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War changes everything: Russia after Ukraine

edited by Marc Ozawa

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Nota Bene

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List of abbreviations

AI	Artificial Intelligence
BCM	Billion Cubic Meters
CIS	Commonwealth of Independent States
CSTO	Collective Security Treaty Organization
EAEC	Eurasian Economic Community
EAEU	Euro-Asian Economic Union
EU	European Union
FOI	Swedish Defence Research Agency
FSB	Federal Security Service
GBU	Combat Management Group
GDP	Gross Domestic Product
ICBM	Intercontinental Ballistic Missile
IMVU	Integrated Massed Air Strike
INF	Intermediate Nuclear Forces Treaty
KPGV	Command Post of a Group of Forces
LNG	Liquefied Natural Gas
MCM	Million Cubic Meters
MRAU	Massed Missile-Aviation Strike
MWh	Megawatt hour
NATO	North Atlantic Treaty Organization
NS1	Nord Stream 1
NS2	Nord Stream 2
NTsUO	National Defence Management Centre
OSCE	Organization for Security and Cooperation in Europe
RPAs	Remotely Piloted Aircrafts
START	Strategic Arms Reduction Treaty
SVO	Special Military Operations

SVR	Foreign Intelligence Service
TTF	Title Transfer Facility
US	United States
USD	United States Dollars
USSR	Union of Soviet Socialist Republics
VPK	Military Industrial Complex
WWII	World War II

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Introduction

Marc Ozawa

“There, on that stair landing, I got a quick and lasting lesson in the meaning of the word cornered... Once I spotted a huge rat and pursued it down the hall until I drove it into a corner... Suddenly it lashed around and threw itself at me. I was surprised and frightened. Now the rat was chasing me”.¹

In one of his earliest and most candid interviews, the newly elected President Vladimir Vladimirovich Putin explained one of his life’s lessons growing up in post-war Leningrad. His account of a cornered rat turning the tables on him, the aggressor, resonates in the current context of Russia’s war with Ukraine. Since Moscow launched the invasion on 24 February 2022, Russia has lashed out not only at Ukraine but also the West and the international community. Keir Giles describes this as “Russia’s war on everybody”, a more aggressive posture that began long before February 2022. However, what the following chapters illustrate is just how the Russia-Ukraine war has amplified this pattern of aggression in dangerous and desperate ways.

The war raises important questions, not only about Russia’s intentions toward its neighbours but also about Moscow’s leadership and approach to the international community. This edited volume addresses some of these matters, such as: how long can Russia sustain its war with Ukraine and how might the character of the war develop? Will Putin risk nuclear war to secure his gains on Ukrainian territory? Has Russia’s approach to hybrid warfare changed since February 2022? What will drive Russia’s defence posture in the future? and What sort of international actor will Russia become in the post Ukraine war era?

The war has changed Russia, that much is clear. Until recently, it was too early to draw conclusions about the longer term beyond the immediate months. Events on the battlefield were too dynamic. However, a picture of Russia’s future is beginning to emerge, one that defines the next era of Russian security and defence. While there are still many unknowns, it is evident that the war did not go as President Putin had hoped or planned, that it was initially poorly conceived and managed by Russian security services rather than experienced

1 V. V. Putin *et al.*, *First person: an astonishingly frank self-portrait by Russia’s president*, New York, Public Affairs, 2000, p.10.

military leadership. The past year has also shown that the West is more united and determined in supporting Ukraine than Putin and even many western analysts expected.

As we move into a more drawn-out phase of the war, whether this western (and global) unity will hold in the face of continued economic stress is yet unknown. However, during a joint press conference following Ukrainian President Zelensky's visit to the White House in December 2022, President Biden reiterated US support for Ukraine to continue for "as long as it takes".² Then in a recent speech, President Putin for the first time admitted that Russia is waging a "war" in Ukraine (rather than a "special military operation") and stated his intentions to continue fighting for as long as necessary.³

To this end, Chapter 1, authored by Marc Ozawa, investigates Russia's approach to non-conventional and hybrid warfare since the war began. In Chapter 2, Jānis Bērziņš, analyses the economic and industrial structures of Russia to ascertain Moscow's ability to sustain the war with Ukraine. The author of Chapter 3, Polina Sinovets, explores a new factor in Russia's war with Ukraine, the role of nuclear weapons. Then in Chapter 4, Tracey German examines the disconnect between Russian military strategy and events on the ground, theory versus practice. Finally, Mark Galeotti provides insights into what drives decision making in the Kremlin and how Russian leadership and policy making may change in the future.

Beginning with Chapter 1, Ozawa examines Russian hybrid aggression and argues that the domains and aims of Moscow's hybrid tactics have not changed since the start of the war. However, the frequency, intensity and scale of attacks have all expanded. This is illustrated through four cases including the weaponization of energy, weaponization of commodities, nuclear threats in information warfare and the weaponization of methane in the environment. Additionally, the Russian conception of hybrid warfare also appears to have evolved from a multi-domain, non-conventional "confrontation" with the "collective West" to a "total, global, hybrid war".⁴ For a Russian military strategy audience, this shift evokes associations with Carl von Clausewitz's conception of "total war" (still fundamental to contemporary Russian military thinking) that requires a full mobilization of society and government resources.⁵ This is one way that Russian authorities can justify to the population the need to bear costs and inconveniences, in this case inflation, travel restrictions and product shortages, in the face of western sanctions.

2 B. Bennett, "Biden asserts to Zelensky and the world that US will back Ukraine 'as long as it takes'", *Time*, 21 December 2022.

3 "Vladimir Putin answered questions from journalists", The Kremlin Office of the President, 22 December 2022.

4 "Patrushev rasskazal o razvyazannoj Zapadom gibridnoj vojne protiv Rossii", *Mezhdunarodnaya Zhizn*, 19 August 2022.

5 C. Von Clausewitz, *On War*, Princeton University Press, Princeton, 1989.

Then in Chapter 2, Bērziņš opens with a central question that will determine the outcome of a protracted, war of attrition – if Russia is prepared to incur whatever it takes to win the war, how long can Russia sustain the massive losses of personnel, weapons and resources? He acknowledges that analysts have attempted to answer this, but events have shown that open-source estimates are unreliable and without access to Russian classified information, analytical precision is futile. Therefore, he approaches the topic through an economic and industrial lens. Because dependence on natural resource exports and the accumulative impact of sanctions over time, the author argues that Moscow will not be able to sustain the war in the medium to long term. The dynamics of the Russian defence industry complex undermine Russia's capacity to maintain offensive attacks because of corruption and supply shortages, further exacerbated by sanctions.

The main question that Sinovets addresses in Chapter 3 is whether Russia's approach to nuclear weapons has changed since launching the invasion. In response, she argues that the Kremlin's nuclear rhetoric appears indeed to reflect an evolving nuclear doctrine. The implications for Ukraine and the West, and arguably the world in case of escalation, is that the threat of Russia using a nuclear weapon is real. She refers to this emerging nuclear posture as a type of "offensive deterrence" as conceived by Russian policy makers rather than IR theorists. This new posture is intended to deter external supporters of Ukraine as much as it is meant to influence the outcome of the war. The author argues that the record of this approach is mixed. She recommends that Allies, led by the US, could use nuclear arms control as a means to deescalate the war and ultimately bring it to an end faster.

Chapter 4, authored by Tracey German, examines the evolution of Russian military thinking and the disparity between theory and practice concerning how future wars will be fought. Drawing primarily on Russian information sources, she begins by explaining the importance of foresight [*predvidenie*] and prediction [*predskazanie*] for Russian military strategists and what this means for the future of war - in their context as opposed to the West. According to the author, foresight and prediction are "an enduring concern for Russian military leadership, part of efforts to gain some illusion of control over the uncertainty and unpredictability of war and conflict". After tracing the lessons Russia has learned from previous conflicts (the end of the Cold War, Yugoslavia, Syria and Western operations in the Middle East), she argues that one crucial flaw of Russian military thinking concerns the emphasis on technology, especially precision strike weapons, while overlooking human behavioural factors such as morale and the will of individuals (as opposed to the collective).

In the final chapter 5, Galeotti considers the impact of the Russia-Ukraine war on Russian leadership and elite decision making. He argues that the war has brought about the late, and perhaps final stage of Putinism, a period defined by the "triumph over autocracy"

over the technocrats who, until recently, functioned as a measured check on the most impulsive and unsubstantiated policies of the hawkish *siloviki* in President Putin's inner circle. Galeotti traces the decision-making process that led to Russia's invasion of Ukraine and subsequent military failures concluding that the professional technocrats, including the military leadership, were progressively side lined by the security services and a select few who maintained direct access to Putin during the COVID-19 pandemic and in the months leading up to February 2022. During this period, Putin became more isolated and detached from reality, the author explains. While the outcome of the war remains unclear, the pandemic and the war itself have changed the balance of the power among Moscow's elite for years to come.

Total, global, hybrid war

Marc Ozawa

It appears that Moscow's approach to hybrid war has changed since the invasion of Ukraine began. Is this really the case? In terms of domains and aims, the ends, ways and means have not changed. Rather, the difference lies in the scale and intensity of hybrid attacks. This pattern began in the lead up to the invasion of Ukraine and has since magnified in tandem with the escalation of war. It demonstrates that hybrid warfare tactics, including cyber, economic, informational and covert operations, are just as much a part of Russia's approach to war as conventional warfare. While the domains of Russian hybrid remain unchanged, the geographic scope, frequency and risk that Moscow is willing to take have all increased. Likewise, efforts to maintain a veil of deniability appear to be less important. The pattern emerging is of a Russia that is more desperate, has less to lose and is willing to escalate confrontation with Ukraine and the "collective west" along the spectrum of war.¹ This means that in the future NATO will be dealing with an adversary that is more reactive, unpredictable and ultimately dangerous.

In the face of Moscow's hybrid aggression, NATO, Allies and Partners have thus far remained united in their condemnation of Russia's actions and in their support for Ukraine. While it is still premature to fully assess the West's combined response to Russian hybrid aggression, the current approach appears to have thwarted Russia's immediate goals. This speaks to the importance of situational awareness, communication and coordination within NATO and with stakeholders not to mention NATO's hybrid benchmarks developed since the Wales 2014 Summit.

Regardless of how long the Russia-Ukraine war lasts, it will be imperative for Allies to further develop collective resilience and counter measures in areas where Russia seeks to create chaos, confusion and disunity. This means putting into practice what the Alliance

¹ The "*kollektivnyj zapad*" or "collective West" is a Russian term frequently used by Russian journalists, analysts and policy makers to describe the group of countries comprising NATO, the EU and their allies and partners in the Indo-Pacific, namely Japan, South Korea, Australia and New Zealand.

already knows to be effective, further streamlining cooperation (intra-NATO, with member governments, Partners and the private sector) to become more responsive, and expanding efforts to develop resilience (economic, societal, political and infrastructure).

The following chapter is organized into four sections. The first covers the Russian conception of “hybrid warfare” and explains how it has changed over the course of the Russia-Ukraine war. The second will provide case studies of Russian hybrid aggression in the months since the invasion. While it is not possible to definitively attribute all the examples to Russia, Moscow is widely suspected of being behind those included here. The next section will analyse the changes in scope and intensity of the cases. The last section will discuss implications for NATO and conclude with recommendations for the Alliance. The information from the cases draws on media reports, public statements, secondary source analysis and interviews with NATO and government officials. For convenience sake, the terms “collective west” and “the West” are used as shorthand to refer to the group of countries comprising NATO, the European Union (EU), and their partners supporting Ukraine, namely Japan, the Republic of Korea (ROK), Australia and New Zealand.

From “hybrid” to “total, global, hybrid” war

To effectively deter Russian aggression, one must first understand Russia’s approach to “confrontation” with the West. In western academic and political circles, the discussion on this topic has been disjointed, focusing on individual components separately. These may include military and war studies, hybrid warfare, strategic studies, diplomacy, and economic competition with some of these categories overlapping others. From a Russian perspective, all of these fall along a continuum of international “confrontation”.² NATO’s traditional role has been to deter and defend against Russia through conventional military means and the nuclear deterrent. After 2014 when Russia illegally annexed Crimea, NATO’s attention shifted to non-conventional threats in light of Russia’s growing attacks on NATO and member states falling below the Article 5 threshold. These tactics are commonly known as hybrid warfare, but they may also fall under the rubric of “the grey zone”, covert actions, or what was known as “active measures” during the Cold War.

Although Russian analysts use the term, “hybrid war” or “*gibridnaya vojna*”, this is a recent addition to their strategic lexicon. Russian political scientist, Sergei Markov, was one of the first to invoke the term “*gibridnaya vojna*” in response to western debates about

2 V. Khudoleev, “Voennaya nauka smotrit v budushcheye”, *Krasnaya Zvezda*, 26 March 2018.

Russian aggression.³ The adoption of western terms is not unusual in the Russian academy. While a discussion of “*gibridnaya vojna*” has continued in Russia, it occupies a conceptual and strategic discussion space of “international confrontation” or “*mezhdunarodnaya konfrontatsiya*”.⁴

Since Russia’s invasion of Ukraine, politicians and analysts have breathed new life into the expression. For example, the influential secretary of the Security Council of Russia, Nikolai Patrushev, along with prominent academics and pundits have frequently described the “collective West” (*kollektivnyj zapad*) as waging a “total global hybrid war” (*totalnaya globalnaya gibridnaya vojna*) against Russia.⁵ In this way, “hybrid” is no longer a novel term used in Russia to describe western perceptions of non-military interstate competition. According to Russia’s current narrative, Moscow’s “hybrid” actions are simply a response to western sanctions.⁶ While the domains of hybrid war according to Russian conceptions have not changed, the evolution of how the term is invoked points to a broader geographic scope and level of intensity compared to before the invasion.

Domains of hybrid warfare since the invasion

The following cases illustrate the weaponization of energy, commodities, nuclear threats in the information space and the environment. This is consistent with the fluid nature of confrontation in accordance to Russian military thinking.⁷ The cases are not exhaustive and represent only two types of hybrid aggression, informational and economic. However, they warrant special attention because of their novelty and extreme nature. Their impact on the security environment of Allies and availability of information in the public domain also make them useful for an analysis of the future direction that Russian hybrid warfare is likely to take. Further examples of cyber, technology, and asymmetric approaches are important, but Russian operations in these domains resemble those before the war. The main difference in 2022 is the frequency and intensity.

3 S. Markov, *Gibridnaya Vojna Protiv Rossii*, Algoritm, Moscow, 2015.

4 V. N. Startsun, “Ponyatiye ‘Serojzony’”, *Voenniye Aspekty Mezhdunarodnogo Prava*, Vestnik Voennogo Prava, 340, No.116, March 2018, pp.77-86.

5 “Patrushev rasskazal o razvyazannoj Zapadom gibridnoj vojne protiv Rossii”, *Mezhdunarodnaya Zbizn*, 19 August 2022.

6 Bolshaya Igra, Pyervyj Kanal, 12 May 2022.

7 D. Johnson, “Russia’s conventional precision strike capabilities, regional crises, and nuclear thresholds”, *Livermore Papers on Global Security*, No.3, February 2018.

Weaponizing energy

Before the February invasion of Ukraine, Russian supply disruptions affected predominately the countries of NATO's Eastern flank. The Swedish Defence Research Agency (FOI) recorded 91 supply disruptions among Eastern flank countries due in part to Russian political pressure on the region.⁸ However, the countries of western Europe were largely sheltered from these tactics. In fact, the dominant view in western Europe was one of Russia being a stable and reliable supplier having delivered uninterrupted supplies through the geopolitical fluctuations of the Cold War. Hence, prior to 2022, the prospect of a prolonged Russian supply disruption was treated as a “nightmare” scenario, practically unimaginable because of the perceived interdependence between Europe and Russia. What the Russia-Ukraine war made clear is that interdependence was unequal. While Russian gas revenues have increased in 2022 despite EU sanctions, Russia has progressively cut natural gas exports to Europe under the pretext of “technical” difficulties or turbine maintenance delays as a result of EU sanctions.⁹ Even before the “sabotage” of Nord Stream 1 (NS1) and Nord Stream 2 (NS2), gas flows had halted.

Supply disruptions have clearly impacted energy markets. While there is typically seasonality (price fluctuations due to season demand) in European natural gas prices, 2022 prices in October rose 188 Euros per megawatt hour (Eur/MWh at TTF) compared to 93 Eur/MWh in 2021.¹⁰ Because natural gas fuels multiple sectors of the economy, the combined impact of reduced supplies has probably contributed to rising overall inflation. This has put pressure on governments and industries at a time when Europe is still recovering from the COVID pandemic. Officially, Russia claims that the reduction of supplies was the result of either technical difficulties or responses to EU sanctions.

The goal of Russia's weaponization of energy is twofold. First, to create divisions within the West to “defect” from support of sanctions against Russia. The second is to pressure European supporters of Ukraine to withdraw their support, particularly military (weapons and systems training) and security (intelligence sharing and advising). With few exceptions, the EU and NATO states have remained united in their sanctions policies, military and security support of Ukraine, and public condemnation of Russia's actions. Moreover, the EU and member states that have the highest dependence on Russian energy, in response to Russia's actions, have sought to supplant Russian gas by finding alternative suppliers and

8 R. Larsson, *Russia's energy policy: security dimensions and Russia's reliability as an energy supplier*, Swedish Defence Research Agency (FOI), 2006.

9 W. Preussen, “Canada to return 5 remaining Nord Stream turbines to Germany”, *Politico*, 25 August 2022.

10 Natural Gas Price Statistics Database, Eurostat, December 2022.

building new infrastructure to enable more liquefied natural gas (LNG) imports. Europe's response to finding alternatives makes clear that the "energy weapon" is a tool that Russia can only use once. In the future, the impact of Russian supply cuts to Europe will diminish because of Europe's efforts to diversify supplies away from Russia.

Weaponization of commodities

While the weaponization of energy is a form of economic warfare, Russia has engaged in other tactics to put economic pressure on Ukraine and supporters of Ukraine. These include blockades of grain and other food items from Ukraine through the Black Sea. Russia has also confiscated and nationalized foreign owned assets located on Russian territory, and the Russian armed forces have engaged in looting in occupied Ukraine. The airlines of most NATO and EU member states, along with partners and allies supporting Ukraine, are no longer able to access Russian territory or fly in Russian airspace.

While the last measure is a tit-for-tat response to those countries blocking Russian carriers, the other tactics are aimed at putting pressure on the economies, societies and (ultimately) political leaders of western countries. Direct pressure takes the form of inflation and product shortages. Russia's contribution to inflation is primarily through the weaponization of energy. While all manufacturers will experience higher costs for energy and pass them on to consumers, certain industries, such as petrochemicals, are particularly sensitive to Russian economic warfare because they use natural gas as a feedstock.

The confiscation of foreign owned assets has two potential advantages for Russia. The first is the acquisition of the assets themselves. In the example of confiscating Airbus and Boeing fleets operated by Russian carriers, these will not only be used by Russia, a portion has been used for spare parts. In the long run this approach is not sustainable because eventually Russian carriers will run out of spare parts, and the aircraft can only operate in Russian or Kremlin-friendly airspace where aircraft cannot be confiscated and returned to their owners. The second effect, however, is indirect. By confiscating and nationalizing foreign owned assets, Moscow is hoping that the companies will lobby their governments for the return of assets, thereby leveraging this pressure in support of Russian policies.

Another feature of Russian economic warfare is the commercial blockade of the Black Sea. Because of Russia's Black Sea Fleet base in Sevastopol on the Crimean Peninsula, Russia was able to not only run military operations from maritime facilities but also block Ukrainian exports (wheat, maize and sunflower products). The blockade began in June 2022 and has experienced different phases of intensity. Due to international pressure and efforts

by the UN and Türkiye to mediate between Ukraine and Russia, Moscow has recently eased the blockade. The following figure illustrates price fluctuations of Ukrainian wheat and maize exports in 2022. Global wheat prices in particular began to rise immediately after Russia initiated the blockade in June. They have since fallen as a result of the UN negotiated export route, but prices are still above 2021 levels.

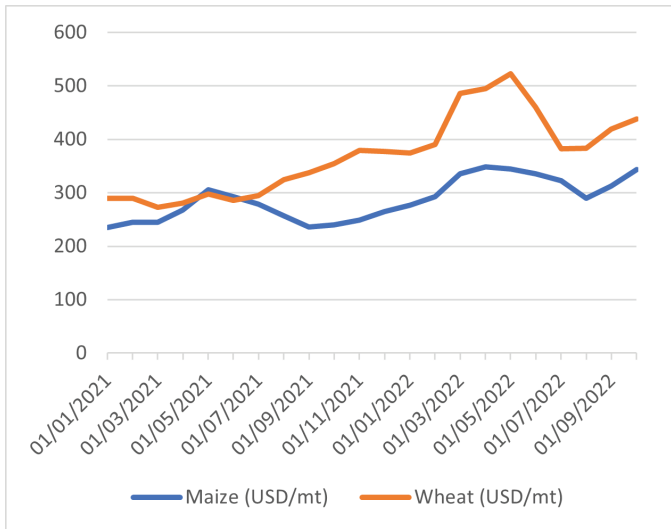


Figure 1: Global maize and wheat prices, 2021-2022

Source: World Bank, 2022

Ukraine ships most of its wheat to Africa while maize and sunflower products reach Europe and North America as well. Beyond the West, Russia is trying to appeal to non-aligned countries and the developing world for support in the war, to discredit the US, EU and NATO through post-colonial grievances and to foster trade relations. Trade with non-aligned countries has become a priority for Russia to counter the impact of sanctions.

Nuclear threats in information warfare

There are three roles that nuclear weapons play in the Russia-Ukraine war. The first is the capture and control of nuclear power plants and the Chernobyl site. The second is the nuclear sabre rattling against Ukraine, which consensus expert views dictate is likely to be a

tactical-low payload nuclear weapon. The third is related to the second insofar that a tactical nuclear weapon would escalate the conflict, further drawing in NATO allies or even NATO itself. The implicit threat is that it would put Russia and NATO on an escalatory path to a full-scale nuclear war. The threat creates panic among western societies to put pressure on their leaders to stop the war, preferably on Moscow's terms.

Concerning nuclear power plants, both the Zaporizhzhia and Chernobyl sites were conquered by Russian forces early in the invasion. While the Chernobyl site is closed, the facility itself is still highly radioactive. It is still not clear why Russian forces rushed to control Chernobyl. However, there exists the danger that Russia could damage the protective structure around the radioactive core. This created fear and confusion not only in Ukraine but internationally. Zaporizhzhia created similar concerns, but the plant also has an economic and environmental dimension. Before the start of the war, Zaporizhzhia supplied roughly 20 percent of Ukraine's electricity supply.¹¹ Other nuclear plants have either partially or fully shut down because of bombing and power outages that impact their backup power, critical for running safety systems.¹²

While nuclear plants can cause economic and environmental damage, the threat of nuclear weapons presents a greater challenge for Ukraine, Allies and the international community. Russian national security doctrine regarding nuclear weapons is both vague and debated. On the one hand, there is the doctrine of "escalate to de-escalate" which many experts believe incorporates a nuclear dimension, particularly tactical low-payload weapons. Early in the war Russian leaders, including President Putin, alluded to nuclear weapons as veiled warnings against allied support of Ukraine and NATO involvement in the conflict. The sham referenda and Russia's illegal annexation of Ukrainian territory provide an additional pretext for nuclear weapons because, as Putin's spokesman D. Peskov pointed out, Russian national security doctrine is clear about the use of nuclear weapons against an attack on Russian territory.¹³ The possibility of Russia using a nuclear weapon against Ukraine would not only cross a taboo line that has held since the end of WWII, it also creates speculation about a western response ranging from NATO attacks on Russian forces to some Allies directly defending Ukraine.¹⁴

11 A. Prokip, "Why the Zaporizhzhia nuclear power plant matters...for the whole world", Kennan Institute, 19 September 2022.

12 "Russian air strikes hit operations at Ukrainian nuclear power plants", Reuters, 23 November 2022.

13 C. Amanpour, "Russia's Peskov refuses to rule out using nuclear weapons", CNN, 22 March 2022.

14 E. Helmore, "Petraeus: US would destroy Russia's troops if Putin uses nuclear weapons in Ukraine", *The Guardian*, 2 October 2022.

Weaponizing methane and the environment

Russia appears to have implemented a new tactic aimed at influencing the public opinion of allies and the international community. The weapon itself is methane and the target is public opinion and the environment. According to one manager, executives at Gazprom, Russia's largest gas company, began discussing the weaponizing of the methane on the environment in February and March after the start of the war.¹⁵ While the production and distribution of oil and natural gas typically involves some methane release (flaring), a process of burning excess methane for operational maintenance, reports indicate that the amount of Russian methane release and flaring has increased substantially since February. Methane is about 28-34 times more harmful to the environment than CO₂ emissions over a 100-year period.¹⁶

There are three events in question. The first concerns the Raspadskaya coal mine. While Russia appears to have been releasing more methane into the atmosphere than usual even before the invasion from the Raspadskaya mine – likely a result of increased coal production – the plant continued to leak unusually high levels of methane through the spring and into the early summer. Canadian satellite methane observer company, GHGSat announced that the mine's release of methane in 2022 was the largest ever recorded since they began monitoring methane release globally.¹⁷ The discharge appears to be deliberate based on the known geology of the mine and the operator's ability to control for the release.¹⁸ From January to June 2022, according to GHGSat, the rate of release increased to an average of 87 metric tonnes per hour.¹⁹

The second instance is a substantial and highly visible flaring on the Baltic Sea coast. On the one hand, the mechanics of natural gas production make it difficult to temporarily reduce production if, for example, Russia stopped exporting natural gas through the Nord Stream pipeline. In order to halt or significantly reduce gas flows through the pipeline, Gazprom would need to flare the excess gas. However, the location of the flaring appears to be a signal to Europe. Gazprom is flaring four million cubic meters (mcm) of gas per day at a pipeline compressor station on the Baltic Sea. The flare is so large that it is visible from neighbouring Finland and Estonia.²⁰ It is a constant reminder to Europe of wasted natural

15 Interview with Gazprom executive, 22 March 2022.

16 "The Challenge", United Nation Economic Commission for Europe, 27 September 2019.

17 F. Harvey, "Methane leak at Russian mine could be the largest ever discovered", *The Guardian*, 15 June 2022.

18 *Ibid.*

19 "Russian mine produces biggest methane leak ever seen by GHGSat", Press Release, GHGSat, 15 June 2022.

20 M. Iden, "Russia flaring around 4.34 mcmd of gas normally bound for Nord Stream 1", Pipeline Technology Journal,

gas supply when energy prices have risen nearly 180 per cent in 2022 compared to 2021.²¹ This flaring has not ceased, and considering that most experts do not believe Russia will start exporting through Nord Stream for the foreseeable future, it makes economic sense for Gazprom to mothball excess production rather than continue flaring.

The third example is the damage of the Nord Stream 1 and 2 pipelines which took place off the coast of the Danish island of Bornholm in the Baltic Sea.



Figure 2: Map of Baltic Pipe and Sabotage of Nord Stream 1 and 2

Although not yet attributed, it is widely suspected – but recently debated among Western officials – that Russia was behind the “sabotage” of the natural gas pipelines (Nord Stream 1 and 2).²² On September 27, a series of explosions penetrated and blew away parts of the

²⁹ August 2022.

²¹ “Never too early to prepare for next winter”, IEA, 1 November 2022.

²² S. Harris *et al.*, “No conclusive evidence that Russia is behind Nord Stream attack”, *The Washington Post*, 21 December

Nord Stream 1 and 2 pipelines which transport up to 55 billion cubic meters (bcm) per annum of natural gas from Russia to Germany. While we may never know if the Kremlin was behind the event, the timing was suspicious. On the same day, the Baltic Pipe, carrying Norwegian natural gas to Poland, was inaugurated. Moreover, one month prior Russia had cut off gas flows through NS 1 on the pretext of technical difficulties. Although NS 2 was not in operation, both pipelines were full of natural gas which were then subsequently released into the atmosphere. Given the pipelines location (subsea off the coast of Danish Bornholm Island) and the highly durable concrete reinforced steel structure of the pipelines, the sabotage was likely a state-sponsored operation. The attack resembles other instances in which Russia is suspected of damaging pipelines in the Caucasus and Central Asia.²³

Potential goals of the NS pipeline sabotage could be to create fear and chaos at a time when Europe is experiencing record energy prices and public concern over heating during winter. The destruction of the pipelines took off the table the possibility of resuming natural gas exports to Europe through Nord Stream. The event may also have released Gazprom from its contractual obligations to deliver supplies by claiming *force majeure*, thereby benefiting Moscow.²⁴

Total, global, hybrid war

Whereby before the war, Russian hybrid aggression was disruptive, the level of intensity, risk to long-term self-harm for short-term gains and the global nature represent a clear escalation in hybrid warfare. The goals are the same as before the war – to advance Russia’s influence over Ukraine by destabilizing the West - but the audience is now wider and multifaceted. Influencing the course of the war includes stopping the “collective West” from supporting Ukraine, deterring sanctions, and creating divisions in NATO and the EU. In most instances, this includes punishment through inflation, confusion and economic instability as a result of energy shortages and food commodities.

Russia’s tactics are more desperate because they come at a high cost to itself. For example, exercising the energy weapon is also costing Russia the loss of its primary export market for oil and gas, Europe. It will take years for Russia to build new pipeline and LNG

2022.

23 “BP faces aftermath of Caucasus region conflict”, *Oil and Gas Journal*, 18 August 2008.

24 A. Cohen, “Russia’s purported sabotage of the Nord Stream Pipeline marks a point of no return”, *Forbes*, 29 September 2022.

infrastructure to export the same amount of natural gas to Asia and other markets. In the meantime, Russia is forced to sell oil at below market prices to China and India. Even though the energy weapon is effective in punishing, particularly Europe, for support of Ukraine, it is also damaging Russia's reputation as a reliable supplier and business partner.

While nuclear sabre rattling may be effective in deterring some kinds of foreign support for Ukraine, it is threatening the world with nuclear war. Creating an export blockade in the Black Sea is driving up prices and creating shortages for the developing world. This is precisely the audience that Russia is trying to win over in the information battle with Ukraine and the West. It is another example of Moscow trying to extract short-term gains, in this case global support for ending the war in Russia's favour, at the expense of reputation. Recent United Nations votes condemning Russia's invasion, illegal annexation of Ukrainian territory, and seat on the Human Rights Committee attest to Moscow's waning international influence.²⁵

The fact that NATO and the Ally that the Kremlin most fears, the US, have not directly defended Ukraine or attacked Russian forces in Ukraine would be perceived as a "total, global, hybrid war" success in Moscow. Yet, the risk and damage to Russia's long-term goals are substantial. The only way that Russia's strategy works is with two outcomes – Russia wins in Ukraine and the international rules-based order collapses. Concerning the former, a "win" would mean, at the very least, securing all of the illegally annexed regions with a cease fire that would allow Russia to regroup and resupply.

The latter condition seems more remote, and is the most troublesome for Moscow in the long run. Ever since Putin's 2007 speech at the Munich Security Conference, in which he proclaimed the end of US leadership, the dominant Russian narrative about international politics is the transition from a unipolar to multipolar world. Much of Russia's efforts over the past decade were aimed at facilitating such a transition through the undermining of the post-war, rules-based international order, US leadership, democratic institutions and unity among Allies. This transition is the lens through which Russian leadership and prominent (Kremlin-friendly) journalists, academics and analysts view current events. In the same way as Cold War Marxist ideology viewed the collapse of capitalism as inevitable, the Russian policy and intellectual establishment see the end point of a divided world dominated by regional hegemons as the future. According to this worldview, the only question is the speed at which the transition will take place.²⁶ With this in mind, Russia's war with Ukraine takes on new meaning. Not only is it an existential war for Russia, the outcome will reverberate

25 "With 143 votes in favour, 5 against, General Assembly adopts Resolution condemning Russian Federation's annexation of four Eastern Ukraine regions", United Nations Meetings Coverage and Press Releases, 12 October 2022.

26 For a recent example, see A. Kortunov, "A new Western cohesion and world order", RIAC, 27 September 2022.

through the international system. The war thus serves as a change agent facilitating this transition. Russian hybrid aggression cannot be fully understood without recognizing the lens through which Moscow views current events.

Countering Russian hybrid aggression

Some time between the coloured revolutions of 2004 to Putin's 2007 speech at the Munich Security conference, Russia's threat assessment changed from viewing the West as a partner to an adversary. Ever since, Russian hybrid aggression has grown in scope and frequency. However, the February invasion was a distinct point of departure in terms of geographic scale, intensity and the risk Moscow is willing to take. Because of NATO's experience with Russian hybrid tactics, NATO and Allies have thus far shown resilience in the face of Russia post-invasion. While the prescriptions for countering Russian hybrid aggression have not changed, the goal posts and required vigilance have. Russian hybrid tactics are part of a seamless spectrum of aggression Moscow orchestrates in tandem with conventional warfare. The sheer number of actors (both public and private) and jurisdictions (national, regional and international) needed to counter hybrid aggression requires greater coordination and cooperation within NATO and among allied capitals, Partners and other stakeholders (private and non-governmental). In practical terms, this means that NATO and Allies would do well to meet with stakeholders more frequently and devote more resources, including staff, to countering hybrid aggression. This could also entail a greater role for hybrid relevant teams and centres of excellence.

For better or worse, NATO has become Moscow's bogeyman to the Russian population for its own failures – a justification for the mobilization and hardships to come. While NATO's role as a defensive military alliance limits what it can do against hybrid attacks, the Alliance can still take steps to engage with Partners and stakeholders more substantively, particularly for planning contingencies given Russia's higher threshold for risk and self-harm. In addition to existing platforms, this could take the form of NATO hosting and incubating initiatives on hostile economic, environmental and information warfare campaigns and creating exchange/secondment programmes with key Partners and organizations.

Russia's strategic maximalism and its limits

Jānis Bērziņš

In theory, effective planning aligns investments and capabilities to specific strategic objectives. In the West, defence planning presupposes the identification, development, and delivery of forces that are adequately equipped, trained, and supported. Therefore, a very important question regards the financial means to realize planning decisions. History shows that a lack of coordination between planning and resources might result in military defeat. During the Agadir crisis of 1911, for example, Germany was hit by a financial panic that lost the Reichsbank 20 percent of its gold reserves in one month. As a result, it came close to falling below the statutory minimum of gold-backed currency in circulation. Risking being driven off the gold standard, the Kaiser had to accept France taking over most of Morocco in a humiliating defeat.¹

Although this case was the result of a financial crisis, in the long-term a state's geopolitical ambitions are limited by the structure and size of its economy while its defence budget is determined by its government's ability to collect taxes. This in turn relates to a country's level of economic complexity. Less complex economies have lower levels of technological and social development. Hence, they are unable to develop proper strategic capabilities because of technological deficiencies and their lack of well-educated personnel.

Since Putin's speech at the Munich Security Conference in 2007, Russia has pursued maximalist strategic objectives. This includes establishing a polycentric world order to counter what Charles Krauthammer termed the "unipolar moment", the establishment of a Eurasian-based security environment, providing greater powers to the OSCE to shadow European Union (EU) and United States (US) influence, advocating the European Union's defence policy to undermine NATO, a permanent neutrality status for Ukraine and other countries of the post-Soviet space, and a dominant presence in the Arctic. This chapter compares Russia's strategic objectives with its economic and social potential, arguing that it lacks the capacity to achieve them in both the short and long run.

¹ L. Ahamed, *Lords of finance: the bankers who broke the world*, Penguin Press, 2009.

Russia's geopolitical ambitions

It is widely believed that Russian President Vladimir Putin seeks to re-establish a Russian-led entity in some semblance of the Soviet Union. This idea stems from Putin's statement during his 2005 annual speech before the Federal Assembly of the Russian Federation that the "fall of the Soviet Union was the greatest geopolitical disaster of the century. (...) Tens of millions of co-citizens and compatriots found themselves outside Russian territory. Moreover, the disintegration epidemic has infected Russia".² Far from tragedy, the collapse of the Soviet brand of socialism meant freedom for the former republics of the Union of Soviet Socialist Republics (USSR). The same does not apply to Russia. The end of the USSR meant the effective collapse of the Russian Empire, the same empire that had been continuously expanding since Ivan IV Vasilyevich (the Terrible) for over 500 years.

Until 2014, Putin's vision to rebuild the Russian empire was asymmetrical. Instead of using force, the Kremlin sought to emulate a model that more closely resembled the EU, where Moscow would have a similar role to Brussels. It was called the Eurasian Economic Union (EAEU). The idea was to rebuild the empire without violence by appealing to economic interests. It did not work. Indeed, in 2000, only Belarus, Kazakhstan, Kyrgyzstan, Tajikistan and Russia established the Eurasian Economic Community (EAEC) with Uzbekistan joining in 2006 as a precursor to the EAEU. As it developed, Belarus, Kazakhstan, Russia and Ukraine signed a treaty establishing a single economic space in 2003, a step to further integrate a subset of the EAEC. This integration step never came to fruition due to the Orange Revolution in Ukraine. In the end, only Belarus, Kazakhstan, and Russia signed the Eurasian Economic Union agreement in 2014 without Ukraine.

For Russia, the exclusion of Ukraine was a geopolitical failure. As the EAEU agreement was signed in March 2014, after the illegal annexation of Crimea, Kyiv did not ratify it. Without Ukraine, the Eurasian Economic Union lost much of its scope and economic potential. Moreover, only Belarus and Kazakhstan signed the agreement. Most of the countries that were expected to be members of the EAEU, rejected any further integration with Russia at the time of its founding. Since 2014, only Kyrgyzstan and Armenia have opted to join the organization making a total of five members today.

Russia's strategy failed for three reasons. The first relates to long-standing historical opposition to Russia of many former Soviet republics. The Baltic States and other countries of the former Warsaw Pact consider Russia an oppressor that deprived them of

2 V. Putin, "Annual address to the Federal Assembly of the Russian Federation", The Kremlin Office of the President, 2005.

development between WWII and the collapse of the Soviet Union. Second, there is deep suspicion that the EAEU (and EAEC) aim to establish economic and political subjugation by securing and increasing Russian influence. Third, Russia's political and governance model, which privileges a small caste at the expense of the general population, is rife with corruption, incompetence, and negligence. Thus, it is not considered an attractive option compared to the Western democratic model.

Instead of engaging in self-reflection to understand why its political and economic model is rejected, Russia's reaction has been to accuse the West of carrying out information, psychological, and influence operations that deny Russia what it considers its zone of influence. A good characterization of this Russian view can be found in an article by Major General Vorobyov and Colonel Kiselyov.³ Published in the official scientific journal of the Russian Ministry of Defence, *Military Thought (Voennaya Mysl')*, it affirms that the "West uses an ideological subversive weapon called Westernization. It consists of imposing on Russia (and other countries) a social, economic, ideological, cultural system and way of life similar to Western countries".⁴

This fortress-under-siege perspective also results in any opposition by the population against the Russian political and social regime being viewed as Western interference. For Russia, it is considered unacceptable that the population of Ukraine, Belarus, or any other country formerly part of the Russian Empire seeks a system modelled after the West. Such an outcome would mean that Russia has failed as regional hegemon. It also means that, for Russia, losing the war against Ukraine would be a geopolitical disaster.

The Russian leadership's idea of creating a multipolar world, where Russia is one of the leading poles, is also crumbling. As the international systems evolves through a process of power redistribution, Russia does remain one of the world's central powers. However, the rejection of the Russian "model" in its near abroad raises questions about the model's appeal and the future of Russian power. As a result, the Kremlin has felt threatened and reacted aggressively. Moreover, with other powers rising, Moscow's maximalist geopolitical objectives might remain unfulfilled even with a hypothetical decline of the West.

Achieving grand strategy goals

Almost a year after Russia initiated its war against Ukraine, a serious lingering question

3 I. Vorobyov and V. Kiselyov, "Strategii sokrusheniya i izmora v novom oblikye", *Voennaya Mysl'*, No.3, 2014.

4 *Ibid.*

relates to its capacity to sustain the war at the current operational level. It is difficult, if not impossible, to make any solid analysis without data from Russia's stocks of military equipment and its military industrial capacity. Since there is much speculation on this subject, and many pundits were proven wrong in the last months, this section discusses the prospects of Russia sustaining the war efforts in Ukraine in the face of structural economic and social challenges rather than based on weapons.

The first and most significant challenge to Russia's war effort is the Russian economy's poor level of development. Although Russia's GDP was USD 1.78 trillion in 2021, this mainly stems from natural resource exports in natural gas and oil. As a commodities exporter, it is no surprise that Russia is a relatively wealthy country but also an underdeveloped one in line with the typical pattern of a "petrostate".⁵ Russia's net exports lack complexity and are concentrated in oil, petroleum products, coal, gold, and other commodities. The Russian economy equally lacks complexity, and since there is a close relationship between economic complexity and development, Russia lacks the level of economic and technological development needed to sustain a modern and well-equipped military, one that matches Moscow's strategic ambitions.

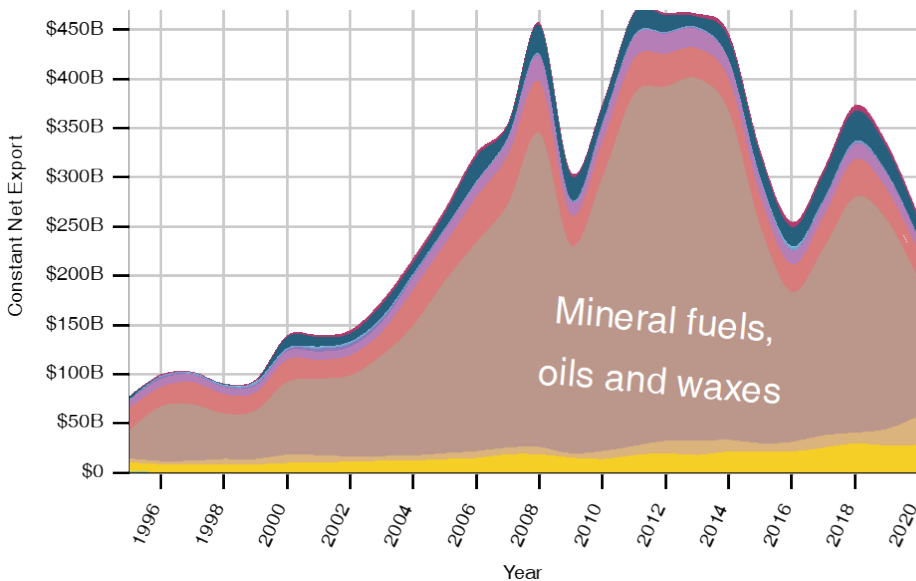


Figure 1: Russia's exports 1995-2020 in constant USD. *The Atlas of Economic Complexity*.

5 M. Goodman, *Petrostate: Putin, power, and the new Russia*, Oxford University Press, 2008.

At the same time, sanctions imposed by the West are having serious structural impacts in the remaining sectors of the Russian economy. The low level of Russia's economic complexity makes it dependent on imports, mainly from the West and more specifically from Germany and Italy for machines, equipment, and software. The military industrial complex is especially reliant on these imports.⁶ In 2016, it was disclosed that some 800 weapons systems' production depended on foreign components from NATO and EU countries.⁷ There is solid evidence that the German Siemens Sinumerik 840D and Heidenhain systems are common in civilian and military industrial production in Russia.⁸ One example is the Kalinin plant in Yekaterinburg, which produces Russia's S-300 air defence system and uses Heidenhain equipment and software. Russia imports high-technology military equipment from France too, including bombs, rockets, torpedoes, missiles, explosive charges, imaging equipment, aircraft, thermal imaging cameras (for more than 1,000 Russian tanks), navigation systems, and infrared detectors for fighter jets and combat helicopters.⁹ To counter this reliance on Europe, Russia's Security Council has pursued import substitution strategies. Still, these efforts have seen little success. For example, in 2016 the Military Industrial Complex (*Voyennyj Promyshlennyy Komplex* or VPK) requested that the domestic industry replace 127 items usually imported from the West. One year later, they managed to achieve only seven substitute products.

Other examples include the production plans of ships. These had to be adjusted because Russia lacks modern ship engines. At the beginning of the modernization program in 2012, the Russian Ministry of Defence counted on the Ukrainian Zorya-Mashproekt's gas turbine engines. Some ships were designed to use these engines, including the Project 11356 "Patrol Guards", the Project 22350 "Frigates", and Project 21956 "Multi-Purpose Destroyers". In September 2019, the Russian government announced that the United Engine Corporation, the NPO Saturn (Rybinsk, Yaroslavl region), and the OJSC Klimov from Saint Petersburg would replace Ukrainian engines. Nevertheless, the precise timing for the commissioning of these new projects is unknown. Therefore, sanctions are expected to continue affecting a significant part of the military industrial complex.

Another complicating factor is the relationship between the Russian Armed Forces and Russia's Military Industrial Complex. On the one hand, the military often complains that the

6 See T. Malmlöf, "The Russian machine tool industry prospects for a turnaround?", Swedish Defence Research Agency, Stockholm, February 2019.

7 *Ibid.*

8 Heidenhain manufactures numerical controls for machine tools, as well as mechatronic measuring devices for length and angle. See <https://www.heidenhain.com/company>.

9 See A. C. Brillaud *et al.*, "EU member states exported weapons to Russia after the 2014 embargo", Investigative Europe, 2022.

industrial sector is unable to fulfil procurement demands and that needs are either not met or that the quality of products is considerably low. On the other hand, the industrial sector complains that the Armed Forces do not know what to procure, including the technical specifications and requirements. In other words, the industrial sector complains that the Armed Forces are aimless, which reflects the general level of poor planning by the military.

Sanctions are also affecting Russian railways, which are slowly decaying because of a shortage of cassette bearings for heavy-duty wagons. By the beginning of September, approximately ten thousand freight cars were taken out of service as a result of maintenance issues related to these bearings. It is likely that the shortfall of cassette bearings will be about 100,000 units in early 2023, even considering Russian manufacturers will have supplied 95,000 units. Since local production is dependent on imported components, with only the final assembly being carried out in Russia, the prospects for import substitution of this critical component remains unclear. As a result, Russian railways already began dismantling cars for spare parts.¹⁰ Another serious issue is the lack of sealants and lubricants which are not produced in Russia nor in Commonwealth of Independent States (CIS) countries.¹¹

The oil and gas sector is also experiencing the effect of sanctions. Although Russia's income from exporting oil and gas has increased, with higher prices resulting from the escalation of the war, there are two significant issues that could eventually bring about a collapse of this sector. Until WWII, the Soviet Union's main source of oil were Azerbaijani reserves. In 1948, new sources were found in Tatarstan and, in the 1960s, in West Siberia. With the Tatarstan and West Siberian reserves becoming depleted, oil exploration is underway in the Arctic region. As a result, the cost of extraction and the dependence of foreign technology are increasing. The Vostok reserves in Krasnoyarsk near Norilsk contain approximately 30 percent of Russia's oil. Russia began extracting the sour, sulphur-rich oil from the first oil field in Prirazlomnoye in 2013. Until now, this is the only new field in operation. With higher operational extraction costs and increased sulphur content, the break-even cost for production is around USD 43 per barrel. This raises serious questions about the sustainability of oil and gas projects in the Arctic.¹² Besides depleting fields and the need to develop new ones, another issue is technology. Russia relies on Western technology for its oil and gas industry; hence, there are serious doubts about the feasibility of exploring the Arctic reserves.

Natural gas is also problematic, although to a lesser degree than the oil industry. The

10 "Russian railway is on the verge of collapse", Railway Supply, 2 September 2022.

11 *Ibid.*

12 A. Chanysheva and A. Ilinova, "The future of Russian arctic oil and gas projects: problems of assessing the prospects", *Journal of Marine Science and Engineering*, Vol.9, No.5, 2021, p.528.

Yamal LNG and LNG2 facilities, both in the Gulf of Ob, were projected to connect to the Ust-Luga infrastructure for access to the Nord Stream pipeline, which is no longer operational. A new liquefaction LNG plant was supposed to begin production in 2023, but growing friction with the West made Gazprom look to China. The export of gas through the Power of Siberia pipeline substantially increased Russian exports and a new processing plant near Blagoveshchensk is expected to reach full capacity by 2025. However, the main issue for natural gas exports to China is that Gazprom took loans from Chinese banks and most of its equipment relies on Western technologies. Both of these create vulnerabilities by relying on China and Western suppliers. Finally, because China holds a monopsony – that is, acts as the sole buyer – on Power of Siberia exports, Russia's negotiating position is weakened. As a result, Beijing will try to set the minimum possible prices, casting doubt on the project's long-term feasibility.

Another major economic (and social) challenge for Moscow relates to income inequality and the level of poverty throughout the country. The data on annual wealth from Credit Suisse provides a good measure by comparing the mean and median income levels. In Russia's case, the 2021 data shows that, while the mean is USD 27,162 the median is USD 5,431 per adult clearly showing a high level of wealth inequality. This disparity leaves Russia ranked 91st in the world in terms of inequality, on par with Ecuador, Peru, Colombia, and Azerbaijan. From the former republics of the Soviet Union which have not become members of the European Union and/or NATO, even Belarus is better off, ranked 67th with a median of USD 12,168 and an average of USD 23,279. Kazakhstan immediately follows in 68th place with a median of USD 12,209 and an average of USD 33,463. Ukraine ranks 117th with a median of USD 2,529 and an average of USD 13,104. By comparison, the Baltic states have less concentrated distribution of wealth than in Russia and most former republics of the Soviet Union. Estonia is ranked 33rd with a median of USD 38,901 and an average of USD 77,817. This is similar to Slovakia, Greece and Cyprus. Latvia ranks 36th with a median of USD 33,884 and an average of USD 70,545, while Lithuania ranks 38th with a median of USD 29,679 and an average of USD 63,500. In other words, by adopting the Western model, the Baltic states have been able to better develop their economies. This helps to explain the disinterest in pursuing the Russian economic model by former Soviet republics.

Demographics is another threat for Russia. After the Soviet Union's collapse, the fertility rate of the Russian Federation fell below the replacement rate, reaching 1.2 in 2001. At the same time, death rates significantly increased. In the future, the problem will become worse. According to the United Nations World Population Prospects, by 2050 the Russian male population between the age of 18 and 40 will have declined to 18.4 million compared

to the current 22.7 million.¹³ In March 2022, President Putin approved a decree increasing the number of combat personnel to 1.15 million. To fulfil this objective today, Russia must recruit 5.1 percent of the male population between the age 18-40.

The Russian people's reaction following the introduction of mobilization on 21 September 2022 gives a hint that this goal will be difficult to achieve. Recruitment offices have been bombed in some cities.¹⁴ In Nizhny Novgorod, the authorities allegedly forbade reservists to leave the city. There were long queues at the border to leave Russia and enter countries that Russians can travel through without a visa or a valid passport.¹⁵ The FSB estimated the number to be near 260,000 émigrés in just four days. The price of a ticket from Moscow to Istanbul reached more than USD 5,000.¹⁶ Even Chechen leader Ramzan Kadyrov said Chechnya has already fulfilled its quota long ago.¹⁷ As a result of the mobilization, protests broke out in Dagestan and other ethnic minority regions. With battalion tactical groups (BTGs) only staffed around 40 percent and low troop morale, the war's continued mobilization is likely unsustainable.

Lastly, beyond questions of demographics and mobilization capacity, there is also the issue of the human capital skills of the Russian population, which is declining due to an ongoing brain drain exacerbated by the war. According to the Russian Association for Electronic Communications, as many as 70,000 tech works (or around ten percent of Russia's IT workforce) fled the country in the first month of the war alone.¹⁸ The same applies to other sectors too. Thus, much of the well-educated, entrepreneurial, and brains of Russia are leaving the country. Although their number might not be huge compared to the overall size of the Russian population, the potential for diversifying the Russian economy away from oil and gas by developing alternative sectors is dependent on precisely the workforce that is leaving in droves. This pattern will compromise not only the Russian economy but also the military industrial complex – and therefore the Russian Armed Forces – for years to come.

13 Russia increased the age limit for military personnel to 65 on May 25, 2022. The idea is to increase recruiting specialists such as physicians and engineers. However, for the purpose of calculating combat forces, the age bracket is 18-40.

14 A. Cullison and A. M. Simmons, "Russian military-recruitment centers attacked amid mobilization pushback", *The Wall Street Journal*, 26 September 2022.

15 N. Gizitdinov *et al.*, "In a major backfire, more Russians are leaving the country because of Putin's mobilization order than are actually joining the military", *Fortune*, 4 October 2022.

16 "Sources: FSB reports 260,000 men left Russia, wants to close borders", *Novaya Gazeta*, 26 September 2022.

17 "Chechnya Exempts Itself from Russia's Draft", *The Moscow Times*, 23 September 2022.

18 "Spetsialisty desyatkami tysyach uezhayut iz Rossii", CNews, 22 March 2022.

Aspirations and shortfalls

Russia has very ambitious geopolitical objectives, yet it lacks the capabilities to achieve them. This mismatch reflects Russia's poor level of economic and social development following the collapse of the Soviet Union. Moscow's policies over the past 3 decades resulted in de-industrialization, forcing the Russian economy to rely increasingly on oil and gas exports while investing less to diversify the structure of the economy. This imbalance has left Russia dependent on Western technologies for industry and thereby its military capabilities. This trend is expected to get worse in the future as a result of growing social inequality and the accelerating brain drain of skilled workers.

Notwithstanding the surprisingly strong performance of the Russian economy in the last months buttressed by high oil prices, sanctions will exacerbate the structural problems at the heart of Russia's economy in the long-term. Considering the waning reserve levels of non-Arctic oil and gas and the necessity of Western technologies to explore new fields in the Arctic, there are serious questions about possible hydrocarbon revenues in the future. The industrial sector has suffered, and the military industrial complex is struggling to produce the equipment needed to sustain Russia's war with Ukraine. Finally, demographic trends are deeply unfavourable, raising questions about Russia's capacity to recruit enough soldiers to maintain its large military. In summary, Russia's maximalism will be restrained by both hard and soft factors. It will be increasingly difficult for Moscow to attain the status of a great power that it so craves – even at a regional level.

Nuclear posturing in Russia's war with Ukraine: “offensive deterrence” in progress

Polina Sinovets

Declaring a so-called “special military operation” against Ukraine, Russian President Vladimir Putin emphasized: “No matter who tries to stand in our way or all the more so create threats for our country and our people, they must know that Russia will respond immediately, and the consequences will be such as you have never seen in your entire history”.¹ This quote, together with the official annexation of the Ukrainian territories and the constant Russian nuclear sabre-rattling during the following months, raised the question of a possible change in Russia's official nuclear strategy. There are several concerns, connected with the character of Russian nuclear policy, which makes the use of nuclear weapons in this conflict more likely, including Russia's “escalate to de-escalate” doctrine and Russia's wide use of dual-capable weapons in its war against Ukraine.

Has the war on Ukraine increased the likelihood of nuclear weapons use by Russia? Having regarded the range of scenarios for Russia's nuclear provocations, this chapter argues that Russia's invasion of Ukraine has made the use of nuclear weapons more probable, as Moscow has codified “offensive deterrence” as its official strategy. “Offensive deterrence” in this context means the strategy by which nuclear capabilities are used not only to deter the enemy's attack on one's home or allied territory but also to ensure an invasion of a sovereign state through the coercive threat of nuclear toward third parties.

Experts utilize two approaches to describe Russian nuclear signalling during the war. The first is that Russian nuclear rhetoric is based on bluffing, as Moscow's official statements have remained consistent with the doctrinal cases of using nuclear weapons.² The latter understands Russia to have a pretty high nuclear threshold and complies with

1 “Address by the President of the Russian Federation”, The Kremlin Office of the President, 24 February 2022. <http://en.kremlin.ru/events/president/news/67843>

2 B. Tertrais, “The Ukraine war: nuclear risks and consequences”, Trends, 19 July 2022, <https://trendsresearch.org/insight/the-ukraine-war-nuclear-risks-and-consequences/>

the 2018 Valdai Speech where President Putin declared: “Only when we know for certain – and this takes a few seconds to understand – that Russia is being attacked will we deliver a counterstrike[...] Of course, this amounts to a global catastrophe, but I would like to repeat that we cannot be the initiators of such a catastrophe because we have no provision for a preventive strike”.³

Concerning the first, some Russian experts point out that based on existing information “the military actions on the territory of Ukraine should not be regarded even as a regional war with a comparable rival”, and therefore the war is not connected doctrinally and practically with potential nuclear weapons use.⁴ The main idea of this approach is that the Russian nuclear strategy has not been affected by the war and is still in line with official doctrine, one that prescribes the use of nuclear weapons only to extreme scenarios when the state is jeopardized.

The second approach is based on concerns that Russia has changed the main provisions of its nuclear policy to include the invasion of Ukraine into the principle of “state survival in jeopardy”.⁵ This approach assumes that Russia may use nuclear weapons in Ukraine. This is consistent with frequent nuclear threats, coming from Russian officials, including Putin’s decision to place Russian nuclear forces on high alert in the early days of the war in Ukraine. Three months later, Russian Foreign Minister Sergei Lavrov pointed out the growing risk of nuclear war which could be triggered because of the West’s “irresponsible” policy of supplying arms to Ukraine.⁶

Then on 21 September, Putin underlined: “If the territorial integrity of our country is threatened, we will without doubt use all available means to protect Russia and our people – this is not a bluff”.⁷ No doubt the aim of such speeches are to enhance Russia’s nuclear deterrent credibility.

The aim of this chapter is to analyse Russia’s nuclear signalling during Moscow’s war against Ukraine, evaluating such scenarios and perspectives of deterring Moscow from nuclear use. It concludes with recommendations for NATO.

3 “Zasedaniye diskussionnogo kluba Valdai”, The Kremlin Office of the President, 18 October 2018, <http://kremlin.ru/events/president/news/58848>

4 D. Stefanovch, “Special warheads and the special military operation”, Russian International Affairs Council, 6 June 2022.

5 A. Arbatov, “The Ukrainian crisis and strategic stability”, Russian International Affairs Council, 18 July 2022.

6 “Russia-Ukraine war: Lavrov warns on risk of nuclear conflict”, 26 April 2022.

7 “This is not a bluff: Putin’s televised warning to escalate Ukraine war”, NDTV, 21 September 2022.

Russia's "escalate to de-escalate" strategy and the war in Ukraine

Russia's nuclear doctrine is often referred to as "escalate to de-escalate". It has been part of the Russian nuclear strategy for more than two decades and the evolution of its meaning can be divided into two phases. The first phase relates to existential deterrence, which lasted till 2014. The second phase is based on "offensive deterrence", where nuclear weapons are employed to assist Russia in securing new territorial acquisitions, including the Crimea annexation and the hybrid war in Donbas.

The idea of "escalate-to-deescalate" was first formulated in the early 2000s, when Russia was both substantially inferior to the West in terms of conventional military power and concerned not to repeat the destiny of Serbia in 1999. Operation Allied Force, initiated by NATO to protect Kosovo from the atrocities of the Milosevic regime had many similarities with the situation in which Russia found itself. For Russia, the parallels were clear: an authoritarian regime, suppression of the human rights and the Chechen wars (compared to Kosovo).

In the 2000 Russian Military Doctrine, Moscow stated the possibility of using nuclear weapons in a regional war "under critical circumstances when conventional means proved their inefficiency".⁸ This very clause survived for almost two decades, embedded in one form or another in subsequent military doctrines. Deterring conventional conflicts, especially regional wars, with nuclear weapons meant that nuclear weapons were regarded as a legitimate option in these types of conflicts.

Since 2010, Russian Military Doctrine has sought to connect nuclear weapons use with the existence of the state: "if the emerging conventional conflict puts the existence of the state in jeopardy, the possession of nuclear weapons may lead to the transformation of conventional conflict into a nuclear one".⁹ The meaning of "existential" in Russian doctrine, however, has always been vague, although this notion likely includes territorial integrity and the survival of the regime.

The 2014 Military Doctrine defined the beginning of the "offensive deterrence" phase in Russian nuclear strategy. The other term defining this strategy is called "the aggressive sanctuarisation".¹⁰ The document essentially repeated the 2010 Military Doctrine regarding the use of nuclear weapons under conventional attack "when the existence of the state

8 "Voennaya doktrina Rossijskoj Federatsii", *Nezavisimaya Gazeta*, 24 April 2000.

9 "Voennaya doktrina Rossijskoj Federatsii", The Kremlin Office of the President, 5 February 2010.

10 J. Gregorin, "Quelles nouvelles menaces, quelles ripostes, quelle dissuasion?", *Revue Defense Nationale*, No.532, June 1992, pp.43-49.

is in jeopardy”,¹¹ without clarifying the character of the threat. The 2014 doctrine came out when Moscow annexed Crimea, began its hybrid war in the Donbas, and accelerated military manoeuvres at the border with the Baltic states. The latter, together with the concentration of the Russian troops along the border and Russia’s provocations using strategic bombers in NATO airspace, caused anxiety in the West. However, considering that Russia lacks vital interests along its Baltic flank, it is likely that the Baltic region served as a coercive instrument for Russia rather than an object of geopolitical ambitions. The main aim of this strategy has been to provide additional leverage over NATO in deterring potential challenges to Russia’s territorial acquisitions in the Black Sea, the Crimea peninsula in particular.¹²

Concerning “existential threats” to Russia before 2022, there were some doubts about whether it included vital spheres of influence beyond the Russian mainland. On 24 February 2022, Russian President Putin highlighted the danger of deployment of the NATO infrastructure on the territory of Ukraine as a pretext for the invasion, also adding:

“For the United States and its allies, it is a policy of containing Russia, with obvious geopolitical dividends. For our country, it is a matter of life and death, a matter of our historical future as a nation. This is not an exaggeration; this is a fact. It is not only a very real threat to our interests but to the very existence of our state and to its sovereignty”.¹³

In this way, the “special operation” against Ukraine was justified by an officially declared “existential threat” to the Russian state. However, if the war in Ukraine can be qualified as an existential threat to Russia, does this *de-facto* invoke Russian nuclear doctrine, putting offensive deterrence at the forefront of its state policy?

The “Basic Principles of State Policy of the Russian Federation on Nuclear Deterrence” is the latest document describing Russian nuclear strategy. The content recalls excerpts from other Russian documents regarding situations and “red lines” related to nuclear weapons use. However, “Basic Principles” clarifies some of the ambiguity of previous documents. First, it states that the main aim of Russian nuclear deterrence is for “preventing the escalation of military actions and their termination in terms favourable for Russia”¹⁴ which, in light of the war on Ukraine, has made Russian nuclear threats more credible.

11 “Voennaya doktrina Rossijskoj Federatsii”, The Kremlin Office of the President, 26 December 2014.

12 P. Sinovets *et al.*, “The Russian roulette: the Kremlin’s escalation strategy in the Baltic Sea to the Black Sea”, *Lithuanian Annual Strategic Review*, Vol.19, No.1, 2021.

13 “Address by the President of the Russian Federation”, The Kremlin Office of the President, 24 February 2022.

14 “Basic principles of state policy of the Russian Federation on nuclear deterrence”, Ministry of Foreign Affairs of the Russian Federation, 8 June 2020.

In particular, "Basic Principles" codified deterrence for possible NATO interference in Ukraine and also encouraged consideration for using nuclear weapons if the war with Ukraine goes in Kyiv's favour. Such consideration has been reinforced by Russian political experts.: "Russia cannot afford to 'lose', so we need a kind of a victory. And if there is a sense that we are losing the war, then I think there is a definite possibility of escalation".¹⁵ Meanwhile nuclear *casus belli* in "Basic Principles" is connected with two cases:

The first is based on credible information of the launch of ballistic missiles toward Russian territory. This represents the "launch on warning" posture. "Basic Principles" intentionally ignored the type of warhead to emphasize that any missile launch aimed at Russia may trigger a nuclear response. This posture does not strengthen stability in a crisis because any early warning system failure could lead to nuclear escalation.

The second is based on an "attack by an adversary against critical governmental or military sites of the Russian Federation, disruption of which would undermine nuclear force response actions".¹⁶ Considering the fact that a significant part of Russian military infrastructure utilized for the attacks on Ukraine are concentrated in Crimea, one cannot exclude missile strikes on this territory by Ukrainian military forces as included in this category. That Ukraine would attack is reasonable, as Crimea hosts the main logistical base for Russia in its invasion in southern Ukraine. However, Russia has already demonstrated its sensitivity for attacks on Crimea as demonstrated by the unprecedented missile attack over the territory of Ukraine in response to the October 8th Crimean bridge explosion. In this regard, the reaction of Russia may vary from intensification of conventional missile strikes on Ukrainian territory to the limited nuclear use demonstrating a Russian "red line". Still, the probability of Russia using nuclear weapons against Ukraine is low, but it cannot be fully excluded because most of Russia's weapons used against Ukraine are dual capable.

Russian dual-capable weapons use against Ukraine and the arms control future

From the 1999 war in Yugoslavia to military campaigns in Iraq and Afghanistan, cruise missiles have played an important role in recent armed conflicts. Russian aggression in Ukraine is no exception. That said, Russia's use of these missiles together with nuclear

15 B. Mações, "Russia cannot afford to lose, so we need a kind of a victory: Sergey Karaganov on what Putin wants", *The New Statesman*, 2 April 2022.

16 "Basic principles of state policy of the Russian Federation on nuclear deterrence", 8 June 2020.

threats from its officials and state propagandists is exceptional. This combination carries a high risk of escalation.

Most Russian cruise missiles in use against Ukraine have been dual-capable, which means that they may be tipped with nuclear warheads if Russia so chooses. During the first months of the war alone, Russia used more than 2,300 missiles – approximately 30 per day, ranging from the most sophisticated models to the oldest, produced in the Soviet Union sometimes not even adapted to current conditions. For instance, in March, the Russian Ministry of Defence acknowledged having targeted Ukraine’s buried weapons storage in Ivano-Frankivsk and fuel storage in the Mykolaiv oblast with a hypersonic cruise missile known as “Kinjal”, while in recent months Russia used limited land-attack capability missiles. With respect to the latter, Russia used the 3K55 *Bastion-P* coastal-defence anti-ship missile and the Kh-22/32 air-launched anti-ship missiles in a strike against the Kremenchug shopping mall, killing 20 civilians.¹⁷ Russia is even deploying S-300 air defence missiles for offensive attacks against Ukraine. The use of missiles that are not fit for purposes means that strikes are less accurate and as a result there is a growing number of indiscriminate civilian casualties. This highlights Russia’s disregard for civilian casualties illustrated by Bucha and Mariupol.

According to the US Department of Defense, a significant percentage of Russian precision guided munitions are not effective, either “failing to launch, or they’re failing to hit the target, or they’re failing to explode on contact”.¹⁸ The rapid depletion of Russian missile stocks and poor kill-rate of their strikes raise the risk and incentives for using nuclear weapons.

In the long term however, the problem of using cruise missiles could be solved through various tools. For example, despite the demise of the Intermediate Nuclear Forces Treaty (INF), the treaty could become the starting point for new multilateral consultations focusing on the ground-based systems. The mandate, subject, and number of participants in such consultations are issues that the parties could start working on now at the expert level, guided by the desire to reduce the nuclear threat and minimize the risks to civilians in both the current conflict and in the future. More ambitious initiatives would include a complete ban on nuclear-armed cruise missiles.

Ahead of such consultations, parties could return to Russia’s proposed moratorium on the deployment of intermediate-range and shorter-range missiles in Europe after the

17 S. Roblin, “Why Russia is using old Kh-22 aircraft carrier killer missiles to hit Ukraine”, 1945, 29 July 2022, <https://www.19fortyfive.com/2022/06/why-russia-is-using-old-kh-22-aircraft-carrier-killer-missiles-to-hit-ukraine/>

18 “Senior defense official holds a background briefing”, United States Department of Defense, 21 March 2022.

end of INF.¹⁹ Looking at the frequency of long-range sea-launched missiles use against Ukraine, there is a serious reason to include these weapons in negotiations. This could start from returning to Russia's initiative to put a ban on the sea launched cruise missiles (which remained up to the beginning of the war), but considering possible constraints on the US position, efforts could also focus on a ban for nuclear tipped sea launched cruise missiles. The latter looks more achievable in the short-term, however, looking at the situation around Ukraine where almost 2/3 of missiles used against Ukraine are sea launched, the idea of initiating a discussion on the regional non-deployment of these weapons contribute to short-term risk reduction.

Also, moratoriums without verification are meaningless, as launchers and missiles can be moved in secret. Although Russia expressed openness to verification, it is impossible to imagine how this could be carried out now, given that Russia and Western countries did not achieve this level of transparency even before the war.

At the same time, the desire for such a moratorium in Europe, even without verification measures, during the war in Ukraine would give visible advantages to all parties. For Ukraine, this would mean that if introduced, the use of these weapons would cease (first temporarily and then for the foreseeable future), which would save both civilian lives and military (and civilian) infrastructure. For European countries, such a moratorium would bring reassurance that escalation could be reduced on NATO's Eastern Flank. Moreover, in the short term a cease-fire with Ukraine could be a precondition for beginning such talks with Russia.

A good example of this approach (but on the level of strategic weapons) was demonstrated by the US President Joseph Biden, who declared that he is ready to resume talks on the New START follow up treaty with Russia while at the same time underlining the necessity to show progress toward de-escalation: "negotiation requires a willing partner operating in good faith. And Russia's brutal and unprovoked aggression in Ukraine has shattered peace in Europe and constitutes an attack on fundamental tenets of international order. In this context, Russia should demonstrate that it is ready to resume work on nuclear arms control with the United States".²⁰ On the other hand, based on the new 2022 NATO Strategic Concept, the Alliance's belief in the possibility of arms control has drastically reduced since the war on Ukraine. Acknowledging the "erosion" of arms control, the document is more concentrated on keeping "open channels of communication with

19 "Russia expands moratorium on the INF-range missiles", Arms Control Association, November 2020.

20 "President Biden statement ahead of the 10th review conference of the Treaty on the non-proliferation of nuclear weapons", The White House, 1 August 2022.

Moscow to manage and mitigate risks, prevent escalation and increase transparency”.²¹

Potential scenarios of Russian nuclear weapons use in the war with Ukraine

Besides the multiple threats coming from the Russian authorities, differing interpretations of Russian nuclear doctrine, and the wide use of dual-capable weapons in Ukraine, there is a range of other risk factors. Russia’s decision-making mechanisms are known to be obscure. Its army disregarded nuclear security when it took control of the Chernobyl Nuclear Power Plant and has repeatedly struck the Zaporizhzhya Nuclear Power Plant, both of which could have (and may still) resulted in nuclear catastrophe. These examples demonstrate two points. First, there is a lack of general awareness among the Russian military regarding nuclear materials and the potential collateral damage that their actions could bring. Second, the unpredictable and non-professional nature of the Russian forces may result in nuclear catastrophe.

With this in mind there are three possible scenarios of nuclear use during in the current war:

- A successful counteroffensive operation of the Ukrainian forces could “threaten Putin’s political positions and the stability of his regime”.²² In such a scenario the Kremlin may use tactical nuclear weapons, and this is the view of former Ukrainian President Leonid Kuchma. Richard Betts made a similar argument when considering possible escalation, that Russia’s main aim would be to avoid complete defeat “by shocking Ukraine and its NATO supporters into standing down”.²³ Indeed, if the Kremlin ties its political existence with the possibility of defeat, this scenario becomes probable especially in light of growing weapons support from the West and success by Ukrainian forces.
- The war could spill over into Crimea or Russian territory. This scenario could be the result of Ukraine’s counteroffensive operation and the application of the new Western artillery systems. In May 2022 Putin himself emphasised that Russia had “sufficient quantities [of weapons] to strike those facilities that we are not attacking so far” hinting on the possible escalation of war if long range system missiles

21 W. Alberque, “The new NATO Strategic Concept and the end of arms control”, IISS, 30 June 2022.

22 L. Kuchma, “This is the tradition of the Nazis – to attack us at 4 am”, *The Odessa Journal*, 4 August 2022.

23 R. K. Betts, “Thinking about the unthinkable in Ukraine”, *Foreign Affairs*, Vol.102, No.1, 4 July 2022.

would be supplied to Ukraine.²⁴ Meanwhile the credibility of this scenario looks low enough as there is reason to believe that Russia is deterred by the NATO nuclear shield to the extent Moscow will not risk global nuclear war because of weapons supplies to Ukraine. To reduce risk in this scenario, strong signalling from NATO should leave no doubts about NATO's reaction to any Russian provocations in this regard.

- A nuclear escalation could be the result of faulty Russian early warning systems or a clash between Russia and NATO aircrafts with unintended casualties. Any situation miscalculation or unintended mistakes risks nuclear escalation because of the high tension between Russia and the West. However, the incident of 16 November 2022 when Poland's territory was struck by a missile, demonstrated that NATO was aware of this risk given its measured and deliberate response, to react only after a thorough examination of the nature of the event.

What next?

The war in Ukraine has opened a new chapter in Russia's nuclear strategy. It has *de facto* lowered the nuclear threshold having broadened the framework of Russian nuclear deterrence. In particular, "offensive deterrence" which appeared in 2014 to secure the annexation of Crimea, has since been expanded to deter "third parties" in preventing the Russian invasion of a sovereign state. On the one hand, the clause is reminiscent of Russian military doctrine from 2000, foreshadowing the use of nuclear weapons in regional wars (at the time, regional wars such as Chechnya were still about the legitimate territory of the Russian Federation). On the other hand, nuclear deterrence is now used to protect Russia's invasion of a neighbouring state. If not confronted, this strategy may lay the groundwork for Russian aggression against other states in Europe, including members of the Alliance.

It is also worth mentioning that the 2022 NATO Strategic Concept differs substantially from the 2010 document. First of all, Russia is explicitly named "the most significant and direct threat to Allies' security and to peace and stability in the Euro-Atlantic area".²⁵ This is not surprising considering that for Russia the war against Ukraine is in many respects a proxy war with the West. Moreover, the frequent exploitation of nuclear threats by the

24 A. Stanton, "What Russia has said About US Supplying Ukraine with Long-Range Missiles", *Newsweek*, 5 June 2022.

25 NATO 2022 Strategic Concept, adopted by Heads of State and Government in NATO Summit in Madrid, NATO, 29 June 2022.

Kremlin demonstrates its ambition and belief in the coercive utility of its nuclear deterrence. To some extent, this has been confirmed by the recent events, as in the initial stages of the conflict the US appeared to respond to Russian threats. The White House publicly reiterated its intention not to interfere directly in the Russia-Ukraine war and, when Russia declared it had put its nuclear forces on alert, the US subsequently cancelled a deal planned for Poland to supply Ukraine with Soviet-era MIG aircraft apparently in exchange for F-16 replacements.²⁶ The US also postponed a test-flight of an intercontinental ballistic missile (ICBM) allegedly to avoid provoking Russia.²⁷ For Moscow, such actions justified its nuclear deterrence in the war with Ukraine. Unlike Russian conventional plans and operations, which have been disappointing, the threat of nuclear weapons have been more effective in influencing outside supporters of Ukraine. From Moscow's perspective, this also affirms their understanding that the higher the stakes are, the less capable the West is to respond because western fears of a nuclear catastrophe are stronger than those of Russia.

Thus, the main aim of Russia's nuclear sabre rattling is to keep NATO at bay from what Russia has called its "sphere of vital interests", so that Moscow can transform these territories into a Russian controlled or pro-Russian environment. For the West, there is the real danger that this "sphere of Russian vital interests" will expand the more the West allows it to expand. If the "special operation" is successful against Ukraine, then Moldova and Georgia may be next.

In the meantime, NATO members have learned from this war, in particular, how to deter, in addition to being deterred. The United States has already demonstrated two approaches to deterrence. The first is deterrence by dissuasion exemplified by the declaration of increased weapons support for Ukraine after Russia's massive shelling against Ukrainian territory beginning in October. The second is deterrence by punishment, which is conducted through private channels. This approach aims to persuade Russia of the high costs of using nuclear weapons such that it would be unacceptable for Moscow. Over time, US deterrent signals became more credible for Russia since the probability of nuclear weapons being used in the war became higher. Suddenly, it was not just Ukraine at stake, but the whole architecture of the international nuclear order, which is paradoxically based both on nuclear deterrence and the tradition of nuclear weapons restraint.

In this regard, optimal strategies for NATO can be divided into two types: deterrence and defence on the one hand, and dialogue, risk reduction, and arms control measures on the other. Deterrence measures should be aimed to prevent Russia from blackmailing the

26 J. Borger and P. Wintour, "US dismisses polish plan to provide fighter jets to be sent to Ukraine", *The Guardian*, 8 March 2022.

27 P. Stewart and A. Idrees, "Exclusive: US Cancels ICBM test due to Russia nuclear tensions", Reuters, 1 April 2022.

West with nuclear threats by drawing a clear "red line" that any nuclear weapons use (or other nuclear catastrophes such as sabotage of nuclear power plants) would result in the immediate escalation of war and risk global nuclear exchange.

Such deterrence messaging should be aligned with an openness for dialogue, arms control and the risk reduction. Concerning dialogue, the optimal message to initiate talks would be that Russian arms control interests and concerns can be heard if Moscow demonstrates a willingness: to negotiate with Ukraine in good faith for a ceasefire; to draw down and halt military operations; and to respect Ukrainian sovereignty in the negotiations process. Arms control remains the field where Russia and the West both have overlapping interests and may still find common ground. Expert consultations may start as soon as possible, but for the time being transparency and risk reduction, while desirable, will be aspirations to work toward rather than realistic goals for today. It is also critical that any dialogue process involving arms control should be framed in the context of long-term goals, namely the signing of a new arms control treaty. Progress in the talks should be conditional on the short-term goals of drawing down the military conflict and reaching a ceasefire. While the proverbial devil is in the details, the point is to keep the overarching structure of dialogue aligned with Ukrainian, NATO and Russian interests for risk reduction.

Learning the wrong lessons? Russian views of the changing character of conflict

Tracey German

Russia's failure to achieve a swift, decisive victory over Ukraine since February 2022 has raised questions about the effectiveness of its long-running military modernisation while damaging the country's presentation of itself as a great power. It has also emphasised the significant gap between the theory and practice of war, and the perils of placing too much faith in technology at the expense of fundamentals such as troop morale and logistics. Russian failures in Ukraine are all the more surprising, as the country has invested considerable financial resources and intellectual horsepower into conceptualizing how future wars might be fought and the means that an adversary may use. The Russian focus on foresight [*predvidenie*] and prediction [*predskazanie*] of the future character of war – based upon a detailed analysis of previous conflicts, military theory, and the impact of technological, political, and societal change – is an enduring concern for Russian military leadership, part of efforts to gain some illusion of control over the uncertainty and unpredictability of war and conflict.

This chapter examines Russian military thinking on the character of contemporary war and the extent to which some of the assumptions of Russian military scholars may have been flawed, particularly regarding how wars would be fought in the future. The analysis focuses on precision strike and its role in contemporary conflict, which has been a key area of interest for Russian military scholars since the 1980s. This reflects a belief that high-precision weapons constitute a fundamental element of the changing character of conflict. The chapter argues that the war in Ukraine has challenged the enduring belief that technology is the central determinant of who wins wars whilst also demonstrating the critical nature of intangible factors such as morale. War is a social construct and human behaviour remains at the heart of it. Russian military science appears to neglect the centrality of human behaviour; whilst there is recognition of the importance undermining an adversary's will to resist, much of the analysis underestimates the impact of individuals

(rather than the collective “adversary”) in determining outcomes.

Shifting views after the Cold War

According to Russian military scholars, there has been a significant shift in armed conflict centred around how military force is exercised, with a shift from the use of massed armies to integrated, networked forces enabling long-range precision strike and targeting across all domains. Colonel-General Vladimir Zarudnitsky, head of Russia’s General Staff Academy, encapsulated Russian views on the character of conflict in a 2021 analysis, stating that the changing means of warfare in the 21st century had stimulated a transition from the physical destruction of the adversary to a complex impact on the adversary, achieved by a single integrated system that includes precision strike, reconnaissance, electronic and information warfare that have strategic, operational and tactical effect.¹ In light of the war in Ukraine, this seems aspirational. This high-tech vision of future warfare has not fully materialised, with the war instead bearing greater similarity to the two world wars of the 20th century.

Russia’s own experience of conflict during the post-Cold War era combined with its observations of Western interventions and analysis of emerging trends and concepts has been instrumental in shaping its views of the character of 21st century conflict. Russian assessments of the operational experience of both its own armed forces and of others confirmed the enduring relevance of certain key principles, including an emphasis on surprise and operational tempo, the importance of the initial period of war (IPW) and seizing the strategic initiative, and that technology had led to an evolution in warfare, with the development of long-range precision strike and network-centric warfare reflecting a shift from industrial to information societies.

Learning from the West

Russia’s observations of Western interventions in the post-Cold War era fostered a belief that the 1990s had heralded the development of a new paradigm of war, led by the United States (US) and fuelled by the information age: the 1991 Gulf War (Operation Desert Storm)

1 V. B. Zarudnitsky, “Kharakter i soderzhaniye voennykh konfliktov v sovremennykh usloviyakh I obozrimoi perspektive”, *Voennaya Mysl*, No.1, January 2021, pp.34-44.

and NATO's intervention against the Federal Republic of Yugoslavia in 1999 (Operation Allied Force) were deemed to be exemplars of this new approach, characterised by the central role of long-range precision strike and the critical role of information operations. Chekinov and Bogdanov characterised the 1991 Gulf War as the first war of a new era – a “new generation war” in the era of high technology. They argued that it was a departure from the classical wars of the past, demonstrating that technological superiority can negate an adversary's quantitative advantage in obsolete conventional weaponry, stating that “for the first time, ground forces of colossal proportions (half a million in number) had no impact on the pursuit of victory”.²

A key lesson drawn was the need to weaken the state, through both information operations and hostile encirclement, in order to deprive it of the will to resist. Overwhelming military superiority and network-centric warfare were deemed vital. Thus, according to the conclusions of a number of Russian analysts, the principal objective of warfare was no longer the destruction of an adversary's armed forces and physical seizure of territory but the ability to exhaust an adversary and undermine their will to resist. Vladimir Slipchenko³ developed the concept of sixth generation “contact-less” warfare on the basis of these operations, asserting that high-precision conventional weapons and electronic warfare would play a decisive role in contemporary conflict, with ground forces in a secondary role. According to Slipchenko, the principal aim of this type of operation is the destruction of an adversary's economic potential (including critical national infrastructure) along with a change of political regime, not the seizure and holding of territory, a significant difference from previous generations of warfare.

Role of technology

The focus on advanced technologies, in particular precision strike and networked systems, reflect Soviet-era thinking. During the Cold War, Soviet military thought focused on the impact of technological change on the balance of power between the Union of Soviet Socialist Republics (USSR) and the US, initially concentrating on the central role of

2 S. Chekinov and S. Bogdanov, “O kharaktere i sodержivanií voyni novogo pokoleniya” *Voennaya Mysl*, No.10, October 2013, pp.13-24.

3 Major General Vladimir Slipchenko taught at the Academy of the General Staff and focused on developing military science, in particular forecasting the character of future wars. He identified six generations of war throughout the history of mankind, from the first generation of warfare with edged weapons (such as spears, bow and arrows, swords) to the sixth generation of non-contact warfare. See V. I. Slipchenko, *Voyna budushchego: shestoye pokolenie*, Moscow, Moskovskii obshchestvennyi nauchnyi fond, 1999.

nuclear weapons.⁴ Under the leadership of the Chief of the General Staff Marshal Nikolai Ogarkov, in the 1980s Soviet military scholars identified a “military technical revolution”, a fundamental shift in the character and conduct of military operations driven by advanced nuclear weapons, the development of long-range precision strike conventional weapons, and information technology.⁵ Slipchenko’s sixth generation warfare constitutes the culmination of Ogarkov’s declaration in the 1980s that a military technical revolution was underway driven by high precision conventional weapons and information technologies. Ogarkov’s initial assertion was made purely on a theoretical basis; however, observation of the 1991 Gulf War and NATO’s 1999 Operation Allied Force provided Slipchenko with empirical evidence to support the theory. However, drawing lessons from the observation of others (or your own experience) can be highly problematic. Confirmation bias may lead individuals to focus on examples that support existing views or beliefs, while ignoring examples that challenge or contradict these views.

This form of bias is apparent in Slipchenko’s analysis of the 1991 Gulf War and 1999 NATO operation: the evidence provided by these campaigns appeared to support Ogarkov’s conclusions about the centrality of precision strike in contemporary warfare, amplifying Russian concerns about technological inferiority and being left behind in a new arms race. It also emphasises the imperative of context when seeking to analyse the action of others. Russian analyses of the US approach to military operations in the post-Cold War era failed to take into consideration the impact of US fears about repeating the experience of its interventions in both Vietnam and Somalia. Long-range precision strike and the perceived secondary role for ground troops in Operations Desert Storm and Allied Force were driven as much by a desire to avoid risking US casualties as by the application of a new way of warfighting.

Focus on precision strike weapons

Parallel to the Russian military scientists’ enduring belief in the primacy of technology is a persistent sense of their country’s technological inferiority, particularly vis-à-vis

4 A collection of articles published in the 1960s with the title ‘Problems of the Revolution in Military Affairs’ analysed the impact of nuclear weapons on warfare. W. R. Kintner and H. F. Scott, *The nuclear revolution in Soviet military affairs*, Norman, OK, University of Oklahoma Press, 1968. Sokolovsky explored the impact of new technologies on traditional components of military art, as well as the forms and methods of warfare, referring to a “revolution in military affairs”. Marshal V. D. Sokolovsky (ed.), *Military strategy: Soviet doctrine and concepts*, London, Pall Mall Press, 1963.

5 For a detailed analysis of the Soviet debates see M. C. Fitzgerald, “Marshal Ogarkov and the new Soviet Revolution in Military Affairs”, *Research Memorandum*, CRM 87-2, Washington, DC, Center for Naval Analyses, January 1987.

the US. Extensive observation of the operational experiences of foreign armed forces reinforced anxiety that Russia was lagging behind its strategic competitors and needed to adopt concepts such as network-centric warfare and the use of precision-guided munitions, alongside the formation of integrated forces.⁶

The simultaneous use of overwhelming military power, particularly with precision strike weapons and against a less capable adversary, was perceived to be both innovative and hazardous for Russia. Slipchenko maintained that in the early 2000s Russia remained in the fourth generation, focused on the contact warfare of era of the Great Patriotic War, while the US had been conducting non-contact warfare for over a decade. This reflects long-running concerns amongst military scholars and policymakers that Russia was lagging behind strategic competitors and was not preparing for the “right” type of war, prompting warnings that Russia “needs to pay attention: we are far behind. There is a covert high precision arms race in which we are as yet lagging behind”.⁷

Russia’s involvement in Syria reconfirmed to political and military leaders that the development of precision guided munitions should remain a priority: *Kalibr* missiles launched from the Caspian Sea were used to strike targets over 1500km away in Syria, demonstrating the evolution of Russian thought and new capabilities in precision strike.⁸

Russia’s Syrian operation was held up as its first Western-style intervention fought mostly at distance, either through the use of long-range precision strike or through proxy forces. Russian Defence Minister Sergei Shoigu claimed that Russian troops had to learn to fight in a new way in Syria.⁹ The use of high-precision long-range missile strikes was deemed by some to be an effective means of pre-empting an adversary and therefore ensuring that Russia has the advantage.¹⁰ It was believed this type of strike enabled a strategy of “selective action”, whereby surgical strikes are directed against critical targets, inflicting high costs against an adversary at a low cost for the protagonist.¹¹

6 V. Litvinenko and S. Yastrebov, “VTO: vzglyad v budushchee”, *Armeiskii sbornik*, 8 August 2017, pp.9-17.

7 Slipchenko in Gareev and Slipchenko, p.23.

8 See for example OV Tikhanychev, “O roli sistemicheskogo ogneвого vozdeistviia v sovremennykh operatsiakh”, *Voennaya Mysl*, No.11, November 2016, pp.16-20.

9 M. Rostovskii, “Sergei Shoigu rasskazal kak spasal Rossiiskuyu Armiyu”, *Armeiskii Sbornik*, No.11, November 2019, p.9.

10 See, for example, V. V. Kruglov and A. S. Shubin, “O vozrastayushchem znachenii uprezhdeniya protivnika v deistviakh”, *Voennaya Mysl*, No.12, December 2021, pp.27-34.

11 M. P. Stepshin and A. N. Anikonov, “Razvitiye vooruzheniya, voennoi i spetsial’noi tekhniki i ikh vliyaniye na kharakter budushchikh voyn”, *Voennaya Mysl*, No.12, December 2021, pp.35-43. They also argue that the adoption of hypersonics means that future war will be global in nature.

Russia's war with Ukraine

Consequently, the Russian political and military leadership was perhaps overly confident in the utility of conventional high-precision weapons to achieve success during its invasion of Ukraine in 2022, which witnessed significant use of Russia's precision-strike capabilities such as the *Iskander* missile. However, precision strike did not have the intended effect during the opening days of the Russian invasion. Moscow appeared to be working on the assumption that missile strikes and a large-scale invasion of ground forces would lead to a swift surrender by the Ukrainian government, underestimating the strength of Ukrainian resolve to resist and defend their homeland.

In a highly critical (and prescient) article published in early February 2022, Mikhail Khodarenok, a former colonel who worked within the General Staff's Main Operational Directorate, accused Russia's expert community of "hat-throwing fantasies" regarding a possible invasion of Ukraine. He disputed claims that Russia would be able to inflict a rapid defeat on Ukraine, arguing that "to expect to crush the armed forces of an entire nation with just one [...] blow is to show unbridled optimism in the planning and conduct of hostilities".¹² Warning that there was a complete ignorance of both the military-political situation in Ukraine and the level of animosity towards Moscow (described as the "most effective fuel for an armed struggle"), he cautioned that:

No one will meet the Russian army with bread, salt, and flowers in Ukraine. Events in south eastern Ukraine in 2014 seem to have taught no one anything. Then they also expected that the entire left-bank Ukraine would turn to Novorossiia [...] in a matter of seconds.¹³

One of the key problems he identified with the Russian expert community's assessments of a hypothetical invasion was the assumption that Russia would have complete dominance of the air, which would facilitate a rapid victory. In his view, this ignored the lessons of Afghanistan and Chechnya, two examples of protracted wars where the adversary did not have any air assets, as well as Georgia in 2008, where Russian forces struggled to overcome Georgian air defences. Khodarenok's analysis provided a clear-eyed assessment of the challenges that might confront an invading Russian force, in particular the Ukrainian will to resist, and he concluded that Russia would face an uphill battle, rather than the easy one

12 M. Khodarenok, "Proгноzyi krovozhadnyikh politologov", *Nezavisimoe voennoe obozrenie*, 3 February 2022.

13 *Ibid.*

being anticipated. He also drew attention to the dangers of placing too much hope in high-tech weaponry, warning that stocks of high-precision weapons were not limitless:

Tsirkon hypersonic missiles are not yet in service. The number of *Kalibrs*, *Kinzhal*s, Kh-101 (air-launched cruise missiles) and *Iskanders* is at best measured in hundreds (dozens in the case of the *Kinzhal*). This arsenal is completely insufficient to destroy a state the size of France and a population of more than 40 million people.¹⁴

This is not the first time that the Russian leadership has overlooked the role of human behaviour in tipping the military balance, focusing instead on quantitative superiority. Commentators are beginning to draw parallels between Russia's performance in Ukraine and historical failures. In a recent article in *Nezavisimoe voennoe obozrenie*, titled "Unlearned lessons from the Finnish campaign", Aleksandr Khamchikin, a well-known defence analyst, criticised the Russian failure to learn lessons from the 1939 Winter War between the USSR and Finland, particularly the Kremlin's under-estimation of its adversary's will to resist and its apparent conviction that "Finnish workers only dreamed of joining the fraternal family of the Soviet peoples, so they would not put up any resistance".¹⁵ The parallels between this historic campaign and Russia's failure to achieve a swift, decisive victory over Ukraine in 2022 are striking: over-ambitious objectives set by political leaders and a Soviet force with a huge numerical superiority in terms of manpower and technology struggled to make progress against a smaller, highly motivated adversary and suffered significant losses.

The lessons that Russia derived from the 2003 coalition invasion of Iraq make its initial failure in Ukraine in 2022 even more surprising. A number of Russian military scholars concluded that achieving air superiority was critical in contemporary operations, something that the Russian military has never attained in Ukraine. Tsyganok also criticised the US and its Western allies for over-estimating the capabilities and impact of high-precision weapons as the decisive factor in contemporary warfare, arguing that the political isolation of leaders constitutes the decisive element rather than military superiority.¹⁶ Efforts to isolate Ukraine's president Volodymyr Zelensky in 2022 (and before) were ineffective, and the Russian invasion bolstered his legitimacy. There also appeared to be an (incorrect) assumption that Russia was militarily superior to its western neighbour and that this would facilitate an easy victory, overlooking the fact that the Ukrainian armed forces were a very

14 *Ibid.*

15 A. Khamchikin, "Nevyuchennyye uroki finskoi kampanii", *Nezavisimoe voennoe obozrenie*, No.16, 29 April 2022.

16 "Uroki i vyivody iz boiny v Irake", *Voennaya mys'*, No.8, 2003, p.76.

different force to that of 2014.

Technology has played an increasingly important role in Ukraine as the war has progressed, with remotely piloted aircraft (RPAs) and electronic warfare becoming more and more significant. RPAs have played a critical role for both Ukraine and Russia. During the early months of the war, Ukrainian forces used its Turkish-built Bayraktar TB2 RPAs to destroy a significant amount of Russian equipment in an attempt to slow Russia's advance.¹⁷ While their usage and success became much more limited once the Russian military focused its main effort on eastern Ukraine's Donbas, where Russia has a large number of anti-aircraft systems, the TB2 initially inflicted significant damage on Russia's military capabilities. For their part, Russian forces have used the Orlan-10 reconnaissance RPAs to support artillery fires. However, despite widespread theoretical discussion and debate about their role in recent years, the Russian military appeared unprepared for the impact of RPAs during their initial invasion, further highlighting the disconnect between the theory and practice of war.

The primacy of the human element

The war in Ukraine has challenged the enduring belief that technology remains the central determinant of how war is fought, demonstrating that technological aspects are not necessarily the only critical element of a war. The human element remains fundamental. This provides a cautionary tale for all states about the dangers of technological determinism and the myth of perpetual progress. Whilst tangible factors such as military capabilities and technology are easy to quantify, the war in Ukraine has emphasised the criticality of intangible factors such as morale and the will to fight and resist. Human behaviour lies at the heart of war and conflict, increasing the unpredictability and uncertainty surrounding it.

Attempts to impose a rigid scientific approach to understanding war may encourage misplaced confidence and the belief that all eventualities have been thought through. This overlooks the gap between theory and practice and underestimates the agency of individuals. As Khramchikin states “when preparing an operation, the country's leadership should proceed from the real situation [...] Exercises and parades are one thing, but military operations are completely different”. Russia's invasion of Ukraine also highlights

17 For details of the Russian military equipment reportedly destroyed by the TB2, see S. Mitzer *et al.*, “Defending Ukraine: listing Russia military equipment destroyed by Bayraktar TB2s”, *Oryx*, 27 February 2022.

the dangers of preparing to fight the last war: despite considerable financial, and intellectual investment in understanding what future war will look like, Russian military science (and its approach to forecasting) was perhaps overly influenced by the experience in Syria. The imperative of continuous learning within military organisations must be balanced against the inherent difficulties in learning the correct lessons (as opposed to wishful thinking and validation of existing conclusions and decisions), emphasising the importance of red-teaming to challenge assumptions and conclusions.

Moving forwards, the sanctions imposed on Russia as a result of its invasion of Ukraine are very likely to hinder the advance of its military, particularly the hope that technologies such as Artificial Intelligence (AI) would play a significant role in the future development of the Russian armed forces. A lack of access to critical components, such as microchips and semi-conductors, will undoubtedly have some effect on the Russian defence industrial base, particularly in the production of advanced systems and precision-guided munitions. Consequently, the Russian leadership is likely to bolster its use of crude economic levers to break the will of both Ukraine and its allies. Russia is deploying the full force of its energy weapon against European states and in the midst of winter, there are still questions about the ability of countries to endure the consequences of Russian shut-off of natural gas supplies. Many countries are already struggling with the widespread impact of soaring prices on their economies and societies. Putin appears determined to stay the course in Ukraine, likely calculating that Western interest and support for Ukraine, as well as its collective unity, will run out long before Russia's ability to sustain its military offensive.

Twilight of the technocrats and the triumph of autocracy in late Putinism

Mark Galeotti

The evolution of Vladimir Putin's Russian state has been marked by two increasingly divergent trends. The first is the recreation of an often-corrupt but essentially rational, bureaucratic apparatus and approach to statecraft, shaped by negotiations between stakeholding interests, standard procedures, and iterative decision-making processes. The second is the emergence of a secular monarchy, with decision-making, especially on strategic priorities, being the preserve of a single ruler operating increasingly without meaningful checks and balances. The head is informed by a shrinking circle of allies and confidants that he himself selects, and whose roles are often fluid, bearing little resemblance to their formal positions.¹ These two trends collided with particularly destructive force in the February 2022 invasion of Ukraine.

Russia's way of war (in theory)

Although, there has never been any doubt in the later Putin era that the president is not simply the commander in chief but the ultimate decider of all significant policy issues, there nonetheless was a sense that his actions would operate within the framework of the bureaucratic order. At the very least, it was presumed that while the tsar may set the course, the technocrats would manage the ship. Thus, the Cabinet of Ministers would administer the nation, the Central Bank would manage macroeconomic policy, and the General Staff would plan and execute those wars President Vladimir Putin wanted to fight.

¹ I have described this as “adhocracy” in the past. See, for example, M. Galeotti, *We need to talk about Putin: how the West gets him wrong*, Ebury Press, London, 2019.

To this last end, an extensive and complex apparatus of doctrine, procedure, and practice had been developed to define and organise military operations. Russia's Military Doctrine, for example, envisages six different types of war or conflict, of which this invasion would be considered at least a "local war" – one fought over specific military-political objectives and confined to the warring states – but which arguably could be rated as a "regional war" involving more than two nations, given the West's heavy involvement.² Either way, there is an equally clear process to be applied in preparing for such a serious undertaking. Crucially, well in advance a Combat Management Group (GBU: *Gruppa Boevogo Upravleniya*) would be stood up within the National Defence Management Centre (NTsUO: *Natsionalnyy Tsentr Upravleniya Oboronoj*), the main command and control structure, buried in the basement of the Defence Ministry building on Frunze Embankment.³ The role of the GBU is not to be an operational command structure but instead to establish the task force necessary for any mission and then set broad strategy, monitor progress, and ensure that the commanders on the ground have what they need to do their job. As a result, these GBUs are mission specific, in place for as long as a crisis may last and with a composition appropriate to the operation. While led by officers from the General Staff's Main Operations Directorate, they will draw on other NTsUO staff and whoever else may be needed from other military services or even outside structures. The hurriedly-convened GBU coordinating the deployment of Collective Security Treaty Organisation (CSTO) forces to Kazakhstan in January 2022, for example, also included liaison officers from both the Foreign Intelligence Service (SVR: *Sluzhba Vneshney Razvedki*) and the Foreign Ministry.

The GBU will ensure not only that the task force has an adequacy of forces and supplies, it will also put in place a unitary operational field command, typically based either in a Military District (which will become a Joint Operational Command), an Army HQ, or, for overseas deployments, a Command Post of a Group of Forces (KPGV: *Komandnyy Punkt Gruppirovki Voisk*). Typically, a contingent ideally able to concentrate a three-to-one local military advantage would be assembled and then, after a Massed Missile-Aviation Strike (MRAU: *Massirovaniy Raketno-Aviatsionnyy Udar*)⁴ meant to suppress enemy air defences, break lines of communications, and disrupt and demoralise the enemy troops, combined with devastating cyberattacks, would roll across the border along a few axes in a carefully

2 See, for example, L. Grau and C. Bartles, *The Russian way of war*, Foreign Military Studies Office (FMSO), Ft. Leavenworth, KS, 2017; M. Kofman *et al*, *Russian military strategy: core tenets and operational concepts*, Center for Naval Analyses (CNA), Washington, DC, 2021.

3 "Natsionalnyy tsentr upravleniya oboronoj Rossijskoj Federatsii", Ministry of Defence of the Russian Federation (Mil.ru), https://structure.mil.ru/structure/ministry_of_defence/details.htm?id=11206@egOrganization

4 The term originally arose to reflect Russian notions of US practice, but as it has begun to be replaced in that role with Integrated Massed Air Strike (IMVU), MRAU has crept into use for a Russian preliminary strike

coordinated combined-arms operation. The aim would not be so much to seize and hold territory, but to shatter the cohesion of the enemy state and its capacity to field and use its forces.

This is how the Russian armed forces prepare, train, and plan to fight. It is the kind of model witnessed in the regular *Zapad* (West) strategic exercises⁵ and at once plays to the Russians' strengths and seeks to minimise the impact of their continuing weaknesses. An unwillingness to grant lower-level commanders much freedom of manoeuvre, sluggish resupply, hidden shortfalls caused by corruption, and the like are not issues of which the High Command is unaware. However, through detailed preparation, judicious oversupply and seizing and maintaining the initiative, this approach is meant to ensure they are not crucial and may be overcome.

The “Special Military Operation”

Of course, the so-called “Special Military Operation” (SVO: *Spetsialnaya Voennaya Operatsiya*) was nothing like this. Although a massive military force had been assembled since spring 2021, it was not properly prepared, either organisationally or mentally, for an invasion that most of its officers and soldiers did not believe would take place. For example, an intercepted voice message between Chechen leader Ramzan Kadyrov and Colonel Daniil Martynov, commander of the Chechen National Guard contingent in the invasion, had Martynov recounting with glee the dismay of his fellow commanders when they were gathered in the week before the invasion to be informed what was about to happen.⁶ According to unconfirmed accounts, the GBU was only formally stood up one or two days before the actual invasion, not the months or weeks that an operation of such a scale required. Most units had ammunition and other stocks for just two weeks of fighting. The pre-invasion bombardment was much more restrained than a “proper” MRAU would have been expected, and left Ukraine's air defences unsuppressed and its air force still able to fly. Meanwhile, the Russians, focusing on the taking of territory rather than the destruction of enemy forces, were advancing on a large number of axes. Indeed, for months there was apparently no single field commander but three or four local commanders (from the Central, Western and Southern Military Districts, as well as Crimea) virtually running their

5 M. Kofman, “Zapad-2021: what to expect from Russia's strategic military exercise”, *War on The Rocks*, 8 September 2021.

6 “V pajonye Majdana ili Kreshchatika tantsy podgotovym’. Shto cheloveku s golosom Kadyrova dokladyvali nakanunye vtopzheniya Rossii na Ukrainu”, *BBC Russian*, 26 February 2022.

own private wars.⁷

It is not that the Russian high command had forgotten all its own tradecraft, but rather that the SVO was an invasion originated, planned, and ordered from within Putin's inner circle, without serious participation (and honest comment) by the professional soldiers. As such, it was a striking and, for the Russians, devastating example of how autocracy can trump technocracy. Although it is still difficult to unpack the decision-making processes at work, forcing us to rely on declassified intelligence reports, official statements, and outright rumour, nonetheless it does seem clear that at every stage, informal rather than formal mechanisms shaped policy, with official channels too often distorted by factional interests and an established practice of flattering rather than challenging the consensus.

Brewing the storm

Putin has undoubtedly long held some questionable views about Ukraine, its historical connection with Russia, and the nature of its government after the 2014 Revolution of Dignity.⁸ Nonetheless – and this begins inevitably to veer into speculation – these views seem to have metastasised during his lengthy period in isolation because of the COVID-19 pandemic. For whatever reason, he was enclosed in a draconian biosecurity regime that meant even his closest allies needed to undergo two weeks in full isolation before they could meet him in person.

Putin continued to hold meetings by video link, but there is a physicality to power; it is no coincidence that Putin is known as “the Body” by both his security team and the Presidential Administration. Some figures such as hawkish Security Council Secretary Nikolai Patrushev and Rosneft head Igor Sechin were able to maintain a schedule of spending half of most months in isolation so as to maintain that direct connection with the president, but prominent technocrats such as Prime Minister Mikhail Mishustin and Presidential Administration Chief Anton Vaino often could not, especially because of their duties directly managing the pandemic, attenuating their relationship with Putin.

In the process, the intelligence services and the hawks in Putin's entourage – two groups

7 For some good critiques of the early stage of the war, see Lawrence Freedman, “Why war fails”, *Foreign Affairs*, July/August 2022; J. Watling and N. Reynolds, *Operation Z: the death throes of an imperial delusion*, Royal United Services Institute (RUSI), London, 2022; J. Edmonds, “Start with the political: explaining Russia's bungled invasion of Ukraine”, *War On The Rocks*, 28 April 2022.

8 Perhaps best evident in his article “On the historical unity of Russians and Ukrainians”, released on 12 July 2021 on the Kremlin website, <http://en.kremlin.ru/events/president/news/66181>

that overlap heavily but are not quite the same – were better positioned to push their own interests. An invasion of Ukraine, after all, carried with it a variety of other potential opportunities. If successfully carried out according to their approach, it would demonstrate their value to Putin and the nation. It would excuse their demands for greater budgets. For those who advocate on ideological grounds for greater state control of the economy, it would be an excuse to press their case again (and, indeed, immediately after the invasion, Patrushev began arguing the need for wider economic mobilisation)⁹. For officials who felt their careers stalled, it created new chances to reinvent themselves as hawks (as erstwhile liberal hope Dmitri Medvedev has done, affecting a new persona of rabid ultra-nationalist)¹⁰ and potential colonial proconsuls (with both semi-disgraced head of Roscosmos, Dmitri Rogozin, and First Deputy Head of the Presidential Administration, Sergei Kirienko, spying opportunities¹¹).

More importantly, perhaps, Putin reportedly isolated along with his old friend, Yuri Kovalchuk, the billionaire chairman and largest shareholder in Rossiya Bank. The two men share a common sense of not just Russian manifest destiny but also the unity of the Orthodox Slavic world, and commentator Mikhail Zygar has argued that the two men fed off each other's sense of historic grievance, generating a determination on Putin's part to prevent – as he saw it – Ukraine from “betraying” Russia.¹² In particular, what Putin would raise in his subsequent speeches was not so much a concern about Ukraine joining NATO as that it could become a forward base for Western aggression: in November 2021, for example, he raised the spectre that if “some kind of strike systems appear on the territory of Ukraine, the flight time to Moscow will be seven to ten minutes, and five minutes in the case of a hypersonic weapon”.¹³

Indeed, it was quite possibly another personal connection that tipped the balance. In February 2021, the Ukrainian authorities moved against oligarch and politician Viktor Medvedchuk, a long-time ally – some would say agent – of Putin's in Kyiv. His channels were taken off the air, his family's assets seized (including a pipeline taking Russian oil to Europe), and he would later be put under house arrest. However, Medvedchuk is a personal friend – Putin is even godfather to his daughter – and this appears to have enraged the Russian president. That the US embassy praised the moves was, to him, “proof” that

9 See, for example, “Nikolaj Patrushev: ‘Sredi priopitetov sovbyeza – ukrepyeniye nyezavisimosti RF’”, *Argumenty i Fakty*, 1 June 2022.

10 “‘I hate them’: Dmitry Medvedev's journey from liberal to anti-western hawk”, *The Guardian*, 1 August 2022.

11 “Dmitriya Rogozina nazyvayut osnovnym kandidatom na dolzhnost' polpreda na novykh territoriyakh”, *Vedomosti*, 27 September 2022; “Politiki novogo zhyesta. Kak vojna zapustila v Rossii gonku preyemnikov”, *Carnegie Politika*, 29 July 2022.

12 “How Vladimir Putin lost interest in the present”, *The New York Times*, 10 March 2022.

13 “Putin warns Russia will act if NATO crosses its red lines in Ukraine”, Reuters, 30 November 2021.

Washington was actually behind this personal attack and proof that the United States was seeking, as he put it, to turn Ukraine into “some kind of polar opposite of Russia, some kind of anti-Russia”.¹⁴ Just two days after the initial move against Medvedchuk, the Kremlin announced the first, relatively small deployment of troops to the Ukrainian border, starting what would be a massive build-up through 2021.¹⁵

Planning the SVO

All this – however tentative – revolves around Putin’s personality: his relationships, his attitudes to Ukraine, perhaps even his sense that he needed a triumph to provide a fitting capstone to his historical legacy. What is especially indicative is what happened when those personal feelings met the technocracy: the technocracy had to give.

There has long been a clearly visible pattern emerging that Putin is neither confronted by contrary opinions nor challenged by inconvenient facts. Although there is no reason to believe that the intelligence agencies collect accurate information with quality analysis, by the time briefings are prepared for the senior elite they are, as one retired intelligence officer put it, “edited into comfortable fictions”.¹⁶ Certainly, assessments from Western sources have raised this as a serious concern for years. During the war itself, there has been a growing body of official and semi-official warnings that the president is routinely misled, whether by intelligence services concurring with his unrealistic expectations of victory or the military as to the scale of losses on the battlefield.¹⁷ Putin was apparently told what he wanted to hear, not what he needed to hear, and likewise, if he had a firm, long-term intention of invading, he seems not to have felt the need to share that with his leadership team. It is not just that the military preparations were rushed, as already discussed, but that the whole government response was pulled together at the last minute.

There seems to have been little to no meaningful debate about his eventual decision to invade. Although only limited weight can be given to any one event, especially one which was televised and thus inevitably had an element of the performative about it, the now-infamous Security Council meeting of 21 February 2022 was a chilling example of

14 “Putin says Ukraine is becoming an ‘anti-Russia’, pledges response”, Reuters, 14 May 2021.

15 “The untold story of the Ukraine crisis”, *Time*, 2 February 2022.

16 Conversation with the author, Moscow, 2015.

17 See, for example, “Putin misled by ‘yes men’ in military afraid to tell him the truth, White House and EU officials say”, Reuters, 31 March 2022; “Ukraine war: Putin being misled by fearful advisers, US says”, BBC, 31 March 2022; “Putin’s suspected purge of his inner circle was fuelled by a misinformation bubble he created”, *Business Insider*, 18 April 2022.

the degree to which powerful and presumably well-informed figures can be forced into cringing obeisance when they do not accurately repeat Putin's approved message.¹⁸ Although technocrats such as Central Bank chair Elvira Nabiullina have expressed their concerns, they are by no means his closest confidants. While there is ample reporting that many Russian officials, perhaps even most of them, have serious concerns about the war, this is not being communicated to the top of the system.¹⁹ Only in October did the *Washington Post* report that "a member of Vladimir Putin's inner circle has voiced disagreement directly to the Russian president in recent weeks over his handling of the war in Ukraine, according to information obtained by US intelligence".²⁰ Whether or not this is true, it speaks volumes that it may have taken almost eight months of a disastrous war before anyone dared express such views.

The two fronts

Calling the invasion an SVO instead of a war was not simply a piece of propaganda. It also seems to have reflected Putin's own assumptions about its nature. He seems genuinely to have believed that a failing Ukrainian state would collapse, that most Ukrainians would welcome the Russians with joy, or at least acquiescence, and that President Volodymyr Zelenskyy would either flee or be arrested. Meanwhile, a massive network of agents and sympathisers recruited by the intelligence services would legitimise the invasion and disrupt any attempt at resistance.²¹ Within two weeks, a puppet regime would be in place in Kyiv, combat operations would be confined to the pacification of a few holdouts, and the West would be presented with a *fait accompli* before it would have a chance to respond or intervene. Putin would have his triumph, and the soldiers ordered to pack their parade uniforms would be marching through Kyiv.

This helps explain so much about the initial attack, from the lack of proper supplies and preparations to the decision to launch a lighter than expected MRAU: why destroy assets you expect soon to control? This appears to be war as envisaged by the intelligence and security community, and certainly demonstrates the degree to which the military high command was marginalised, ignored or forced to bow to the Kremlin's will. The Federal

18 "Zasyedaniye Sovyeta Byezopasnosti", The Kremlin Office of the President, 21 February 2022.

19 "Almost nobody is happy with Putin", *Meduza*, 24 May 2022.

20 "Putin confronted by insider over Ukraine war, US intelligence finds", *Washington Post*, 7 October 2022.

21 "Russia's spies misread Ukraine and misled Kremlin as war loomed", *Washington Post*, 19 August 2022.

Security Service (FSB), in particular, appears to have massively over-stated the loyalty, scale and effectiveness of its agent network in Ukraine, and this clearly shaped the Kremlin's unrealistic notions of how it could, in effect, scale up the Crimean annexation to a whole country.

Nonetheless, the degree to which Putin is unable or unwilling to change his style of rule and discipline his closest allies continues to be clear. There were early reports that General Sergei Beseda, head of the FSB's Fifth service (officially the Service of Operational Information and International Relations), had been arrested and sent to Lefortovo Prison.²² However, these have since been questioned, and Beseda may still be in post.²³ While there have been some dismissals of field commanders (such as Black Sea Fleet commander Admiral Igor Osipov, following the sinking of his flagship, *Moskva*)²⁴, none of the principals have suffered any evident repercussions as of November 2022. To be sure, Defence Minister Shoigu faces regular public excoriations, notably from such figures as Chechen leader Ramzan Kadyrov and Evgenyi Prigozhin, manager of the Wagner Group mercenary force. Nonetheless, in his role as Putin's "flak vest", soaking up criticisms that might otherwise be directed at the commander-in-chief, he has so far survived them.

However, no apparent political harm seems to have been done to any of the key principals from the security agencies. FSB director Alexander Bortnikov, whose service arguably did most to create a misleading picture of the situation in Ukraine, is considered likely soon to retire on grounds of his age and health, but otherwise remains in his position. SVR director Sergei Naryshkin, despite his public humiliation by Putin – which some suggest was because he was critical of the decision to invade – continues to maintain a high public profile. National Guard commander Viktor Zolotov, despite the indifferent performance of many of his men in Ukraine (reflecting the fact that they are trained and equipped for public order missions, not mechanised warfare) likewise shows no sign of political discomfort, even while admitting that "not everything is going as fast as we would like".²⁵ As for Nikolai Patrushev, the influential secretary of the Security Council and one of the driving forces behind not just the invasion, but subsequent efforts to use that as reason for militarisation of the economy, he has acquired a higher profile than ever. Along

22 "Putin nachal repressii protiv 5-j sluzhby FSB. Imenno ona nakanunye vojnye obespyechivala prezidenta Rossii dannymi o politicheskoy situatsii v Ukrainye", *Meduza*, 11 March 2022.

23 "Byesyeda na doprosye. Dyejstvit'no li arestovan glava 5-j sluzhby FSB", *Dossier Centre*, 13 March 2022. <https://fsb.dossier.center/beseda/>; "RTVI: glava 5-j sluzhby Sergej Byesyeda posetil pokhorony veterana razvedki. Zhurnalisty soobshchali o ego aprestye", *Meduza*, 29 April 2022.

24 "Kto teper' komanduyet na Chernom morye", *Nezavisimoe voennoe obozrenie*, 27 October 2022.

25 "Zolotov pro voyennuyu spetsoperatsiyu na Ukrainye: nye vsye idyet tak bystro, kak khotyelos' by", *Kommersant*, 13 March 2022.

with his usual schedule of diplomatic trips to allied states, he is more regularly on Russian media than in the past.

Personal ties over institutions

Based on the Ukrainian invasion, power in the late Putinist era is clearly vested not so much in institutions, but personal ties with the president. The role of institutions is primarily to execute rather than influence the policies that emerge from the monarch's court. Even the most powerful technocrats within the system, such as Prime Minister Mishustin and Moscow Mayor Sergei Sobyenin, are relegated to a secondary status. Still, it is not that they have no role within the system. It was, for example, an alliance of Mishustin, Nabiullina, and Vaino who persuaded Putin initially to maintain the mixed economy in February-March, in the face of Patrushev's campaign to push forward enhanced state control. However, this was on a relatively narrow issue relating to their areas of expertise, and it apparently took Nabiullina's threat to resign to get them access to Putin and argue their case.²⁶ Likewise, the generals – technocrats in uniform – have had trouble persuading the Kremlin to listen to their needs, from mobilisation (partially adopted in September, even though it was first mooted by the military in spring) to such specific decisions as withdrawing from the city of Kherson (which reports suggest the generals have been wanting to do since September).²⁷

Putin is still happy to trust the technocrats to administer his state for him, but their traction on strategic policy making, never especially strong, appears now to be negligible. It is unlikely that Putin will recognise this as a problem, let alone address it, but it will likely be a defining question facing his successor, whomever and whenever that may be. For now, though, it is hard to escape the suspicion that not only by prompting the disastrous invasion but also by more generally elevating courtiers at the expense of experts and practitioners, it is symptomatic of the way that the man who founded Putinism is now also burying it.

26 "Putin otklonil pros'bu Nabiullinoj ob otstavke", *Deutsche Welle*, 23 March 2022.

27 "As Russian losses mount in Ukraine, Putin gets more involved in war strategy", *The New York Times*, 23 September 2022.

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