vehicles has resulted in increasing energy imports. Reliance on overseas fuels is seen as a massive vulnerability by the Chinese government. This in particular concerns growing demand for oil. Driven by low oil prices, imports jumped to 73% during the first half of 2020. Oil imports have declined somewhat since then. In this context, decreasing energy dependency and maximum self-sufficiency have been prioritised in China's policy strategies.

Transitioning from dirty energy sources in China is also heavily influenced by the scale of the air pollution problem, which is taken seriously by the leadership. This came as a result of a series of severe haze and smog episodes in several Chinese megacities – sometimes referred to as "Airpocalypses" – and a resulting heavy public outcry. Environmental problems are therefore seen as a threat to social stability, which is considered to be important for the legitimacy of the Chinese leadership.¹⁴

¹⁰ Heggelund &Nadin, 2017.

¹¹ Engels, 2018.

¹² Paraskova, 2020.

¹³ Ibid., 2021.

¹⁴ Kopra et al., 2020.

Societal demands for addressing all types of environmental pollution have been growing, as also has been scientific evidence of pollution impacts on public health and the economy. In response to these concerns, the Chinese government has elevated environmental protection to the top of policy agenda through adopting a slogan of "ecological civilisation" (shengtai wenming 生态文明). While some view these developments as discourse capture allowing the Chinese government to silence those environmental activists who disagree with the official line, ¹⁵ prioritisation of environmental goals has also led to the strengthening of legislation and adoption of various action plans to tackle air, water and other types of pollution. In the climate context, the main sources of air pollution, for instance coal power plants, are often also responsible for greenhouse gas emissions, and therefore policies to improve air quality have a climate mitigation effect.

Another driver behind low-carbon reorientation in China is the realisation of the limits of the old economic growth model focusing on exports and heavy industry and accompanied by low innovation and low efficiency. In contrast, developing technological leadership is viewed by the Chinese leadership as leading to a more economically sustainable advancement. In this respect, green manufacturing in general and green vehicles in particular are prioritised in Made in China 2025, a national strategic plan for transforming the country into a global high-tech superpower.

Since the late 2000s, China has formulated various climate mitigation policies, with overarching climate targets contained in Five-Year Plans for Economic and Social Development (FYPs). For the 13th FYP (2016–20), the majority of climate goals, including the targets for non-fossil fuel energy share and reduction of CO2 intensity in

¹⁵ Standaert, 2020.

¹⁶ Naughton, 2014.

¹⁷ Engels, 2018.

GDP, were overachieved, except reducing energy consumption.¹⁸ The 14th FYP (2021–25), announced in March 2021, is assessed by experts as unambitious on climate targets, though sectoral plans are still in preparation and may alter these evaluations.¹⁹

Climate mitigation policy in China is intertwined with its energy policy. Rapid economic growth and industrialisation have been accompanied by growing consumption of fossil fuels, in particular coal. Coal constitutes around 59% of the country's energy mix.²⁰ China accounts for about half of all global coal capacity and continues to build new coal plants.²¹ Continuous coal power expansion, however, does not reflect demand for coal capacity but misguided investments: average plant utilisation rates currently stand at about 50%²² whereas average lifetime for coal power plants can be 30–40 years.

Transitioning from coal to cleaner sources of energy therefore lies at the heart of emissions reduction policies in China. To this end, various policies have been put in place, ranging from increased natural gas use and heavy investments in renewable energy such as hydro, nuclear, wind and solar, to energy conservation and energy efficiency. While energy transition targets are seen to be achieved mostly through top-down administrative mechanisms, these have been recently complemented by economic instruments. A national carbon market was launched in 2017 (operational in 2021). At the initial stage, the government aims at building the infrastructure and data reporting, hence the scheme is not yet expected to curb emissions. However, in the long run, with the rules tightened, it will become an important mechanism for climate mitigation.²³

¹⁸ Jiankun, 2020; Holzmann & Grünberg, 2021.

¹⁹ Shi, 2021; Myllyvirta, 2021.

²⁰ National Bureau of Statistics of China, 2019.

²¹ Shearer et al., 2020.

²² Ibid.

²³ Slater, Shu & De Boer, 2021.

It has to be noted that climate mitigation policies in China have primarily focused on reducing CO_2 emissions and less so on other greenhouse gases, for instance methane. However, non- CO_2 emissions are important to address due to their role in global warming. These emissions are already significant in China and projected to grow exponentially under existing policies.²⁴

China's policy steps to reduce domestic emissions of CO₂ have already led to impressive cuts. Between 2014 and 2016, it seemed that the emissions peak had already been reached; however, in 2018–19, China's CO₂ emissions grew again due to increased fossil fuels usage and cement production.²⁵ The most recent data shows that in 2020, despite the COVID-19 pandemic, CO₂ emissions increased by 1.5% compared with the previous year.²⁶ The challenge of reducing coal reliance is enormous in terms of balancing against the goals of short-term economic recovery and accommodating the vested interests in the coal industry and in regional governments. Overall, low-carbon transformation in China is expected to be "volatile rather than stable" due to the factors of internal contestation, fragmentation, limited civil participation, and limited transparency.²⁷

The evolution of domestic policy has also gone hand in hand with the evolving role of China in the UN Framework Convention on Climate Change (UNFCCC) – the main regime and negotiating forum defining international climate policy. In fact, participation in the UNFCCC is considered to have been central to the development of a comprehensive national greenhouse gas inventory.²⁸ China also actively engaged in emissions reduction projects under the Clean

²⁴ Bo et al., 2016.

²⁵ Ritchie & Roser, 2020; Myllyvirta, 2019.

²⁶ Myllyvirta, 2021.

²⁷ Engels, 2018.

²⁸ Gunneng, 2012.

Development Mechanism of the Kyoto Protocol.²⁹ Yet, when it comes to taking responsibility for reducing domestic emissions on the international arena, for a long time China was reluctant. As a leading negotiator of G-77/China – the coalition of developing countries - China highlighted historical responsibility of the developed world for the current global warming. The lack of agreement on the part of emerging powers and in particular China to common commitments to reducing greenhouse gas emissions have for instance led to the collapse of the 2009 UN meeting on climate change in Copenhagen.³⁰ However, since then, China's approach to international climate policy-making has changed as a result of the shifting domestic narrative about low-carbon development. A more constructive role in the UNFCCC was also facilitated by Sino-American diplomatic cooperation during the presidential term of Barack Obama which resulted in several joint statements with climate mitigation pledges.³¹ This enabled China's active support for the Paris Agreement of 2015, where China did not only agree to common mitigation commitments but also to the international reporting and transparency framework. Furthermore, China has emerged as a climate finance donor providing support for low-carbon and adaptation projects in developing countries.32

The Donald Trump presidency brought new challenges for the Paris Agreement, and elevated China into a leadership position.³³ Despite the US's negative approach to climate multilateralism, China did not back off on its commitments. In fact, quite unexpectedly for many observers, in September 2020, at the meeting of the UN General Assembly, China's President Xi Jinping announced that his country aims for carbon neutrality before 2060, alongside a CO₂ emissions'

²⁹ Heggelund & Nadin, 2017.

³⁰ Bodansky, 2010.

³¹ The White House Office of the Press Secretary, 2015.

³² Ihid

³³ Kopra et al., 2020.

peak before 2030.³⁴ Although some viewed this announcement primarily as China's attempt to position itself as a defender of multilateralism vis-à-vis the US of the Trump era,³⁵ there are reasons to consider this message beyond the space of symbolic politics. Domestic discussions on how the carbon neutrality goal can be achieved indicate a substantive reorientation of the economy and the energy sector.³⁶ Many details remain to be fleshed out: this for instance concerns whether the neutrality goal covers CO only or all greenhouse gases, as well as assumptions about CO removals.³⁷ Thus far, a new set of updated national climate targets for 2030, announced at the UN Climate Ambition Summit in late 2020, represent a linear progression from the previous targets but not yet a steep acceleration.³⁸ The 14th FYP, as mentioned earlier, also fails to provide a clearer vision of near-term steps towards carbon neutrality.

If the target is embraced at the policy level and indicates a move towards rapid energy transition, it is nothing short of a game-changer in global climate action. According to estimates by Climate Action Tracker, if China were to achieve carbon neutrality by mid-century, this would help avoid 0.2 to 0.3 degrees of global warming by 2100.³⁹ In other words, China's actions would lower the estimate for end-of-century global warming to 2.4–2.5 degrees and thus closer to the 1.5 degree temperature target declared by the Paris Agreement.⁴⁰

Achieving carbon neutrality implies phasing out coal and further promoting clean energy sources, as well as developing negative emissions technologies. According to existing scenarios, carbon neutrality

 $^{^{\}rm 34}$ Ministry of Foreign Affairs of the People's Republic of China, 2020.

³⁵ Borrell, 2020.

³⁶ Myllyvirta, 2020a.

³⁷ Ibid.

³⁸ Myllyvirta, 2020b.

³⁹ Climate Action Tracker, 2020.

⁴⁰ Ibid.

suggests shifting energy pathways from fossil fuels in general, where by 2050 more than 85% of all energy and more than 90% of electricity should come from non-fossil sources (renewables and nuclear).⁴¹

Although the climate agenda has been internalised at the domestic level in China, a significant proportion of China's outward energy investments still flows into the coal sector, primarily in the regions of South-East Asia, South Asia and Africa. 42 Coal plants lead to substantial amounts of CO2 emissions and affect those countries' capacities to achieve Nationally Determined Contributions to the Paris Agreement. By one estimate, China's financed fossil fuel power plants already lead to approximately 314 million tons (Mt) of CO, emissions a year, which is about 3.5% of the annual CO₂ emission from the power sector globally outside of China. 43 The projects that are currently under construction or planning will add a further 211 Mt to annual CO₂ emissions.⁴⁴ The climate effect of China's outward investments has been long criticised by civil society: in April 2020, more than 260 international and local environmental organisations sent an open letter to the Chinese government to not bail out 60 Belt and Road projects due to their embedded environmental, social and climate risks.45

In the Arctic, Chinese investments have so far heavily focused on energy and port infrastructure, especially in Russia: Yamal liquefied natural gas (LNG) plant, Payakha oilfield, and Zarubino and Arkhangelsk ports. ⁴⁶ The ambitious energy transition domestically is set to influence China's fossil-fuel imports but the impact on its participation in Arctic hydrocarbon projects both in the short and

⁴¹ Myllyvirta, 2020a.

⁴² Ma, 2020.

⁴³ Ibid.

⁴⁴ Ma, 2020.

⁴⁵ Civil society organisations' statement, 2020.

⁴⁶ Chun, 2020.

longer term is difficult to predict at this point. It is unlikely to have implications for China's participation in LNG projects similar to the Yamal project: at the moment, natural gas is considered to be a greener alternative to coal and critical for achieving energy transition goals.

CLIMATE AGENDA IN CHINA'S ARCTIC POLICY

Climate change features prominently in the Chinese Arctic narrative. China's Arctic Policy of 2018 explicitly acknowledges the role that climatic changes play in the current and future transformation of the Arctic region.⁴⁷ It also recognises that the changes in the Arctic environment such as diminishing ice cover can lead to "accelerated global warming, rising sea levels, increased extreme weather events, damaged biodiversity, and other global problems" but they also open opportunities for various economic activities in the region.⁴⁸

Interestingly, the Arctic Policy highlights the impact of Arctic environmental change on "China's climate system and ecological environment, and, in turn, on its economic interests in agriculture, forestry, fishery, the marine industry and other sectors". ⁴⁹ In other words, China uses climate change as one of the factors to justify its engagement in Arctic affairs: it is due to the adverse impacts of Arctic changes on China that China should be accepted as a legitimate participant in the governance of the Arctic. ⁵⁰ While there is indeed some scientific evidence behind this approach to legitimise Arctic claims, the narrative of adverse impacts of Arctic changes on the environment in China can also be seen through the lens of symbolic politics:

⁴⁷ The State Council Information Office of the People's Republic of China, 2018.

⁴⁸ Ibid

⁴⁹ The State Council Information Office of the People's Republic of China, 2018.

⁵⁰ See also Kopra, 2020.

it serves as a discursive hook⁵¹ employed by China to claim it needs to be part of the Arctic policy discussion. There are clear flaws to this framing as it does not account for China's contribution to global and Arctic warming.

With respect to its own role, China declares promoting sustainable development of the Arctic as one of its goals in the region and intends to "actively respond to climate change in the Arctic". ⁵² An active role and commitment of China to international and regional cooperation on climate change, in particular in the context of the UNFCCC and the Paris Agreement, are also clearly emphasised in the document. It is noteworthy that China's Arctic Policy highlights abundant clean energy resources of the Arctic region and its intention to strengthen clean energy cooperation in the High North.

Scientific cooperation has been central to China's involvement in Arctic affairs. Climate change is for instance the focus of several scientific collaboration initiatives such as China-Nordic Arctic Research Center, China-Finland Arctic Monitoring and Research Centre, and China-Iceland Arctic Science Observatory. Here, China uses scientific diplomacy as an instrument of soft power and "as a way to enter the region in a way, which is non-provocative and does not raise fears and concerns among Arctic States", an approach that has generally been successful so far. At the same time, concerns have been raised about China's motives to cooperate on sharing satellite data which can be used both for civilian and military purposes. 55

As an observer state to the Arctic Council, China has opportunities to participate in some of the relevant ongoing work on climate

⁵¹ The term is borrowed from the work on participation of NGOs in climate change negotiations by Allan, 2018.

⁵² The State Council Information Office of the People's Republic of China, 2018.

⁵³ Summarised for instance in Smieszek, Koivurova & Nielsson, 2020.

⁵⁴ Bertelsen, Xing & Gregersen, 2016.

⁵⁵ Jåma & Olofsson, 2019.

change under the auspices of the Arctic Council. This concerns, for instance, addressing emissions of short-lived climate pollutants, where observer states are encouraged to contribute to the implementation of the 2015 Framework for Action on Enhanced Black Carbon and Methane Emission Reductions through submitting their national reports on black carbon and methane emissions reductions. Several observer states, including France, Poland, Japan, and notably India, along with the EU, have been supplying such information to the Arctic Council. Thus far, China has not contributed to this domain of action; but this lack of activity is better explained not by China's reluctance to do its share in reducing emissions of black carbon and methane but rather by insufficient data, the immaturity of both domestic discussions and policy frameworks, and a lack of related policy goals.⁵⁶

CONCLUSIONS: OPPORTUNITIES AND RISKS

To sum up, China has been continuously strengthening its climate policy in a way that goes beyond symbolic politics and indicates a structural transformation. Although near-term policy steps sometimes appear contradictory, the long-term direction for the Chinese economy and the energy sector towards carbon neutrality is clear on paper.

Combined with various climate policy advancements in the EU and the renewed emphasis on climate mitigation action under President Joe Biden's administration in the US, China's overall policy indicates a broad normative agreement on the climate agenda, aligned with some of the key actors in the context of Arctic connectivity. The climate agenda therefore provides a space for pursuing cooperative approaches between traditional Arctic actors and China for the

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⁵⁶ Yamineva & Liu, 2019.

benefit of everyone. Whether these actors will be able to capitalise on this normative consensus amidst growing tensions and unease about China's rise on the global arena and in the High North remains, however, a crucial question.

There should be no naivety when it comes to cooperating with China on climate action, while at the same time acknowledging the complexity and domestic challenges of its decarbonisation pursuit. Even if a broad policy orientation towards carbon neutral economy has been politically advanced, China's current steps are not always compatible with its climate goals. China still needs to demonstrate a clear and ambitious mid-term pathway to decarbonisation, which cannot accommodate the continued expansion of coal or other fossil fuels domestically or abroad. In the Arctic context, if China wants to be considered a legitimate actor, it should take a more active responsibility for regional climate change, for instance through action on black carbon emissions or its investment priorities in the region.

One clear area for developing cooperation is joint scientific activities. China with its growing scientific capacity can positively contribute to producing knowledge about climate change sources and impacts in the Arctic. Such cooperation can for instance include a comprehensive assessment of the Arctic climate footprint of China, including its investments abroad,⁵⁷ similarly to the exercise conducted by the EU.⁵⁸ From a multilateral perspective, scientific cooperation can also serve as a tool to bridge gaps and build trust among countries. Some argue that science cooperation has a key role in integrating and socialising China into the Arctic⁵⁹ although the limitations of such an approach have also been emphasised.⁶⁰ Indeed, there are risks in enhancing science cooperation, in view of the possibility of military or commercial

⁵⁷ Kopra et al., 2020.

⁵⁸ Cavalieri et al., 2010.

⁵⁹ Bertelsen, Xing & Gregersen, 2016.

⁶⁰ Su & Mayer, 2018.

usage of scientific data or research bases in the Arctic.

Scientific cooperation is connected to a greater involvement of China in various other work under the Arctic Council, for instance on the already mentioned short-lived climate pollutants. Reducing their emissions brings about co-benefits both for the global and Arctic climate, and local air quality⁶¹ – in this respect, it is an attractive option to pursue for China. China has so far played a peripheral role in the work of the Council on this specific topic but opportunities exist to cooperate on improving emissions inventories, understanding climate impacts, and exchanging policy lessons.

The Arctic is often discussed through the lenses of great-power rivalry and the race for natural resources. It is good to remember that all of that is unfolding in the context of – and due to – a changing climate, and that China is an essential partner due to its enormous environmental footprint to tackle this global challenge. Any advancements of Arctic diplomacy should provide a space for multilateral cooperation to maintain climate stability as a global and regional public good and to pursue connectivity in a sustainable manner.

⁶¹ AMAP, 2015; UNEP, 2011.

Agne Cepinskyte

Over the last two decades, China's foreign direct investment (FDI) in the European Union (EU) totalled nearly 120 billion euros. In the European Arctic, China has made limited investments thus far, but aiming to establish itself as one of the main stakeholders in the region, it has expressed an interest to increase its financial engagement in Europe's circumpolar North. The issue of Chinese investments in Europe, including in the Arctic, became particularly problematic in light of the Chinese government's alleged involvement in human rights violations and consequent EU sanctions imposed in March 2021 against four Chinese individuals and one entity, which were followed by China's counter-sanctions against ten EU citizens and four entities. Page 120 billion euros. In the EU citizens and four entities.

This chapter addresses the question as to whether the European Arctic is sufficiently safeguarded against potential human rights abuses, such as violations of indigenous peoples' rights, by foreign investors,

¹ European Commission, 2020.

² European Council, 2021; Chinese Foreign Ministry, 2021.

to justify the acceptance of Chinese capital flows in the region despite the evident clash of values. The chapter begins by overviewing China's engagement in Arctic projects in Finland – an EU Arctic state that has received most attention from Chinese investors. It then discusses the absence of human rights provisions in the recently reached EU-China Comprehensive Agreement on Investment (CAI) and the related criticism from human rights non-governmental organisations (NGOs) as well as the European Parliament (EP). Finally, the chapter concludes by assessing potential threats to human rights associated with China's FDI in the Arctic.

CHINA'S INVESTMENTS IN THE FINNISH ARCTIC

The growing geopolitical significance of the Arctic has prompted China, a self-proclaimed "near Arctic state" and a permanent observer in the Arctic Council since 2013, to seek becoming one of the key non-Arctic stakeholders in the region, including by boosting its investments. While Chinese actors have so far mainly focused on the Russian Arctic, primarily by funding gas and oil infrastructure projects, they have also demonstrated an increased interest in the European Arctic states, notably Finland. The two states have maintained diplomatic relations since the 1950s, but the partnership between them has been strengthening significantly in the last few years. In 2017, President Xi Jinping made the first state visit to Finland in 22 years. During this visit, he and his Finnish counterpart signed a joint declaration on fostering cooperation in a number of areas, not least in "increasing the level of mutual investment".3 Interestingly, the meeting occurred less than a year after the Chinese company Tencent acquired over 80% of shares in the Finnish company Supercell for nearly nine billion euros, making it one of the largest Chinese FDI projects in the EU.

³ President of the Republic of Finland, 2017.

In 2010–18, most of the Chinese FDI in Europe went to the so-called "Big Three" - the UK, France and Germany. However, in 2019, Northern Europe replaced them, receiving 53% of investments from China, largely due to Chinese capital flows to Finland. It became the top Chinese investment recipient in Europe that year and one of the top five based on the total value of investments received from China in 2000-19. Admittedly, this was chiefly the result of large-scale acquisitions of Finnish companies, such as the Chinese company Anta Sports Products Ltd purchasing the Finnish company Amer Sports for 4.6 billion euros in 2019.4 In the Finnish Arctic, Chinese investments have as yet been limited and concentrated in the tourism sector, primarily in tourist accommodation building projects in Lapland, and in construction of biofuel and bio-refineries. 5 Furthermore, such projects have been experiencing disruptions and proceeding slowly: for instance, the Kaidi Finland company's bio-refinery project in Kemi, launched in 2014, has been delayed due to financial problems of the Chinese Sunshine Kaidi New Energy Group, the parent company of Kaidi Finland.6

Nonetheless, several strategically important Finnish private sector-led Arctic projects that are either in progress or in prospect also involve Chinese state-owned enterprises. The construction of the Arctic Railway, connecting Rovaniemi in Lapland to the Arctic Ocean through the Norwegian port of Kirkenes, was delayed until at least 2040 largely due to its current economic nonviability. However, if the project were to proceed, it would likely include Chinese investments given the interdependence of the railway and the planned Talsinki underwater tunnel between Finland and Estonia, in which the Chinese company Touchstone pledged to invest nearly 15 billion euros, while another three Chinese companies signed contracts for building

⁴ Kratz, Huotari, Hanemann & Arcesati, 2020, p. 10.

⁵ Koivurova et al., 2019, pp. 64–69.

⁶ Jouslehto, 2021.

it.⁷ Both the Arctic Railway and the Talsinki tunnel are seen as part of China's Polar Silk Road.⁸

Furthermore, the Arctic Connect project, aimed at connecting Europe and Asia via a 14,000-kilometre subsea fibre-optic cable by 2023, will involve the Chinese company Huawei Marine as its submarine-cable network supplier, raising concerns in academia that this could potentially strengthen China's intelligence capabilities. The Finnish government has not publicly voiced such concerns. Overall, they have, to a large extent, demonstrated a positive attitude towards attracting capital from China. Notably, in April 2021, the Finnish and Estonian governments signed a Memorandum of Understanding "On Common Transport Initiative Cooperation Including the Helsinki-Tallinn Railway Tunnel Project", confirming their support for the project's development without expressing any reservations about the fact that the construction of the tunnel would mainly be funded and implemented by Chinese companies. 10

Finnish authorities, have, however, highlighted a number of potential risks linked to cooperation with Chinese investors. They include the risk of China using its capital, particularly for major acquisitions and investments in critical infrastructure, as an instrument of increasing influence and dominance, potential non-compliance with environmental and sustainable development requirements, and unreliability as to the completion of the project and engagement in unfair competition practices against the local actors. In 2018, the Finnish Defence Forces turned down the Chinese Polar Research Institute's offer to either purchase or rent Kemijärvi airport for launching flights to conduct environmental and climate research in the Arctic. The Defence

⁷ Finestbay Area Development, 2019a; 2019b; Nilsen, 2021b.

⁸ Jüris, 2019.

⁹ Lehto et al., 2019; Jüris, 2020b.

¹⁰ Finnish and Estonian governments, 2021.

¹¹ Koivurova et al., 2019, pp. 83–90; Kaaresvirta et al., 2021, p. 21.

Forces cited security concerns, namely the airport's proximity to Rovajärvi – Europe's largest military shooting range suited for artillery exercises. ¹² Curiously, Finland's national broadcaster Yle only made the case public three years later, in March 2021, as if to reassure the allies and the domestic public that, amid deteriorating relations between China and the West, Finnish authorities would carefully weigh the risks associated with Chinese investments and would not hesitate to spurn suspicious offers, despite their commercial benefits.

Nonetheless, the Finnish government has not drawn much attention to potential violations of human rights, especially the significance of ensuring that Chinese investors respect the rights of indigenous peoples in the Arctic. For instance, the Finnish FDI screening mechanism – legislation on vetting and, if the protection of national interests so requires, restricting a foreign investment in question – does not mention the risk of human rights abuses, which is particularly important when it concerns foreign investors with a poor human rights record, such as China.¹³ It is noteworthy that the EU FDI screening mechanism, adopted in March 2019 and fully operational since October 2020, is also silent on possible restrictive measures on FDI due to concerns about human rights violations – such restrictions are only permitted "on the grounds of security or public order".¹⁴

In Finland, the protection of indigenous rights is a sensitive matter as the Arctic Railway controversy exemplified. Even though the project was stalled due to economic reasons, in its planning stages a dispute transpired between the government and the indigenous Sámi people. First, out of the five alternative railway routes, the Finnish Transport Agency (together with the Norwegian Railway Directorate) chose the Rovaniemi-Kirkenes route, despite acknowledging that it would be more environmentally disruptive and accordingly more harmful to

¹² YLE, 2021.

¹³ Finnish Economic Ministry, 2012.

¹⁴ European Parliament and Council, 2019.

the Sámi people than the other four options.¹⁵ Second, in the view of the Sámi, government authorities failed to fulfil their consultation duty and the obligation to acquire a free, prior and informed consent of the indigenous people.¹⁶ In the follow-up report in 2019, the Finnish-Norwegian joint working group emphasised the obligation of the relevant authorities to ensure that the Sámi people are adequately engaged in negotiations and hearings throughout the next stages of the project.¹⁷ However, as the project has been put on hold, it remains to be seen whether this would actually be the case, particularly given the lack of clarity as to what an adequate participation of indigenous peoples in the planning and implementation of projects affecting them entails.

Indeed, the disagreement between the Sámi and the government was largely caused by the legal ambiguity of the scope and content of the government's obligations towards the indigenous people.¹⁸ This is precisely a case in point, underscoring the fact that clear regulations containing explicit human rights provisions are crucial in order to ensure that foreign investors, especially those associated with countries accused of human rights abuses, would fulfil their responsibilities concerning such rights and would be held accountable in case of non-compliance. Such regulations, however, are currently lacking in the domestic legal framework. Thus, the next question to be considered is whether EU legislation could fill this loophole.

¹⁵ Finnish Transport Agency, 2018, p. 27.

¹⁶ Saami Council, 2018; Rasmus, 2018.

¹⁷ Finnish Transport Ministry, 2019.

¹⁸ Cepinskyte, 2018.

HUMAN RIGHTS IN EU-CHINA FDI REGULATIONS

At the end of 2020, the European Commission (EC) and China reached in principle the Comprehensive Agreement on Investment (CAI), aimed at regulating and facilitating capital flows between the two parties. Given that this was the outcome of seven-year-long negotiations, it is a milestone agreement, but the timing of its adoption coincided with allegations that the Chinese government was repressing hundreds of thousands of Uighur Muslims in the Xinjiang province, which made the agreement controversial. In fact, just two months prior to the conclusion of the CAI, 39 states, including the majority of EU Member States, delivered to the United Nations General Assembly a Joint Statement on the Human Rights Situation in Xinjiang and the Recent Developments in Hong Kong, publicly expressing their concerns about human rights abuses in China.¹⁹

Shortly before finalising the CAI, the EC adopted the so-called European Magnitsky Act – a global human rights sanctions mechanism, allowing the EU to target persons suspected of human rights abuses. ²⁰ In March 2021, based on this legislation, the EU imposed sanctions on four Chinese officials and one entity allegedly involved in violations of Uighur human rights. It was subsequently reciprocated by China imposing counter-sanctions on ten EU citizens and four entities. The mutually imposed targeted sanctions and ongoing human rights violations in China will likely delay the ratification of the CAI. The European Commission's executive vice-president Dombrovskis stated in May that the EU institutions "suspended some efforts" towards the ratification of the agreement, and the EP issued a resolution stating that any talks concerning the ratification of the CAI would remain "justifiably frozen" until the sanctions were lifted. ²¹ Nevertheless, the mere achievement of an agreement aimed at fostering capital flows

¹⁹ United States Mission to the United Nations, 2020.

²⁰ European Council, 2020.

²¹ Euronews, 2021; European Parliament, 2021b.

from China under the current circumstances highlighted the issue concerning the EU's approach to accepting investments from countries accused of or implicated in human rights abuses.

The travaux préparatoires of the CAI reveal an extensive debate among different stakeholders and EU institutions on the agreement's potential impact on human rights and as to whether explicit human rights provisions should be included in the CAI. In 2013, the EP emphasised that EU investment agreements must not contradict the EU's fundamental value of human rights promotion. It furthermore stressed that any EU-China investment agreement should "make a contribution to upgrading the EU-China political dialogue, notably on such issues as human rights" and requested that the EC assess "the impact of the EU-China investment agreement on human rights".²²

In 2013, in the preparation of the CAI impact assessment, the EC conducted a public consultation and a survey on the agreement's potential impact on various issues, including on human rights, which was open to all stakeholders, such as governmental authorities, NGOs, private companies and trade associations and unions. Some of the respondents were of the opinion that an investment agreement could be an opportunity to influence China's human rights policies by exchanging good business practices and by encouraging Chinese companies to respect human rights, but the majority believed that the agreement would not have any impact on human rights at all. The respondents nonetheless agreed that there should be a balance between the protection of human rights and the protection of an investment as well as the investor's rights, yet they were divided on the issue as to whether or not human rights clauses should be included in the CAI.²³

The Directorate-General for Trade (DG Trade) and the European External Action Service (EEAS) also debated the same issue when

²² European Parliament, 2013.

²³ European Commission, 2013, pp. 112–114.

evaluating a potential impact of the CAI. The DG Trade deemed human rights clauses in the CAI unnecessary, and argued that the agreement should be confined to matters pertaining to facilitating and protecting investments. However, the EEAS had two concerns. First, in case of a dispute between a host-state and an investor, arbitrators would not be obliged to take human rights arguments into account when judging a case, if explicit human rights provisions were not present in the CAI.²⁴ The EEAS provided an example of the 2007 case between Argentina and the German company Siemens, in which Argentina invoked the necessity to protect human rights amid the economic crisis in the country as an argument to reduce the required compensation for expropriating Siemens' investment in breach of the Germany-Argentina Bilateral Investment Treaty (BIT). The arbitrators dismissed the argument principally because the invoked human rights provisions were spelled out in the Argentine Constitution and arguably in customary international law, but not in the BIT.25 Second, the EEAS called attention to the EU's commitment enshrined in Article 21.2 (b) of the Treaty on the European Union (TEU), stipulating that its policies and actions should support the advancement of human rights:

EU [Member States'] investment agreement could afford to be unspecific on this issue as their external policies were not under the legal obligation to promote and protect Human Rights. The EU, however, was legally bound to do so under Art. 21 TEU. It was true that the [investment agreement] might not be the appropriate place to settle the issue. Nevertheless, the problem should be noted in the text.²⁶

The outcome document, EC's 2017 CAI impact assessment, concluded that the agreement's impact on human rights would depend not only

²⁴ European Commission, 2013, pp. 77–82.

²⁵ International Centre for Settlement of Investment Disputes, 2007.

²⁶ European Commission, 2013, p. 80.

on the laws and policies of the host-state, but also on human rights policies and practices of the investor state. International human rights organisations, such as Amnesty International and Human Rights Watch, among others, have been expressing their concerns about human rights abuses in China for years, even before the crackdown on protests in Hong Kong and the revealed suppression of the Uighur minority. However, in the CAI impact assessment, the EC indicated that the final agreement would not include specific human rights provisions, but rather contain references to human rights commitments in the preamble. It pledged that the agreement would "provide countries with the necessary policy space to retain adequate policy and regulatory ability to protect human rights under the terms of the investment agreement" and "encourage the States to address private actors' potential abuse on human rights and to consider the full range of permissible preventative and remedial measures". 27

In 2020, the European Court of Auditors reiterated that the "promotion of human rights will continue to be a core part of the EU's engagement with China", and "the EU will hold China to account for its human rights record". It furthermore urged the EU to "continue to insist that China complies with its international legal and human rights obligations, both within China and abroad". Nonetheless, the CAI, concluded in December 2020, contains no explicit human rights provisions, except a reference to the Universal Declaration of Human Rights and another one to the United Nations Guiding Principles on Business and Human Rights. The agreement's scope is limited to market access opening and investment protection. The mere references to international documents might provide guidance for the implementation of the CAI but do not by themselves compel foreign investors or states to observe human rights.

²⁷ European Commission, 2017, p. 219.

²⁸ European Court of Auditors, 2020, pp. 64–65.

²⁹ European Commission, 2021a.

As might have been expected, especially given that the CAI was concluded shortly after an increased global awareness of Uighur minority's oppression in China, the document fell under the scrutiny of the EP as well as human rights organisations. A few weeks after the CAI was reached, the EP issued a resolution, denouncing the democratic opposition's suppression in Hong Kong. In the resolution, the EP stated that "the decision on a political conclusion of the CAI has not reflected Parliament's requests in previous resolutions on Hong Kong to use investment negotiations as a leverage tool aimed at preserving Hong Kong's high degree of autonomy, as well as its basic rights and freedoms". The EP furthermore expressed its concern "that, by rushing to reach this agreement while not taking concrete action against ongoing grave human rights violations, for example in Hong Kong, Xinjiang province and Tibet, the EU risks undermining its credibility as a global human rights actor" and assured that the EP would carefully examine the agreement and take into account the human rights situation in China before endorsing the CAI or any other trade and investment agreements with China.30

Around the same time, a group of NGOs submitted to the EU a joint appeal, demanding to include enforceable human rights provisions into the CAI, as otherwise it would signal that the EU aims "for closer cooperation regardless of the scale and severity of human rights abuses carried out by the Chinese Communist Party, even when Beijing is in direct and open violation of international treaties". Among other things, the NGOs requested to specify in the agreement that it is essential for both parties to respect human rights as defined by international customary and treaty law, and in the event of a failure to do so, the other party is entitled to suspend the agreement, in full or in part, or take any other appropriate measures, such as barring foreign investors from the protection of their investment.³¹

³⁰ European Parliament, 2021a.

³¹ European Trade Union Confederation, 2021.

Thus, both the *travaux préparatoires* of the CAI and the backlash from the EP and human rights NGOs that followed its conclusion, identify two main concerns about the failure to include human rights provisions into the agreement. First, there is a procedural concern that in case of a dispute between a host-state and an investor, the absence of explicit human rights clauses in the agreement might prevent the host-state from successfully invoking human rights protection in its defence, as arbitrators would not be obliged to take such an argument into account. The second concern is normative: the CAI devoid of any explicit human rights provisions implies the legitimisation of China's alleged human rights violations, which contradicts the EU's foundational values and breaches the fundamental commitment of advancing human rights as stipulated in TEU. All in all, the CAI in its current form does not provide sufficient protection against potential human rights violations.

POTENTIAL THREATS TO HUMAN RIGHTS POSED BY CHINA'S ARCTIC FDI

One of the principal concerns in the Arctic in terms of human rights is the protection of indigenous peoples. They hold a special set of prerogatives, derived from the internationally recognised right to self-determination, including the legal requirement for government authorities and investors to consult them and seek to acquire their free, prior and informed consent to any projects potentially affecting them.³² In its 2018 Arctic Policy Paper, the Chinese government acknowledged that commercial activities in the Arctic would have substantial impact on the way of life of indigenous peoples.³³ The document reiterated a number of times that China would accommodate the interests and address the concerns of indigenous peoples in the region, as well as respect their historical traditions and culture – an

³² United Nations, 2007; International Labour Organization, 1989.

³³ China's State Council Information Office, 2018.

almost identical phrasing to the one found in the Arctic Council's Observer Rules to which China is committed as an observer state.³⁴ Despite such pledges being incorporated in China's Arctic Policy Paper, the EP has expressed its doubts about their genuineness.³⁵

Indeed, in authoritarian states, policy-makers often embellish policy documents and political discourse with references to the protection of human rights, including the rights of indigenous peoples, by appropriating the language of international documents, while in practice the situation is entirely different. In Russia, for instance, policy documents refer to the protection of indigenous peoples as one of the primary objectives of the state's Arctic policy. Meanwhile, domestic and international non-governmental organisations as well as supervisory bodies of human rights treaties have continuously drawn attention to the Kremlin's violations of indigenous rights in the Arctic, for instance, against the indigenous Nenets people in the Yamal Peninsula, and assessed Russia's policy concerning indigenous peoples as regressive, especially amid the increased suppression of civil society and the enforcement of the so-called "foreign agent' law against indigenous peoples" organisations over the last decade. The protection of the so-called "foreign agent' law against indigenous peoples" organisations over the last decade.

One way to explain this discrepancy is the argument that in states with non-democratic regimes, sovereignty rests with the government rather than with people. Such an approach is incompatible with the right to self-determination, which is not granted by the government but inherent in people, and which seeks to strengthen the agency of indigenous peoples by empowering them to freely determine their political status and to independently pursue economic, social and

³⁴ Arctic Council. 2011.

³⁵ European Parliament, 2018, p. 3.

³⁶ Rossiyskaya Gazeta, 2009.

³⁷ CERD, 2013, pp. 5–6; CERD, 2017, pp. 2–3, 6–8; Rohr, 2014; IFIP, 2018, p. 7; Cultural Survival, 2018, p. 5.

cultural development.³⁸ Thus, it is not surprising that Beijing claims there are no indigenous peoples in China at all and refers to different ethnic groups as minorities instead. Consequently, while China is a vocal advocate of indigenous rights internationally, it considers that neither international law on the rights of indigenous peoples, nor its own international statements apply to domestic policies towards, for example, the Tibetans or the Uighurs. It is also noteworthy, that the 2018 Arctic Policy Paper mentions indigenous traditions, culture, concerns and interests, but not their rights, thereby obscuring the agency of indigenous peoples.

As the EC acknowledged in its 2017 CAI impact assessment report, one of the main factors to determine the agreement's effect on human rights is human rights policy and practices in the investor state. Even though China refuses to use the term indigenous peoples to refer to its different ethnic groups, the government's alleged repression of the Uighurs and the Tibetans significantly reduces the credibility of its proclamations about the protection of indigenous people expressed in policy documents, such as the Arctic Policy Paper. Since China has not yet made substantial investments in the European Arctic, there have been no cases of indigenous rights violations in the region that would involve Chinese actors. However, the disregard of indigenous rights has already proven to be an issue accompanying Chinese investments elsewhere in the world. Chinese investors have been accused of threatening indigenous way of life, neglecting the rights of indigenous peoples and overriding their interests in multiple countries, including Bolivia, Brazil, Peru, the Philippines, Cameroon and Ecuador.39

Given China's domestic human rights policy and the multiple cases of investments abroad that resulted in violations of indigenous peoples'

³⁸ Cepinskyte, 2019.

³⁹ Business & Human Rights Resource Centre, 2020; Collyns, 2019; Mayers, 2019; Poirier, 2017; Green, 2019; Hui, 2019.

rights, the concern that Chinese investors would likely fail to respect human rights, including the rights of the Sámi people, in the European Arctic, is not unreasonable. It is further complicated by the fact that the domestic laws in Finland, Norway and Sweden are not sufficiently clear as to the scope and content of the government and investors' responsibilities and obligations towards the indigenous Sámi people. The legal ambiguity leaves enough room for disregarding indigenous rights, which is a tempting course of action given that the processes of negotiating with local communities and seeking their consent to a project is often an onerous and long process that investors would likely try to avoid.

CONCLUSION

China's remarkable economic rise, the growing geopolitical significance of the Arctic and the widening chasm between European and Chinese values, exacerbated by grave human rights violations in China, have left the EU torn between its aspiration to be an economic superpower and the commitment to play the role of a global normative authority. Herein lies the Faustian bargain dilemma: should the EU and the Member States take advantage of China's interest in the European Arctic and accept the generous investments at the expense of neglecting the foundational values and potentially undermining the EU's norm-setting power in global economics and trade? On the one hand, restricting Chinese capital poses a risk of a Catch-22: if the EU's economic power shrinks, its political power would likely diminish too, thereby compromising the ability to have a normative impact in the world. On the other hand, advancing normative objectives is a legal commitment, derived from the foundational values comprising the very core of EU identity. The EU might fall short of exerting influence on China's domestic human rights policy, but it must, at the very least, insist that foreign actors uphold European values within EU boundaries. After all, it is the responsibility of the EU and

the Member States to ensure that the rights of people within their jurisdiction are protected. Therefore, human rights requirements and foreign investors' accountability for breaching them should be unequivocal – something that is currently not the case.

CHINA'S IMPACT ON LOCAL COMMUNITIES IN RUSSIA'S SIBERIA AND FAR EAST

Aimar Ventsel

Approximately 70% of the territory of the Russian Federation lies to the East of the Ural Mountains. This part of Russia is usually called Siberia, although geographically and also administratively it is divided into two subregional units - Siberia and the Far East. It is somewhat disputed where the border between these two is but currently the Russian Far Eastern Federal District includes everything from Krasnoiarski Krai eastwards, hence the Far East starts with the Republic of Sakha (Yakutia). The northern part of the region lies at the Arctic Ocean and everything north from the polar circle is geographically considered as the Arctic. The total area of Siberia and the Russian Far East encompasses 13.1 million km² and is currently populated by 33.565 million people. There are three federal districts that divide the territory - the aforementioned Far Eastern Federal District, the Siberian Federal District and the Ural Federal District. Simple arithmetics show that less than one fourth of the Russian population lives on nearly 70% of its territory. The population density is three inhabitants per square kilometre, approximately equal to that of Australia. Apart from Russians, who are the biggest population group, the area is also home to several indigenous ethnicities such as Sakha (Yakut), Tuvinian (Tyva), Khakhassians, Evenki, Eveni, Dolgam Khanty, Nenets, to name a few. Siberia and the Russian Far East are a mixture of cultures and economies where a reindeer herder can be living next to an oil or gas field and a trapper next to a coal mine.

This chapter is about the Chinese impact on local communities in the Russian Arctic and Arctic-related more southern regions. This impact affects local people and business on multiple levels, whereas often we see conflicts between the policy and interests of the Russian state and regional business and inhabitants. In terms of connectivity, the Russian Arctic and China are mutually interlinked with multiple economic ties. China extracts Russian resources to satisfy her own needs for raw materials that often return to Russia as products "Made in China". The Russian Arctic profits from the export of these goods and farming products to China, which is a growing market for global trade with agricultural produce. As will be shown, this often causes anti-Chinese sentiments in Russia. First of all, this chapter goes to the roots of trade between China and Russian Siberia and the Far East. Then there will be a short overview of the expansion of Chinese entrepreneurship in the Russian North and the moral panic that has accompanied it. Next, there will be a focus on how the bigger Chinese companies operate in the region, and how the soybean business became lucrative in certain Far Eastern regions. The chapter finishes with a rather pessimistic message stating that because of the opportunistic policy of the Russian state institutions, many of these projects tend to fail.

There are at least three levels of Chinese impact on local people and their communities in Russia's Far East: first, the grass-roots level, which includes interaction with Chinese traders, workers and small-scale entrepreneurs; second, the level of Chinese companies that are active in the area; and third, the national or state level, where contacts take place between the People's Republic of China and the Russian Federation. These levels, of course, overlap. The states exercise control over people they consider their subjects. The Russian Federation is interested in controlling its territory and the people on it with maximum accuracy. Analysts assert that China as a state is very well aware where its people are and what they do abroad, whom their relatives

are, and how to contact them.¹ Moreover, it is assumed that the Chinese Communist Party (CCP) controls not only state companies but also bigger private enterprises and that some of the private Chinese enterprises are in fact disguised state companies.² To some extent, the interests of China and Russia collide in the Far East and Siberia. In absolute terms the number of Chinese citizens in Russian territory is not that high. According to statistics of the Russian Ministry of Internal Affairs, in 2019 approximately 450,000 Chinese citizens lived in the Russian Federation, including people whose main reason to stay was working or studying, in addition to "private reasons" and "other reasons". In the 2020 statistics the number shrunk to 89,852 Chinese citizens due to the closure of the Russia-China border from the Russian side and the stopping of incoming flights from China.

PETTY TRADE AND GRASS ROOTS ECONOMY

Chinese traders and workers appeared in the Russian Far East and Siberia as soon as it was possible to cross the border without problems. Probably starting in the mid-1990s most bigger cities in the region had Chinese markets, where Chinese traders sold poor-quality goods, ranging from plastic kitchen utensils and domestic electronics to clothes. It must be also noted that the trade was reciprocal. A vast horde of Russian shuttle traders – known as chelnoki – crossed the Russian-Chinese border from the north side to bring back full bags of Chinese goods that they sold all over Siberia and the Far East. In contrast to the Chinese, who traded often in markets and kiosks in bigger cities, chelnoki also sold their goods in smaller places. My own research shows that such petty shuttle traders can cover long distances when there are hopes for a profit, and indeed the traders with their bags or trucks appeared in the Far North where the Chinese traders did not go.³

Yeh & Wharton, 2016; Jia & Bennett, 2019; Alekseev, 2001; Nyíri, 1999.

² Wu, 2016.

³ Ventsel, 2011.

In fact, Chinese market traders were and still are generally disliked in Siberia and the Far East where they are often accused of profiting from and exploiting local people by selling poor-quality goods. Such antipathy is quite widespread among people from different ethnic, social and cultural origins who live in Siberia and the Far East, be they ethnic Russians or indigenous people from various ethnic groups. But this has changed – in the Russian Far East in 1995 only 4% of the population welcomed the appearance of Chinese business and collaborative projects with Chinese entrepreneurs, in in 2016–17 this increased to 25–26% and was 16% in 2020.4 So people are becoming less hostile towards the Chinese in the Russian Far East. Trade and economic exchange between Chinese and Russian people was and is possible because there is a number of people from both sides who are interested in cooperation.⁵ For example, research by sociologist Natalia Ryzhova6 on fishing on the Amur border river has demonstrated that Chinese poaching was made possible only by bribing Russian officials and applying for help from various Russian institutions that produced the necessary certificates for customs procedures. In retrospect, it could be argued that Chinese markets and shops played a significant role in supplying the local population with primary goods such as clothes, electronics or footwear for the price they could afford in a time of crisis that occurred after the collapse of the Soviet Union. It was a time when the old Soviet light industry was in crisis, goods with affordable prices were scarce and people's disposable income was extremely low.7 Chinese petty trade also contributed to the spread all over the Russian Arctic of the local culinary usages of chilli, soy sauces and certain spices.

⁴ Zuenko. 2020.

⁵ Billé & Humphrey, 2021.

⁶ Ryzhova, 2014.

⁷ Laruelle & Radvanyi, 2018.

EXPANSION OF CHINESE ENTREPRENEURSHIP AND MORAL PANIC

In the late 1990s and 2000s Chinese entrepreneurs started to be engaged in agriculture wherever it was possible (mainly in the southern regions of Siberia and the Far East). In many areas such as Primorie or the Republic of Sakha, the Chinese were more or less the first to start with commercial vegetable growing. Growing vegetables in glasshouses and summerhouses, or datcha gardening, has always existed in different regions of Siberia and the Far East, but it was more or less for people's own needs, while the occasional surplus was sold in the markets. In the 1990s, a self-subsistence on datcha plots grew all over Russia, and the Russian Far East and Siberian regions were no exception.8 Chinese agricultural brigades, nevertheless, turned it into a market-oriented business. Small Chinese working groups built greenhouses, established vegetable gardens and often housed themselves nearby in small temporary shacks. At the same time, Chinese workers also appeared in certain regions of Siberia, including Transbaikalia. They often worked in logging and saw mills, both providing work for entrepreneurs of Russian and Chinese origin.9

Here a fluid legality in Russian economy could be observed. It is not always easy to understand the ownership of such enterprises. Although in every Russian Siberian region there are rumours that Chinese entrepreneurs often use local people as a front to register their enterprises, avoid document controls and thus cover their missing work and residency permits, it is undoubtedly often rather a cooperation between Russian and Chinese business partners, profiting both sides. At any rate, Chinese workers have a reputation as hard working people who can live in basic conditions. In some peripheral areas Chinese men are also popular candidates as husbands for local indigenous women because they have a reputation, apart from being

⁸ Tichotsky, 2000.

⁹ Brandišauskas, 2017.

hard workers, as being modest when it comes to alcohol consumption (there are widespread problems related to alcohol abuse all over Siberia).¹⁰

This aforementioned fluid legality can be observed in the extended networks in which the Chinese purchase certain products or market their goods. Anthropologists studying indigenous people of the Russian Arctic are well acquainted with the trade in young velvet antlers – panty – of (mainly) domestic reindeer. The business started in the early 1990s and has seen ups and downs in different Russian regions. This trade is mainly concentrated in Arctic regions because this is where a large scale domestic reindeer husbandry or mass hunt for wild reindeer is located. The antlers usually end up in China, where they are used in different medicines and potency-increasing drugs. The products will then be consumed either in China or shipped all over the globe to sell to the Chinese living in the United States, Europe or elsewhere. The trade in panty is usually conducted through middlemen who can be Russians, Armenians, Kyrgyz or from other backgrounds.

In the 1990s the trade was a prime source of income for the indigenous peoples of the Arctic, but when prices soared, the trade became less lucrative. Currently the trade is still very important on the Yamal Peninsula among Nenets reindeer herders but has been in decline in many other regions of the Russian Arctic. In the peak of the panty-craze, most reindeer herders in the Russian Arctic were involved in it. Whilst many of them believed that cutting off young antlers was not good for the health of animals, the profit was a major motivation for most reindeer herders to continue to harvest velvet antlers. Interviews with reindeer herders have shown that weakened animals without antlers were not successful in the rut period, and that the entire

¹⁰ Safonova & Santha, 2013.

¹¹ Stammler & Ventsel, 2003; King, 2003.

trade in the long run affected the genetic pool of a herd.¹² The trade in velvet antlers demonstrates that the Chinese impact on communities in the Russian North can express itself in multiple ways. The trade is often conducted indirectly via interlocutors, but it became an important part of reindeer herding, affecting migration routes and herd composition, and thereby reshaping the traditional economy of Arctic indigenous peoples.

When looking at the operations of Chinese enterprises in the Russian Far East and Siberia, noticeable features that stand out include the flexibility from the Chinese side and the quick reaction to the market situation. Chinese enterprises are active in multiple spheres and their activity depends on "the current level of development of local markets, labour resources and infrastructure". For instance, in 2014 when Vladimir Putin issued a prohibition on the import of Western food and agricultural products, the Chinese were very quick to flood the market with fruit and vegetables. Chinese vegetables and fruit had always dominated the market in the border areas since the 1990s, but now suddenly they were on sale also in the Arctic regions like the Republic of Sakha. Dutch or Polish apples or Greek strawberries vanished from the market and were replaced by Chinese imports.

One factor that had a growing impact on Russian communities in pre-COVID-19 times was tourism. The rise of Chinese tourism to Russia was also a sign of alignment between Russia and China. The growth was rapid and in 2019 – at least according to statistics of the Russian Ministry of Internal Affairs – was slightly below two million visits a year. The Chinese visits took place primarily in the border areas, where Chinese people came for one-day visits to enjoy a "European" atmosphere and for shopping, or group tourism in the Lake Baikal area or large tourist destinations such as Moscow and St. Petersburg. As a result, the Russian media published more and

¹² Ventsel, 2005.

¹³ Zuenko, 2020.

more critical articles about the "Chinese takeover" of Russia which developed into a substantial moral panic in 2019. Many tourist industry heavyweights protested against Chinese mass tourism, explaining that Russia does not earn any money, and that all the money from that kind of tourism returns to China. According to these accounts, Chinese tourism groups are brought to Russia through Chinese tourism operators, who have their own hotels and restaurants where Chinese tourists live and eat. In turn these hotels are apparently attached to a network of souvenir shops that sell "Russian souvenirs", produced in and imported from China, to Chinese tourists. Several articles appeared in the Russian media that were outright Sinophobic, depicting Chinese tourists as dirty and loud, as people who misbehave and disrespect Russian cultural heritage and nature, be it the historical inner districts of St. Petersburg or the nature-protected shores of Lake Baikal. Moreover, the Russian press published reports about how the Chinese consider Siberia as "their own" (nasha).¹⁴

It looks like this smear campaign was initiated by those Russian tourist agencies who were left out of the game, out of spite for not getting their share of the lucrative business of hosting Chinese tourist groups. The moral panic culminated with renowned Russian writer Tatiana Tolstaia raising a hysterical call to build "somewhere" in Siberia a copy (or even several copies) of St. Petersburg for Chinese tourists, including a full copy of the Hermitage museum because Chinese tourists tend "to break the parquet" of the real Hermitage. The perceived problems with Chinese tourists disappeared in 2020, when Russia closed its border with China due to the COVID-19 pandemic.

¹⁴ Bazarov, 2017; Belyi, 2016; Krylova, 2017; Kudin, 2017.

CHINESE RESOURCE EXTRACTION IN THE RUSSIAN FAR EAST

China has two strategies in its economic expansion. In the developed countries China is interested in technologies and know-how, whereas in developing countries China is after resources and is engaged in building infrastructures, while being active in the construction business. As demonstrated below, in Russia Chinese enterprises use the same economic model they use in Africa, Asia and South America. In addition to the above-mentioned moral panic that occurred in Russia due to Chinese tourism, the Chinese logging business, especially in Transbaikalia, in the Irkutsk area, forms another emotional topic in Russia. One reason was the collapse of state support for the local logging industry, with Chinese entrepreneurs eager to fill the vacuum.

The moral panic around the logging industry appeared around 2016 but apparently the issue was still relevant in 2020. There have been reports how Chinese companies cut down vast swaths of taiga leaving behind an empty earth. The Chinese, as in other locations, are interested in timber as a resource in order to export it to Chinese saw mills and production plants. YouTube contains several video pleas addressed to the government in which ordinary people but also activists demand that the logging be stopped. In 2016, nature protection and civil activists demanded that such total logging be prohibited. Protests grew so loud that in 2018 the head of the Ministry of Nature announced a potential ban of timber exports to China. This case also, not unexpectedly, had a Sinophobic undertone, hinting at how the Chinese are "taking over Russian Siberia". 15

The negative sentiments surrounding the activities of Chinese enterprises escalated into a public outcry when some Chinese companies aimed to build a factory that would produce bottled water from Lake

¹⁵ Pashkov, 2018.

Baikal for importing to China, Mongolia and South Korea. In 2019, the Chinese enterprise Akvasib started building such a factory on the shore of Lake Baikal, having already leased the land from the local municipality. The construction was accompanied by protests from local inhabitants and in April 2019 the court of arbitration of the Irkutsk Oblast halted the construction process citing fears of ecological damages. The scandal grew so big that the then Prime Minister Dmitri Medvedev ordered that he be able to oversee how the construction plans conform to the ecological standards of the Russian Federation. There was a similar outcome when there were plans to allow Chinese investors 115 hectares of arable land for a 49-year rent in Transbaikalia. When these plans became public it caused such a nationwide outcry that the regional and federal governments had to intervene and ban the deal.

Aside from resource extraction, Chinese companies have also not been entirely successful in various other infrastructure and construction projects. One of the most remarkable failures has been the bridge over the Lena River and the reconstruction of the inner city of Yakutsk. Both projects have been planned since the mid-2000s but the necessary financial resources have been lacking. The bridge over the Lena River should have united both river banks at Yakutsk, the capital of the Republic of Sakha (Yakutia). Plans were ready when the long-awaited railroad finally reached Nizhny Bistiakh, a village on the opposite side of the Lena River from Yakutsk. The construction of the bridge was about to start when Moscow stopped it in 2014, because the funding was needed for the Crimean Bridge. The republic did not want to give up on the project and sought for external funding. After securing a limited amount of finances, it turned to Chinese companies. Several visits by the republic's high officials to the Chinese embassy in Moscow took place, after which a contract was signed. In 2019, however, the administration of the Republic of Sakha

¹⁶ Vedomosti, 2019; Val'tseva, 2017; Zuenko, 2020; Kudin, 2017.

¹⁷ Interfax, 2018; TASS, 2015.

informed the Chinese side that the financing of the bridge-building project was not going to materialise and suggested that Chinese companies would need to look for external investors. The Chinese answer was to abandon the contract.

The saga with the rebuilding of Yakutsk's inner city was no more successful. It was first announced in 2015 and in 2016 this author met city administration officials who indicated that the plans were already close to the contract-signing stage. The Yakutsk city needed to borrow money from Chinese banks to hire Chinese construction firms to conduct the reconstruction. This is a very common strategy for Chinese companies operating abroad - very often part of the deal is that the project has to be financed by Chinese bank loans (presumably one of the most expensive bank loans in the world) and the Chinese contractor uses workers they bring in from China. This way, China earns threefold - Chinese banks receive interest, Chinese companies earn money for fulfilling the contracts and Chinese workers gain a salary that they most often send back home. Seemingly the modus operandi applied by the Chinese was based on this classic model. The construction started with delays and mutual accusations by the city council of Yakutsk and the Chinese company, culminating in March 2018 with the Yakutsk city council cancelling the contract.

The Russian Far East is not a lucrative region for Russian citizens. There have been several federal programmes to bring more inhabitants to the region, but these have been unsuccessful. For instance, in 2014 the Russian Far East was included in the compatriot (sootechest-venniki) programme, which aimed to lure former Soviet citizens to migrate to the Russian Federation in order to satisfy the growing need for human capital and labour force. Only 36,000 or 6.5% of compatriots who came to Russia decided to migrate to the Far East. In a similar way, the programme of the Far Eastern hectare failed completely. Through this programme, any Russian citizen could apply for one hectare of land in the Far East. The goal of the programme was also to

increase the local population, but the number of applicants was much lower than expected, because one hectare in a roadless periphery is not considered an asset.¹⁸

There is, however, an interesting example of the Chinese impact on the communities in Russia that can, more or less, be seen as the only one that has been long lasting and dynamic – namely the growing of soybean in Russia for the Chinese market. When the then President Trump's trade war with China deepened, China's main supplier of soybeans – the USA – cut its exports to China. 19 In the pre-COVID-19 period, several Chinese investors were interested in buying and growing soybeans on Russian territory in the Russian Far East, motivating local agricultural producers. Labour force was brought in from China, until regional governments quietly changed the limitation for the usage of foreign labourers. Chinese entrepreneurs moved in buyers of soybean production but also as investors in soybean farms. The run to grow soybeans took off in the Jewish Autonomous Oblast, and also in the Amurski and Primorski Oblasts. In the Jewish Autonomous Oblast, Chinese enterprises directly or indirectly soon controlled 80% of arable land, whereas in other regions the invasion was less dramatic.20

Chinese interest in Russian soybeans caused an increase in Russian soybean farming. However, because Chinese buyers were only interested in raw materials, there was no local interest in developing processing plants in Russia. Hence these three regions of the Russian Far East became raw material producers for the Chinese market and became highly dependent on China in multiple ways. Russian farmers not only produced for the Chinese market, selling their produce via Chinese intermediaries, but also depended on Chinese workers

¹⁸ Mkrtchian, 2017.

¹⁹ Zuenko, 2021.

²⁰ Ibid.

and technology rented from China.²¹ This halted the interest to invest in regional agriculture and establish processing plants to add value to the soybean as a product. Simultaneously, Chinese salaries at home increased and were higher than in Russia, demotivating Chinese labourers to come to work in Russia.²² On top of that, the COVID-19 pandemic hit and the movement of Chinese labour across the border stopped.

As argued by Russian researcher Ivan Zuenko, this crisis could have positive consequences for Russian farmers. Firstly, Russians may now become more interested in soybean processing inside Russia. Secondly, Russian farmers may be motivated to hire and train a local labour force. As Zuenko sees it, the Chinese side still needs soybeans but the status quo has changed. Because Chinese traders and workers have now more limited access to the Russian Far East, Russian farmers can start producing soy for Chinese markets more independently and slowly take over the farms of Chinese investors that solely relied on Chinese workers. This can all provide the Russian agricultural enterprises with a better position for negotiating trade deals.²³

CONCLUSION: THE FAILURE OF SINO-RUSSIAN COOPERATION

In 2019 the first bridge between China and Russia was completed over the Amur River between Blagoveshensk and Heihe. The governor of the Amurski Oblast saw in this opening a new boost to a regional economy. This bridge was one fulfilled promise in a long line of failed regional projects between Russia and China. Already in 2002–3 a plan existed between the Russian Federation and China to build an automobile bridge over the Amur River. Later this plan

²¹ Zuenko, 2021; Yi et al., 2020a; Yi et al., 2020b.

²² Mkrtchian, 2017.

²³ Zuenko, 2021.

transformed into a plan to build a bridge for both automobile and railway traffic. In 2008 the Jewish Autonomous Oblast announced a plan to build a bridge from the Nizhneleninskoe village to Chinese Heilongjiang, but that bridge never materialised. Moreover, in the Amur Oblast more than a dozen "free economic zones" were established to develop economic cooperation between Chinese and Russian businesses. But these free trade zones exist only on paper and have had no economic impact. On paper there is also a tourist zone on Ussuriskiy Island of the Khabarovskii Krai.²⁴

Already in the early 2000s there were plans to establish three transborder trade-economic zones between China and Russia. In 2001, the project for one of them – linking Russian Pogranichnyi and Chinese Suifenhe – was signed. Russia contributed 300 hectares of land while China contributed 150 hectares. In 2005 construction work was finished. This zone was meant to be similar to the trade-economic zone on the Chinese-Kazakhstan border – a visa-free territory, where citizens from both sides can enter in order to shop, or visit restaurants and entertainment facilities. But contrary to the success story on the Kazakhstan-Chinese border, the Pogranichnyi-Suifenhe project never took off and it exists today as an empty, fenced territory with a few empty hotels and storage facilities.²⁵

Many Sino-Russian cooperation projects in Russia's Far East failed because of the mistrust from the Russian side. Russian Far Eastern regions are more interested in receiving money from Moscow as subsidies than making it through trade with Chinese counterparts. On the other hand, as Natalia Ryzhova and Ivan Zuenko conclude: "Local initiatives have encouraged Chinese investment in the Russian hinterland, whatever Moscow might say". 26

²⁴ Ryzhova, 2014.

²⁵ Zuenko, 2017.

²⁶ Billé & Humphrey, 2021.

The cases discussed in this chapter indicate that there has been a limited increase of connectivity across the Sino-Russian border in the Russian Far East. Apart of the traditional petty trade – which has been very much affected by the COVID-19 restrictions – Chinese economic activities have always caused protests or public outcry despite the fact that a growing number of people in the region approve of the activities of Chinese enterprises. The problem is that in most cases, like tourism, logging or construction, Chinese entrepreneurs tend to hire workers from China and many locals do not see enough profit for themselves. The growing and export of soybeans from the Russian Far East to China seems to be the only success story because it could initiate a regional soybean processing industry on the Russian side and offer more work to the local labour force.

On multiple levels the Russian state apparatus did not, or was too slow to, approve ongoing projects. When on a local grassroots level many people in Russia are interested in continuing economic cooperation with China, but the administration at both local and federal levels is passive when it comes to implementing the plans. In Russia, the narrative of a Chinese threat is still present, alluding to a possible Chinese takeover of Siberia and the Far East once they are "let inside". Such mistrust is often supported by protests and negative sentiments on the ground, as illustrated by the protests against factories at Lake Baikal and against Chinese land lease. The Sinophobic sentiments are often fed by local media that people trust more than explanations from official institutions. Therefore, the Chinese impact on Russian communities remains - with few exceptions - at a low level, and an increase is not on the horizon. It seems that "Russia as a country appears to China as an unreliable partner, ²⁷ and this pessimism is also expressed in some accounts by the Chinese.²⁸

²⁷ Billé & Humphrey.

²⁸ Economist, 2018.

There is however a great potential for the growth in Chinese-Russian connectivity in the future due to geopolitical tensions between Russia and China, and the Western world. Some Chinese food and industrial products are crucial for people in Siberia and the Russian Far East. China is still interested in the natural resource extraction, for example of timber or natural gas, on the northern side of the border. Chinese entrepreneurs and traders are incredibly flexible in adapting to the everlasting changes in the Far Eastern economy. If the Russian state adopts a less strict policy towards the Chinese then there is a high possibility that significant changes will happen in the transregional economy.

ARCTIC POLICY OF THE UNITED STATES: ILL-PREPARED FOR THE GROWING COMPETITION?

Tõnis Idarand

The transformation of the Arctic environment has created new economic opportunities, improving access to Arctic resources and new maritime connections, which is integrating the region into global networks and increases its geostrategic importance. At the same time, geopolitics is returning to the Arctic. Great-power competition here is driven by the region's economic potential and spillover effects of growing global tensions. In a globalised Arctic, the traditional geopolitical competition, including military build-up and ambitions to control territories, resources and maritime connections, is taking place in the context of increased global interdependence between nations and emerging geoeconomic rivalry, where control of supply chains and flows of resources, finances and data is used as an instrument of political leverage. Connectedness and interdependence in the Arctic, which was expected to benefit Arctic as well as non-Arctic nations, can also be seen as a vulnerability due to asymmetric dependencies where one player could use its privileged position in controlling these flows to gain geostrategic advantages.

As an Arctic great power, the US plays an important role in this evolving, contentious geostrategic game. Contemporary US Arctic policy

can be traced back to 1971, when President Nixon's National Security Council issued the first US Arctic policy document, National Security Decision Memorandum 144. At that time, the region did not attract too much interest of US policymakers. This has changed during the last decade: the Arctic, which was once considered to be an isolated region with a harsh climate and fragile environment, has attracted worldwide attention and gained geopolitical relevance. Even so, the main interests of the US in the Arctic, as outlined by President Nixon, have remained the same: sustainable and rational economic development, international scientific cooperation, and national security together with freedom of navigation. The subsequent Arctic policy agendas have mainly added more elaborate details to the objectives and necessary activities or realigned the priorities, adjusting to the changes in the US political landscape or developments in the international or domestic Arctic arena.

This chapter looks at the development of US Arctic policy and involvement in the region on the basis of relevant US strategy documents. The US is still the sole superpower with global reach and having resources to affect the developments worldwide, including the Arctic. The chapter explores where the Arctic stands in the US policy agenda, what are the US interests and priorities there, how they have changed over the years, and what different administrations have been doing or not doing to protect those interests. It also aims to analyse how recent shifts of US Arctic policy match with the developments of an increasingly globalised, connected and geopolitically relevant Arctic. The chapter starts by providing an overview of the Arctic policy developments and actions of US administrations, with a focus on topics of general interest in Arctic cooperation. Thereafter the chapter analyses three priorities of US Arctic policy in more detail – Arctic governance, freedom of navigation and US security in the Arctic.

¹ National Security Council, 1971.

CONTINUITY AND CHANGE IN US PRIORITIES IN THE ARCTIC

Monitoring and protecting the Arctic environment has always been an important area of US contemporary involvement in the region. In particular, the first Arctic policy initiatives of the United States were mainly focused on environmental and scientific research and economic development in the region, although security issues were also always included among the top priorities in policy documents. President Reagan's National Security Decision Directive NSDD 90 from 1983 tasked the administration to do a review of federal agencies and activities needed to promote US security, economic and scientific interests and international cooperation in the Arctic.² In the following year the Congress adopted the "Arctic Research and Policy Act", which outlined US scientific research needs and relevant institutions.³

During the first post-Cold War years the focus of US Arctic policy was on collaboration with all Arctic nations on issues of common interest such as research and protection of the Arctic environment. The Arctic Environmental Protection Strategy (AEPS), adopted by the Arctic nations in 1991, was based on this common interest. President Clinton's Arctic policy was supportive of the idea to create a formal forum to oversee the implementation of AEPS, which led to the establishment of the Arctic Council. In 1994, Presidential Decision Directive 26 (PDD/NSC-26) on "US Policy on the Arctic and Antarctic Regions", signed by President Clinton, outlined six principal objectives in the Arctic, with the main focus on environmental issues – the protection of the Arctic environment and conserving its biological resources, environmentally sustainable natural resource management, economic development, strengthening institutions for cooperation of eight Arctic nations, involvement of indigenous

² National Security Decision Directives, 1983.

³ U.S. Government Publishing Office, 1984.

peoples in decisions that affect them and monitoring and scientific research of environmental issues.⁴ In line with previous documents the national security and defence needs and the principle of freedom of navigation were also at the top of the list.

In the atmosphere of collaboration of the first post-Cold War years the Clinton administration focused on cooperation with Russia. It contributed to institution-building with a view to environmental monitoring and resource management in the Russian Arctic and provided technical assistance to create facilities for treatment and disposal of radioactive waste in Russia, preventing these from being dumped in the Arctic Ocean.

The dominating narrative of the Arctic as a region of peace and collaboration started to fray in the mid-2000s.⁵ International interest in Arctic resources and economic possibilities emerged after the US Geological Survey reported on undiscovered oil and gas in the Arctic, and the first report of Arctic Climate Impact Assessment in 2004 informed about melting sea ice. This caught the imagination and raised expectations of possible off-shore oil and gas exploration in the Arctic and other new economic opportunities in the region. Increased economic interest together with the misperception that a great part of the region is outside national jurisdictions supported the new vision of competition and an emerging resource race in the Arctic. The symbolic act of planting a titanium Russian flag on the seabed beneath the North Pole in 2007 helped to create the impression that the Arctic is a region of land grab and conquer.

These developments caused sovereignty concerns among Arctic coastal states, who in 2008 issued the Ilulissat Declaration reaffirming that international law governs the region and the coastal states will follow its principles in case of territorial disputes. As the Arctic

⁴ The White House, 1994.

⁵ Young, 2020.

was changing, the countries in the region had to adapt their policies accordingly. In these years most of the Arctic states published their first Arctic strategies, which focused on regional cooperation, environmental protection and sustainable economic development. In January 2009, during his last weeks in office, President G.W. Bush signed National Security Presidential Directive/ NSPD-66 and Homeland Security Presidential Directive/HSPD-25 on Arctic Regional Policy.⁶ This document, which is still in effect, takes into account the developments in the region since 1994, including the effects of climate change and increasing human activity in the region.

In comparison to the previous US Arctic policy documents, this one was more exhaustive and elaborated on details of policy objectives and related activities. Maritime transport and energy extraction in the Arctic were highlighted as new priority areas, while climate change, as a driver behind these new opportunities, was acknowledged also as a concern. Therefore, scientific research and monitoring of the Arctic environment was seen as vital for the protection of a nation's interests in the region, and the administration expected the US to continue its leadership role in regional scientific cooperation. As increased maritime activity and development of natural resources has an impact on the environment and in order to promote safety of navigation and prevention of pollution of marine environment, the US contributed in the framework of the Arctic Council to concluding two legally binding agreements addressing these risks - the Agreement on Cooperation on Aeronautical and Maritime Search and Rescue in the Arctic, and the Agreement on Cooperation on Marine Oil Pollution Preparedness and Response in the Arctic.

With new possibilities of resource extraction in the Arctic, the challenge of balancing the development of hydrocarbons or other natural resources and the protection of the environment became an issue of

⁶ The White House, 2009.

discussion in most Arctic countries. The US debate on how to manage this balance in the American Arctic can be traced back to the 1970s, when President Nixon was the first to announce energy development as a national security issue. The debate is still going on, in the Congress and across the nation, and particularly in Alaska, where the economy is dependent on resource extraction.

The Obama administration did not issue a separate Presidential Directive on the Arctic, but his administration released several other important Arctic policy documents. In 2013 the "National Strategy for the Arctic Region" came out, followed by its "Implementation Framework" in 2016, during the US chairmanship of the Arctic Council. The documents identify three priority lines of effort: advancing US security interests, pursuing responsible regional stewardship and strengthening international cooperation, and four guiding principles to be followed in the course of these efforts – safeguarding a conflict-free Arctic, knowledge-based decision making, innovative arrangements and consultation with Alaska natives. Fighting climate change and strengthening the US energy security, including by increasing domestic fossil fuel production, were two incompatible policy priorities of the Obama administration.

Addressing the impact of climate change was one of the priority themes of the US chairmanship of the Arctic Council from 2015 to 2017. Two years later, at the meeting of the Arctic Council in Rovaniemi, the Secretary of State outlined a radical turn in US Arctic policy, when contesting the climate change language in the final document of the meeting⁷ and informing about the administration's decision to free up energy exploration in the National Wildlife Refuge in Alaska.⁸ The Trump administration intended to lease federal land in a wildlife refuge for oil and gas drilling, which the previous administration had halted.

⁷ Pompeo, 2019b.

⁸ Pompeo, 2019a.

National energy security has been a strategic priority for US administrations since the 1970s, aiming at reducing vulnerability to global supply disruptions and coercive use of energy resources. Both the Obama and Trump administrations worked to diversify the access to energy, develop domestic fossil resources and become a world leader in oil and gas production. The Trump administration, while claiming to balance energy security and environmental protection, was countering the climate policy of his predecessor as an "anti-growth energy agenda" and "detrimental to US economic and energy security interests" and withdrew from the legally non-binding Paris Agreement.

US VIEWS ON ARCTIC GOVERNANCE

As other Arctic nations, the United States has been pursuing its Arctic interests through bilateral contacts, international organisations and regional structures such as the Arctic Council. The Arctic Council is considered by the US to be an appropriate forum of coordination and consensus building between the Arctic nations, as it has a number of outstanding achievements of regional cooperation, such as on public safety, environmental protection and interaction with indigenous peoples.¹⁰

Some US Arctic policy documents have mentioned the need to strengthen the institutions of Arctic cooperation, but the US firm position has been that the Arctic Council should continue in its current limited mandate.¹¹ Because of US insistence, the mandate of the Arctic Council, when agreed in 1996, was limited to economic development and environmental protection topics. More controversial issues such as military security or territorial disputes were left

⁹ The White House, 2017.

¹⁰ Ibid., 2009.

¹¹ The White House, 2013.

out.¹² As the geopolitical situation has changed, security issues have become more relevant, as well as the increasing pressure to find a way to deal with them. As most of the formats for discussing security among the Arctic nations have been suspended since 2014, there have been calls to extend the mandate or face the risk of the Arctic Council becoming irrelevant. However, there is a common understanding between the Arctic nations, that the present system has served them well and there is a risk that extending the agenda may jeopardise the current constructive atmosphere of the institution. As the decisions on guidelines and recommendations of the Arctic Council are consensus based, the forum cannot be used for imposing policies that some nations may find difficult to approve. The Council has no mechanism to enforce its decisions, as this is the responsibility of member states. Proposals to provide the Council with some enforcement mechanisms are unlikely to succeed. The United States has expressed its preference that the Arctic Council should stay as it is,13 and that the security challenges must be addressed, but in the right channels outside the Arctic Council.14

Increasing global importance of the Arctic and growing interest of non-Arctic nations to participate in related discussions, or even have some role in Arctic governance, has raised the question whether the present governance system and its legal framework is suitable for addressing the Arctic issues of wider international relevance. The US as well as other Arctic coastal states consider the governance of the region being their responsibility, and have been rejecting any attempt of non-Arctic states to obtain a role in it. In this context the growing tensions between the US and China have become increasingly visible in the Arctic. In his remarks in Rovaniemi in 2019, Secretary of State Mike Pompeo stressed that, as there are Arctic states and non-Arctic states and no such category as a "near-Arctic" state exists,

¹² Auerswald, 2020.

¹³ The White House, 2009.

¹⁴ Bye, 2020; Blinken & Thordarson, 2021.

the regional governance has to be restricted to the Arctic states.¹⁵ He was particularly referring to the ambitions of China, which is already defining itself as a stakeholder in Arctic affairs and a rule-maker in Arctic governance.¹⁶ The Trump administration perceived the ambitions of non-Arctic states as a new challenge to Arctic nations. Mike Pompeo also sent a clear warning to observer states, reminding them that the observers of the Arctic Council have their status contingent upon respect of sovereign rights of the Arctic states.¹⁷

Like other Arctic littoral states, the US is opposing the idea of an "Arctic Treaty" or any other new comprehensive international legal regime to govern the region, which has been promoted by some non-Arctic states, international organisations and NGOs.¹⁸ In light of such proposals the Arctic coastal states fear their sovereignty is being challenged and reject any idea of global governance of the Arctic, as proposed from outside of the region. They share the view that present arrangements and treaty system is serving the region well, as the waters of the Arctic are subject to the United Nations Convention of the Law of the Seas (UNCLOS), and littoral states apply their national laws to their terrestrial and marine domains. Five coastal states (the United States, Russia, Denmark, Norway and Canada), in the Ilulissat Declaration from 2008, outlined the basic framework of Arctic governance and reaffirmed that the law of the sea applies to the Arctic Ocean and it also provides a good framework for delineation of continental shelves, protection of marine environment, freedom of navigation, scientific research and other uses of the sea, as well as being a solid foundation for settlement of disputes.¹⁹ The issues not regulated by the law of the sea are governed by generally applicable international law or by the set of treaties addressing specific regional issues.

¹⁵ Pompeo, 2019b.

¹⁶ The State Council Information Office of the People's Republic of China, 2018.

¹⁷ Ibid

¹⁸ The European Parliament, 2008.

¹⁹ The Ilulissat Declaration, 2008.

With increasing economic activity in the region, safe and secure Arctic shipping has become an area of concern. The US, together with Norway and Denmark, made joint efforts to get the Polar Code adopted by the International Maritime Organisation, which aims to strengthen safety requirements for commercial shipping in the Arctic. Another matter of concern is the management of fish stocks. The US initiated steps in cooperation with other nations to adopt an agreement to manage migratory fish stocks in the Arctic Ocean. Negotiations between five Arctic coastal states, four major fishing nations and the EU led in 2018 to an agreement to prevent unregulated commercial high seas fisheries in the Central Arctic Ocean. This could serve as a good example of engaging non-Arctic nations with interests in the region in an Arctic governance mechanism. But the question remains whether existing arrangements in the Arctic are addressing the concerns and interests of non-Arctic nations in light of the Arctic becoming global and more crowded in the future.²⁰

FREEDOM OF THE SEAS AND THE LAW OF THE SEA

In all US Arctic strategy documents, the freedom of the seas and access to global commons is outlined as the highest national priority, which is essential for its commercial, scientific and national security interests. Freedom of the seas is understood as all freedoms and rights of lawful uses of the sea and airspace, including for military ships and aircraft, as guaranteed to all nations under international law.²¹ The US uses different instruments, including diplomatic and military presence, to protect this principle globally and exercises its navigation and overflight rights and freedoms by preserving global mobility of its forces and unhindered commerce worldwide.²²

²⁰ Lanteigne, 2020a.

²¹ The United States Navy, Chief of Naval Operations, 2019.

²² Department of Defense, United States of America, 2011.

It is a major concern for the US that in different regions of the world this regime is under threat, as states claim jurisdiction and interfere with navigation rights, making attempts to redefine international norms and rules for seas and straits, which is inconsistent with UNCLOS and customary international law. The US is concerned that this is also taking place in the Arctic where Russia and Canada apply restrictive shipping regimes in the straits on the Northern Sea Route and Northwest Passage. Both sea routes include straits used for international navigation where the regime of transit passage should apply, but Russia and Canada claim the right to regulate these waters in excess of the authority permitted by international law. The US is contesting the legal basis of these restrictions on innocent passage and transit in waters which Russia and Canada designate as internal waters or with reference to Article 234 of UNCLOS impose regulations in their exclusive economic zone. The US and Canada have agreed to disagree on the issue and continue their otherwise close cooperation in the Arctic.

From the US perspective preserving the rights of navigation and overflight in the Arctic is of principal importance for supporting the same rights in other regions of the world. Great powers are divided over interpretations of UNCLOS and a number of countries claim authority within their exclusive economic zones, beyond what is allowed by UNCLOS. The way those states define freedom of navigation may have an impact on maritime order in the 21st century.²³ Therefore the US Department of Defense and other federal agencies are tasked to ensure continued access to the Arctic for legitimate civilian, military and commercial purposes. These freedoms are codified in UNCLOS, which the United States has not acceded to, but is applying relevant parts of the Convention as customary international law. Since 1994, when UNCLOS entered into force, three US administrations have supported the accession to the Convention and have included this

²³ Smith, 2021.

goal in Arctic strategy documents of 2009 and 2013. But the full Senate has not yet voted on the question of whether to give its advice and consent to ratification of this instrument. The US is the only Arctic state not party to the Convention. The situation could become a problem when protecting its interests in the region. Accession would strengthen the US position in the Arctic Council, as UNCLOS is the legal framework that the Arctic governance is based on. It would also strengthen arguments for freedom of navigation on the Northern Sea Route and the Northwest Passage. It helps to protect US rights and freedoms of uses of air and sea space not only in the Arctic but also serves its interests in maritime disputes outside the Arctic.²⁴

Accession to UNCLOS would also improve the ability of the US to protect its sovereign rights and provide legal certainty and international recognition to its claims for an extended continental shelf through the procedure available to the states which are party to the Convention.²⁵ Four Arctic countries have submitted claims to the Commission on the Limits of the Continental Shelf (CLCS) concerning the external limits of their extended continental shelves. The US has been conducting preparatory work for the submission of claims, but lacks the access to the Commission as long as it is not a party to the Convention. It would be in the US's future interests in the spheres of energy security and environmental protection to have a clearly defined seabed in the Arctic, where it can exercise its sovereign rights.²⁶

Arctic coastal states are aware of the potential disagreements over undetermined limits of the continental shelf. Difficult disputes are looming, as at the end of March 2021 Russia submitted a claim to the CLCS for an enlarged seabed in the Arctic Ocean, stretching from the

²⁴ There are similar disputes worldwide, where China, India, Sri Lanka, Italy, Japan, Russia and Ukraine are involved. See Lalonde, 2018.

²⁵ The White House, 2009.

²⁶ Ibid., 2013.

North Pole to Greenland's and Canada's exclusive economic zones.²⁷ This addendum to its previous claim of 2015 significantly increases the overlap with claims filed by Canada and Denmark. Russia did not extend its claim into the North of Alaska, where the US could have claims on the continental shelf, if it had been party to UNCLOS. Russian enlarged claims, if successful, give rights to resources on the seabed and some rights to regulate traffic in order to protect the seabed. This means that Russia could affirm its rights all the way across to the limit of Canadian and Danish economic zones. The region could be heading towards difficult negotiations, but no big risk of confrontation between Russia and other Arctic nations is expected, as long as the parties stick to the rules they committed to follow in the Ilulissat Declaration of 2008. However, growing global tensions may complicate the negotiations and increase the risk that the agreed rules may be violated.

ARCTIC SECURITY

Due to geography the US has core security and defence interests in the Arctic. Maintaining the ability to protect against attack across the Arctic, the control of borders and areas under its jurisdiction will always be of strategic importance. All US Arctic policy documents highlight defence and homeland security as the nation's top priority in the region. After WWII the United States did not have a separate Arctic policy. But Alaska was considered the first line of defence, as over the Arctic it was the shortest avenue of approach to US territories from the north.

After the Cold War national security remained among the priorities of US Arctic policy, but primary focus was on environmental protection, monitoring climate change, scientific research and regional

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²⁷ Breum, 2021.

cooperation. Military security and defence got less attention. President Clinton's Presidential Directive from 1994 mentions the objective of meeting post-Cold War national security and defence needs by maintaining the ability to protect against attacks across the Arctic and to move the ships and aircraft freely under principles of customary international law.²⁸

President G.W. Bush's National Security Presidential Directive from 2009 gives some more details of the US defence interests in the Arctic and mentions the key elements of it: missile defence, early warning systems, strategic sealift, strategic deterrence, maritime presence and freedom of navigation and overflight. Over the years the Department of Defense and armed services assessed that the security environment in the Arctic was at low tension level and with no immediate threat of conflict. The Obama administration's strategy for the Arctic region from 2013 was rather based on a broad definition of security, emphasising environmental security, energy security and the public safety aspects of security, including federal responsibilities in the region's waterways, airspace and coastal areas. In 2014 the US Navy predicted that the region will be a low threat security environment in the foreseeable future and the US must be prepared for contingencies through low cost, long-lead activities.²⁹

Over the last years the geopolitical picture of the Arctic has changed. The environment has become more complex due to changes in the physical environment, increasing human activity and more assertive presence of China and Russia. However, the report on national security in the Arctic from 2016 of the Department of Defense barely mentions the increasing Russian military build-up or activities of China in the region. During the Obama administration some US policy-makers started to point out that the Arctic is not immune to geopolitical forces which apply to other parts of the world and expressed their

²⁸ The White House, 1994.

²⁹ The United States Navy, Chief of Naval Operations, 2014.

concern about Russian and Chinese assertive presence. Critics in the Congress pointed out that the Obama administration was too much focused on climate change at the expense of other core US interests.³⁰

The US National Defense Strategy from 2018 acknowledged the remergence of long-term strategic rivalry, which has become the central challenge and primary concern of US national security, with the main global competitors in the Arctic being China and Russia. Russia as a major Arctic nation has been increasing and modernising its military presence there during the last decade. China as a newcomer in the region, who understands the long-term strategic and economic importance of the Arctic, has been increasing its economic and scientific presence there. Perceived through the lens of US national security, the Chinese presence and assertive geoeconomic ambitions were seen as a challenge to the present governance system in the Arctic, as its growing economic activity and investments in strategic sectors could be exploited as leverage to influence economic, political or security decisions of the Arctic nations.

During the years of low tensions and dominating narrative of peace and cooperation in the Arctic, the US administrations did not pay much attention to the strategic importance of this remote region. US policymakers' low interest in the region was also reflected in the shortage of funding for the activities outlined by different administrations to secure the national interests in the Arctic. Defence-related activities in the Arctic were continued, but mostly as post-Cold War continuations of national defence activities. After the Cold War, Department of Defense operations in the Arctic were reduced, with the exception of submarine and aviation operations.³² Applying the basic measures to safeguard the nation's security interests in the region through its enhanced presence was not the priority and the US

³⁰ U.S. Government Publishing Office, 2015.

³¹ Department of Defense, United States of America, 2018a; 2018b.

³² Ibid., 2011.

has been falling behind its competitors in the last decade. As the prospect of military confrontation in the Arctic was considered low, the investments in the region were not successful in competing with the funding of other priorities. The national security community saw the Arctic as being of peripheral interest with a low potential for armed conflict in the coming decades, and the existing infrastructure was considered adequate.³³ Given the fiscal constraints and political situation after the 2008 financial crisis, it was difficult to mobilise public and political support for investments in Arctic capabilities and infrastructure. The National Defense Strategy of 2018 acknowledges that US "comparative military advantage has been eroding" and "its superiority is contested".³⁴ In 2019 the Department of Defense acknowledged that the Arctic has direct implications on US security interests and, in contrast to prior documents on the region, it sees the Arctic as a potential corridor of strategic competition.³⁵

The key elements of the Trump administration's Arctic policy were outlined by State Secretary Mike Pompeo in May 2019 at the ministerial meeting of the Arctic Council and also at a State Department briefing in April 2020, which both signalled a shift in focus. Pompeo recognised that the region has become an arena of great-power competition and the Arctic states must adapt to this new reality. Acknowledging the new strategic situation in the Arctic, America as an Arctic nation was going to fortify its security and diplomatic presence there. ³⁶

Pompeo's statement in Rovaniemi was a clear expression of US Arctic priorities shifting from climate and environmental issues to economic and security ones. His remarks were understood as calling in question the utility of cooperative international actions, considering the expression "collective goals, even when well intentioned, are not

³³ Department of Defense, United states of America, 2011.

³⁴ Ibid., 2018b.

³⁵ Department of Defense, United States of America, 2019.

³⁶ Pompeo, 2019b.

always the answer". 37 A year later a State Department senior official tried to mitigate this impression by confirming that the US would continue Arctic cooperation as a critical part of US Arctic policy. It also reaffirmed the vision that geopolitics does matter in the Arctic, and that the US is going to moderate its posture and enhance engagement in the region, starting from reopening a consulate in Greenland, and increasing its military and scientific presence and infrastructure investment.38 Furthermore, US economic presence was intended to avoid Chinese non-transparent investments in mining and energy sectors or taking control of critical infrastructure in Greenland. The Trump administration also indicated interest in Greenland's mineral resources, primarily rare earth minerals, as of great strategic importance for the US defence industry.³⁹ As Greenland holds a considerable part of the world's rare earth resources, the US sees them as an alternative to supplies from China. US has become increasingly concerned about its defence industry's growing asymmetric dependence on imports of strategic materials from China, 40 which in a number of cases has used or threatened to use its dominating position for limiting or disrupting supplies.41

During the Trump administration the US increased its military presence in Greenland and Iceland, re-established the 2nd Fleet with an area of responsibility in the North Atlantic and the Arctic, and showed progress in the Polar Security Cutter programme of developing an icebreaker fleet by securing funding for two new icebreakers for the US Coast Guard. The latter had been unsuccessfully applying for funding since 2013 and had not been able to guarantee year-round access to all ice-covered areas, where the US has sovereign interests and responsibilities.

³⁷ Pomeo, 2019a.

³⁸ U.S. Department of State, 2020.

³⁹ Gronholt-Pedersen & Onstad, 2021.

⁴⁰ Department of Defense, United States of America, 2018b.

⁴¹ Congressional Research Service, 2019.

Over many years the funding of Arctic-related activities has been less important than funding for capabilities and activities in other parts of the world. Arctic security issues have been mentioned as a priority for decades, but not everything can be a priority with mandated funding.42 This could have sent a message to other countries about how serious the US is as an Arctic power and has induced domestic critics to describe US as a "reluctant Arctic nation"⁴³ and its posture as "Arctic apathy". 44 Different administrations have faced difficulties when engaging strategically and operationally in the Arctic, despite agreed national interests and responsibilities. 45 It is also worth noting that the relative priority of the Arctic on the US policy agenda depends on the domestic political landscape as well as external and global developments. One of the impediments to a more assertive Arctic policy is a strong polarisation on the US political landscape. 46 As Alaska is a remote region with its specific problems, with a minor share in the US economy and having no role in US national identity,⁴⁷ it may have been difficult to reach an understanding in American society about the strategic importance of the Arctic.

After decades of underinvestment in Arctic capabilities it is important for the US to find new ways to counter increasingly assertive strategic competitors in the region. Innovative approaches and new operational concepts are needed to be able to enhance and maintain presence with existing forces, as investments and integration of new capabilities may take years.⁴⁸ Dynamic force employment, a concept proposed in the National Defense Strategy of the Trump

42 Bouffard, 2020.

⁴³ Herrmann & Hussong, 2020.

⁴⁴ Burke, 2020.

⁴⁵ Herrmann & Hussong, 2020.

⁴⁶ Granholm, 2016.

⁴⁷ Hamilla, 2020.

⁴⁸ Department of the Navy, United States of America, 2021.

administration, which proposes flexible use of ready forces,⁴⁹ may meet these needs for a new operational environment in the Arctic. The US Navy, therefore, is planning a tailored approach by combining different ways of maintaining a presence – permanent stationary and rotational forces, prepositioning of equipment, regular participation in regional exercises and conducting freedom of navigation operations. Strengthening cooperation with allies and partners is another important way to enhance its presence and extend deterrence.

In the last few years the US Navy and Air Force have increased their presence in the European Arctic by participating in joint exercises. In 2020 for the first time since the end of the Cold War, US Navy surface vessels operated in the Barents Sea in a joint exercise with the UK Navy and the Norwegian Navy. The same year US special operation forces together with the Navy and Air Force exercised in Sweden and Estonia. In 2021 US Air Force B-1B Lancers arrived in Norway, the first time B-1B strategic bombers have landed in the Arctic. When modernising forces, US Navy Arctic Strategy emphasises the need to consider Arctic conditions in designing and developing capabilities as well as improving infrastructure and logistical capability. This approach will probably not change with the Biden administration, as facts on the ground and threat assessments are the same as under the previous administration.

CONCLUSION AND WAY FORWARD

A number of external factors, notably growing geopolitical tensions, increased Chinese ambitions in the Arctic, as well as the urgency to fight climate change, has pushed the US to raise the relative priority of the Arctic on its policy agenda.

⁴⁹ Department of Defense, United States of America, 2018b.

⁵⁰ Hurt, 2021.

The US Arctic policy is currently in flux – President Joe Biden has been emphasising the priority of climate change and environmental issues when re-joining the Paris Agreement and halting the activities on drilling licences in the Arctic National Wildlife Refuge. As energy security is still a priority while US oil imports from Russia are at a record high,⁵¹ the Biden administration has supported the ConocoPhilips oil development project in the National Petroleum Reserve of Alaska, previously approved by the Trump administration, which is meanwhile halted by litigation.⁵²

President Biden's Interim National Security Strategic Guidance does not mention the Arctic, but points to climate change and rivalry with China and Russia among the main challenges to US strategic interests. As with previous administrations, it reaffirms the continuing importance of access to global commons and the principle of freedom of navigation to protect the flow of commerce and ensure that supply chains critical for national security remain secure. Before the Arctic Council Ministerial of May 2021 in Reykjavik, Secretary of State Antony Blinken expressed US geostrategic concern with Russian unlawful maritime claims and the regulation of foreign vessels transiting the Northern Sea Route, which is inconsistent with international law.

Lloyd Austin, as US Defense Secretary nominee during hearings in the Senate Armed Services Committee, recognised that climate change was altering the strategic balance in the Arctic. Due to concerns about Russian military build-up and Chinese intentions, he pledged to review US posture, strategy and equipment in the region.⁵⁵ The intervention of the US Secretary of State Antony Blinken at the most recent Arctic Council Ministerial, and remarks to the press, were intended to be in

⁵¹ Blas, 2021.

⁵² Murkowski, 2021.

⁵³ The White House, 2021.

⁵⁴ Blinken, 2021.

⁵⁵ Senate Armed Services Committee, 2021.

contrast with his predecessors' bombastic statements two years earlier in Rovaniemi, and were in line with the traditional approach of US Arctic policy. He recalled the issues for a peaceful Arctic, cooperation on climate change, environment, science, safety and sustainable economic development, and the new challenge of a global health emergency, as priorities from the US perspective. The role of effective Arctic governance and rule of law were identified as important for management of the risks of increasing human activity in the region. While making reference to US worries about the impact of increasing militarisation in the Arctic on cooperation, Blinken aimed at downgrading the importance of the narrative of geopolitical competition and also did not react explicitly to the proposal of the incoming Russian chairmanship of the Arctic Council "to extend the positive relations that we have within the Arctic Council to the military sphere" by reintroducing a military dialogue in the format of Chiefs of General Staffs of the Arctic states. ⁵⁶ The main US geostrategic concern expressed during Blinken's trip to the Arctic region was about free access to Arctic maritime connections, in particular to the Northern Sea Route.⁵⁷

The Arctic policy of the Biden administration will likely follow the approaches of prior administrations with regard to challenging China in the Arctic and dealing with climate change. At the same time, increasing awareness of the Arctic challenges among US policymakers and in defence establishments should guarantee that future Arctic policy guidelines will be accompanied by funding for implementation. As geopolitics is back in the Arctic, climate change cannot be the sole focus of the US Arctic policy, and neither can be security issues. The understanding that a complicated security environment and climate change are global processes which become closely interlinked in the Arctic should help to consider them together in a comprehensive way.⁵⁸

⁵⁶ Lavrov. 2021.

⁵⁷ Blinken, 2021.

⁵⁸ Murkowski, 2020; Bye, 2020.

CHAPTER 12

TAKING EUROPE-ASIA CONNECTIVITY TO THE ARCTIC: COOPERATION BETWEEN THE EU AND JAPAN

Bart Gaens

In addition to being a relatively new and often ill-defined buzzword in international relations today, connectivity is increasingly a driver of great-power competition. This is not least because of the key role that connectivity projects have in China's geoeconomic strategy to create spheres of interest and influence in Asia as well as in Europe. At the same time connectivity brings countries and regions together, providing opportunities for cooperation in the decades to come. This chapter explores the strategic partnership between the EU and Japan and its potential for Arctic cooperation. After placing connectivity in the context of competition as well as cooperation, the chapter examines both actors' connectivity strategies. It proceeds by examining the EU-Japan partnership agreement, including the connectivity partnership, before assessing whether synergies and opportunities exist for cooperation in the Arctic region.

CONNECTIVITY AS THEATRE FOR COMPETITION AND COOPERATION

Connectivity increasingly defines relations between Asia and Europe, in terms of competition as well as cooperation. First and foremost, connectivity has a strong element of competition, as key actors aim to establish contending spheres of interest through infrastructure development. As such, connectivity is deeply ingrained in notions such as geoeconomics,1 economic statecraft2 and weaponised interdependence.³ For some, the interconnected infrastructure of the global economy is increasingly replacing conventional warfare as the battleground of conflict. Marked by the disruption of trade and investment, international law, the internet, transport links, and the movement of people, "connectivity wars" play out through economic warfare, the weaponisation of international institutions, and infrastructure competition.4 Defining connectivity as the building of "seamless transportation, energy, and communications infrastructures among all the world's peoples and resources", Parag Khanna has argued that, in the 21st century, unitary nation-states will give way to a world of interconnected regions across former frontiers.⁵ As recent developments have shown, in the Arctic and elsewhere, conventional geopolitics, geographical borders, and state-centric policies and actions are certainly not off the radar. However, Khanna may have a point in that, more than just about borders, global organisation is increasingly about the management of flows and frictions. 6 Connectivity has become a key paradigm of global organisation, and functional infrastructure increasingly defines the world, in addition to political borders. Furthermore, Khanna has argued that a decentralising process

¹ Wigell, 2016. Cf. Wigell and Mikkola in this volume.

² Baldwin, 2020.

³ Farell & Newman, 2019.

⁴ Leonard, 2016.

⁵ Khanna, 2016.

⁶ Cf. also Aaltola et al., 2014.

of "devolution", e.g. from central capitals to autonomy-seeking cities, is accompanied by "aggregation", i.e. the fusion into larger commonwealths of shared resources. As a result of this process, geopolitical competition is increasingly transforming from war over territory to war over connectivity, with special economic zones or infrastructure alliances becoming key tools in a global tug-of-war.⁷

China has taken on a leading role in driving forward "contentious connectivity". China's efforts in this field arguably already started around the turn of the century when Beijing initiated its "Going Out" policy, boosting Foreign Direct Investments (FDI). They certainly became much more prominent in the early 2010s, in particular through the launch of the Belt and Road Initiative (BRI) in 2014. Beijing heavily invested in large-scale infrastructure projects, including the creation of Eurasian land bridges and maritime transport corridors. For Europe, China's challenge has been palpable in multiple fields. First, China-funded projects are most often tied with Chinese companies, and are much more to the benefit of China than of the local countries. Frequently lacking a transparent bidding process, they are generally less open to local or international companies. Importantly, China typically provides loans to countries rather than investments, which can have a profound impact on national debt, as in the case of Macedonia. It can even result in a debt trap and loss of sovereign control, as was the case in Sri Lanka's Hambantota Port project.

In addition, concerns have risen about standards, environmental considerations and social requirements, including labour rights or human rights, often lacking in China-sponsored projects. The Chinese presence in Europe, including growing political influence, is a further challenge. The 17+1 framework, currently the 16+1 grouping, a platform driven by China to promote cooperation between Beijing

⁷ Khanna, 2016, pp. XVI-XVII.

and a number of Central and Eastern European countries, has often been regarded as a tool for driving a wedge between the European Union and its neighbourhood, and even within the EU itself. The Union seems divided between those member states that advocate a tougher stance against a "systemic rival", and those that support closer cooperation.⁸ A final challenge has been that China's investments can undermine EU rules, especially in sensitive industries such as steel and nuclear energy, posing a challenge for transparency and technological and legislative standards.

Connectivity is, therefore, a key tool and battleground for competition in the sphere of Asia-Europe relations. However, it also offers possibilities for cooperation. Khanna has argued that the era of "infrastructure alliances" marked by connectivity and flows has started, and China has taken on a leading role in building these geoeconomic partnerships with third countries. Beijing is successfully accessing raw materials in third countries to feed its export-oriented industry, and uses infrastructure development and supply chain mastery as drivers of geopolitical status and influence.9 In addition to serving as a tool of influence, connectivity can also facilitate cooperation in the form of functional partnerships at the bilateral, regionto-region and multi-stakeholder levels. Japan, for example, signed a partnership agreement, labelled the Asia Africa Growth Corridor (AAGC), with India in 2017, focusing on economy, technology and infrastructure development. The Association of Southeast Asian Nations (ASEAN) adopted its Master Plan on ASEAN Connectivity 2025 in 2016. Connectivity partnerships are increasingly becoming part of the EU's tool box. As noted most recently by the Council of the EU, Connectivity Partnerships with other countries and regions such as Japan, India, ASEAN and the US, can "promote compatibility of policy approaches and complementarity in preparation,

⁸ Owen, 2019.

⁹ Khanna, 2016.

implementation and financing of sustainable projects." ¹⁰ In September 2019 the EU and Japan concluded a partnership on sustainable connectivity and quality infrastructure, which was followed by the EU-India Connectivity Partnership of May 2021. A partnership with ASEAN promoting connectivity within and between both regions is likely forthcoming.¹¹

The following sections zoom in on the connectivity strategies of the EU and Japan, and explore whether the synergies between them, externalised in the EU-Japan partnership, allow for cooperation, in particular in the Arctic.

THE EU'S CONNECTIVITY STRATEGY FOR ASIA

For the EU, the aim to improve connective links with Asia is not new. For example, the Europe-Caucasus-Asia Transport Corridor (TRACECA) had already started in 1993 and ran from Europe to China. It is currently run as part of the European Neighbourhood Instrument (ENI), and connects the EU with Central Asia. In more recent years however, as stated in the European Union's Global Strategy for Foreign and Security Policy of June 2016, Brussels has become increasingly aware of the importance of a connected Asia for European prosperity, with trade between both regions amounting to 1.5 trillion euro. Connecting the Trans-European Transport networks (labelled TEN-T), currently being extended to the EU's neighbourhood, to networks in Asia is, therefore, an important goal. The EU's connectivity strategy for Asia, officially called "Connecting Europe and Asia—building blocks for an EU strategy" and published in September 2018, is a concrete marker of this grown awareness. The

¹⁰ Council of the European Union, 2021b.

¹¹ Ibid., 2020.

¹² European Union, 2016, p. 37.

¹³ European Parliament Think Tank, 2018.

strategy emphasises three core ideas, and has a strong normative emphasis. Connectivity has to be economically, fiscally, environmentally and socially sustainable in the long term. It needs to be comprehensive, covering transport links, digital networks, energy flows, and people-to-people networks. Finally, connectivity needs to be rules-based and transparent.

The EU strategy has its strengths. First, it proposes a European model for connectivity and a blueprint for building up international support for the values and principles it promotes, including sustainability, human rights, and a rules-based international order, allowing Europe to help shape the rules of the global marketplace. Second, it looks beyond investment in infrastructure, pointing the way to niche markets in which the EU has a comparative advantage, such as green technology, digital connectivity, or educational mobility.¹⁴ Third, the strategy creates synergies, and is key in implementing other EU priorities such as the Global Strategy (2016), the European Green Deal (2019), the digital strategy (2020), and regional strategies such as those for Central Asia (2019), Africa (2020), or the Arctic (2016). Fourth, it feeds into multilateral processes such as the UN 2030 Agenda for Sustainable Development and the Sustainable Development Goals (2015), the connectivity agenda of ASEM, and the G20 Principles for Quality Infrastructure (2019).

Weaknesses of the strategy include the document's vagueness and lack of substance. The strategy does not include new programmes, and the level of ambition is set rather low.¹⁵ The financial backbone and absence of concrete commitments are a second weakness, with a lot depending on investments from the private sector. The EU has agreed on a new financing instrument, namely the Neighbourhood, Development, and International Cooperation Instrument (NDICI-Global Europe) with a long-term external action budget for 2021–27

¹⁴ Gaens, 2018.

¹⁵ Broer, 2018. See also Devonshire-Ellis, 2018.

amounting to 79.5 billion euro. However, this obviously also covers geographical areas other than Asia,16 including the EU neighbourhood and Africa, and thematic fields other than connectivity, such as conflict prevention, human rights, or civil society. In addition, NDICI includes an investment framework of 53.4 billion euro in order to guarantee sustainable investment inter alia in connectivity projects in the EU neighbourhood, Western Balkans, Africa, or regions with critical infrastructure and connectivity needs. Furthermore, the EU aims to mobilise public and private financing through a reinforced EU guarantee, which may be complemented by loans and grants.¹⁷ Eventually, much will depend on the extent to which additional financial resources can be raised from the private sector, as well as from national, international and multilateral financial institutions.¹⁸ A third weakness arguably relates to branding. Unlike China's New Silk Road (NSR) or Belt-and-Road Initiative (BRI), or the US Blue Dot Network (BDN), the EU's strategy has no marketable image or moniker and lacks public awareness. It is not accompanied by a communication policy highlighting benefits, achievements, goals and potential.¹⁹ Finally, beyond the strategy there remains the EU's bureaucratic machinery slowing down the process from planning to implementation.

In spite of weaknesses, the strategy and "the European way" outlined in the policy document form the baseline for the EU to establish partnerships in and with Asian countries, including Japan. These could help the EU become a norm provider in the field of sustainable connectivity, as well as promote European priorities. Lastly, the "Connecting Europe and Asia" policy paper also leads the way to an EU global connectivity strategy, expected by Spring 2022.

¹⁶ 8.48 billion euro would go to Asia and the Pacific. European Commission, 2021b.

¹⁷ European Commission, 2018.

¹⁸ Gaens, 2018.

¹⁹ European Parliament, 2020a.

JAPAN'S CONNECTIVITY STRATEGY

Japan's connectivity strategy is closely linked to its development policy. Japan's development cooperation and connectivity investments, labelled "economic cooperation" (keizai kyouryoku), have a number of distinct features. First, Japan strongly emphasises its own national interest. Tokyo has traditionally linked connectivity investments, in particular in economic infrastructure, with development cooperation, especially in Southeast Asia, to support its export sector and underpin its economic and foreign policy interests. Ever since the 1970s, Japan has regarded infrastructure development as a useful tool for Japanese companies to access local markets. In recent years, development policy has become increasingly securitised, and Official Development Assistance (ODA) has been used to support foreign military forces for "non-military purposes", for example.20 Second, the largest share of bilateral ODA goes to infrastructure projects, peaking at 4.8 billion USD in 2017, including in transportation, energy, and natural resource development.21

Third, Japan focuses on self-reliant development and the promotion of economic growth. Japan's model of ODA is said to be based on the country's own historical experiences. Just as Japan focused its postwar development on rebuilding its economy, Japanese ODA has centred on infrastructure development and capacity building in order to help recipient countries to develop a functioning market economy and become self-reliant. Fourth, Tokyo focuses on low-interest, long-term loans instead of grants. These loans are typically of concessional nature, at below-market interest rates, and with longer repayment periods. Fifth, Japan makes wide use of public-private partnerships, primarily with Japanese companies. One important instrument here is JICA's Private-Sector Investment Finance tool, which provides loan aid to private corporations engaging in infrastructure development

²⁰ Donor Tracker, n.d.

²¹ Ibid.

to assist them in local development projects. Sixth and finally, Japan has typically focused on Asia, in particular Southeast Asia, based on strong economic, diplomatic and geographic links. For example, Japan still invests more in ASEAN's six largest economies (Indonesia, Malaysia, Philippines, Singapore, Thailand and Vietnam) than China, namely 367 billion USD in the case of Japan, compared to 255 billion USD in the case of China.²² Tokyo is also investing robustly in connectivity and development projects in Myanmar, often through ODA loans, most recently at 0.01% interest rate, financed by the Japan International Cooperation Agency (JICA) and the Asian Development bank (ADB). Myanmar is key in Japan's goal to counterbalance China's BRI. Since 2015 Japan has invested heavily in the Thilawa Special Economic Zone, key in the East West Economic Corridor.

In recent years Japan has expanded its geographic scope as an outcome of the Abe administration's Free and Open Indo Pacific strategy, aiming to connect Asia and Africa to promote sustainable growth in both regions.²³ Within this Free and Open Indo Pacific strategy, the Partnership for Quality Infrastructure (PQI), launched in 2015 and budgeted at 110 billion USD (and in 2016 raised to 200 billion), is a key policy priority. The emphasis on quality, including connotations of economic efficiency, safety, resilience, environmental and social sustainability, and contributions to local society and economy, denounces a clear attempt to set Japan's policy off against China's, and counterbalance the BRI.24 The PQI is based on four pillars:25 (1) expand ODA loans for Asia's infrastructure and mobilise private funding; (2) strengthen collaboration with the ADB including by promoting PPP for infrastructure investment by utilising JICA's Private Sector Investment Finance; (3) increase funding for high-risk infrastructure investments through the Japan Bank for International

²² South China Morning Post, 2019.

²³ Donor Tracker, n.d.

²⁴ Pascha, 2020, p. 14.

²⁵ Ministry of Foreign Affairs of Japan, 2015.

Cooperation (JBIC) and a newly founded Japan Overseas Infrastructure Investment Corporation (JOIN); and (4) promote "quality infrastructure investment" as an international standard. In 2019 Japan was successful in this international standard-setting when the G20 summit adopted Japan's concept of quality infrastructure as a set of new principles for infrastructure projects, including economic efficiency, debt sustainability, and openness and transparency of procurement.

Japan's connectivity and development strategy traditionally has focused on unilateralism. In more recent years however, and due to increasing competition with China, Japan has embarked on a quest for strategic partnerships with other countries and regions. The EU-Japan strategic partnership is an example of this new policy.

THE EU-JAPAN CONNECTIVITY PARTNERSHIP

Looking back on the recent history of bilateral relations, it is clear that trade and economy have been a prime element but, in spite of a plethora of declarations and summitry, cooperation in other fields has been patchy, pragmatic, and ad hoc. After Japan rose to become the world's second largest economy in 1968, its relations with the European Economic Community (EEC) were marked by trade disputes and a sizable European trade deficit throughout the 1970s. In the 1980s the EU started pressuring Japan to open up its market and strongly criticising Japanese Non-Tariff Barriers (NTBs),26 whereas Japan grew increasingly wary of a gradually developing Single Market turning into a protectionist "Fortress Europe". The year 1991 marked a new beginning with the adoption of the Hague Declaration on EU-Japan Political Relations on the occasion of the very first EU-Japan summit. Both players have been referring to each other as likeminded partners sharing values as of that time. This resulted in a number of ad hoc policy dialogues going beyond trade and economy.

²⁶ Söderberg, 2012, p. 254.

The awareness that more could be done was at the heart of renewed efforts for closer interaction in 2001, when both actors agreed on an "Action Plan for EU-Japan Cooperation" that was supposed to be implemented in the course of the next decade. The Action Plan covered more than a hundred areas for cooperation in the four broad fields of security, economy, societal challenges, and culture exchange. However, the Action Plan resulted in few tangible outcomes, not in the least because of the plan's lack of focus and insufficient resources.²⁷ In 2004 the EU and Japan reaffirmed the importance of cementing a strong "strategic partnership" buttressed by a number of area-specific policy dialogues. As argued by Hook et al., cooperation since has tended to focus on "strategic pragmatism", marked by "ad hoc, issue-led agendas focusing not on overarching relations but more specifically on issues of mutual concern," including energy, climate change, and development (in particular based on the concept of human security).28

Nevertheless, it was clear that more vistas for cooperation existed, in view of the synergies and convergences between the EU and Japan. First, both the EU and Japan consider themselves "herbivorous" powers that aim to play a global role first and foremost by focusing on civilian and "soft" power, as opposed to military power. Relatedly, both actors refer to each other as global partners sharing the same basic values, including democracy, a market economy, human rights, human dignity, freedom, equality, and the rule of law. This normative convergence is also present in the field of connectivity, where both countries emphasise sustainability, consideration for the local society and economy, or rules-based connectivity for example.

Second, a gradual convergence has taken place between EU and Japanese development aid practices. The EU now increasingly emphasises

²⁷ Berkofsky, 2012, p. 274.

²⁸ Hook et al., 2012, pp. 275, 309.

the need to shift from aid dependence to self-reliance, as well as an emphasis on economic infrastructure rather than social/administrative infrastructure. These are both elements that have been part and parcel of Japan's traditional aid philosophy.²⁹ Furthermore, the EU is increasingly aware of the need to support private sector involvement in development, and to leverage private sector investment in order to satisfy infrastructure demands. Third, the EU, just like Japan, is increasingly aware of the need to include a political and security-related dimension in addition to trade-related partnerships in order to broaden the engagement with countries like Japan.

In December 2017 the EU and Japan finalised negotiations for an Economic Partnership Agreement (EPA), marking a milestone in the interaction between both players. A Strategic Partnership Agreement (SPA) (also known as a Framework Agreement, FA), a binding political arrangement, was concluded in parallel. This shows that both the EU and Japan increasingly combine economic diplomacy with a more comprehensive approach, including a stronger political and security-related dimension. As a first tangible outcome of the SPA, both actors concluded the Japan-EU partnership on sustainable connectivity and quality infrastructure in September 2019.

Implementation of the partnership has been slow thus far, but a few concrete examples of EU-Japan cooperation on the ground deriving from the SPA or the connectivity partnership agreement exist. In 2019 the European Investment Bank (EIB) and JICA signed a Memorandum of Understanding (MOU) to cooperate more in the fields of transport, quality infrastructure investment, microfinance and renewable energy sources. This was preceded by two other cooperation agreements involving the EIB, namely one with the Japan Bank for International Cooperation (JBIC), and one with the Nippon Export and Investment Insurance (NEXI). As of August 2019,

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²⁹ Cf. Gaens, 2017.

the EIB and JICA co-finance a women-focused microfinance fund in Sub-Saharan Africa.³⁰ The European Bank for Reconstruction and Development (EBRD) joined forces with Japan's NEXI in 2020 to support the development of sustainable infrastructure. As of 2021, the EBRD also cooperates with JICA and JBIC, among other international development finance institutions, in an initiative called the 2X Challenge, aiming to step up investments in gender equality and the empowerment of women.³¹ As of early 2019, the EU and Japan also have an agreement on mutual data adequacy in place, allowing for the free flow of personal data between the two economies based on strong protection guarantees. Most recently, in the field of climate change, the EU-Japan Green Alliance was created in the sidelines of the latest bilateral summit, held on 27 May 2021, to cooperate on energy transition, environmental protection, and promote regulatory and business cooperation, research and development, and sustainable finance

THE EU AND JAPAN IN THE ARCTIC: TOWARDS COOPERATION?

In view of the commonalities in their respective connectivity strategies, the SPA and the connectivity partnership, there should be ample space for collaboration between the EU and Japan. The two also have a lot in common in the Arctic, including the aim to ensure regional stability, a rules-based international order, and a favourable regional balance of power. The EU's Arctic policy paper was published in 2016, and emphasises climate change and safeguarding the Arctic environment; sustainable development in and around the Arctic; and international cooperation on Arctic issues. A revised policy paper is in the works, and is set to appear in Autumn 2021. It is expected that more focus will lie on climate change, as the EU's Green Deal makes

³⁰ European Investment Bank, 2019.

³¹ Zgheib, 2021.

curbing climate change an overarching priority. There is also bound to be more emphasis on geopolitics and security, in light of increased military activity and higher economic importance of the Arctic.³² The European Parliament has recently called for a broader scope of EU Arctic policy and for making the Arctic a cross-cutting issue area in other relevant policies, in addition to emphasising the need to address hard and soft security within existing frameworks.³³

Japan's interests in the Arctic include understanding and tackling environmental changes in the Arctic; rule of law and international cooperation; and sustainable economic activities. In the field of research, in 2015 Japan launched ArCS, or "Arctic Challenge for Sustainability", to promote joint research in order to understand the current status and process of environmental changes in the Arctic. In the field of international cooperation, Japan aims to contribute to formulating international rules in order to sustain a free and open maritime order based on the rule of law, including through cooperation among law-enforcement agencies. As for sustainable use, Japan aims to be involved in preparing for utilising the Northern Sea Route and in developing resources. A less explicit factor pertains to China's Arctic ambitions. It is clear that Japan's more proactive Arctic policy and political engagement with the region have been partly pushed forward by rivalry with China as well as South Korea.³⁴ Hard security threats have not tended to play a major role thus far, and competition with China has mainly played out in the field of research and infrastructure. China, for one, has also sought to establish Arctic partnerships through science diplomacy. In 2016 China, Japan and South Korea initiated a high-level annual dialogue on Arctic issues. Even so, the security dimension is gaining in importance. Japan's 2018 White Paper, for example, stated that, against the background of China's ambitions for a Polar Silk Road and the country's claims

³² European Parliament, 2021c.

³³ Ibid., 2020b.

³⁴ Solli et al., 2013, p. 258.

to rights pertaining to the development of resources, the "focus will be on whether or not such activities would have any relation to the PLA Navy's future advancements into the Arctic Ocean". In addition, Japan is certainly anxious about China's growing presence in the Arctic, as access to Arctic resources is vital to Tokyo. Parallels can be drawn with the South China Sea, from where Japan receives 90% of its oil and 33% of its LNG imports, and where China has been making an increasingly assertive stance. In the control of t

Hence, can the EU and Japan cooperate in the Arctic? It is clear that multiple obstacles exist. First, geography matters, and neither the EU nor Japan are dominant actors in the Arctic. Japan has a permanent observer status in the Arctic Council (AC), whereas the EU's observer status has been denied thus far (even if the EU can be regarded as a de facto observer). Furthermore, the EU and Japan are located in rather different regional contexts and security environments. For example, Japan has sought closer ties with Russia in order to inch closer to settling the territorial dispute over the Northern Territories (referred to as the South Kuril Islands by Russia), seized by Russia at the end of the Second World War and under Russian control since then. Eager to ensure its energy supply without overreliance on the Middle East, Japan has also invested in Yamal-LNG production in Northern Russia. Japan's Mitsui and the Japan Oil, Gas and Metals National Corporation (JOGMEC) invested in the Arctic LNG 2 Project, holding a 10% stake through the jointly owned Japan Arctic LNG. A first shipment of LNG to Japan took place on 24 July 2020.

Second, Japan-EU relations revolve around interaction between a regional organisation and a state. The EU is a grouping of 27 states that also aims to be a unitary actor with transnational competences in certain areas such as foreign trade. Especially since the 1992 Maastricht Treaty the EU has been seeking "actorness", while increasing its

³⁵ Ministry of Defense of Japan, 2018, p. 192.

³⁶ Drifte, 2016.

global political presence. However, lack of understanding of the EU as a political structure on the part of Japan, and the lack of a single voice on the part of the EU have contributed to Japan's low expectations of Europe as an entity or as a single actor, in the words of Tsuruoka Michito resulting in an "expectations deficit".³⁷ Indeed, the reluctance of most member states to further pool their sovereignty has limited the possibilities to maintain a coherent policy stance and achieve a unified EU foreign policy. In the Arctic the EU as an entity is not a key player, unlike the three member states, Denmark, Sweden and Finland that are AC members.

Furthermore, while six member states (Germany, France, Netherlands, Italy, Spain and Poland) are observer countries in the AC, the EU has not been granted official observer status. As a unitary actor the EU is wary of interfering with member state interests. For example, on issues relating to the law of the sea and marine environmental protection beyond national jurisdictions, the EU has chosen to promote the UNCLOS Commission rather than the OSPAR Commission, which may be better suited to leverage EU interests but could antagonise some of its member states or close partners.³⁸ As noted by Stepień and Raspotnik, when it comes to "rule-based governance of Arctic resource extraction and navigation, an increased EU involvement usually triggers anger or anxiety among Arctic actors, also from close partners such as Iceland or Norway."39 Even so, the EU's Arctic member states have generally promoted stronger EU involvement in the region to help coordinate and compliment their Arctic policies, which, in light of growing opportunities as well as competition, is increasingly important.⁴⁰

³⁷ Tsuruoka, 2008.

³⁸ Öslem, 2021. OSPAR ("Oslo-Paris") is a cooperation mechanism formed in 1992 aiming to protect the marine environment of the North-East Atlantic, including 15 European governments and the EU, and unifying and extending the 1972 Oslo Convention and the 1974 Paris Convention.

³⁹ Stępień & Raspotnik, 2019.

⁴⁰ European Political Strategy Center, 2019, p. 11.

Nevertheless, synergies and opportunities for cooperation between the EU and Japan do exist. First, Arctic research could be a helpful tool in contributing to the implementation of the EU-Japan connectivity partnership. The EU has already mobilised 200 million euro over the past seven years into Arctic research, in areas like Earth observation, polar science and climate action. As this also constitutes a priority area for Japan, visible through its flagship project ArCS II, joint Arctic research could be conducted, including on environmental impact assessments, for example.

Second, and related to green economy, there is tremendous potential for cooperation on the hydrogen economy. As noted by Midford, "stranded wind power" in Northern Scandinavia, i.e. electricity that cannot be easily connected to grids further south, can be used to produce green hydrogen that can then be exported to Japan via the Arctic, as is already the case with Norwegian natural gas.⁴² The signing, in the context the EU-Japan Green Alliance, of an MOU of cooperation on hydrogen, expected for Autumn 2021, can be a first step forward in this field.

Third, "peaceful" civilian use of space is another area for potential cooperation. Primarily through its Earth Observation Programme, Copernicus, the EU already possesses strong capabilities in Earth observation and environmental monitoring covering the Arctic. Japan has excellent expertise in satellites used for Arctic environmental monitoring, with the Japan Aerospace Exploration Agency (JAXA) operating numerous observation satellites.⁴³ Cooperation would not be unprecedented. The European Space Agency (ESA) and JAXA have maintained close relations, and have reached several milestones in space technology, such as the first communication between optical satellites in 2005, and formal EU-Japan cooperation

⁴¹ Borrell, 2021.

⁴² Midford, 2020, p. 44.

⁴³ For more details, see Arctic Science Ministerial, 2021, pp. 58–59 (EU), 76–77 (Japan).

in positioning services started in 2016.⁴⁴ In 2018 the BepiColombo⁴⁵ mission was launched, sending a European-Japanese spacecraft on a seven-year journey to Mercury. As noted by the Council of the EU, space solutions play a key role for Arctic policy: mitigating and adapting to climate change and safeguarding the Arctic Environment; ensuring sustainable development in and around the Arctic; as well as advancing international collaboration on Arctic issues.⁴⁶ The EU and Japan could share expertise and exchange data and information on issues such as long-term monitoring of the Arctic environment and climate change, or emergency management. Furthermore, joint research could help foster free and open services promoting transport connectivity, environmental policy, and energy and telecommunication interconnections.

Finally, in view of shared values and priorities, the EU and Japan should engage in a strategic regional dialogue on comprehensive security in the Arctic, as called for by the EU-Japan summit of 2021. Both actors have a stake in ensuring regional stability and a rules-based regional order. This is certainly true in the Arctic, where these factors are critical for the "adequate integration of the Arctic as an energy and communications hub in a rules-based international liberal order".⁴⁷ As noted above, the EU is also increasingly aware of the importance of political and security cooperation with other players in an intensifying security environment in the Arctic. Japan, for its part, is very eager to promote international cooperation in order to contribute to the process of international rule-making in the Arctic. Dialogue on "soft", comprehensive security issues such as Maritime Domain Awareness (MDA), i.e. maritime issues impacting security,

⁴⁴ Fatton, 2020.

⁴⁵ Named after the Italian mathematician and engineer Giuseppe ("Bepi") Colombo (1920–84). The author is indebted to Richard Paisley for his briefing on European-Japanese space cooperation.

⁴⁶ Council of the European Union, 2019.

⁴⁷ Simon, 2015.

safety, economy or environment, can lead to capacity-building in the area of search-and-rescue operations, for example. A strategic dialogue can also lead to increased science diplomacy, or the use of science to prevent conflicts, support policy-making, and build trust.

CONCLUSION

In sum, Asia and Europe have reached a comprehensive and normatively-imbued definition of connectivity. In recent years the rise of China, and its use of economic statecraft through large-scale infrastructure investments in Asia as well as Europe, have resulted in increased competition over connectivity. It has also led to cooperation in the form of connectivity partnerships, in which countries or regional actors such as the EU, agree on common standards, values, and priority areas for joined dialogue, collaboration, and investment in connectivity projects. The Japan-EU partnership on sustainable connectivity and quality infrastructure of 2019, itself an outcome of the Strategic Partnership Agreement between both actors, is an example of the quest for teaming up in connectivity. While the partnership agreement does not mention the Arctic, this chapter has argued that synergies in the EU's and Japan's connectivity strategies, convergence in policy areas such as development, as well as shared values and priorities, can result in cooperation in the Arctic region. This can entail Arctic research, green economy, civilian use of space, and dialogue on soft security issues.

CHAPTER 13

BALTIC PERSPECTIVE ON CONNECTIVITY WITH CHINA

Konstantinas Andrijauskas

For centuries the Baltic states trio, from north to south composed of Estonia, Latvia and Lithuania, has been characterised by a remarkably precarious geostrategic environment. It was only after they finally acceded to NATO and the EU in 2004, that the narrative of the region as a connecting "bridge between the west and the east" started to look promising enough to temper the trio's deeply ingrained suspicion of the former hegemon - Russia. Throughout the upcoming decade, however, Moscow's conduct in Georgia (2008) and particularly Ukraine (2014) had dashed the last Baltic hopes of a truly fruitful and mutually considerate economic relationship with their largest neighbour, at least as long as there were no significant political changes in the Kremlin. The trio's own recent experience, ranging from Russian economic pressure by withholding its commercially agreed-upon oil deliveries1 or blocking the Baltic trucks from entering its territory² to massive cyber-attacks against the region's digital infrastructure as witnessed by Estonia in 2007,3 has persuaded them of the pressing need to reconnect physically with their European allies and to look for major alternative economic partners beyond the continent.

¹ Reuters, 2007.

² Socor, 2013.

³ Juurvee & Mattiisen, 2020.

As a result, the Baltic states sought to reposition from the previously dominant western-eastern axis to the southern-northern axis, as exemplified by modernisation of the road (Via Baltica) and construction of the railway (Rail Baltica) to connect Warsaw with Tallinn, as well as these routes' proposed undersea extension to Helsinki. Such a shift, particularly manifest in the southern duo of Latvia and Lithuania, logically provided a stepping stone for the whole trio's attention to the High North. The impact of the global financial crisis highlighted the need to forge better relations with the world's second largest economic superpower China, that survived the crisis without experiencing recession. This chapter thus aims to analyse the Baltic trio's evolving perspective on China with particular emphasis on connectivity. It argues that throughout most of the 2010s the Baltic approach in this regard could be described as cautiously enthusiastic. However, the lack of expected economic breakthroughs in the relationship, including those related to connectivity, as well as China's own increasing international assertiveness, not excluding the Baltic states, has caused a widening political, economic and diplomatic disconnect between the two parties that makes cooperation in logistics, high-tech or, indeed, Arctic matters, hard to achieve.

Before getting to the actual case study, it is imperative to highlight an important perceptual difference on the High North among the three Baltic states which has a lot to do with their geography – in general the more northward one is located, the more natural and self-ascribed "Arctic" features there are. These variations between Estonians and their two Baltic-proper neighbours are also significant as far as Arctic connectivity is concerned – contrary to the former, both Latvian⁴ and Lithuanian⁵ scholars acknowledged that the opening of navigation in the High North would constitute as much of a challenge as an opportunity for their countries' critical transport and logistics sectors due to competitive pressure on the national railways

⁴ Vargulis, 2014, p. 196.

⁵ Jurkynas, 2014, p. 192.

and seaports that are traditionally oriented horizontally, i.e. along the eastern-western axis. With the proclamation of the so-called Digital and Polar Silk Roads, China has increasingly become a major factor in the trio's deliberations of comprehensive connectivity beyond land-based Eurasian transportation. As it will be shown below, all of the Baltic states experienced a similar transformation of their perspective on the issue in question, although Estonia and Lithuania clearly stood out.

CAUTIOUS ENTHUSIASM FOR SINO-BALTIC CONNECTIVITY BEFORE 2019

For the initial roughly two decades since the establishment of official diplomatic relations between the Baltic states and the People's Republic of China, there had been no major breakthroughs in either of the bilateral interactions, despite the outgoing president Jiang Zemin's brief visit to all of the three respective capitals in mid-2002. The trio's persistently unenthusiastic popular and elite attitudes towards China began to shift as the Baltic states increasingly felt Russia's economic pressure through its market access restrictions and were struck by the global financial crisis, forcing them, as a result, to seriously contemplate about novel alternatives for their exports and inbound investments.

A more fertile ground for the Sino-Baltic relationship had thus already been prepared when the trio was invited to participate in the then 16+1 format of Cooperation between China and Central and Eastern European Countries (PRC+CEEC, recently expanded to 17+1)⁶ back in 2012. Much less enthusiastic about the prospects for massive Chinese investments than their partners in Central Europe or the Balkans, and somewhat puzzled by the actual inclusion into

⁶ With the curious 2019 accession of Greece that has no clear-cut association with either the communist past or the "region" in question.

such a group of countries to begin with,⁷ the Baltic states accepted the offer mainly to "wait and see", since even the slightest economic opportunities brought by such a decision seemed to clearly outweigh the costs back then.

China's subsequent proclamation of the One Belt One Road megaproject of trans-Eurasian connectivity in 2012 (later renamed the Belt and Road Initiative, BRI) and initiation of the Asian Infrastructure Investment Bank (AIIB) in 2015 further raised the trio's attention to the opportunities offered by cooperation in logistics and transportation sectors that the Chinese had cautiously promoted even before the global financial crisis. A more regularised string of their delegations that expressed an investment interest in the Baltic states' seaports and both of the region's principal more (*Rail Baltica*) or less (Tallinn-Helsinki, or Talsinki, tunnel) common connectivity projects sustained the suspense. Notably, from Beijing's perspective both of the latter projects have a clear Arctic dimension as possible extensions of its so-called "Polar Silk Road" that would potentially reduce the transit time between Europe and Asia by largely using the Northern Shipping Route, most of which is under effective Russian control.

It is imperative to notice that the rise of China's unprecedented attention to both post-socialist Europe and the Arctic largely coincided, ¹⁰ and thus can arguably be interpreted as two manifestations of a single but complex process, namely the self-acquired identity of a global power with commensurate interests. Nevertheless, throughout most of the last decade, Beijing's own actions were somewhat contradictory as far as the Arctic component of the Sino-Baltic connectivity was concerned. Indeed, China's decision to actually group the trio

⁷ Considering their shared willingness to escape any association with the communist past.

⁸ Kurm, 2005.

⁹ Jüris. 2019.

This was showcased by the fact that the initiation of the then 16+1 format took place several months before the first Chinese ice-breaker, the Ukraine-built Xue Long ("Snow Dragon"), successfully crossed the Arctic through the Northern Shipping Route to Europe.

with central and south-eastern parts of the continent clearly indicated its priorities as well as economic and political perceptions, since the High North was not seen by Beijing as a matter to discuss with anyone in Europe beyond the Nordic states. Tellingly, none of the so-called Guidelines, the defining joint document of the 17+1 format, mentioned the Arctic.

Except for the Talsinki tunnel, no other Baltic project of interest to Beijing had a clear High-Northern dimension. Although both cases of major (multi-million euros worth) and most discussed Chinese direct investment into the region thus far, namely the 2017 proclamation of a strategic partnership between Didi Chuxing and the ridesharing unicorn Taxify/Bolt and the 2018 acquisition of the Magnetic MRO aviation maintenance company by the Guangzhou Hangxin Aviation Technology,11 occurred in Estonia and were related to the transportation sector, neither of them seemed to do much with the Arctic. It is notable, however, that among other services, 12 the Magnetic MRO maintains line stations at Ørland airport in Norway, which also hosts a NATO air base located some 300 km south of the Arctic circle, as well as in Tallinn and Riga, Estonia's and Latvia's main aerial entry points and main backup airports for both countries' only air bases, Ämari and Lielvārde, respectively. Lithuania's case was somewhat different in this regard, as the Šiauliai air base attracted the attention of local aviation maintenance company Avia Solutions Group, that became controversial within the country's political and intelligence community due to its previous operations in Russia and current ones in China.¹³ As a result, the company was banned from settling itself in Šiauliai¹⁴ and expanding in Vilnius¹⁵ airports in 2015 and 2021, respectively.

¹¹ Karásková et al., 2020, p. 46.

¹² Magnetic MRO, n.d.

¹³ Avia Solutions Group, 2020.

¹⁴ BNS, 2015.

¹⁵ Ibid., 2021f.

Actually, it was Latvia and Lithuania that perhaps even more emphasised transportation connectivity as a priority area in their relationship with China. Geographically centremost Riga not only remains the only regional capital to have hosted the 16/17+1 platform's summit meeting in 2016, attracting the sole Chinese prime ministerial visit to the Baltics thus far, but also succeeded the right to host the format's first "permanent institution" in the trio, namely the CEEC-China Secretariat on Logistics Cooperation. Despite the expectations associated with these alleged breakthroughs, Riga's bid for direct flights to China has failed to materialise thus far, as even aside of the pandemic it would be hard to imagine commercial viability, especially the balance between cost and demand, of such a route to begin with.

Meanwhile, Lithuanian Railways and the Klaipėda seaport increasingly served as a conduit for the China-Belarus Industrial Park expanding on the outskirts of Minsk. Lithuania's self-presentation as a transit hub at the centre of Europe proved to be successful enough to secure a steady growth of items sent from China throughout the 2010s, almost reaching staggering two thirds of all incoming parcels handled by the state-owned Lithuanian Post immediately before the COVID-19 pandemic. Since previously around 90% of international shipments arrived to the country by airmail, the quarantine-related slowdown of such traffic called for long-awaited alternatives by the Lithuanian transit sector. As a result, the first ever Europe-bound entirely postal Chinese train arrived to Vilnius from Chongqing megacity in mid-April 2020. Out of its 42 containers shipped for more than 10,000 km, only two were intended for Lithuanian

¹⁶ In reality, however, the Secretariat does not amount to much, except for its official website: http://www.ceec-china-logistics.org/en/.

¹⁷ LSM, 2018.

¹⁸ Lietuvos paštas, 2020.

¹⁹ Delfi, 2020.

customers, while the rest were destined to go further to other European countries,²⁰ thus contributing to Vilnius' then cherished goal of becoming China's logistical gateway to the continent for this type of transit and monetising much of the process itself.²¹ Although there were no further reports of these entirely postal trains, logistical cooperation in the rail sector had already become an important feature of the relationship, as the Lithuanian Railways carried 130 freight trains from China in 2018.²²

However, Lithuania's own change of heart will have a further negative impact on the postal logistics from China. Its parliament's late 2020 decision to get rid of a tax exemption for low-value shipments from outside the EU should surely check the rapid growth of Chinese e-commerce platforms in general and AliExpress in particular within the country's small but fairly digitalised market, when it comes into force in mid-2021. Notably, however, this legal initiative was not related to China per se, but merely reflected the realisation that competing Lithuanian companies had been losing too much in their earnings – about 1% of their total retail turnover – as a result of such practices by their own country's consumers.²³ Brussels' impending ruling to implement such a policy union-wide is expected to further damage Lithuania's barely-achieved position in this increasingly important sector due to its would-be impact on a huge number of such parcels transiting through the country, instead of being destined to it.

Since substantial revenues for both the Lithuanian Railways and the Klaipėda seaport have been generated by the transit fees for cargos

²⁰ Lithuanian Railways, 2020.

²¹ Lietuvos paštas, 2019.

²² Lithuanian Railways, 2018, p. 2.

²³ LRT, 2020.

coming from Belarus,24 Alexander Lukashenko's decision to reroute them to Russian ports in response to Vilnius' principled stance throughout the ongoing political crisis and apparent pressure from Moscow, is expected to have serious repercussions for the potentially significant Chinese component of this economic arrangement²⁵ as well. Thus, geopolitical trials and tribulations beyond Beijing's control could delay or otherwise negatively affect its connectivity plans through the Baltic states, similarly to unforeseen consequences generated by the 2013-14 Ukrainian crisis. Indeed, without Belarusian willingness and Ukrainian ability to serve as terrestrial conduits for Chinese goods to the Baltic states' ports, the land-based part of the New Silk Road would lose much of its economic and strategic rationale for the trio. Tellingly, even aside of Lithuania's growing security concerns over China's interest in the expansion of its only seaport (see below), the government faced serious pressure from environmental groups and decided to postpone these plans for at least a decade.²⁶

Lithuania's gateway narrative has not been limited to transportation connectivity and international e-commerce, but also includes financial technology (fintech). In mid-2019 co-founder and former executive chairman of Alibaba Group, Jack Ma, visited Vilnius. He is considered to be the global ambassador for Chinese businesses in general and free trade zones of e-commerce in particular, but has recently fallen from grace, when the Chinese government intervened

²⁴ In 2019, Klaipėda's seaport handled more than 14 million tons of Belarusian cargo, mostly mineral fertilizers and oil products, making almost a third (30%) of its total handling volume worth 46.3 million euros (see Delfi, 2020). In 2020, this figure actually went up a bit with only fertilizer amounting to some 11.8 million tons. Out of nearly 60 million tons carried by the Lithuanian Railways (LTG Cargo) in 2020, 19 million were Belarusian shipments (see Jegelevicius, 2021).

²⁵ Most of Belarusian exports to China is composed of specifically mineral fertilizers (see Trading Economics, 2019) long shipped through Klaipėda, and both the seaport and the Lithuanian Railways were also seen as would-be conduits for the developing Sino-Belarusian industrial park on the outskirts of Minsk (see Great Stone Industrial Park).

²⁶ LRT, 2021.

with Ant Group's IPO to better manage the fintech sector.²⁷ Lithuania was able to attract Chinese fintech companies thanks to the clear-cut expression of such ambitions in 2018 by important Lithuanian politicians, including the country's president, Dalia Grybauskaitė.²⁸ Before the pandemic nine Chinese capital fintech companies had been licenced to operate in Lithuania, and thus the EU as well.²⁹ Although none of them were from China's top list in this booming sector, their common decision to choose Lithuania for operations or even European headquarters³⁰ was nevertheless important as it contributed to the country's self-promotion of the gateway for Asian fintech. On the other hand, these developments attracted the attention of Lithuanian intelligence agencies and after learning about would-be screening procedures some potential fintech investors from unnamed third countries immediately abandoned their plans.³¹

In general, none of the Baltic states has become a member of the Beijing-based AIIB, and both Lithuania and Estonia were among the last European members of the 17+1³² format to sign a memorandum of understanding on jointly building the BRI in 2017. Despite the relatively new option of the "Polar Silk Road", two other conceptual upgrades of the BRI became more tangible in the region. Indeed,

²⁷ His falling from grace in autumn 2020 is itself indicative of Xi Jinping's continuing personalisation of China's political system as well as the rise of techno-nationalist priorities and re-newed emphasis on control in its economic system. As of the time of this writing, Jack Ma remains shut out from the Chinese public sphere (see more on this in Peach, 2021).

²⁸ Grybauskaitė, 2018.

²⁹ Ministry of Finance of the Republic of Lithuania, 2019.

³⁰ As of the time of this writing, one has to highlight the following local branches or entirely new companies still offering e-payment and digital banking services that were established in Lithuania with the help of the Chinese commercial entities (usually legally settled in Hong Kong): IBS (https://www.ibsettle.com/), DSBC Financial (https://www.dsbcf.com/), Glocash (https://www.glocash.com/), PanPay (https://www.panpay.com/en/), Seven Seas Finance (https://sevenseasfinance.com/), Paytend (https://www.paytend.com/), CBI Money (https://cbimoney.com/).

³¹ State Security Department of the Republic of Lithuania and Second Investigation Department under the Ministry of National Defence, 2020.

³² Along with Slovenia, Greece signed a similar document in 2018, a year prior to joining the framework in question.

the "Digital Silk Road" has been associated with the Chinese fintech expansion to Lithuania and Huawei's role in the development of the whole trio's 5G infrastructure, while the "Health Silk Road" narrative intertwined with Beijing's comparatively minor "mask diplomacy" in the Baltics during the first wave of the pandemic. As it will be shown below, neither of these initiatives reversed the continuing slide of the Sino-Baltic relationships downwards that began roughly in 2019 and had a lot to do with connectivity and spheres closely related to it, particularly digital surveillance.

THE WIDENING SINO-BALTIC DISCONNECT

Throughout the initial quarter century since the establishment of official diplomatic relations, China had gradually been promoted as an opportunity and largely ignored as a potential threat by important segments of the Baltic trio's political and economic elites, even despite Beijing's occasional usage of economic statecraft to "punish" some of them for such "offences" as meetings with the visiting Dalai Lama.³³ The stepping stone for the latter shift was arguably provided by a rather expected development, namely the deepening Sino-Russian security relationship, that was highlighted in mid-2017 by their first joint naval drills in the Baltic Sea. Although the first-ever Chinese flotilla to appear there was relatively small, the message behind this endeavour³⁴ was definitely taken seriously in all of the other littoral countries, including the Baltic states. Subsequent developments on the global level of international politics and in the trio's own neighbourhood, particularly the Sino-American trade war initiated in early 2018, the largely coinciding rise of China's so-called "wolf warrior diplomacy" across the Western world, and the US-led backlash against Huawei, a Chinese national champion that also got

³³ Roonemaa, Eesmaa & Liepiņa, 2019.

³⁴ However, none of the directly participating ships from either side had Arctic focus or experience.

implicated in spying allegations against Poland in early 2019,³⁵ further enforced the changing perceptions of the Balts.

It was against this background that the Baltic states began to slowly reconsider their relationships with China, and the multi-dimensional topic of connectivity was soon affected by these developments. To begin with, Lithuania's parliament definitely took account of China's decade-long attention to Klaipėda's seaport³⁶ and the region-wide Rail Baltica project when it decided to adopt an updated version of the original 2002 Law on the Protection of Objects of Importance to Ensuring National Security in early 2018, further strengthening one of the most powerful foreign investment screening mechanisms in Europe as a result. A year later, Lithuanian intelligence bodies for the first time in the Baltics plainly identified China's espionage activities as a threat to the country's national security, adding it to the two usual suspects of Russia and Belarus.³⁷ Notably ignoring the expected Chinese outrage, subsequent Estonian³⁸ and Latvian³⁹ assessments essentially confirmed the Lithuanian position.

As if to validate concerns about China's increasingly assertive approach towards the trio, an unprecedented diplomatic scandal broke out in Lithuania in August 2019, when an independent event marking the 30th anniversary of the Baltic Way, i.e. one of the world's largest ever peaceful political demonstrations and a key event in the trio's liberation story, but also voicing the support for the simultaneously conducted "Hong Kong Way," was obstructed by a pro-Beijing group in the heart of Vilnius. Not only was it the first time that a pro-Beijing counter-protest took place in the Baltic public space,

³⁵ Plucinska, Qing, Ptak & Stecklow, 2019.

³⁶ Klaipėdos uostas, 2009.

³⁷ State Security Department of the Republic of Lithuania and Second Investigation Department under the Ministry of National Defence, 2019.

³⁸ Estonian Foreign Intelligence Service, 2019.

³⁹ Latvian State Security Service, 2019.

but protesters' ranks also included members of the Chinese diplomatic staff with the ambassador observing the commotion from the sidelines. Subsequent analysis of this by far the most clear-cut manifestation of the "wolf warrior diplomacy" in the region revealed a major role of organising the Chinese diaspora to participate in counter-protests in support of Beijing's policies that fit the description of recent "united front work" activities from Finland and Sweden. Notably, the protests in the heart of Vilnius happened less than three months after a low-profile visit to Vilnius by You Quan, the Head of the United Front Work Department of the Chinese Communist Party. The diplomatic scandal was arguably one of the reasons why despite Lithuania's pledge to set up a Fintech Coordination Centre for the increasingly controversial 17+1 initiative, a mere "network of fintech coordinators" was actually founded during the format's Vilnius High Level Fintech Forum in November 2019.

Besides the intelligence agencies, intensifying Chinese influence activities in the Baltics increasingly attracted attention of the local media.⁴³ Concerns about China's recruitment of Baltic nationals for spying purposes have been increasingly voiced since at least 2019, to finally be validated when the news about the first such case broke out in March 2021. According to the publicly available and naturally scant information, a renowned Estonian marine scientist with Estonia's and NATO's security clearance was sentenced to three years' imprisonment for conducting intelligence activities against his country on behalf of China.⁴⁴ Notably, much of the culprit's research revolved around Arctic matters, such as navigation through sea ice,⁴⁵

⁴⁰ Jüris, 2020a.

⁴¹ Andrijauskas, 2020, pp. 13–17.

⁴² Ministry of Finance of the Republic of Lithuania, 2019.

⁴³ Roonemaa, Eesmaa & Liepiņa, 2019.

⁴⁴ BNS, 2021e.

⁴⁵ Estonian Research Information System, n.d.

i.e. crucial knowledge for any country that seriously contemplates penetration of the polar regions.

Perhaps no other Sino-Baltic issue of growing concern for the latter is related to connectivity more than physical infrastructure, and both Estonia and Lithuania have become increasingly vocal about it. Since 2019, their intelligence agencies and think tanks have been warning about the threats emanating from the use of China's high-tech hardware and software⁴⁶ and granting it access to their critical infrastructure in general, and the region's major transportation development projects in particular. For instance, Chinese participation in the Talsinki project has been justifiably criticised for unreliable nature of its supposed investor⁴⁷ and all of the principal security risks derived from Beijing's participation in such massive and quintessentially dual-use endeavours in general, ranging from the rise of its political influence and technological dependence on it to indebtedness and potential loss of the object's operational control.⁴⁸ Similar concerns were voiced about China's potential participation in the Rail Baltica project.49

It is no wonder then that northernmost Estonia's expected interest in the connectivity options offered by the Chinese proclamation of the "Polar Silk Road" and its possible extensions to and through Finland, namely the Arctic Railway linking Norwegian Kirkenes with the Finnish rail network and the Arctic Connect project⁵⁰ of laying undersea cables along the Northern Shipping Route, has not amounted to anything more substantial thus far, and those plans in any case remain in the blueprints. On the other hand, the trio's coinciding volte-face in the area of digital connectivity was most clearly

⁴⁶ Estonian Foreign Intelligence Service, 2019, pp. 59–60.

⁴⁷ Ibid., 2020, p. 76.

⁴⁸ Jüris, 2019.

⁴⁹ Estonian Internal Security Service, 2021, p. 55.

⁵⁰ Jüris, 2020b.

enshrined with Tallinn's landmark October 2019 decision to issue a joint declaration with the US to strengthen cooperation on 5G security and development, in effect restricting the use of Chinese mobile technology. Both Riga and Vilnius followed suit in February and September 2020, respectively. Meanwhile, Estonia passed a set of amendments for telecom security reviews or the so-called "Huawei law".⁵¹

The ongoing pandemic has also affected the trio's connectivity with China, as negative developments continued to supersede the positive ones thus far. Despite the logical focus on the Sino-Baltic supply chain in order to secure personal protection equipment during the first wave of the pandemic, the effect of Chinese "mask diplomacy" in the region proved to be rather limited, as the vast majority of deliveries were commercially acquired from, instead of donated by, Beijing, and remained controversial due to often undisclosed prices, questionable quality, and even Russian propaganda involvement.⁵² As happened elsewhere in the Western world, the image of China further suffered as its diplomats to the region increasingly questioned the virus' Chinese origins. Tellingly, according to a representative study of Lithuanian societal perceptions of international politics and threats published in mid-2020,53 only a fifth of respondents agreed that Chinese medical equipment sent to Europe was a benevolent aid without political goals attached to it (32% disagreed and 38% remained undecided on the matter).54

Corresponding perceptions of the region's political elites changed even more remarkably, with Lithuania providing by far the most telling example. In mid-2020 one of the country's most widespread

⁵¹ Guzdar & Jermalavičius, 2020, p. 3.

⁵² Andrijauskas, 2021, pp. 12–14.

⁵³ Kojala, 2020, pp. 37-39.

⁵⁴ Though, admittedly, a third of respondents called China a friendly country to Lithuania (26% saw it as an unfriendly one and 40% were undecided).

digital media outlets published an opinion piece⁵⁵ that resolutely condemned Beijing's recent decision to apply national security legislation in Hong Kong and depicted it as part of China's assertive turn in domestic and foreign policies, which calls Lithuania to decidedly choose between liberal democratic allies and a "totalitarian and predatory Chinese communist regime." Among other more usual critiques towards Beijing, such as suppression of human rights and the "divide and rule" character of the 17+1 format, the article targeted issues related to connectivity, namely "total surveillance initiatives" within China and the BRI that allegedly attempted to "increase its economic and political control" of other countries.

This piece could perhaps have been seen as relatively unimportant personal opinion, but it was co-authored by two prominent members of one of the country's two largest political parties that would later win the general elections, and one of its authors, the party's leader Gabrielius Landsbergis, would become Lithuania's next foreign minister, while the other, Mantas Adomėnas, would serve as his deputy. It is no wonder then that the five-fold action plan for the review of the relationship with China presented in the article provided a blueprint for the new government's foreign policy. The original piece highlighted the following policy shifts: de facto withdrawal from the 17+1 format thus addressing a long-held EU and US concern; strengthening of relations with Taiwan; striving for a united principled position vis-à-vis Beijing within the EU and NATO; refusal to cooperate with all Chinese companies involved in surveillance, espionage and human rights abuses; and an offer of immediate refuge to the persecuted Hongkongese.

The whole Baltic trio's perceptual shift on the general relationship with China became widely acknowledged during the delayed 17+1 summit online meeting in February 2021 which none of them

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⁵⁵ Adomėnas & Landsbergis, 2020.

attended in presidential or prime ministerial capacities, despite the fact it was personally hosted by Xi Jinping. Lithuania's participation there illustrated the priorities of its new government, as the country was represented by the Minister of Transport and Communications, the lowest rank of all of the attendees. Only a week after the summit meeting, the Lithuanian government decided to bar China's statecontrolled Nuctech company from supplying X-ray scanning equipment to the country's airports over national security concerns,⁵⁶ particularly its alleged surveillance functions at border crossings and other sensitive gateways.⁵⁷ In early April, the Lithuanian government indicated that Klaipėda's deepwater port project, long of interest to the Chinese, will be postponed for at "least a decade",58 and in late May, the country's parliament passed the expected amendments that prohibit "unreliable" manufacturers and suppliers from participating in Lithuania's digital communications market, 59 thus following Estonia in this regard.

It is needless to stress that after such a multi-dimensional snub it would be even harder to imagine any breakthroughs in areas of Sino-Baltic connectivity that previously looked at least theoretically possible if not practically promising, including those related to the Arctic. Despite the above-mentioned Chinese investments, there is a general acknowledgement in the trio that Beijing has failed to deliver on its economic promises, and that those could not in any case outweigh the related security risks. Under the current circumstances, when one of the Baltic states has already publicly withdrawn from the former 17+1 format⁶⁰ and the other two are apparently contemplating doing the same, one would increasingly struggle to find areas deemed safe for cooperation by both sides, with connectivity being a clear

⁵⁶ BNS. 2021a.

⁵⁷ Tatlow, 2021.

⁵⁸ BNS, 2021g.

⁵⁹ Ibid., 2021h.

⁶⁰ Lau, 2021.

example of, as opposed to an exception to, this trend. A surprisingly positive outcome of the Baltic exit for the relationship in question might be associated with the possible shift in Beijing's perspective that would acknowledge the trio's belonging to the developed Northern, as opposed to the post-Communist Eastern part of Europe, thus not only addressing their long-pursuit goal but perhaps also opening some new areas for mutual cooperation, including in terms of connectivity through the Arctic.

CONCLUSIONS

The evolution of a Baltic perspective on connectivity with China was characterised by two principal stages, although a clear-cut dividing line between them is hard to define outright. Roughly before 2019, the trio's perceptions of the Asian giant in general and mutual connectivity in particular were cautiously enthusiastic, as all of them attempted to highlight their strengths in logistics and/or high-tech to attract Chinese investment interest as well as cargo flows through bilateral and multilateral (17+1) means, and expressed the willingness to join the BRI. However, a series of events within the region and beyond immediately before, during and right after 2019 forced a major rethink of the Sino-Baltic relationship, causing a serious disconnect that seems to be widening further at the time of this writing. Since the promises behind Chinese connectivity projects have been unfulfilled in the Baltics, the trio's long-held reservations about the relationship and novel threat perceptions caused by the latest developments in Beijing's relationships with them and their allies on both sides of the Atlantic simply filled the void.

As the horizontal (east-west) axis of Eurasian terrestrial connectivity is increasingly deemed insecure by the Balts due to political instability and/or rising authoritarianism in neighbouring post-Soviet countries, even more emphasis is going to be given to the vertical

(north-south) option, thus naturally raising further the trio's awareness of the Arctic. Notably, despite continuing deliberations over the Talsinki project, the actual ongoing developments on the latter direction, such as Via Baltica and Rail Baltica, have increasingly been associated with the Three Seas Initiative that is supported by both the EU and the US as a thinly-veiled local alternative for Beijing's BRI megaproject and the reduced 16+1 format. As has been additionally showcased by the trio's withdrawal from a signature area of digital connectivity, the 5G, at least in the short to medium term deeper Sino-Baltic cooperation would only be possible in those areas that are not deemed sensitive by both the region and their crucial allies. The same is to be expected in the Arctic, if the trio would ever increase its role there, as Estonia seems most eager to do now.

RUSSIA, CHINA AND THE BALTIC CONNECTIVITY

Liudas Zdanavičius

Both Russia and, more recently, China play an important role in the development of connectivity in the Baltic states. It goes without saying that the importance of the Baltic states for Russia is traditionally much higher than for China, due to historical, geographical, and economic reasons. Russia often considers the Baltic states as its natural zone of interest, which traditionally is referred to as "near abroad" (rus. Ближнее зарубежье) – a term which also includes Commonwealth of Independent States (CIS) countries. In recent decades the Baltic states have achieved considerable progress in lowering their economic and energy dependence on Russia. Even so, Moscow tries to sustain its influence in the region, and demonstrate that it is the dominant actor, including through regular military power projection.

China's economic presence in the region has been growing. For Beijing the Baltic states are less important due to geographical distance, lack of natural resources, small markets, and the limited size of the high-tech sector. At the same time, the Baltic states matter for China as it seeks to broaden its economic presence in Europe. For example, the Baltic region could serve as an additional transportation link to the Western European markets. Furthermore, China is interested in selling its high-tech products in the Baltic states (including 5G). Similar to Russia, China sees this region in the framework of global political expansion and power struggle with the United States.

The aim of this chapter is to examine in detail Russian and Chinese activities in the field of connectivity in the Baltic states, including in the traditional transportation, energy and communication sectors, but also the high-tech and financial-technological sectors. The chapter analyses numerous cases and examples of both countries' presence in these sectors, and explores similarities and differences in their interests, approaches and tools. As a result of Russian and Chinese investments and activities, the Baltic countries face the serious challenge of how to balance possible economic opportunities with considerable risks to national security. The chapter therefore also analyses the security risks involved.

RUSSIA'S PRESENCE IN BALTIC CONNECTIVITY

Transportation

Russia tries simultaneously to achieve two overlapping and sometimes contradictory goals in order to safeguard its economic leverage in the Baltic states' transportation sector. On the one hand Moscow tries to rapidly develop its ports and other transportation infrastructure, for example in the Leningrad oblast and partly in the Kaliningrad region, in order to increase cargo flows. On the other hand, Russia is interested in maximum control of the transportation sector of the Baltic states, particularly the transit routes to/from Kaliningrad and the key ports. Such control could provide Russia with the tools to influence foreign and domestic policy of the target countries, weaken NATO's influence in the region, and provide competitive advantages for Russian business. Despite the fact that from the 1990s Moscow both at the official level and in its propaganda actively threatens to leave the Baltic states' ports without the transit flows, actual "progress" in this field was slower than promised.

From the 2000s Russia has successfully developed its port infrastructure in the Leningrad oblast (Saint Petersburg, Ust Luga, Primorsk, and Vysotsk ports). The biggest share of goods went to Ust Luga port. Its cargo turnover between 2010 and 2020 increased from 11.8 to 102.6 million tons. The biggest impact of these ports at the beginning was felt by Estonia, but from 2018–19 Latvian ports and rail transportation also began to suffer. Latvian railways and ports were particularly hard hit by the withdrawal of Russian goods in 2020. Latvian railways cargo turnover in 2020 dropped by 41.9% to 24.1 million tons.1 Lithuania's Klaipėda port was minimally impacted by the Russian cargo reorientation in the 2010s, because it had already suffered from such a withdrawal in the 2000s. Klaipėda's turnover in 2020 increased by 53% compared to 2010,2 with currently its main foreign client being Belarus. The share of Belarusian goods in the Klaipėda port in 2020 was 32%.3 The total income of the Lithuanian state budget from the Belarusian goods transit is estimated at 155 million euros (1.4% of the total income).4 The share of Belarusian fertilisers in the state-owned company "Lithuanian Railways" cargo turnover amounted to around 16.1% (61 million euros).5 Russia is constantly pressuring Belarus to reorient its goods, which are currently mostly exported through Klaipėda port, and partly Latvian ports, to Russian ports. In 2017-18 it introduced considerable discounts on rail tariffs (up to 50%) for oil products, which were later extended to 2025,6 but this did not lead to the desired outcome.

After the political crisis caused by manipulated presidential elections in Belarus in August 2020, the situation began to change to Russia's advantage, which used the momentum and increased its pressure

¹ Delfi, 2021.

² Sinkevičius, 2011.

³ Matutis, 2021.

⁴ Butkus, 2020.

⁵ Mykolaitytė, 2021.

⁶ Belta, 2018.

on Belarus. In February 2020 Belarus began to divert its oil product exports from Klaipėda to Russian ports. That year its oil products constituted 3.1% of Klaipėda's cargo turnover and 2.4% of the Lithuanian Railways cargo turnover.⁷ Russia is also trying to divert fertiliser exports from Klaipėda port, and is planning to build terminals for Belarusian fertilisers in the Leningrad oblast. Furthermore, Russia also seeks to acquire control of the rail transit from/to the Kaliningrad region by signing special agreements with Lithuania on the transit regime without border and custom checks, which is known as the Fast Speed Rail Link project.

The EU economic sanctions imposed on Belarus which were introduced in June 2021,8 will definitely strengthen Russia positions in transferring Belarusian goods to its ports. On the other hand, current sanctions only partially affect fertilisers and the flow of other main transit goods (the annual impact of the sanctions on the Lithuanian Railways income stands at 5% of the annual turnover),9 but possible strengthening of the sanctions in the future could leave Belarus without any options but to transfer all flows to Russian railways and ports.

Russia tries to increase its influence through business entities. For example, in the beginning of the 2000s Moscow proposed the so-called 2K project, i.e. Kaliningrad-Klaipėda ports coordinated cooperation. Russian companies MTK, Medial Trans, and others with links to the former head of Russian Railways, Vladimir Yakunin, and the Lithuanian natural gas intermediary Dujotekana, were planning to become the main operators of a joint Lithuanian-Russian transit company, which would control transit to both Kaliningrad and Klaipėda ports. Currently the Lithuanian-Latvian company LGC Cargo, with clear links to Russia, tries to enter transit to/from the

⁷ BNS. 2021b.

⁸ Council of the European Union, 2021a.

⁹ Deveikis, 2021.

Kaliningrad region through the Lithuanian market.¹⁰ Because of the sensitivity of this sector to national security, the Lithuanian Railways cargo code, amended by the Parliament in 2006, states that cargo freight on this transit corridor can only be transported by Lithuanian state-owned companies.¹¹

Technology

Traditionally Russia has not been a very active investor in the technology sector of the Baltic states, and its presence has been partly restricted by its limited achievements in the development of new technologies, with some notable exceptions in the field of ICT. Even so, the fields of transport technology and software provide examples of exceptions to this general observation.

During 2016–18 a scandal relating to the use of the Russian Klub-U automatic train control system surfaced in Lithuania. In 2005 this system was already installed in all trains of the state-owned company Lithuania Railways. The National Security and Defence Committee of the Lithuanian Parliament in its investigation found that the system was provided by the Russian company Iževskij Radiozavod, which has close links with the Russian defence industry.¹² This

This company is connected to Latvian oligarchs A. Schlesers and A. Skele, who have close links with Russian companies, including Russian Railways, through its main shareholder Baltijas Tranzīta Serviss. Another shareholder of this company, Baltloco, is owned by S. Gretchuk, who was the head of THMB (currently Railvec), which represented the Russian company Transmashholding. Other shareholders in this company include the former head of Lithuanian Railways, S. Dailydka, who left his post in 2016, one of the unofficial reasons being non-transparent procurements of Russian equipment, including from Transmashholding. LGC Cargo officially states that it plans to transport goods to Lithuania, or through Lithuania to Poland, including a route through Kaliningrad, which technically would mean that it is not transit. Lithuanian authorities are not following this logic and are not allowing LGC Cargo to operate such international routes. LGC Cargo is actively appealing this decision in the Lithuanian courts, applying to the European Commission, and trying to use other legal measures, thus far unsuccessfully. Laurinavičius, 2020; Makaraitytė & Maglov, 2019; Lapienytė, 2016.

¹¹ Seimas, 2004.

¹² In 2018 "Lithuania Railways" declared that "Klub-U" system will be fully removed; Seimas, 2018; BNS, 2018.

creates serious security risks: increased Russian surveillance capabilities, including tracking of train locations through satellite connections; dependence on Russian know-how (Russian specialists installed the system); and leverage over strategic infrastructure, as the system allows remote control of the trains. The use of such a system is clearly incompatible with NATO standards, because it creates a lot of vulnerabilities for the Russian side to exploit both in peace time and during military conflict. Another problematic acquisition was the purchase of the URAL radar, which was acquired by the Lithuanian state company Oro Navigacija, responsible for air traffic control. As a further example of security risks relating to Russian hardware, the Latvian domestic security agency VDD in its annual report described the interest of the Russian side to install and gather information from CCTV cameras in Latvian territory under the framework of the cross-border cooperation programmes.¹³

Russia tends to subsidise its software products, despite the fact that they are produced by private companies, in order to stimulate their use both by government institutions and the general population. In 2020 the Russian company Kaspersky Labs invested in the considerable PR programme in the Baltic states media. In 2017 the Lithuanian government decided to replace Kaspersky computer security software with other options, because of the potential security vulnerabilities. ¹⁴ The Estonian Information Systems Authority has also recommended institutions and companies to assess security risks associated with the use of Kaspersky products. Kaspersky is not the sole potential source of security problems. ¹⁵ In 2018 the Lithuanian National Cyber Security Centre reported serious vulnerabilities of the ride-hailing Yandex Taxi software, which could allow the Russian side to collect an extensive range of sensitive information about Lithuanian citizens and send it to Russia. ¹⁶

¹³ Leta. 2020.

¹⁴ Ministry of national defence republic of Lithuania, 2017.

¹⁵ Denisa-Liepniece, 2020.

 $^{^{\}rm 16}$ National Cyber Security Centre at the Ministry of National Defence, 2018.

In the field of financial technology (fintech), the biggest player in the Lithuanian market is Revolut, founded by an emigrant from Russia in the UK, which received a banking licence in Lithuania.¹⁷ Lithuanian intelligence agencies in their annual threat assessment report in 2018 stated about the general outlook of the sector: "These possibilities attracted attention of investment companies from third countries, the companies providing various financial services and financial technology-based systems ("fintech"). Some of them did not meet the national security interests due to the origin of their capital funds, their activities, and links to states hostile to Lithuania".¹⁸

CHINA'S PRESENCE IN BALTIC CONNECTIVITY

Transportation

Chinese interests in the Baltic states' transportation sector resemble those of Russia. Furthermore, Russia's economic pressure on Baltic ports, including the withdrawal of Russian and Belarusian goods, is beneficial to China because it lowers competition for existing infrastructure, and strengthens the motivation of the Baltic countries to diversify cargo flows from China. For Moscow, on the other hand, China's arrival is more complex: more Chinese goods in the Baltic states means more transit fees, but also more competition for Russian ports. The main China-EU rail routes viable for the Baltic states go through Russia, thus providing Russia with additional leverage. It is doubtful that Russia would openly sabotage China's logistical schemes to pressure Baltic states, but this does not exclude covert manipulations from the Russian side, or even joint efforts by Russia and China.

¹⁷ LRT, 2020a.

¹⁸ State Security Department of the Republic of Lithuania & Second Investigation Department under the Ministry of National Defence, 2018.

The Baltic states have regarded the arrival of China in their transportation sector as a possibility to balance Russian influence. In the years 2008–2018 the Baltic states had considerable expectations to attract Chinese goods to their rail infrastructure and ports. It was seen as one of the ways to compensate declining Russian transit flows. This notion was reinforced by Beijing's promises of investment and cargo flows in the Belt and Road Initiative (BRI) context. All three Baltic states participated in the 17+1 format. Initial expectations, however, were gradually replaced by the acknowledgment that the benefits of cooperation with China are very limited or even disappointing. In May 2021, Lithuania officially confirmed its withdrawal from the 17+1 format.

Despite rapidly growing cargo flows on the China-EU rail route the actual share of the Baltic states in China-EU transit is still insignificant, while more than 90% of this flow goes through Belarus and Poland. Until 2014 China was planning to organise a main rail freight route through Ukraine, but because of the Russian aggression in Ukraine these plans were halted. A remaining option for the Baltic states in this context has been deliveries to the Nordic countries and serving as a backup route for the occasionally overloaded Polish transit infrastructure. However, Poland is rapidly developing its transit capabilities to enable it to process Chinese and other goods more efficiently.²⁰

Russian Railways reported that in 2020 they had transported 592,000 TEU²¹ of transit goods on the China-EU-China route (54.2% more than in 2019).²² Out of this flow 55,3 thousand TEU were transported

¹⁹ One of the summits in this format in 2016 was held in Riga. During this event CEEC-China Secretariat on Logistic Cooperation was opened under the auspices of Latvian ministry of transportation in Riga, http://www.ceec-china-logistics.org/en/

²⁰ The Cargotor company, a subsidiary of PKP Cargo, plans to invest 870 million euros in the expansion of the logistical capabilities of the Malaszewicze transit hub, see Madrjas, 2021.

²¹ TEU - Twenty-foot equivalent unit. Maximum weight of such container is up to 21 tonnes (depending of the goods transported).

²² ERAI. 2021.

to or through Lithuania (amounts which were transported to or through Latvia or Estonia were minimal). This is a fivefold increase compared to 2019 (630 trains vs 130).23 Even so, the importance of such transit flows is limited. For example, the approximate turnover of Chinese goods in 2020 in Lithuania was around 1 million tonnes (converted from TEU), when the total cargo turnover in 2019 of the Lithuanian Railways company had been 55.2 million tonnes.²⁴ It is important to note that most of the rail transit on the China-EU route was attracted to the Baltic states (mostly Lithuania) only because Russia is actively developing a transit freight hub for Chinese goods in the Kaliningrad region. The hub started to operate in late 2019 and generates considerable cargo turnover not only for Russia, but also for the Lithuanian Railways. Out of the already mentioned 55.3 million TEU Chinese goods in Lithuanian Railways in 2020, 47,5 thousand TEU (86.5%) went to the Kaliningrad region. Compared to 2019 the total transit of the China-EU rail goods through the Kaliningrad region in 2020 increased by 4.6 times.²⁵

While most goods are still transported through sea routes, in recent years there has been a considerable expansion of the rail share. The COVID-19 pandemic at least temporarily increased the attractiveness of rail transit, as sea transportation became more expensive and time-consuming. Another factor which has increased rail cargo flows on the China-EU-China route was high subsidies for such transportation²⁶ provided by the governments of the Chinese provinces, amounting to an annual total of up to USD 300 million, or up to USD 3,000–3,500 per container. The Chinese government has declared that it will phase out those subsidies by 2022.²⁷ It is as yet unclear whether

²³ Miknevičius. 2021.

²⁴ Lithuanian Railways, 2021a.

^{25 29.1} thousands TEU were sent through the Kaliningrad ports to the Nordic and Western European countries, 18,4 thousands passed over the land route to Poland, see RZD-Partner, 2021

²⁶ Jakóbowski, Popławski & Kaczmarski, 2018.

²⁷ Leijen, 2019.

the current rail cargo turnover is sustainable when sea transportation costs return to a normal level and China will phase out its subsidies.

Another important aspect of cooperation with China are the aims of the Baltic countries state-owned postal companies to become distribution hubs for imported Chinese goods directed to European countries, including Russia:

- Latvijas Pasts of Latvia from 2017 actively cooperates with the Alibaba group, becoming one of the important distribution hubs in the region. Goods are delivered by cargo aircrafts: in 2017 Latvijas Pasts accepted 13 postal transit cargo aircraft from China.²⁸
- The Lithuanian Lietuvos Paštas in 2019 signed a cooperation agreement with China Post to become the postal distribution hub for Chinese goods transported by direct rail connection. The first postal train arrived in Vilnius from Chongqing in spring 2020. The goods from this train were distributed by the Lietuvos Paštas to 30 European countries. Until the end of July 2020 Lithuania received 33 such postal trains.²⁹
- In 2015 the Estonian post, working under the Omniva brand, signed a cooperation agreement with one of the biggest Chinese logistical companies, S.F. Express.³⁰

Despite the comparatively lower importance of the routes through the Baltic countries, China actively tried to get involved in strategic port infrastructure in the region. In January 2007, the Port of Tallinn signed a memorandum of understanding with the Port of Ningbo, the second largest port in China and the fourth largest in the world, to launch container traffic between these two ports. In preparation for the cooperation, Muuga port facilities were expanded, with the total cost amounting to around 63.9 million euros. According to the initial plan the port expansion should have taken place in cooperation, but

²⁸ Delfi Bizness, 2020.

²⁹ Embassy of the People's Republic of China in the Republic of Lithuania, 2020.

³⁰ The Baltic Course, 2016.

the Chinese side lost interest due to the economic crisis.³¹ The hopes on the Estonian side for profitable cooperation did not materialise.

Beijing was particularly interested in the acquisition of the Klaipėda port. Such interest was visible in the 2000s, but became considerably more tangible in 2015–17.³² In 2018 Lithuanian media reported that the intelligence agency's State Security Department provided the Parliament with information about the negative security implications of possible Chinese investments in the Klaipėda port.³³ Lithuanian Defence Minister Karoblis was even more explicit, stating that a Chinese purchase of the port could allow Beijing to "create obstacles for the arrival of military cargoes, military equipment, [or] reinforcements" in a crisis. "Our position is very clear that it's a strategic infrastructure project", he said. "We can't afford to be dependent on China".³⁴

At the moment of writing, it is clear that, based on statements of Lithuanian political leaders, the question of possible Chinese involvement in Klaipėda port is closed.³⁵ Lithuanian intelligence agencies in their annual threat assessment in 2021 stated that China still demonstrates clear interest in investments to Klaipėda or other Baltic

³¹ Pao, 2011.

³² Main events include the following. In 2015 the Chinese state-owned China Merchant Group signed cooperation memoranda with Klaipėda port, Lithuanian Railways and Kaunas FEZ. Chinese companies (particularly China Merchant Group at different stages were interested in the acquisition of the control of big cargo terminals in Klaipėda port (Klaipėdos smeltė and Konteinerių krovos terminalas), and control of the currently state-owned port operator. China was also seen as a possible investor in the major port expansion project, including the construction of a deep-water port. The estimated cost of the project amounted 800 million euros.

³³ BNS. 2018.

³⁴ Gehrke, 2019.

³⁵ In 2019, the newly elected Lithuanian President G. Nauséda stated, "that Chinese investment into a deep-water port construction at Klaipéda can undermine national security", see BNS, 2019. Prime minister I. Šimonyte in 2020 demonstrated that she was sceptical of both the economic feasibility of the deep water port and Chinese presence in the port, see Blekaitis, 2020.

states' ports for the implementation of its logistical plans.³⁶ Several Baltic security experts share the view that China is less interested in the acquisition of control of Latvian ports because of the heavy presence of Russian interests and capital there, including close links of the Riga port operator company RTO with Russian partners such has the "Uralchem" fertiliser terminal, which possibly motivates China to avoid unnecessary competition.

Chinese companies have also tried to participate in the Rail Baltica project that connects the Baltic states with the European railway network. In addition, Chinese companies and state actors are interested in developing a transport corridor from the Northern Sea Route in the Arctic down to Berlin in the heart of Europe, potentially yielding influence through strategic infrastructure, including the Arctic Railway and the Talsinki tunnel projects.³⁷ Interestingly, there is a clear difference in Russia's and China's attitudes towards the Rail Baltica project. Russia is openly hostile to this project, and the Kremlin media constantly slash this project as "geopolitical" and "economically non feasible".³⁸

Recently some cargo flows have taken place through the Northern Sea Route and the Baltic ports. For example, in Autumn 2020, Belarusian fertiliser producer Belarusian Potash Company (Belaruskalij) used the Northern Sea Route for shipping two cargo vessels of potash fertilisers to China. The shipment was successful, because it shortened the delivery time by 1.5 times compared to the traditional sea route.³⁹ The Northern Sea Route could, therefore, potentially generate additional cargo flows for the Rail Baltica project. This could happen if the additional rail links were built from Russian/Norwegian ports

³⁶ State Security Department of the Republic of Lithuania & Defence Intelligence and Security Service under the Ministry of National Defence, 2021.

³⁷ Jüris, 2019.

³⁸ See e.g. Naumova, 2021.

³⁹ Belta, 2020.

to Southern Finland. Nevertheless, a joint report by the Finnish-Norwegian Working Group on the Arctic Railway assessed the project as lacking in feasibility. In the future a possible opening of a rail connection to the Northern Sea Route could have an impact on both the Chinese as well as the Russian presence in the Baltic states' transportation sector. A more active presence of China in the Arctic would create new security risks for the Baltic region, which would need considerably more attention from the US and other NATO countries.

Furthermore, China is present in the aviation sector of the Baltic states, as is Russia. The Lithuanian company Avia Solutions Group has close links both with Russia and China. In Russia it was one of the main developers of the fourth Moscow Airport, Zhukovsky, in cooperation with the Rostec Corporation.⁴¹ At the moment of writing, however, the company has officially withdrawn from this project. Lithuanian intelligence services in its annual threat assessment have stated, that "Risks to the national security also originated from activities of the companies registered in Lithuania that cooperate with Russian business entities directly linked to the Russian military industrial complex".⁴²

The Avia Solutions Group is also active in the Chinese market. It has set up the FL ARI Aircraft Maintenance & Engineering Company, which provides aircraft maintenance services in China. In 2020 its subsidiary BAA Training, together with the Chinese company Henan Civil Aviation Development and Investment Company, the second largest civil aviation company in China, opened a new aviation training centre in China. Due to these links, the Avia Solutions Group on several occasions has failed to pass the strict Lithuanian government

⁴⁰ Ministry of transport and communications, 2019.

⁴¹ BNS, 2021c.

⁴² State Security Department of the Republic of Lithuania and Second Investigation Department under the Ministry of National Defence, 2018.

⁴³ Avia Solutions Group PLC, 2019.

investment screening mechanism. In early 2021, the government commission blocked the expansion of the Avia Solutions Group facilities at Vilnius Airport.⁴⁴

The main possible explanation, access of the companies with the Chinese and Russian links to the strategic infrastructure (particularly areas used by NATO, such as Zokniai Airport in Lithuania), could create serious national security risks (information gathering, interference in the operations etc).

A further important player with links to Chinese capital in the Baltic states market is the Estonian aircraft maintenance company Magnetic MRO – 100% of the company's shares were acquired by Guangzhou Hangxin Aviation Technology in 2018.⁴⁵

Technology

Contrary to Russia, China is a rising technological powerhouse, including in the field of sensitive technologies such as 5G. Dependency on China in the field of technology has become a more clearly articulated threat in the Baltic states in recent years. Rising security challenges are clearly visible in the intelligence agencies' threat assessments in the Baltic states. For example, the Estonian Foreign Intelligence Service in its 2020 report stated that "[t]he threat of Chinese technology is strategic and will be revealed in the long term. China has a different culture and values than the West and a repressive communist regime in power". Lithuanian intelligence agencies stated in their 2020 report: "Through technological development and economic leverage, China increases its geopolitical influence and creates preconditions for vulnerability of the states involved in

⁴⁴ BNS, 2021d.

⁴⁵ ERR, 2018.

⁴⁶ Estonian Foreign Intelligence Service, 2021.

its economic projects".⁴⁷ The Head of the Lithuanian Parliament's National Security and Defence Committee, Laurynas Kasčiūnas, stated in 2021 that Lithuania will not be part of the technological space controlled by China.⁴⁸

The following examples further serve to underscore the far-reaching advancement of Chinese companies in the technology sector in the Baltic states. In the field of 5G, Huawei and other Chinese suppliers had serious plans to participate in the roll-out of the 5G network in the Baltic region. Such aspirations were strengthened by the fact that Chinese equipment, mostly Huawei and ZTE, is heavily used in existing 3G and 4G networks of local mobile operators. Local operators were also quite positive towards the use of Chinese equipment, because of its lower price and good maintenance offers by the manufacturers. On the other hand, there is the clear position of the governments of all three countries to ban Chinese vendors from participating in the installation and maintenance of 5G networks. The main reasons for this are the US government's stance, with Washington being the main security partner of the Baltic states, and rising awareness on the dangers of the use of Chinese technologies. In 2019 Lithuanian Vice-Minister of Defence E. Kerza commented that "[o]ur strategic partners [US] have said that if Chinese equipment finds its way into our networks, they can hardly imagine military cooperation".49

At the outset, the Baltic states tried to rely on general security guidelines of the EU and NATO with regard to 5G. However, because of the vague character of these recommendations, the Baltic states decided to introduce restrictions at the national level. The fate of Chinese technologies in the Baltic states' 5G networks is still in the making, but there are clear signs of what to expect:

⁴⁷ Second Investigation Department under the Ministry of National Defence and State Security Department of the Republic of Lithuania, 2020.

⁴⁸ Andrukaitytė, 2021.

⁴⁹ Viluckas, 2019.

- Estonia (2019), Latvia (2020) and Lithuania (2020) have signed bilateral declarations with the United States on the security of 5G networks. Despite not explicitly mentioning Huawei or other Chinese suppliers, the wording leaves no doubt that "suppliers should not be subject to control by a foreign government without independent judicial review; financing should be transparent, commercially based, and follow standard best practices in procurement, investment, and contracting; ownership, partnerships, and corporate governance structures should be transparent". ⁵⁰
- In 2020 the Estonian Parliament passed the so-called Huawei Law. The Electronics Communications Act will ensure that security reviews for telecom equipment needed for the development of future networks will be carried out by government institutions.⁵¹
- In May 2021 the Lithuanian Parliament banned "unreliable" manufacturers and suppliers from the communications market, especially in deploying 5G mobile network technology. Companies using equipment from unreliable providers will be banned from participation in the state radio frequency competitions for the development of 5G networks. Existing equipment from unreliable providers should be removed from communication operators' stock by the end of 2025.⁵²

Apart from 5G, the Chinese state-owned company Nuctech is trying to actively expand its presence in the Baltic states. The company produces X-ray machines, scanners and explosive detection systems for airports, customs and other purposes. Such equipment collects huge amounts of sensitive information, including movement of goods, personnel data and the like, which has huge value for China both for security and commercial purposes. The use of such equipment, therefore, creates considerable security risks.⁵³ In 2014 the United States effectively banned the use of Nuctech equipment in its airports due to the below-standard quality of detecting radioactive material

⁵⁰ The White House, 2019.

⁵¹ Reuters, 2020b.

⁵² BNS, 2021h.

⁵³ More on potential issues see Hannas & Tatlow, 2021; Tatlow, 2021.

necessary for developing nuclear capabilities. In December 2020, the United States Department of Commerce added Nuctech to the Bureau of Industry and Security's Entity List.⁵⁴ Nuctech equipment is continuously purchased by Baltic states' governmental institutions and state-owned companies, including customs, prisons, airports, and so on. The main official reasons given by Baltic states' authorities for the acquisition of Nuctech equipment are low prices, good warranty, and service packages.

In 2016–17 Nuctech won the bid to implement the EU-funded project "Development of a unified data exchange network for X-ray control systems used by the Baltic customs" budgeted at 3 million euros in Lithuania, Latvia and Estonia. The Lithuanian State Border Protection Service under the Ministry of the Interior installed ionising radiation detection equipment for divisions of the State Border Guard Service in 2006 (Kena railway border post). The project was financed by the funds of the EU Schengen measure. Furthermore, the Lithuanian customs department in 2007–14 installed Nuctech X-Ray scanners in the custom posts in Klaipėda port, land crossings with the Kaliningrad region (Panemunė and Kybartai) and Belarus (Lavoriškės and Medininkai).

In Latvia six Nuctech X-ray scanners have been installed at Riga Airport terminals and the Latvian post office, and eight in different Latvian prisons. Nuctech scanners, including rail freight scanners, are also installed in most of Latvian custom posts, such as ports and border crossings with Russia and Belarus. Nuctech equipment is also actively used by the Estonian custom authority. The latest projects include X-ray systems at border crossings with Russia in southern Estonia and the first full-automatic railway scanner at the Narva rail crossing. The latter was installed in 2018 with a bombastic celebration

⁵⁴ Federal Register, 2020.

and attracted great Chinese media coverage. Similar to the Latvian case, Nuctech security equipment is also used in Estonian prisons.⁵⁵

In 2019-20 the Baltic states at least partly changed their attitudes towards Nuctech. Only in Lithuania the underlying reasons were explained publicly, namely potential security threats of the equipment, and alignment with the US position on this issue. In 2019 the Estonian government citing national security reasons disallowed Tallinn Airport to purchase Nuctech X-ray equipment, but the company filed a lawsuit and successfully defended its right to obtain the 1.9 million euros contract. 56 The 2021 decision by the Lithuanian government to block a subsidiary of Nuctech from supplying baggage-scanning equipment for all Lithuanian state-owned airports has attracted media attention globally.⁵⁷ The decision was made in the framework of the existing investment and acquisitions screening mechanism, based on the Law on Enterprises and Facilities of Strategic Importance to National Security. Transfer of ownership, large-scale acquisitions of companies (e.g. of new communications equipment) and new projects in strategic sectors such as transportation, energy, ICT, and defence need to receive approval of a special commission.

Chinese video surveillance equipment constitutes another example of Beijing's Baltic presence. Widespread use of Chinese CCTV equipment has raised serious questions related to national security. In addition to ethical aspects relating to the participation of Chinese companies in oppressive surveillance activities at home, the main concerns related to the possible access of Chinese government institutions to sensitive data collected by the cameras. In 2020 the Lithuanian National Cyber Security Centre, in a reaction to a journalistic investigation by state media LRT, published a report on the security

⁵⁵ Yinglun, 2018.

⁵⁶ Green, 2020.

⁵⁷ Reuters, 2021.

of the Chinese Hikvision and Dahua equipment.⁵⁸ The report stated that 57 Lithuanian governmental institutions were using these CCTVs, including the police, the state border protection service, VIP protection service, the Parliament (including the National Security and Defence Committee), and other institutions. Cameras in 24 institutions were connected to the internet. The report identified and openly disclosed a considerable number of major security vulnerabilities of this equipment. Such vulnerabilities could easily be used to organise denial of service, hostile code insertion and other attacks.⁵⁹ In Estonia, in 2021, a scandal surfaced related to a procurement fumble by the Estonia police, which eliminated any other offers besides Hikvision CCTV equipment. This raised awareness of other concerns related to Chinese technology like human right violations and security weaknesses.⁶⁰

Another important technological aspect related to the connectivity of the Baltic states is the growing presence of Chinese capital and technologies in the development of the backbone of communication infrastructure, including through investments in undersea communication cables.

In 2017 the Chinese state-owned company CITIC Telecom CPC acquired Dutch Linx Telecom Communication with strong presence in the region: a 470 kilometre submarine fibre network in the Baltic Sea, and network operation centres (NOCs) in Moscow and Tallinn; and Estonia's largest Internet Exchange (TLL-IX) data centre in

⁵⁸ National Cyber Security Centre under the Ministry of National Defence Republic of Lithuania, 2020.

⁵⁹ For example, camera software "Hik-Connect" send IMEI, IMSI and ICCID identification numbers to servers in China, Thailand, Singapore and Ireland. Camera software and firmware had some easily exploitable loopholes. An update of the software was organised through servers in Russia and China, see National Cyber Security Centre under the Ministry of National Defence Republic of Lithuania, 2020.

⁶⁰ Salu, 2021.

Tallinn.⁶¹ In addition, the undersea cable C-Lion1 between Helsinki and Rostock branching out to Estonia, Latvia, Lithuania and other countries, was finished in 2016 by the Finnish company Cinia, whose majority stake is owned by the Finnish government. For the operation of this undersea cable Huawei technologies are being used.⁶²

In the sphere of financial technologies, the Baltic states present themselves as an opportune location to develop fintech solutions. The most active in this field is Lithuania, which in 2019 organised a 17+1 fintech summit and initiated the opening of a so-called 17+1 fintech coordination centre. Chinese fintech companies were attracted to use the liberal Lithuanian regulatory environment and access to the EU payment market. Up to ten Chinese fintech companies received licences issued by the Bank of Lithuania. They operate using an electronic money institutions licence, issued by the Bank of Lithuania. ⁶³

In the field of biotech, one of the biggest Chinese companies in the genetic technologies area, the BGI group, in 2019 opened MGI Latvia, an R&D and manufacturing facility in Riga. The total size of the investment amounted to 15 million euros. ⁶⁴ Such investment perfectly fits Chinese "Made in China 2025" policy goals, because it will help to get access to the biotech sector of the Baltic states, and open opportunities to export hi-tec products and services (for example, COVID-19 related equipment).

In the energy sector, state-owned North China Power Engineering (NCPE) in 2013 acquired the Lithuanian company Energetikos tinklų institutas, an electricity infrastructure company with 40 employees. This company is actively participating in construction projects for the Lithuanian electricity grid including strategic ones. NCPE also

⁶¹ Citic Telecom International, 2017

⁶² Huawei, 2016.

⁶³ Bank of Lithuania, 2021.

⁶⁴ MGI, 2019.

actively participated in Belarus electricity grid modernisation projects in Belarus, including projects related to the Astravets NPP.⁶⁵ Presence of the Chinese investment in the electricity infrastructure sector is sensitive, particularly because Lithuania and other Baltic states are implementing an electricity grid independence project in order to synchronise the Baltic States' electricity grid with the continental European network by 2025.

As a final example, the Chinese presence in Baltic states' universities has been markedly increasing. This entails wide-ranging cooperation programmes, including student exchanges and other activities between Baltic and Chinese universities. This potentially could provide the basis for technological transfers to China, the creation of influence networks and other possibilities. In addition to Confucius Institutes, the most active in this field has been Huawei. It has signed cooperation agreements with universities in all three countries in the context of the "Seeds for the Future" programme.66 This programme enables the most talented students in ICT programmes to travel to China for study trips (conducted online in 2020). There are also other cases of scientific cooperation that potentially involve security risks. For example, Kaunas Vytautas Magnus University in 2021 signed a cooperation agreement with Nanjing University of Aeronautics and Astronautics, NUAA.⁶⁷ The Australian Strategic Policy Institute | ASPI Chinese universities tracker assess this university as "very high risk".68

⁶⁵ Aušra, 2019.

⁶⁶ As it is described by the company itself: "This program aims to develop skilled, local ICT talent and bridge communication between countries and cultures. By sharing our ICT expertise and experiences in the global business environment, young people from different countries can learn about advanced technologies in the ICT industry and accumulate ICT expertise and skills through the Seeds for the Future program, contributing to the progress of the global ICT industry", see Huawei, n.d.

⁶⁷ VDU, 2021.

⁶⁸ ASPI, 2021.

COMPARATIVE OBSERVATIONS AND CONCLUSIONS

As this chapter has shown, the presence of Russia and China in the field of connectivity in the Baltic countries is palpable, in particular in the transport and (in the case of China) technology sectors. China's and Russia's positions in the Baltics are considerably different. Russia has much lower possibilities to have a strong impact in the technological field. In the transportation sector, Russia is withdrawing its cargo flows because of economic and other reasons, but at the same time trying to sustain its influence on existing and future flows. For China, the Baltic states hold a minor importance in terms of logistical schemes, but it tries to increase its presence and potential in order to implement its foreign policy goals. Potential increased use of the Northern Sea Route would further boost the interests of China in the region. As demonstrated, China is clearly eager to include the Baltics in its technosphere.

Russia sees the Baltic states as its traditional zone of influence; so at least in theory the presence of an additional and increasingly active player in the region should cause unease in Moscow. However, because of the generally positive facade of Sino-Russian relations, signs of such unease have rarely surfaced thus far. For example, Russia has been calm and cautious when referring to China's BRI. In general, Russian media have portrayed the Chinese economic presence in the Baltic states in a positive light, while the Baltic states' countermeasures to limit Beijing's influence have been depicted as paranoid, providing parallels with a similar "anti-Russian" stance. Russian media outlets (Sputnik, Baltnews and others) often also describe possible cooperation of the Baltic states with China in a positive way. Taking into consideration the asymmetry of Russian-Chinese

⁶⁹ Karmazin, 2021; Sputnik, 2021; Iljashevich, 2021.

⁷⁰ For example, such narratives as the "paranoid Baltic attitudes towards partnership with China and Russia" and "service to the US interests" are often being used, see *Baltnews*, 2020.

relations, including a growing Russian reliance on Chinese technologies and energy market, there is little Moscow could do to limit China's growing presence in its "near abroad", even if it would try. As far as the non-transparent nature of Russian and Chinese decision-making processes allow an assessment of the situation, there are few signs of cooperation or policy coordination between Beijing and Moscow towards the Baltic states.

Russia has based its economic policy for the Baltics on the existing, but rapidly diminishing, close post-Soviet linkages. These include the joint electricity system Brell, a considerable share of Russian goods in Baltic ports, a previously dominant position in the natural gas markets, etc. China, by contrast, relies on promises. Beijing portrays future economic cooperation, including in the BRI context, by promising new investments, cargo flows, opportunities in the vast Chinese market, even if, as in many other cases, most of these promises in Baltic states never materialise. Despite differences in policy strategies, both Beijing and Moscow try to rely on local businesses, which benefit, or could potentially benefit, from economic opportunities.

To achieve their foreign policy and economic goals, both countries are actively using their full political warfare arsenal: different sanctions and initiatives, co-opting target state elites, and investments in strategic sectors, thereby creating additional leverage etc. Both Russia and China are keen to use economic dependence as the leverage to influence foreign and domestic policies of foreign countries. Russia has often used economic sanctions, including in the transportation sector, against Baltic states, targeting Lithuanian milk producers or Lithuanian road carriers, or in the cases of the "repair" of the transit oil pipeline "Družba", imports of Latvian food products, rail transportation to Latvia, etc.⁷¹ China also has demonstrated that it is keen to use economic pressure even despite the fact that economic links between the countries are weak. The most visible examples have been

⁷¹ Kudors, 2016.

the retaliatory measures after the visits of the Dalai Lama to Estonia in 2011 and to Lithuania in 2013.⁷²

The *modus operandi* of Russia and China is thus very similar. Their activities can be aptly analysed through the concept of "economic statecraft".⁷³ Interestingly, while Russia barely hides the fact that it bases its economic activities on a zero-sum game model, China is pretending that it sticks to a liberal internationalist "win-win" approach.

The technological presence of China, and to a lesser extent Russia, in the Baltic states creates a range of security threats, both in terms of investments in the technological sectors, and as a result of the wide usage of these countries' technological products within governmental institutions, strategic sectors, private companies and among the general population. As this chapter has shown, in recent years the Baltic states have become considerably more aware of the dangers of the Russian and Chinese technological presence. The risks are at least partly mitigated by applying investment screening and other legislation. Nevertheless, Russian and Chinese companies including Nuctech, the Avia Solutions Group and others, are trying to use lawfare in order to secure access to the Baltic states' markets. Even if there are attempts to bloc these companies at the national level, they may try to appeal to EU regulation in order to gain access. Also the potential impact of the Comprehensive Agreement on Investment (CAI) agreement, the ratification of which is currently suspended, on the Chinese technological advancement still remains unclear. In future, it is crucial to address the security risks related to Chinese and Russian technology more effectively at the EU level.

Last but not least, both Russia and China are interested in weakening the influence of the United States and the EU in the Baltic states. It is clear that the presence of Russian and/or Chinese investments in key

⁷² LRT, 2019.

⁷³ More on this: Blackwill & Harris, 2017; Wigell, Sören & Aaltola, 2020; Zdanavičius, 2021.

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strategic sectors such as critical infrastructure and key ports could have a direct negative impact for Baltic states' national security. However, this presence can also pose grave security risks when applied as a tool for influence operations, sabotage, espionage and other activities. In case of military escalation such threats could amplify to even higher levels. Not least importantly, such presence has a serious negative impact on the security cooperation between the Baltic states and the US and other NATO partners.

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The Arctic is occupying an increasingly important position in connectivity between Asia and the Nordic-Baltic countries. This is not least because climate change opens up new economic opportunities to make use of the region's vast resources and develop the northern transport routes. Along with these possibilities, the need to ensure peaceful, norms-based and environmentally sustainable development in the Artic region poses a complex challenge. Major powers have strategic interests at stake in the region, and great-power competition, especially between Russia and the United States but increasingly also China, is tightening. While geoeconomic competition is gathering speed, and environmental and human-rights concerns are on the rise, (hard) security issues have also returned to the discussions on the Arctic.

Against this background, this book assesses the opportunities and risks involved in the intensifying connectivity and interdependence between the Nordic-Baltic countries and Asia via the Arctic region. It analyses the interests of the Nordic-Baltic states and other major stakeholders in the region. This edited volume pays particular importance to the use of economic statecraft, i.e. the use of economic resources and connections in power projection and, the other side of the coin, vulnerabilities created by 'weaponisation' of interdependencies. After introducing theoretical approaches to Arctic connectivity, the case studies in this book focus on the geopolitical and geoeconomic strategies applied by Russia, China, and the US, and examine risks, responses and threat perceptions in the Nordic-Baltic states. Is the Arctic destined to become a battleground for geostrategic competition or can connectivity and economic geography also drive forward integration and cooperation to the benefit of major powers and the Nordic-Baltic countries alike?