President Putin’s decision to launch a full-scale invasion of Ukraine has embroiled Russia in a long war of attrition, requiring its defense industry to manufacture and send an uninterrupted flow of materiel to the battlefield. Sanctioned by the West and unable to achieve self-sufficiency, Russia has turned to U.S. adversaries—primarily China, Iran, and North Korea—as alternative military suppliers. All three countries have aided the Kremlin’s war effort, albeit to varying degrees and with different geopolitical objectives. This piece, building on the analysis contained in the recent CSIS report, “Back in Stock? The State of Russia’s Defense Industry after Two Years of the War,” assesses the significance of Russia’s military-technical collaboration with these countries and speculates on the impacts these partnerships may have on regional security in the Global South, where U.S. standing has been more equivocal.

Military-Technical Benefits for Russia
Since the start of the full-scale invasion, the Kremlin has directly benefited from increased military-technical partnerships with China, Iran, and North Korea, with these countries mitigating sanctions- and war-induced pressures on Russia’s defense industry. Combined, the three have supplied Russia with much needed dual-use items, arms, and weapon parts. While these goods have generally been of lower quality than their Western alternatives, they have nonetheless kept the Russian Armed Forces relatively well supplied. This has allowed Russia to maintain consistent intensity of attacks on Ukraine and has contributed to Russia’s battlefield successes.

China: Beijing has arguably been the most important enabler of the Kremlin’s war effort. China has thus far refrained from openly supplying weapons, although the UK defence minister has recently accused its leadership of “providing or preparing to provide” lethal aid to Russia for its war effort. What has been commonly acknowledged, however, is that Beijing has provided Russia with much-needed
dual-use components such as semiconductors, ball bearings, and machine tools through a complicated network of China- and Hong Kong–based shell companies. Leveraging its vast stockpiles of old Soviet equipment, these Chinese shipments have helped the Russian defense industrial complex speed up the refurbishment and modernization of many Soviet-era combat vehicles and technologies, including artillery, tanks, and missiles. The Russian military has also relied on commercial drones and drone parts manufactured by Chinese companies, including DJI. While DJI, China’s biggest drone manufacturer, has said it would discontinue its businesses in Russia and Ukraine due to the war, existing evidence suggests that DJI products and relevant components are continuously imported to Russia through different intermediaries. For instance, within the first six months of 2023, Russia received at least $14.5 million in direct drone shipments from Chinese trading companies. While commercial, such drones, especially the first-person view (FPV) variants, can carry a variety of munitions, causing significant distraction and harm on the battlefield. Russia has also increased imports of Chinese-made goods that are not usually restricted by the international sanctions regime—such as trucks and digging and dirt-moving equipment—but that nonetheless have wide battlefield applications. Overall, Beijing has dramatically eased the pressure caused by sanctions on the Russian defense industrial base through shipments of dual-use components and commercial technologies. This aid will reach new levels if the most recent claims about Chinese plans to send weapons to Russia turn out to be true. Going forward, this partnership might also extend into the military high-tech sector, with President Putin suggesting joint Sino-Russian production of higher-end microchips and even high-orbit assets for space.

Iran: Similar to China, Tehran has also supplied Russia with uncrewed systems, especially combat drones. According to Kyiv, since the start of the full-scale invasion, Moscow has launched at least 4,600 Iranian Shahed attack drones against Ukraine’s major cities and military and energy infrastructure. While Ukraine has reportedly shot down the majority of those Shaheds, such continuous attacks have drained Ukraine’s air defenses. Iran has also collaborated with Russia on the construction of a new factory in Russia’s Tatarstan region that could reportedly manufacture at least 6,000 Iranian-designed Shahed drones by 2025. Besides uncrewed systems, since January 2024 Tehran has reportedly sent Moscow around 400 Fateh-110 ballistic missiles, capable of striking targets at a distance of 186–435 miles, with additional missile shipments from Iran potentially underway. According to pro-Kremlin media, Moscow and Tehran allegedly moved away from the SWIFT payment system for cross-border transactions by the end of 2023. They aim to set up a direct interbank transfer mechanism that would allow companies in both countries to trade in rubles and rials instead of dollars or euros. Such a move could potentially encourage even larger-scale Russo-Iranian arms sales, further aiding Russia’s war effort in Ukraine.

North Korea: The war has resulted in a strengthened military-technical cooperation between Russia and North Korea. Following a September 2023 meeting between North Korean leader Kim Jong Un and President Putin in Russia, Pyongyang has been accused of selling weapons to Moscow. According to South Korean defense experts, North Korea might have sent as many as 5,000 containers of weapons to Russia by the end of December 2023, potentially carrying up to 2.3 million rounds of 152-millimeter (mm) shells, or 400,000 rounds of 122 mm artillery shells. These deliveries may have kept the Russian military supplied with munitions for months, while firing around 10,000 shells a day and bringing further damage to the Ukrainian Armed Forces, which are themselves running low on ammunition. Besides artillery systems, Russia has reportedly deployed around 50 North Korean ballistic missiles in Ukraine, which the White House has called a “significant and concerning escalation” to be met with additional sanctions.
against individuals in those arms deals. Moscow will likely continue relying on ammunition and weaponry sent by Pyongyang as long as the current attritional phase of the war continues.

**Military-Technical Benefits for the Partner Countries**

As the war in Ukraine drags into its third year, all three countries have leveraged Russia’s changing political, economic, and military-security dynamics to secure benefits and concessions from Moscow.

**China:** In the case of China, Russia’s growing military-security and economic dependency has been glaringly obvious. Beijing has become Moscow’s key trade partner, replacing EU imports lost to sanctions. Beijing’s two-way trade with Moscow hit a record high of **$240 billion** in 2023, growing by more than 26 percent from a year earlier. Chinese shipments to Russia—which included shipments of dual-use goods and technologies, among other items—jumped by around 47 percent in 2023 compared with 2022 and 64 percent compared with 2021. However, while by some preliminary estimates China’s share in Russia’s trade turnover exceeds 32 percent (41 percent in imports and 26 percent in exports), Russia’s share in China’s trade turnover is significantly smaller (around 5 percent in imports and 3 percent in exports). These numbers point to a growing asymmetry in the Sino-Russian economic relationship, with significant potential for implications in defense-military cooperation. For instance, China still relies on Russian imports of advanced defense equipment and technologies that are difficult to reverse-engineer, especially with regard to aerospace. Up to 40 percent of China’s air force fleet depends on Russian-made fighter engines. While, historically, Moscow has been more protective of its engine technology, it may have already made, or eventually will be forced to make, more concessions to Beijing, considering the latter’s role in providing economic and defense lifelines to Russia. Going forward, the increased Sino-Russian defense partnership will likely result in more asymmetry, with China gaining access to advanced Russian defense and technological know-how Moscow had been reluctant to share in the past.

**Iran:** Similar to China, Iran is leveraging Russia’s war- and sanctions-induced defense industrial complications. In return for Iranian-made combat drones and missiles, Tehran has allegedly secured unprecedented defense cooperation with Moscow, including obtaining Russian-made attack helicopters, radar systems, and combat aircraft—potentially significantly strengthening Iran’s stunted air force. Furthermore, as Iranian-made Shahed drones are being constantly tested on the battlefield in Ukraine, Iran has continued opportunities to observe, improve, and promote technology to other potential buyers around the world. According to CSIS’s Hanna Notte, “It’s no longer the patron-client dynamic, where Russia holds all the leverage,” as Iran is also setting forth specific requirements and benefitting from military transfers.

**North Korea:** Just like Tehran, Pyongyang also views its arms transfers to Moscow as an opportunity to test its equipment in battle. It also expects Russia to provide advanced weapons systems and technological know-how to significantly strengthen its defense, nuclear, and space programs. For instance, some analysts suggest North Korea gets insights from Russia’s alleged use of North Korean missiles to further develop its missile technology. Going forward, these combat-qualified weapons may open new markets to Pyongyang. Importantly, even if North Korean missiles represent a marginal share of Russia’s missile stockpiles, their alleged use goes against the consensus achieved between the permanent members of the United Nations Security Council—Russia included—on preventing
Pyongyang from expanding its nuclear and ballistic missile programs. Furthermore, Putin has also promised to help North Korea develop its space satellite program. In November 2023, two months after the two leaders met in Russia, North Korea successfully launched its own military reconnaissance satellite, which many Western analysts attributed to Russian expertise and assistance. If Pyongyang were to develop fully fledged military satellite capabilities with help from Moscow, it would be able to access critical data regarding U.S. and South Korean military activities on the Korean Peninsula, with the potential to further exacerbate tensions in the region.

The Impact on the Global South

As this piece demonstrates, the military-technical partnerships Russia has built and developed with China, Iran, and North Korea are mutually beneficial, and they have the potential to challenge U.S. interests in their respective neighborhoods.

The Middle East is the most obvious region where Russia could play a more important role in challenging U.S. standing. Rising Russo-Iranian arms transfers could benefit militant groups such as Hamas and Hezbollah, which are commonly considered Iranian proxies in Tehran’s confrontation with Israel; they could also harden Iranian defenses against any future Israeli airstrike. Some experts believe that if the war in Ukraine becomes frozen, the chances of Russia ramping up its involvement in the Middle East will rise. Russia could send weapons, and large numbers of Russian troops with battlefield experience could also potentially appear in the Middle East, welcomed by Iran-backed groups eager for partners in their fight against “U.S. neocolonialism.”

Similarly, expanding Russian–North Korean defense ties threaten to destabilize the Korean Peninsula, with Pyongyang growing more hostile toward Seoul. For instance, in January 2024, North Korea fired hundreds of artillery rounds into the sea near its contested border with South Korea and conducted its first intermediate-range ballistic missile test of the year, announcing that it no longer considered South Korea a “partner of reconciliation and reunification.” If Moscow continues to help Pyongyang advance its defense and military capabilities, Seoul’s security as well as U.S. activities and interests on the peninsula will be further endangered.

In the case of strengthened Sino-Russian defense-military relations, Moscow’s technological know-how, its lessons learned on working around sanctions, and its well-tested battlefield tactics might prove beneficial to China and could impact the latter’s military calculus with regard to Taiwan. Elsewhere in the world, including with middle powers like India and countries across Africa and Latin America, growing defense cooperation between Moscow and Beijing might lead to the proliferation of relatively cheap Russian weapons systems and technologies made from Chinese components and spare parts. Such arms sales could increase Russia and China’s clout in conflict-driven regions, straining U.S. relationships with existing partners.

In short, Russia’s burgeoning relationships with its fellow authoritarian states have mitigated its diplomatic isolation and pushed Moscow into a long path of dependence. Going forward, this new status quo could make it more acceptable for other countries, particularly in the Global South, to do business with Russia. Thus, should the war in Ukraine fade from global headlines following the 2024 U.S. presidential elections, Russia’s war-tested defense industry and increasing willingness to share...
military technology will make it an attractive partner to many in the Global South. Russia will work hard to further break out of its diplomatic isolation in this part of the world and will likely succeed.

Max Bergmann is the director of the Europe, Russia, and Eurasia Program at the Center for Strategic and International Studies (CSIS) in Washington, D.C. Maria Snegovaya is a senior fellow with the CSIS Europe, Russia, and Eurasia Program. Tina Dolbaia is a research associate with CSIS. Nick Fenton is a program manager and research associate with CSIS.

This report is produced by the Center for Strategic and International Studies (CSIS), a private, tax-exempt institution focusing on international public policy issues. Its research is nonpartisan and nonproprietary. CSIS does not take specific policy positions. Accordingly, all views, positions, and conclusions expressed in this publication should be understood to be solely those of the author(s).

© 2024 by the Center for Strategic and International Studies. All rights reserved.