

Russia's Nuclear Policy

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Since Russia's international behaviour is increasingly revanchist and aggressive, its nuclear policy is a source of growing concerns. Russia is and will remain in the foreseeable future the second largest nuclear power after the US even under the most pessimistic nuclear capability projections. Nuclear weapons play a progressively more important role in Russian military strategy. Russian strategic thinking and military planning tend towards lowering of the nuclear threshold and consider nuclear weapons above all tactical, not only as a political weapon aimed at prevention of a war, but also as a battlefield weapon able to assure a victory in a wide range of military conflicts including local ones.

Nuclear Weapons and Russian Strategic Mentality

Though the role of nuclear weapons in contemporary Western security thinking is more modest than it was during the Cold War, Russian strategic thinking and military planning are evolving in a different direction. Russian military, political, and bureaucratic elites consider nuclear weapons to be one of Russia's few indicators of global great power status, though it is rather fictitious than real, and the main foundation of Russian security, and also see them as an instrument that ensures Russia's national interests. The Russian Military Doctrine approved by President Medvedev on February 5, 2010, states that "nuclear weapons will remain an important factor to prevent an emergence of nuclear and conventional armed conflicts."¹ Russian First Deputy Prime Minister responsible for military industry and security affairs, Sergey B. Ivanov, said at the 46th Munich Security Conference on February 6, 2010 that nuclear weapons "cannot be regarded as a cure-all for the whole range of real threats and challenges" (which is absolutely true; terrorism, drug trafficking, transnational crime and the like in no case can be cured by nuclear weapons). Nevertheless, Russia's "point of departure" was the assumption that

¹ "Military Doctrine of the Russian Federation," approved by the Decree of the President of the Russian Federation, February 5, 2010, <http://news.kremlin.ru/ref_notes/461>.

nuclear weapons remain “the core element of strategic deterrence.”²

In part, Russia's current conceptualization of nuclear weapons is rooted in the mentality of its elites. In this decade, economic growth fuelled by huge oil and gas export earnings has convinced the Russian ruling cohort that the period of decay and retreat is over. Instead of a country in crisis, Russia today is seen by the current leadership as a country “rising from its knees” and returning to its former role of a global superpower. Yet at the same time the Kremlin and military top circles cannot but realize that Moscow's actual international weight and importance are far from these great-power illusions. In these intellectual and emotional frameworks nuclear weapons are seen not only as a symbol of great power status, but also as a practical factor putting Russia on a par with the US and other modern major powers.

In addition, many in Moscow explain that the decline of its international position is due to a purposeful policy of the West, especially the US, which fears a new powerful Russia and does its best to hinder Russia's rebirth. As President Medvedev said, “Today, Russia competes increasingly confidently in the economic, political and military spheres. And we must frankly acknowledge that many are not pleased with this development. Perhaps some forces in the world would like to see us remain weak, and to see our country develop according to laws dictated from the outside.”³ Some elements of Russia's foreign policy, like the panicky reaction to the US plans to build missile defences in Eastern Europe (in fact cancelled by the Obama administration in September 2009), suggest that the West is seen by Russia's leadership as a direct military threat. Partly, it results from enduring political paranoia inherited from the Soviet days. Partly, a vision of the West as an imminent threat to Russia comes from the theory that in the foreseeable future global demand for hydrocarbons will outstrip global supply of them leading thus to “wars for energy resources” including in the areas neighbouring Russia. In the beginning of 2009 Defence Minister Serdyukov, in his report to the enlarged meeting of the Collegium of the Defence Ministry, openly accused the US of anti-Russian intrigues:

Strategic circumstances are characterized by attempts of the US administration

² Sergey B. Ivanov, First Deputy Prime Minister, Russian Federation, “Speech at the 46th Munich Security Conference,” February 6, 2010, <<http://www.securityconference.de/Ivanov-Sergey-B.457.0.html?&L=1>>.

³ President Dmitry Medvedev, “Speech at the ceremony for officers who have been newly appointed to senior command positions and who have received high (special) ranks,” September 30, 2008, <http://www.president.kremlin.ru/eng/speeches/2008/09/30/1359_type82912type 82913 _207068.shtml>.

to achieve global leadership, by US expansionism in regions close to Russia, and by growing American and NATO military presences there. American policy is aimed at gaining access to raw materials, energy and other natural resources of the CIS countries. The processes resulting in expulsion of Russia from the space of its traditional interests are actively supported.⁴

While Moscow considers the West as an inherent rival and enemy of Russia, encroaching on its rich natural resources, its views about China are contradictory. To judge by official rhetoric, Russia's main foreign policy priority is to strengthen the "strategic partnership" with China. The latter is perceived as a reliable partner motivated by a yearning to secure its northern and western rear areas in view of an eventual inevitable confrontation with the US. Yet at the same time there is a growing body of evidence that current differences between Russia and China including those over the character and future of the Shanghai Cooperation Organization (SCO), and looming competition over Central Asian energy resources, are manifestations of mutual suspicions and an essential conflict between the long-term basic interests of the two countries. China's negative reaction to Russian aggression against Georgia was one more indication of emerging strategic divergences between them. Although such concerns would never be made public for obvious reasons, they are very real. Many in the Russian military command insist that analysis of China must be based not on official declarations, but rather on the observable character of military development.⁵ In this light and having in view Chinese conventional military superiority over Russia in the Far East, one may conclude that Russian nuclear planning includes use of nuclear weapons against China in any armed conflict between the two countries.

⁴ <<http://www.oborona.ru/309/314/index.shtml?id=1295>>.

⁵ For instance, the Russian military expert Vitaly Tsygichko has commented: "Observing the behavior of our southern neighbor, China, I have to conclude that it is returning to its imperial traditions ever more and acting accordingly. Today, the Celestial Empire, with its powerful, dynamically developing economy as well as the most numerous army in the world, is a center of power, attempting to strengthen and enlarge its influence not only in the Asia-Pacific, but also far beyond its limits. Moreover, relying on historical tradition, the new Middle Kingdom is shunning no means to achieve its hegemonic aims and is acting more and more brazenly." See: Dmitry Trenin and Vitaly Tsygichko, "What is China to Russia: comrade or master?," *Security Index*, no. 2 (Summer–Fall 2007), p. 111.

Nuclear Weapons as Compensation for Deteriorating Conventional Forces

Despite a recent sense that the country has been restored to grandeur, Russia's leadership, both political and military, cannot but understand that its conventional armed forces are far behind NATO troops in Europe as well as behind Chinese, American and Japanese forces in the Far East. They realize that Russia is not able to take advantage of the "revolution in military affairs" and that its high-technology capabilities, including its ability to develop new high-precision non-nuclear weapons and military technologies are shrinking. On October 26, 2009 President Medvedev recognized the technological backwardness of the Russian armed forces and defence industry. "Large financial assets are allocated for development and manufacturing of the most modern arms" he said to the bosses of the Russian military-industrial complex. Yet "money is being spent for modernization of armaments that are already morally obsolete or will become outdated in a few years. Research and development lasts for years, and decades sometimes... This is inadmissible."⁶ A major initiative of the Medvedev Administration, a technological breakthrough project, often called "Russia's modernization," emerged basically from deep concerns about country continually lagging behind advanced nations in military technologies.

In this context nuclear weapons are considered by Russian political and military leadership as the most important means of assuring military security simply because Russian non-nuclear forces are not seen as effective enough and degrade further. In March 2006 then president Putin announced quite definitely that "analysis of the current international situation and its trajectories forces Russia to consider nuclear deterrence as a primary element that can guarantee its security."⁷ The same thesis was repeated by the head of the Russian General Staff General Nikolay Makarov in 2009. "Russia's strategic nuclear forces remain the basic means to deter military threats."⁸

Conceptualization of nuclear weapons as an effective means to compensate the degrading battle efficiency of Russian conventional forces leads Russian military commanders to a logical conclusion that such weapons may and should be turned into battlefield weapons especially because they believe, most probably without

⁶ <<http://www.president.kremlin.ru/transcripts/5825>>.

⁷ *Rossiiskaya gazeta*, March 31, 2006.

⁸ <<http://www.mil.ru/info/53270/53288/index.shtml>>.

substantial reason, that escalation of a limited nuclear war into a total thermonuclear exchange is much less probable now than it was during the Cold War. Alexander Radchuk, an adviser to the Head of the Russian General Staff, concluded:

Accomplishment of combat missions by use of nuclear weapons is indeed possible...exactly because of the fact that political and psychological barriers that made such use practically unthinkable have been enfeebled as the threat of a large scale nuclear war has almost disappeared. This allows recognizing that use of nuclear weapons is possible and in some cases expedient. That is why reliance on nuclear weapons and their planned modernization are not caprices or machinations of particular political figures and military commanders. This is a response to existing or, at least, distinctly perceived threats⁹.

Such views are based on an assumption that American extended deterrence is unreliable, in particular in case of a war between Russian and NATO member-states in Europe, or between Russia and Japan in the Far East, limited use of nuclear weapons by Russian forces will not trigger an American nuclear response, either limited or large-scale, because the USA will not risk its own existence in order to prevent Russian aggression against an American ally.

“De-escalation of Armed Conflict” by a Limited First Use of Nuclear Weapons

In the Cold War era, Soviet military planning developed two basic ways of using nuclear weapons. The first one presumed using a few hundred substrategic nuclear weapons at the very beginning of a war in Europe and/or in the Far East to destroy NATO's defences in Europe or American, Chinese and Japanese forces in the Far East. In Europe such a nuclear attack was planned to be launched prior to a massive conventional blitzkrieg aimed at a fast takeover of most of the continent before the US would make an extremely difficult decision to retaliate. Such a strategy made sense as the Soviet General Staff had reason, real or imagined, to believe that regional nuclear war would not escalate into a full-scale strategic nuclear exchange between the United States and the Soviet Union. The second one assumed a massive

⁹ Alexander Radchuk, “Bolshaya yadernaya igra XXI veka: razoruzhenie ili voina? (A Great Nuclear Game of the XXI century: disarmament or war?),” *Index bezopasnosti*, no. 1 (92), vol. 16, p. 24.

nuclear first strike or retaliatory counter-value attack against the US by the Soviet strategic armaments.

Yet in the strategic environment since the end of the Cold War, instead of massive use of nuclear weapons planned by the Soviets during the Cold War, Russian military command have sought to develop a method of limited use of nuclear weapons that will enable them to deter or stop attack of superior conventional forces without escalation into total nuclear exchange or into a large-scale regional war.

Unlike the Cold War period, the Russian military sees the main threats coming from limited selective air and rocket non-nuclear attacks performed by long-range high precision weapons launched from remote emplacements, and air- or sea-based platforms. Analysis of Russian military writings and, more importantly, scenarios of military exercises confirm that Russian military planners see limited use of nuclear weapons either tactical or strategic as the only way to challenge an enemy by an awful dilemma: either to stop military operations and recognize defeat, or to respond by a nuclear strike, which would be followed by an escalation up to strategic nuclear exchange with catastrophic consequences for all. This tactic is called as “de-escalation of armed conflict” by a limited first use of nuclear weapons. In particular, it presumes “demonstrative strikes” made by a few strategic weapons against targets located in unpopulated areas in the deep rear of the enemy or a few strikes at the seat of war by tactical nuclear weapons.

First Use of Nuclear Weapons and the Nuclear Threshold

The first use of nuclear weapons is one of the core elements of this tactic. The previous Soviet commitment to the no first use policy was officially denounced by the “Basic Provisions of the Military Doctrine of the Russian Federation” approved by President Yeltzin in November 1993.¹⁰ It said that Russia may use nuclear force first against any NPT member state who is a US ally if this state is in armed conflict with Russia or its allies. Strictly speaking, the first Russian Military Doctrine presumed

¹⁰ The Basic Provisions stated that Russia “will not employ its nuclear weapons against any state party to the Treaty on the Non-proliferation of Nuclear Weapons... which does not possess nuclear weapons except in the cases of: (a) an armed attack against the Russian Federation, its territory, armed forces, other troops or its allies by any state which is connected by an alliance agreement with a state that does possess nuclear weapons; (b) joint actions by such a state with a state possessing nuclear weapons in the carrying out or in support of any invasion or armed attack upon the Russian Federation, its territory, armed forces, other troops or its allies.” See: “The Basic Provisions of the Military Doctrine of the Russian Federation,” *Krasnaya Zvezda*, Special Appendix, 19 November, 1993, p. 2 (in Russian).

that Russia could use nuclear weapons in any armed clashes between Russia and any American ally and also between Russian allies, like Byelorussia and Armenia, and NATO member-states neighbouring them.

The doctrinal documents approved by then president Putin at the beginning of his tenure in the first half of 2000 confirmed Russia's willingness to use nuclear weapons first. The 2000 National Security Concept said that Russia might use "all means available to it, including nuclear weapons, if it is necessary to repel armed aggression and if all other crisis management measures have been exhausted or have turned out to be inefficient."¹¹ The 2000 Military Doctrine, which replaced The Basic Provisions of 1993, presumed that "The Russian Federation retains the right to use nuclear weapons in response to the use of nuclear weapons or other WMD against Russia or its allies, as well as in response to the large-scale conventional aggression in situations critical for Russian national security."¹²

These documents were not quite clear in describing the conditions under which Russia would use nuclear weapons. They neither define terms like "crisis management," nor do they identify any criteria for efficiency or non-efficiency of "crisis management measures," nor do they present a clear notion of a "situation critical for national security." However, both these documents presumed that nuclear weapons would be used by Russia in the course of actual armed fighting in case Russian political leadership and military command decide that Russia has no other means to prevent military defeat. Most likely, this highly important doctrinal provision is replaced by the concept of preventive use of nuclear weapons including in local conflicts.

Development and approval of the new doctrine were marked by a few intriguing moments in evolution of Russian views on the nuclear threshold. On October 14, 2009 General Patrushev, the head of Russia's Security Council, unveiled dramatic news in announcing that according to the new doctrine nuclear weapons might be used in local wars and in a preventive manner, in other words, under the belief that future conflict is inevitable, though not imminent, and before actual fighting starts. He said:

With regard to the provisions that regulate the possibility of using nuclear weapons, this section of the military doctrine is written in the spirit of the fact

¹¹ "The Concept of National Security of the Russian Federation," <www.mid.ru>.

¹² "The Military Doctrine of the Russian Federation," *Nezavisimaya Gazeta*, April 22, 2000, p. 5.

that the Russian Federation is a nuclear power, which is capable of using nuclear deterrence to deter potential adversaries from aggression against Russia and its allies. This is the most important priority of our country in the foreseeable future. We also changed the conditions of use of nuclear weapons to counter conventional aggression not only in large-scale wars, but also in regional and even local wars. In addition, the doctrine provides flexibility in the use of nuclear weapons depending on the situation and the intentions of the enemy. In situations critical for national security we do not rule out the possibility of a preventive nuclear strike against the aggressor.¹³

In other words Patrushev mentioned two principal innovations in Russian views on conditions of use of nuclear weapons. Firstly, these weapons may be used in local wars while previous Russian doctrinal documents defined the use of nuclear weapons as one of the principal distinctions between local and regional wars; it was considered as possible in regional yet not in local wars.¹⁴ Secondly, nuclear weapons may be used in a preventive way, in other words, not to avert a military defeat in the course of military operations as it was presumed by the de-escalation concept, but under the belief that future conflict is inevitable, though not imminent, and before actual fighting starts.¹⁵

In a practical manner there are two possible scenarios for Russia to use nuclear weapons in local conflicts in a preventive way. The first one presumes a preventive nuclear attack against American and/or NATO forces that are ready to intervene in a war between Russia and some of its neighbours, such as Georgia, Ukraine or the Baltic States, with a view to defend victims of Russian aggression. This scenario looks quite possible as the war on Georgia was stopped not only because of enormous political efforts undertaken by the EU and the French president Nicolas Sarkozy, yet also due to the appearance of American warships in the Black Sea carrying humanitarian aid and long-range nuclear tipped cruise missiles. The latter

¹³ Nikolay Patrushev, "Menyaetsya Rossiya, menyaetsya i ee voennaya doctrina (Russia is changing and its military doctrine is changing too)," interview with *Izvestiya*, October 14, 2009.

¹⁴ "Aktual'nie zadachi razvitiya voozruzhennich sil Rossiiskoi Federatzii (Topical tasks of the development of the Armed Forces of the Russian Federation)," *Krasnaya zvezda*, October 11, 2003.

¹⁵ Some Russian analysts and mass-media translated this point in Patrushev's interview as "preemptive use" of nuclear weapons, which means use in an attempt to repel or defeat a perceived inevitable offensive or invasion, or to gain a strategic advantage in an impending (allegedly unavoidable) war before that threat materializes. However, Patrushev said not only "uprezhdayustshii udar" yet also clarified this Russian term as "preventivnii," in English "preventive" strike.

was a strong argument indeed, and the Russian advance on Tbilisi was stopped. The second scenario presumes that Russia uses nuclear weapons against American or NATO forces in Europe or against American, Chinese or Japanese troops in the Far East at a relatively high stage of conflict escalation, yet before military operations start. By doing this Moscow may attempt to change its correlation of forces in a particular region to gain principal military or political advantages.

Whatever scenario is assumed the ongoing changes in Russian military doctrine will have a highly destabilizing effect. Of course, Russian strategists may hope that Russia's first-strike strategy encourages a potential enemy to worry about escalation to the nuclear level and therefore deters them from pressing Russia too far. Yet, equally probable would be a preemptive strike aimed at disarming or limiting damage. For a potential victim of a preventive nuclear strike it produces an unacceptable or hardly acceptable threat. Most likely it stimulates it to eliminate the possibility of such a strike once and for all by using nuclear weapons first in a disarming strike. This radically decreases the crisis stability and substantially enhances the risk of massive nuclear conflict.

It is unclear why the Secretary of the Russian Security Council revealed such highly explosive information about Russia's nuclear policy before the new military doctrine was approved. Patrushev's revelations were probably an attempt to legalize and codify the factual plans of Russian military. Actually, in August 2008, General Anatoly Nogovitzin, a mouthpiece of the Russian General Staff during the Georgia war, announced that because of planned deployment of American ABM components "Poland is making itself a target. This is 100 percent." He emphasized that Russia's military doctrine presumes the use of nuclear weapons "against the allies of countries that have nuclear weapons."¹⁶ In September 2009 Russia and Byelorussia once again conducted large joint military exercises, code name Zapad 2009, near the Polish border, which included a simulated use of tactical nuclear weapons.¹⁷ Conceivably, Patrushev, a member of Putin's inner circle, also attempted to compromise Medvedev's efforts to conclude the START-I follow-up treaty as soon as possible. He and his patron might be concerned that the signing of such an

¹⁶ Damien McElroy, "Russian general says Poland a nuclear target," telegraph.co.uk, August 15, 2008, <<http://www.telegraph.co.uk/news/worldnews/europe/georgia/2564639/Russian-general-says-Poland-a-nuclear-target-as-Condoleezza-Rice-arrives-in-Georgia.html>>.

¹⁷ Matthew Day, "Russia 'simulates' nuclear attack on Poland," telegraph.co.uk, November 1, 2009, <<http://www.telegraph.co.uk/news/worldnews/europe/poland/6480227/Russia-simulates-nuclear-attack-on-Poland.html>>.

important treaty would essentially strengthen Medvedev's international reputation and thus his positions in the latent rivalry with the former Russian president, now the Prime Minister Putin. Yet whatever the motivations of Patrushev's demarche, Russia's top political leadership, the President and his administration above all, and perhaps the Foreign Ministry were seriously concerned with the highly negative reaction of the international community to Patrushev's revelations.

Actually, Patrushev's statement caused a shocking effect. It is quite possible that the Kremlin preferred to dissociate itself from a straightforward presentation of Russian nuclear policy. The new doctrine says only that "Russia reserves the right to use nuclear weapons in response to the use of nuclear and other weapons of mass destruction against it and its allies, as well as an aggression against the Russian Federation with the use of conventional weapons if the very existence of the state is under threat."¹⁸ At first glance, it looks like a major disproof of plans to use nuclear weapons in a preventive way. Yet the doctrine presents neither an exact criteria for "the very existence of the state being under the threat" nor specifies existence of what state — Russia or its ally — should be threatened to justify the use of nuclear weapons. Also together with the new military doctrine President Medvedev approved another document, The Principles of the State Nuclear Deterrence Policy to 2020, which remains secret. It may mean that Russia's true views on the nuclear threshold may be different than those outlined in the document available for general public.

This was confirmed factually on February 10, 2010 by an anonymous source from Russia's Security Council, the governmental body responsible for development of the Military Doctrine, who unveiled to the official Russian news agency that Russia will use nuclear weapons if there are "threats of loss of national sovereignty and territorial integrity of the state." It was added that the document defines the main goals of Russian policy in the field of nuclear deterrence as prevention of aggression, pressure by force and by other means, assured protection of sovereignty and territorial integrity.¹⁹ The keyword here is "threat" because it will be for Russian military and political leaders to decide if there is a threat or not, and also because a threat, actual or imaginative, may exist even in absence of any practical actions aimed at realization of it. Putting it differently, preventive nuclear strikes are still

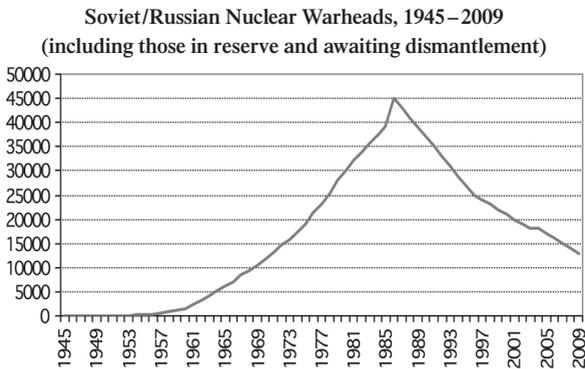
¹⁸ "Military doctrine of the Russian Federation," approved by the Decree of the President of the Russian Federation, February 5, 2010, <http://news.kremlin.ru/ref_notes/461>.

¹⁹ "Rossiya primenit yadernoye oruzhie v sluchae ugrozi ee suverenitetu (Russia will use nuclear weapons in case its sovereignty is threatened)," <http://www.rian.ru/defense_safety/20100210/208527725.html>.

regarded by Russia as practical options.

Decrease of the Russian Nuclear Arsenal Since 1991

Soviet nuclear forces were at a high in the second half of the 1980s when the total number of nuclear warheads, including those in reserve and awaiting dismantlement, reached a peak of about 45,000 weapons. Since then the amount of nuclear weapons was rapidly decreasing; in early 2010 their number was assessed at about 12,000 warheads.²⁰



According to one of the best American sources on strategic issues, The Bulletin of the Atomic Scientists, in the beginning of 2010 Russia had about 2,604 operationally deployed warheads on strategic delivery vehicles, a little bit more than 2,000 operationally deployed tactical (or substrategic) nuclear weapons, and 8,150 weapons in reserve or awaiting dismantlement. The total amount of Russian operationally deployed nuclear weapons is approximately equal to American nuclear assets yet Russia is far ahead of the US in number of tactical weapons and of those in reserve and awaiting dismantlement.

²⁰ Robert S. Norris and Hans M. Kristensen "Nuclear Notebook: Russian Nuclear Forces, 2010," *The Bulletin of the Atomic Scientists* (January/February 2010), p. 74.

Russian and American Nuclear Weapons (2009 and 2010)

NUCLEAR WEAPONS	RUSSIA, January 2010	USA, January 2009
Total	About 12,000	5,200 ²¹
Operationally deployed on strategic delivery vehicles	2,604	2,202
Operationally deployed on tactical delivery vehicles	About 2,000	About 500 ²²
In reserve	7,300	2,500

Sources: Robert S. Norris and Hans M. Kristensen, "Nuclear Notebook: Russian Nuclear Forces 2010," *The Bulletin of the Atomic Scientists* (January/February 2010), pp. 74, 76; Robert S. Norris and Hans M. Kristensen, "Nuclear Notebook: US Nuclear Forces 2009," *The Bulletin of the Atomic Scientists* (March/April 2009), p. 61.

At the end of 2009 Russian strategic nuclear forces were considerably smaller than they were in the beginning of the 1990s. This resulted from two basic factors: decommissioning of delivery vehicles, both missiles and submarines, as warranty times expired; and the inability of the defence industry to compensate those losses by production and deployment of new delivery vehicles in necessary quantities.

Russian Strategic Nuclear Forces, 1990–2010

	START-accountable, as of September 1, 1990		START-accountable, as of July 1, 2009		Operationally deployed, January 2010	
	Delivery vehicles	Warheads	Delivery vehicles	Warheads	Delivery vehicles	Warheads
ICBM	1,398	6,612	465	2,001	331	1,090
SLBM	940	2,132	268	1,288	160	576
Aviation	162	855	76	608	75	838
Total	2,500	9,599	809	3,897	566	2,204

Source: The US Department of State; Robert S. Norris and Hans M. Kristensen, "Russian Nuclear Forces, 2010," *The Bulletin of the Atomic Scientists* (January/February 2010), p. 76.

In this context the most rational option for Russian top military and political leadership would be rejection of the so-called strategic triad and concentrating all

²¹ In May 2010 it was officially revealed that US had a total of 5,113 warheads in its nuclear stockpile at the end of September 2009. The figure included warheads that were operationally deployed, kept in active reserve and held in inactive storage. But it did not include "several thousand" warheads that were retired and awaiting dismantlement.

²² There are other assessments of Russian and American tactical nuclear arsenals. The Congressional Research Service estimates that the United States has maintained approximately 1,100 nonstrategic nuclear weapons in its active stockpile, with a fair amount of these held in storage areas in the United States. See: "Nonstrategic Nuclear Weapons," Congressional Research Service Report, RL 32572, p. 6. As for Russia, CRS outlined that "analysts have estimated that Russia may still have between 2,000 and 8,000 warheads for nonstrategic nuclear weapons, with the lower number reflecting the number of deployed weapons and the higher number including those weapons that remain in central storage." *Ibid.*, p. 17.

scarce financial, intellectual and industrial resources on one or two of the most promising and technologically advanced systems. However, in the 1990s, due to a lack of political will and the inability of the high military command to overcome pressure from and lobbying of the Navy, Air Force and Strategic Rocket Forces, Moscow was not able to develop a coherent concept for development of Russian nuclear potential. A relatively sound vision of further development of strategic forces was only formed in the beginning of the 2000s. It consisted of the following three main points:

- Life expectancy of the most perfect Russian ICBMs SS-18 and SS-19 should be increased by as much as possible, up to 2016;
- Topol-M (SS-27) ICBM for silo and mobile basing modes should become the core of the Strategic Rocket Forces. Since 2009 some of these missiles should be equipped with at least three warheads (Topol-M with three warheads is known as RS-24);
- Since the middle of the 2010s the Russian strategic naval force will consist of a few new nuclear submarines of the 955 class (Borey) equipped with new Bulava (RSM-56) SLBMs and six Delta-IV submarines equipped with modernized version of the SLBM R-29RM (SS-N-23, aka Sineva).

A number of forecasts have been made by Russian and foreign analysts about the structure of the Russian strategic arsenal in 2015–2020. All of them assume that the SS-18, SS-19 and SS-25 (Topol) missiles, which now form the bulk of the land-based strategic arsenal, will have been decommissioned by that time. A certain number of them will have been replaced by the new silo-based and mobile Topol-M missiles —some of them carrying three warheads. The nuclear-powered ballistic missile submarines of the Delta-III class based in Kamchatka will have reached the end of their service life and will have to be decommissioned. It is expected that three new 955 class (Borey) subs will have been launched by 2015. They will carry the new Bulava SLBMs, with six or most probably three warheads per missile.

However, the size and structure of the Russian strategic arsenal by 2015 is hard to predict, because there is a growing body of evidence that the Bulava project will fail and will not deliver a usable missile, or that the production targets for Topol-M ICBMs will be met. In any event, experts estimate that in seven or eight years' time, Russia will have 300–400 strategic carriers and no more than 1,500 warheads,

though probably much less.

The New START in the Framework of Russia's Policy

Official American assessments of the New START signed by President Obama and President Medvedev in Prague on April 8, 2010 are quite enthusiastic; it is considered as a principal achievement of the so-called “reset” as not well as an “essential step toward deeper, even more meaningful nuclear reductions in the future.”²³ William J. Burns, Under Secretary of State for Political Affairs, called this agreement “the most impressive and most fittingly named example” of a “promising new start, beginning to move beyond past frustrations and grievances,” made by the Kremlin and the White House.²⁴ Russians are much more modest. Sergey A. Ryabkov, Russian Deputy Foreign Minister, only mentioned that “the treaty is in the entire interests of the Russian Federation yet it does not mean that it is an ideal one.”²⁵ In fact, Russians haven't reached most of goals they would like to achieve by concluding the new treaty.

The Russian top brass appears to be extremely anxious over inevitably lagging behind the US in strategic armaments. The US has all the technological and industrial capacity to maintain or restore its strategic arsenal to its current level. Actually, US experts estimate that as of early 2009, the United States had about 800 operationally deployed strategic delivery vehicles; 2,200 deployed nuclear warheads (i.e. warheads fitted onto delivery vehicles); and about 1,200 stockpiled warheads. If needs be, those warheads can be deployed on ballistic missiles or heavy bombers.

²³ Daniel A. Russell, Deputy Assistant Secretary, Bureau of European and Eurasian Affairs, “U.S.–Russian Relations: First Year of the Obama Administration,” Washington, DC, April 26, 2010 <<http://www.state.gov/p/eur/rls/rm/2010/140850.htm>>.

²⁴ William J. Burns, Under Secretary for Political Affairs, “The United States and Russia in a New Era: One Year After ‘Reset,’” Washington, DC, April 14, 2010, <<http://www.state.gov/p/us/rm/2010/140179.htm>>.

²⁵ Sergey A. Ryabkov, Deputy Minister of the Foreign Affairs of Russia, interview given to “Goloss Rossii” (The Voice of Russia), April 11, 2010, <<http://www.mid.ru/ns-dvbr.nsf/50ce23af9ceacf46432569ea00361254/432569d800226387c325770300283ad3?OpenDocument>>.

US Strategic Forces (START accountable, as of July 1, 2009, and operationally deployed)

	Delivery vehicles		Warheads	
	START-I accountable	Operationally deployed	START-I accountable	Operationally deployed
ICBM	550	450	1,600	550
SLBM	432	288	3,264	1,152
Aviation	206	60	1,052	500
Total	1,188	798	5,916	2,202

Sources: The State Department; Robert S. Norris and Hans M. Kristensen "Nuclear Notebook: U.S. Nuclear Forces, 2009," *The Bulletin of Atomic Scientists* (March/April 2009), p. 61.

As for Russia, its strategic potential continues to shrink as old missiles reach the end of their service life and the Russian defence industry is unable to replace them all with new ones. In addition, the throw-weight of the Topol-M and Bulava missiles is less than 1.2 metric tons. This creates difficulties in equipping them with more than three MIRVed warheads.²⁶ Also Russia will be unable to replicate the US practice of "unloading" the carriers and replacing some of the nuclear warheads with conventional ones. Essentially, Russia will have to load each strategic carrier to its fullest capacity so as to minimize the gap with the United States in terms of the number of deployed strategic nuclear warheads.

Another source of Russians' concerns is American plans to replace some nuclear warheads deployed on strategic ballistic missiles with high-yield and high-precision conventional warheads since strategic nuclear arms can be useful for a very limited set of purposes. In essence, their only function is to deter a nuclear strike by the potential adversary. In a limited or regional conflict, they are next to useless. Meanwhile, strategic carriers armed with conventional warheads can come in very handy. For example, they are an excellent instrument for delivering a massive simultaneous strike against hundreds of key military and political targets in North Korea or Iran. In such situations time is of the essence, because it is important not to allow the adversary the time to come to his senses and retaliate in some way or another as the retaliation measures can be quite painful. Russians are not able to develop conventional weapons precise and powerful enough to be deployed on

²⁶ For the purposes of the START Treaty, the Bulava was declared as carrying six warheads. However, there are serious doubts whether a SLBM, the throw-weight of which is 1.15 metric tons, can carry six nuclear warheads. The throw-weight/warhead ratio for the Bulava if it is equipped with six warheads calculated on the basis of the last START-I data exchange in July 2009 would be 0.19 metric tons per warhead, which is much lower than, for instance, the Trident-II (0.35 metric ton per warhead).

strategic missiles; due to this Moscow strives to minimize American ability to equip strategic missiles with conventional warheads. Also, Russians attempted to decrease as much as it would be possible American 'upload capability', which is ability to deploy quickly stockpiled nuclear warheads on strategic delivery vehicles.

These considerations formed Russia's approach to strategic arms talks with the United States, which began soon after Obama and Medvedev met in London in early April 2009. The main goal of the Russian delegation was to reduce as much as possible the number of American strategic delivery vehicles. This would solve the "upload potential" problem and severely restrict America's ability to arm its strategic missiles with conventional warheads, which now represents a major headache for the Russian generals.

Yet the main stumbling block that caused a lot of difficulties in the negotiations was Russia's demand to include U.S. missile defences in a new treaty with a view to restrict American efforts aimed at ABM development and deployment. Russians insisted on legally binding ceilings on quantitative and qualitative characteristics of future US ballistic missile defence. Officially they argued that such limits are crucially important for ensuring nuclear parity. Yet most probably, Russian top commanders and diehard political circles advanced demands and claims, which were apparently unacceptable to the American administration with a view to foil negotiations and thus prevent possible improvement of Russian–American relations. In this light the statement made by General Makarov, the head of Russian General Staff, two weeks before the new treaty was signed must be mentioned: "The treaty is some 95% ready, but we still have to resolve some issues, including getting the U.S. agreement to include the missile defence issues in the treaty". He also claimed that the previous treaty was "skewed in favour of the United States and harmed Russia's national interests." This time, General Makarov declared, Moscow wanted to make sure that a new deal would be based on parity and stability.²⁷ This was an open manifestation of opposition of the Russian military command to the new arms control treaty since raising the most difficult issue in negotiations at the moment when the text of the treaty has been agreed was nothing but an attempt to destroy the treaty as such.

Actually, the New START falls short of most of Russian expectations. Its Article II stipulates that each party shall reduce and limit its ICBMs and ICBM launchers, SLBMs and SLBM launchers, heavy bombers, ICBM warheads, SLBM warheads,

²⁷ "Russia says no arms reduction deal without missile defense clause," <<http://en.rian.ru/Russia/20100323/158284830.html>>.

and heavy bomber nuclear armaments, so that seven years after entry into force of this Treaty and thereafter, the aggregate numbers do not exceed:

- 700 for deployed ICBMs, deployed SLBMs, and deployed heavy bombers;
- 1,550 for warheads on deployed ICBMs, warheads on deployed SLBMs, and nuclear warheads counted for deployed heavy bombers; and
- 800 for deployed and non-deployed ICBM launchers, deployed and non-deployed SLBM launchers, and deployed and non-deployed heavy bombers.

Thus, under the New START the USA may retain all of its current strategic delivery vehicles if about one hundred of their launchers are transformed from the deployed to non-deployed category, while the Russian strategic arsenal will be diminishing because of decommissioning of ballistic missiles and nuclear submarines. The new treaty allows Russians to restrict partly the American ability to replace nuclear warheads by conventional weapons since under the new treaty conventional warheads on strategic missiles would be counted against the total limit of 1,550 units. At the same time if American submarines with ballistic missiles are converted to carry conventional cruise missiles, such cruise missiles would not be counted against this limit, nor would bombers fully converted to conventional missions.

In order to assess reductions of warheads required by the New START one should take into consideration so-called counting rules. Article III of the new treaty says that for ICBMs and SLBMs, the number of warheads shall be the number of re-entry vehicles placed on deployed ICBMs and on deployed SLBMs; yet one nuclear warhead shall be counted for each deployed heavy bomber; this provision reportedly has been suggested by Russia.²⁸

Hans Kristensen, Director of the Nuclear Information Project at the Federation of American Scientists, rightly wrote that “the limit allowed by the treaty is not the actual number of warheads that can be deployed.” A new counting rule attributes

²⁸ Previous strategic arms control treaty, the START I, stipulated that for the USA, each heavy bomber equipped for long-range nuclear ALCMs, up to a total of 150 such heavy bombers, shall be attributed with ten warheads. Each heavy bomber equipped for long-range nuclear ALCMs in excess of 150 such heavy bombers shall be attributed with a number of warheads equal to the number of long-range nuclear ALCMs for which it is actually equipped. For the USSR each heavy bomber equipped for long-range nuclear ALCMs, up to a total of 180 such heavy bombers, shall be attributed with eight warheads. Each heavy bomber equipped for long-range nuclear ALCMs in excess of 180 such heavy bombers shall be attributed with a number of warheads equal to the number of long-range nuclear ALCMs for which it is actually equipped.

one weapon to each bomber rather than the actual number of weapons assigned to them. "This 'fake' counting rule frees up a large pool of warhead spaces under the treaty limit that enables each country to deploy many more warheads than would otherwise be the case. And because there are no sub-limits for how warheads can be distributed on each of the three legs in the Triad, the "saved warheads" from the "fake" bomber count can be used to deploy more warheads on fast ballistic missiles than otherwise."²⁹ He continues then that "with the 'fake' bomber counting rule the United States and Russia could, if they chose to do so, deploy more strategic warheads under the New START Treaty by 2017 than would have been allowed by the Moscow Treaty."³⁰

As for the inclusion of missile defence into the New START, its preamble says that:

Recognizing the existence of the interrelationship between strategic offensive arms and strategic defensive arms, that this interrelationship will become more important as strategic nuclear arms are reduced, and that current strategic defensive arms do not undermine the viability and effectiveness of the strategic offensive arms of the Parties.

Actually, this particular wording is a Russian diplomatic victory; it is not simply recognition of the interrelationship between offensive and defensive strategic weapons, which is apparent of course. Having recognized that "current strategic defensive arms do not undermine the viability and effectiveness" of American and Russian strategic offensive arms, both the Kremlin and the White House have accepted that circumstances may emerge under which strategic defensive armaments undermine "viability and effectiveness" of offensive weapons. This allows Russia to demand at any moment they would like that Americans should stop their strategic defence programs.

As a whole, if to call things by their proper names there could be more reasons to characterize the New START rather as militarily meaningless than as an "essential step toward deeper, even more meaningful nuclear reductions in the future." It neither reduces the actual number of strategic weapons nor addresses strategic

²⁹ Hans M. Kristensen, "New START Treaty Has New Counting," <<http://www.fas.org/blog/ssp/2010/03/newstart.php>>.

³⁰ Ibid.

armaments alert level (albeit the higher this level is the higher the probability of using nuclear weapons due to failure of early warning systems, errors in command and control systems or because of misinterpretation of intentions and actions of the other side) nor does it address in any way Russian tactical nuclear armaments that play a highly important role in the strategic landscapes of Europe and the Far East. Finally, Russians are most probably are not ready at all for further reductions of strategic nuclear weapons and even to discuss tactical nuclear weapons.

In addition, there are no reasons to believe that the New START is of essential importance because it signalled a return of arms control and, as “arms control theologians” claim will strengthen so-called strategic stability.³¹ In the Cold War era, strategic arms control agreements were based on the notion that any further increase in the number of warheads or delivery vehicles would not yield any tangible military benefits, and the resources required for such an increase would be better spent on improving the quality rather than the quantity of the weapons. That led to mutual interest in limiting or even reducing the numbers. Both sides also pursued two other goals at the talks: to limit, reduce or even eliminate those weapons categories in which the other side had the advantage; and to protect the categories in which the home side had the upper hand. That meant that each round of negotiations would normally degenerate into lengthy and painful horse-trading that ended with numerous trade-offs and compromises. On the whole, the agreements reached at those talks did serve to strengthen strategic stability to the extent that they balanced American and Soviet strategic potential —but that was not the primary purpose of the talks. Yet now the “traditional arms control” approach to strategic armaments has lost its *raison d'être* because of Russia's growing lag behind the USA both in numbers and qualitative characteristics of its strategic arsenal. The basic fact is that Russia has next to nothing to offer the United States in return for the New START, which is Russia's essential political accomplishment. In fact, the USA has recognized the Russian ruling coterie as a partner politically equal to the Obama Administration, Russian aggression against Georgia has been forgotten and Washington demonstrated that Moscow was turning into a privileged partner of a sort.

³¹ The term “arms control theologians” is borrowed from the perfect John Bolton book, *Surrender is Not an Option: Defending America at the United Nations and Abroad* (New York: Threshold Editions, 2007).

Russian Tactical Nuclear Weapons

Since Russia's strategy presumes preventive nuclear strikes and the use of nuclear armaments as a battlefield weapon, the strategic role of Russian tactical nuclear weapons, which are beyond any arms control measures, is growing. It would be hardly possible to expect that preventive nuclear strikes in local conflicts will be executed by strategic nuclear systems while tactical nuclear weapons were designed exactly for limited, at least in geographical terms, nuclear wars.

A top Russian military commander, Colonel-General Vladimir Verkhovtsev said in 2007 that tactical nuclear weapons would remain in the arsenal of the Russian Armed Forces since "The situation that we have on our southern borders is quite complicated. We border on nuclear powers. That is why Russia's possession of tactical nuclear weapons restrains potential aggressors."³² It may mean in particular that Russia plans to use its tactical nuclear weapons to deter China, the only nuclear power nearby Russia's southern borders; or against Iran if the latter acquires nuclear weapons.

However, one may suppose that the set of targets for Russian tactical nuclear weapons is much wider. The Russian Navy plans to use long-range cruise missiles against enemy's warships yet also to strike deep in enemy territory.³³ Vice Admiral Oleg Burtsev, Deputy Head of the Navy General Staff, announced in March 2009 that "Probably, tactical nuclear weapons [on submarines] will play a key role in the future... Their range and precision are gradually increasing. There is no longer any need to equip missiles with powerful nuclear warheads. We can install low-yield warheads on existing cruise missiles."³⁴ The Commander of Rocket Forces and Artillery of the Russian Land Forces, Lieutenant-General Sergey Bogatinov recognized that the Russian tactical missiles Tochka and Iskander, which are to be deployed near the Western border may be equipped with nuclear warheads. He said in the interview to the Russian popular radio "Echo Moskvy" that "We do not

³² "Russia determined to keep tactical nuclear arms for potential aggressors," October 31, 2007, <http://english.pravda.ru/russia/kremlin/99911-nuclear_arms-0>.

³³ The main weapon designed for this purpose is land attack sea-based cruise missile SS-N-21 Sampson (aka RK-500 Granat), Russian sea-based cruise missile analogous to American Tomahawk, with battle range 3000 km equipped with nuclear warhead. Three types of Russian nuclear attack submarines Akula II (aka "Bars", project 971, nine ships), Sierra (aka "Barrakuda", project 945, two ships) and Victor III (aka "Schuka", project 671, four ships) are able to deliver and launch this SLCM.

³⁴ "Russia could focus on tactical nuclear weapons for subs," March 23, 2009 <<http://en.rian.ru/russia/20090323/120688454.html>>.

keep in secret that we have tactical nuclear weapons and that we have special (i.e. nuclear — Yu.F.) warheads both for Tochka missile complex and Iskander missile complex.”³⁵

Russian Tactical Nuclear Weapons

	Operationally deployed	In reserve	Total
Land-based	0	0	
Air defence	700	500	1,200
Air force	650	1,350	2,000
Navy	700	1,570	2,270
Total	2,050	3,420	5,470

Source: Hans Kristensen, “Russian Tactical Nuclear Weapons,” <<http://www.fas.org/blog/ssp/2009/03/russia-2.php>>.

Having in view that Russia has about 1,500 operationally deployed air- and sea-based tactical nuclear weapons, including nuclear-tipped sea-based cruise missiles of about 3,500 kilometres battle range, one may conclude that the Russian military plan to use them not only in local and small-scale regional wars nearby Russian borders, but also with a view to deliver a “nuclear blow” against targets located far from Russia. “There is not the slightest possibility that Russia will reveal the number of tactical nuclear weapons it holds,” said Vitaly Shlykov, a former high-ranking officer of the Soviet military intelligence, now a civilian adviser to Russia’s Defence Ministry, in May 2010. He continued

The main thing that justifies Russia’s claim to be a major regional power is its nuclear arsenal, and there is considerable leeway in our nuclear doctrine to use tactical nuclear weapons in an emergency. The mystique surrounding these weapons — that is, their numbers and the conditions under which Russia might employ them — is considered a very important advantage. I don’t believe Russian leaders would contemplate giving this up.³⁶

³⁵ Sergey Bogatinov, interview to “Echo Moskv,” November 21, 2009, <<http://www.echo.msk.ru/programs/voensovet/635231-echo.phtml>>.

³⁶ Fred Weir, “NPT: Obama reveals size of US nuclear weapons arsenal. Will Russia respond?,” *The Christian Science Monitor*, May 4, 2010.

Conclusion

The current evolution of Russian strategic thinking includes a greater role for nuclear weapons in Russian military planning and an enlargement in the set of situations in which Russia may use these weapons both in the course of military operations and in a preventive manner. Weakness of conventional forces fuels the nuclearization of Russian military strategy and its orientation toward first and preventive use of nuclear weapons. The latter in turn radically decreases crisis stability and substantially enhances the risk of massive nuclear conflict. Thus Russia's nuclear strategy may become a highly destabilizing factor in the international strategic landscape.

Despite the current reduction of the Russian nuclear arsenal it will have by the end of the next decade a quite substantial nuclear force of about 300–400 strategic delivery vehicles equipped with many hundreds of nuclear warheads. This force will be able to deter possible American (or other Western) involvement in local conflicts and wars along the borders of Russia initiated by Moscow with a view to establish a sphere of dominance in the former Soviet territories and spheres of influence in Central Eastern and Southern Europe. The threat of use of Russian tactical nuclear weapons may turn into an effective instrument of Russian foreign policy not only in regional but also in the much wider global context.