

“Operation Atom”

The Soviet Union’s Stationing of Nuclear Missiles in the German Democratic Republic, 1959

By **Matthias Uhl** and **Vladimir I. Ivkin**

On 26 March 1955, Nikita S. Khrushchev, First Secretary of the Communist Party of the Soviet Union (CPSU) and Nikolai A. Bulganin, Chairman of the Soviet Union’s Council of Ministers, signed government decree no. 589-365. Their signatures set in motion one of the most secret military actions of the Cold War—the stationing of strategic nuclear missiles on the territory of the German Democratic Republic (GDR).¹

Recently declassified documents and internal materials from the Russian Federation’s Strategic Missile Command now reveal that the first stationing of Soviet strategic missiles outside the borders of the USSR did not occur—as previously assumed by most historians and observers—in Cuba in 1962, but in the GDR nearly three years earlier. While the stationing of the missiles in Cuba provoked a global crisis, the Western governments, in their official statements in 1959, acted as if unaware of the developments in East Germany. Documents from the West German foreign intelligence service (*Bundesnachrichtendienst*—BND), now available in the German Federal Archives in Koblenz, show that at least the intelligence agencies of the Federal Republic of Germany (FRG), the United States, Great Britain, and France knew about the missile stationing. Both blocs apparently succeeded in addressing the tense military situation outside the public eye through a combination of secret diplomacy and calibrated pressure.

This essay provides an overview of the most important events and presents aspects of this military episode that have received little attention to date. Many of the relevant documents are still classified in Russian, German and US archives, or are considered to be lost, so the following is only a tentative assessment. It is difficult to put these events in the context of larger political developments because the internal deliberations about the operation are not yet known.

By 1955, more than 300 of the German missile specialists who had been brought to the USSR in the early postwar years had left the Soviet Union. They had been included in the missile building program that had existed since 1946 as a vital part of the Soviet Union’s effort to develop and produce long-range ballistic missiles using German technology. The German scientists’ legacy was the production of a Soviet version of the German V-2, which the Soviets called R-1.² The entire Soviet missile program was subsequently built on the success of the R-1 series. The next step in its development, the R-2, already had a range of 600 kilometers. The first missile of genuinely Soviet production was the R-5, which was successfully

tested in March 1953. It had a range of 1,200 kilometers and carried a warhead weighing 1.42 tons.³

It was necessary to equip the missile with an atomic warhead in order to make it a new strategic weapon. On 10 April 1954, the Soviet government gave its military-industrial complex the assignment of developing just such a weapons system. Given that the atomic bombs available at the time were too heavy to be delivered by a missile, the first step was to reduce the weight of the warhead. A special department of the Nuclear Weapons Development Center “Arzamas-16” headed by Samuel G. Kocarjanc took the lead on this aspect of the project. The nuclear warhead was to be delivered by a modified version of the R-5. The draft construction plan of the new R-5 was drawn up by the “Special Construction Office No. 1” (OKB-1) of the Scientific Research Institute No. 88 (NII-88), which, at that time, was the only Soviet research institution that developed long-range ballistic missiles. The well-known missile builder Sergei P. Korolev headed the scientific aspects of the project, and D. I. Kozlov was charged to head the construction of what was officially called “Production 8K51.” The project progressed rapidly, and in January 1955, the first flight tests took place at the Soviet Ministry of Defense’s central testing site in Kapustin Yar.⁴ The tests revealed several technical adjustments still necessary to make the R-5M a reliable carrier of nuclear weapons.

The second phase of the testing began in January 1956. By that time, Soviet technicians had succeeded in delivering atomic warheads on missiles. The operation had been code-named “Baikal.” Initially, the troops responsible for testing the new weapon launched four missiles equipped with complete warheads, except for the components necessary to start a nuclear chain reaction. On 2 February 1956, the Soviets successfully completed the world’s first launching of a battle-ready nuclear missile. After a flight of 1,200 kilometers, the missile reached its planned target area in the Aral region’s Karakum Desert [*Priaral’skie karakumy*]. The detonation device for starting the chain reaction functioned properly, causing the first explosion of a missile equipped with a nuclear warhead. The strength of the detonation was measured at the equivalent of 0.4 kilotons (KT) of TNT. Soon thereafter, the engineers and technicians increased this strength to 300 KT, more than twenty times the power of the bomb dropped on Hiroshima. At that point, the missile and the warhead comprised a new weapons system that allowed the destruction of strategic objectives. The Soviet Ministry of Defense added the R-5M to its missile arsenal as early as

21 June 1956.⁵

The new weapon, officially called a first-generation mid-range strategic missile, had a length of 20.8 meters, a diameter of 1.65 meters, and a weight of 28 tons. The missile was driven by a liquid propulsion system that used liquid oxygen and alcohol, which created a thrust of 44 tons and was therefore able to carry the 1,400 kilogram warhead up to a maximum distance of 1,200 kilometers. The missile would hit its target after a maximum flying time of 637 seconds. The navigational system of the missile functioned on the basis of inertial navigation and was guided by radio transmission to correct deviations from the missile's proper flight path. The average margin of error of 1.5 kilometers was considered to be sufficiently accurate. It allowed the destruction of important political and economic centers as well as larger "soft" military targets.⁶

Even before the successful conclusion of the tests, the Soviets began working on designs for a deployment of the weapon. The planners in the Soviet Ministry of Defense responsible for the project were aware that the R-5, with a range limited to 1,200 kilometers, still had to be stationed outside the territory of the Soviet Union if the most important political, military, and economic centers of Western Europe were to be in reach. Between 1953 and 1955, special groups from the Soviet Ministry of Defense gathered information on potential deployment locations for R-1, R-2 and R-5 missiles during reconnaissance trips to

Romania, Bulgaria and the GDR. Due to the limited effectiveness of these weapon prototypes in a conflict situation, the military leaders decided against implementing these plans. The plans were, however, the starting point for the planned stationing of the R-5M missile outside the Soviet Union.⁷

In March 1955, the Soviet Ministry of Defense presented draft decree no. 589-365 for the USSR Council of Ministers' decision. The draft called for stationing battle-ready missile brigades of the Supreme High Command Reserve (RVGK) in the Trans-Caucasian Military Zone, the Far Eastern Military Zone, in the GDR and in Bulgaria. While the Soviet Foreign Ministry was instructed to obtain the agreement of the Bulgarian government for stationing missiles on its territory, this procedure was not followed in the GDR. There the missile brigade was apparently to be integrated into the Group of Soviet Forces in Germany, which were considered to have extraterritorial status. The Soviet Union therefore saw no reason to consult with its ally about the intended stationing.⁸ In fact, as far as can be documented, the Soviet military apparently kept the stationing of the R-5M in the GDR a secret from their East German ally.⁹

Although Khrushchev and Bulganin signed the decree on 26 March 1955, its implementation was delayed repeatedly. The most important causes for this delay were repeated problems in producing the R-5M in sufficient

Announcing The Machiavelli Center (CIMA)

After many years of close but informal cooperation, last year a group of Italian Cold War historians decided to set up a formal arrangement in order to coordinate their research projects and link their efforts to the international programs studying the same historical period. This led to the creation of an inter-university center, The Machiavelli Center (CIMA), which unites a number of departments from the Universities of Florence, Padua, Pavia, Perugia, Roma Tre, and Urbino. The project centers around the activities of the Dipartimento di Studi sullo Stato of the University of Florence. Planned activities include conferences, publications and internships. Those interested to know more about its activities can write to dinolfo@unifi.it, leonuti@etr.it, guderzo@unifi.it. See also the CIMA website at <http://www.machiavellicenter.net>.

numbers, which made it impossible to equip the troops as planned. It was not until 1957 that the first strategic nuclear missile was actually introduced to the Soviet armed forces.¹⁰ By that time, plans for stationing the R-5M in the GDR had solidified. In addition to the Operations Division of the General Staff of the Soviet Army, the Staff of the Missile Troops also took part in preparing the operation. In early 1957, Maj.-Gen. P. P. Puzik, acting head of the Operations Division of the Missile Troops, received the order from the head of the Main Operations Administration of the General Staff, Lt.-Gen. A. O. Pavlovski, to choose proper stationing locations for the R-5M in the GDR. A few days later, Puzik traveled to the staff of the Group of the Soviet Forces in Germany, near Wünsdorf. From there he began his search for the best locations. These locations would ideally be in thinly populated areas, be easy to guard, and, if possible, have a good railway connection for unloading the equipment necessary for the operation. In the end, he chose the towns of Fürstenberg on the Havel and Vogelsang. Planning proceeded under the utmost secrecy. Puzik, for example, was not allowed to make any drawings during his inspection tour. The exact map of the planned sites was only developed after his return to the Operations Division of the Soviet General Staff.¹¹

The troops chosen for the stationing—the 72nd RVGK Engineer Brigade of the Soviet Army—were considered to be elite troops with experience in Germany. The 72nd RVGK Engineer Brigade had been formed in 1946 in Thuringia. On Stalin's orders, the core of the future Soviet missile troops practiced launching V-2s at Berka, near Sonderhausen. The goal of the exercises was the practical testing of six V-2 rockets in Peenemünde in October 1946.¹² Because Stalin feared diplomatic problems due to this obvious violation of the 1945 Potsdam Accords, the first launch of the rocket took place in Kapustin Yar in 1947.

In the ensuing years, the unit tested not only a steady stream of new models of missiles but also practiced the first tactical variations of the use of missile weapons. The unit alternated between simulating the destruction of industrial areas and political centers. The brigade was still primarily a testing unit since the inaccuracy and low levels of explosive power of conventional warheads made their effective use in battle unlikely. The experience gathered from the tests was used primarily to analyze the most applicable methods for missile attacks and to develop the necessary command and troop structures.¹³

Once the 72nd Engineer Brigade had been designated for stationing in the GDR, the military preparation for the operation began immediately. From March 1957 on, the first of the brigade's three artillery units was equipped with the R-5M weapons system. Just one month later, the special unit responsible for the construction and use of atomic warheads, the 23rd Field Construction Brigade, was formed within this division. The other two artillery units continued to deploy the outdated R-1 and R-2 missiles. The entire brigade took part in an exercise in the summer of 1957, in the course of which the troops were ordered to show

actions of an engineer brigade during the attack of an army group. During the exercises, the brigade's 650th Missile Unit launched two R-5M missiles.

During the following year, the 72nd Engineer Brigade underwent a number of restructuring measures. At that point, the 635th and 638th Artillery Units, designated for stationing in the GDR, received new nuclear missiles. At the same time, the construction brigade necessary for the use of the warheads, soon renamed the Mobile Missile Technical Base, was established. In addition, the brigade developed a strenuous training schedule in order to master the awe-inspiring weapons system. By the end of 1958, the 72nd Engineer Brigade had launched a total of eight R-5M missiles in preparing for the stationing. At this point, the missiles were equipped with nuclear warheads that could carry the equivalent of 300 kilotons of TNT to any type of strategic target in an attack.¹⁴

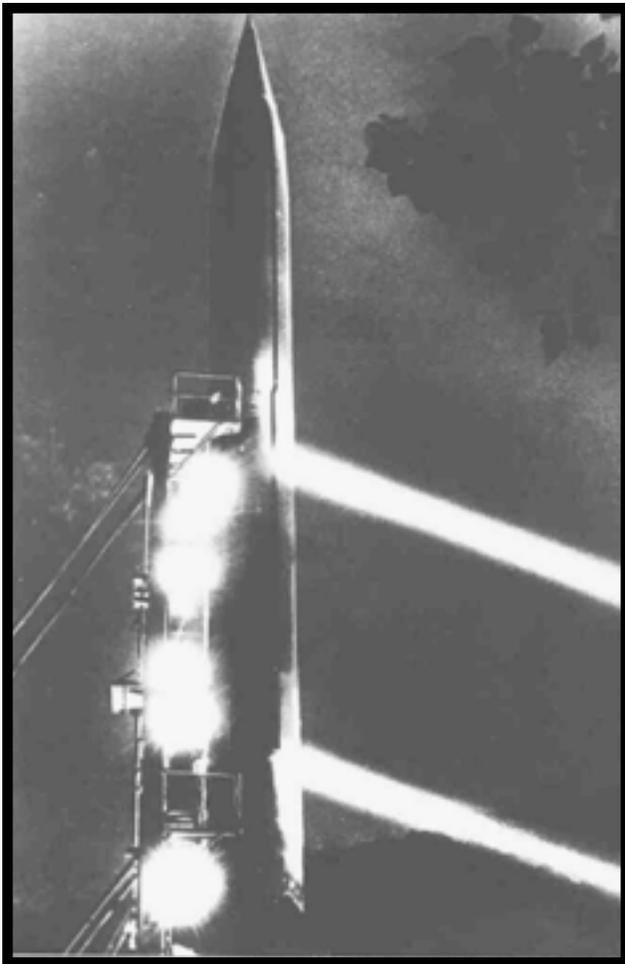
In early summer 1958, the USSR to build storage and housing areas for the warheads, missile technology, and the soldiers, while preparing the troops for their transfer. These preparations were carried out in extreme secrecy. Only Soviet soldiers worked on the construction sites—German construction companies did not participate in the project. Rumors were spread that the new facilities were being constructed to train East German army troops with the Soviet troops stationed in Germany.¹⁵ In spite of the caution exercised, the Soviets made a fatal mistake in the beginning phase of the project. The trucks used to transport construction materials bore the marking "ATOM" prominently displayed on the rear. By the time that the Soviet troops noticed the mistake, it was already too late. The West German intelligence service (BND) learned of the unusual events taking place in the Fürstenberg/Vogelsang area from its agents, mostly civilians working in the Soviet garrisons as well as agricultural workers and foresters who had access to the restricted area.¹⁶

In fact, the secrecy employed by the Soviets came back to haunt them. The local population, including those that were working for BND, became suspicious about the exclusive use of Red Army construction crews and the unusual practice of strictly separating the Soviet garrisons. In September 1958, an agent code-named "V-16800" reported that the large-scale transport of construction material "is connected with the construction of a rocket launching base in the region around Vogelsang, Templin, and Groß Dölln."¹⁷ The BND's evaluation of this report rated it a C-3, meaning "dependable source/probably true information." Although this report shows signs of having been processed, no further clues are available as to the impact of this information, because the relevant documents are still classified in Bonn and Pullach.¹⁸ Nevertheless, the report provided Western intelligence services with information about the Soviet deployment plans before the first missiles had even reached the GDR.

The Soviet military continued its preparations, however, since it still assumed the operation to be a secret. By the end of 1958, the construction work necessary for

stationing the missiles and their crews was nearing completion, and in November-December 1958, the 72nd Engineer Brigade prepared for its transfer to the GDR. Since only enough space existed thus far for two divisions, the third division was transferred to Gvardeysk in the Königsberg region. The remaining staff of the brigade, the 635th and 638th Missile Units as well as the 349th and 432nd Mobile Missile Technical Bases, began their secret transport of soldiers and equipment to the GDR.¹⁹

Efforts to maintain secrecy, such as firing all German workers in the Vogelsang and Fürstenberg garrisons, were increased.²⁰ Nonetheless, at the end of January 1959, agent V-9771 reported to his contact in the BND the arrival of parts of the 635th Missile Unit. He reported that a transport of the Soviet Army had arrived at the train route between Lychen and Fürstenberg. At the center of the transport, soldiers had moved “very large bombs” with the help of caterpillar tractors. It seems clear that this was the movement of R-5M components. Avoiding the main roads, the equipment, now covered in tarpaulin, was then taken to the back side of the Kastaven Lake military base near Fürstenberg.²¹



R-5M Missile

Picture Courtesy of Matthias Uhl

The staff of the brigade as well as the 349th Mobile Missile Technical Base were stationed with the 635th Division in Fürstenberg, in the immediate vicinity of the command center of the Second Soviet Tank Guard Army. The 638th Division and its accompanying 432nd Mobile Missile Technical Base were stationed twenty kilometers away, in the neighboring village of Vogelsang.²² Each of the two missile divisions controlled two artillery battalions, outfitted with a launching ramp for firing the R-5M, including the necessary ground equipment. Each launching ramp was equipped for three missiles at that time; in total four launching units and 12 missiles were ready for deployment in the GDR. In addition to the aforementioned equipment, each division had a transport battalion, a unit to fuel the missiles, and a guidance battalion. This last group had the task of increasing the accuracy of the missile through the use of radio control. To this end, the guidance battalion employed a guidance device designed to reduce the missile's tendency to veer to one side or the other.²³

The missiles, however, were not fully ready for battle. They still lacked the necessary nuclear warheads, which arrived in the GDR only in mid-April 1959. The warheads, officially labeled “generators” for the trip, were brought by train under heavy guard to the military airport at Templin. In the nights thereafter, they divided the Mobile Missile Technical Bases among the bunkers designed for them in the area around Vogelsang and Fürstenberg. On 29 April, an incident occurred that is not described in any detail in the material available at the time this article was written. But it is clear that during the transport of the nuclear weapons, the head of the 432nd Mobile Missile Technical Base, Lt.-Maj. S. I. Nesterov was demoted and relieved of command on the spot by Lt.-Gen. M. K. Nikolski, the head engineer for the 12th Central Division, responsible for the warheads.²⁴

Once the nuclear warheads had arrived, the 72nd RVGK Reserve Brigade was finally ready for battle. At the beginning of May 1959, the Commander of the Group of Soviet Forces in Germany, M. V. Zakharov, personally told Khrushchev that the missiles were ready for use.²⁵ At that point, the brigade, which reported directly to Khrushchev and the General Staff, was in position to report that it was ready to “assume the planned launching position and fulfill the designated tasks.”²⁶

Since the relevant documents are not accessible, one can only speculate as to the possible targets assigned to the missile brigade. It seems likely, however, that four missiles were aimed at the UK. The US-British “Thor” missiles stationed in Yorkshire and Suffolk were to be destroyed by the Soviet nuclear missiles in the case of a crisis. For the first time, moreover, the most important US air bases in Western Europe were also within range of the Soviets' weapons. The bombers stationed in Western Europe carrying US nuclear weapons, the most important element in the strategy of massive retaliation, were thus in

danger of a surprise attack. A third military option was also conceivable: Western Europe could be cut off from its US protector in the event of war by the destruction of the Atlantic harbors. It is also certain that missiles were aimed at population centers in Western Europe, such as London, Paris, Bonn and the Ruhr, and Brussels.²⁷ The establishment of another Soviet missile base in Albania could have completed the Soviet's strategy. From this base in the harbor city of Vlorë, Rome and NATO's Southern European Headquarters in Naples could be targeted.²⁸

Although a formidable number of the Soviet Union's battle-ready nuclear missiles were located in GDR territory at the time,²⁹ this fact alone should not be viewed as an aggressive move on Khrushchev's part. His central interest was to improve the Soviets' strategic position in the case of a potential conflict. At the time of the Suez Crisis, Soviet politicians and military planners had to recognize that they did not have the military capacity to threaten Western Europe in order to exert pressure in the case of a crisis. This strategic disadvantage, which the Soviets considered decisive, was to be eliminated through the stationing of R-5M nuclear missiles in the GDR. At the same time, it can be assumed that the nuclear forward guard of the USSR was supposed to reduce the US nuclear advantage that had existed up to that point. Since the Soviet Union was not in a position militarily to match the alleged threat of the Strategic Air Command, it responded by stationing nuclear missiles.

Meanwhile, the brigade in the GDR perfected its readiness through repeated launch drills. For security reasons, training took place only at night. Since the unit was very motivated politically and also enjoyed comparatively comfortable material conditions, they succeeded in reducing the preparation time for a launch from thirty to five hours. This increased performance guaranteed a high state of readiness, but technical problems repeatedly emerged. The substitute used for the highly volatile fuel component liquid oxygen continued to cause problems. Without refueling, the missiles were not mission-ready for longer than thirty days.³⁰

After the BND had gathered the first bits of information about the stationing of the 72nd Engineer Brigade at the beginning of 1959, the information flow increased in the spring of that year. The continued construction work exclusively carried out by Soviet units, the strict cordoning-off of the construction sites, and the forest surroundings necessary for hiding the missile troops, as well as the close military observation by machine gun posts—all of this caused the local population to speculate frequently that the Russians were building missile-launching bases in the area. The BND informants in the area quickly passed these rumors on to the intelligence organization's center in Pullach.³¹ But the West German intelligence service was by no means the only such agency active in the area where the 72nd Missile Brigade was stationed. US, British and French intelligence agencies, as well as two others that have yet to be identified, attempted to gather information

about the unusual activities in the Fürstenberg/ Vogelsang region.³² Despite this concentration of intelligence agents from NATO countries on such limited territory, the documentary evidence thus far available suggests that information on the nuclear missile deployments may not have reached top-level policymakers in the US until late 1960. It was not until then that US intelligence agencies had even reached firm conclusions on the GDR deployment. Indeed, the CIA believed that Soviet missiles were still in the GDR as of early 1961!³³

The Soviet missile base in the GDR provided Khrushchev with an important means to back up his Berlin ultimatum—whether or not its deployment was known among Western policymakers. The Soviet leader reiterated this threat in a conversation in Moscow on 23 June 1959 with W. Averell Harriman: “It would take only a few Soviet missiles to destroy Europe: One bomb was sufficient for Bonn and three to five would knock out France, England, Spain and Italy. The United States would be in no position to retaliate because its missiles could carry a warhead of only ten kilograms whereas Russian missiles could carry 1,300 kilograms.”³⁴

The Western military alliance hence had to make it clear to the Soviets that there would be no compromise on the status of Berlin. The core of this tactic was NATO's 1959 contingency plan “Live Oak,” designed to assure Western Allied rights in Berlin. The crisis scenario developed in the context of “Live Oak” foresaw a continual escalation of military force applied in Berlin in the case of a military conflict. The possibilities ranged from an armed invasion of the GDR by US military units to reach Berlin to nuclear retaliatory strikes.³⁵

Unfortunately, it is impossible to determine at this time whether the presence of the battle-ready Soviet missiles in the GDR played any role in this contingency planning of the Western plans and tactics in the Geneva negotiations that began in May 1959. Uncertainty about Soviet missile deployments (whether Intercontinental or Intermediate-range ballistic missiles) heightened Western concerns that a political crisis over Berlin that turned into a military confrontation could put the UK and Western Europe at risk.³⁶ Certainly that problem made negotiations seem more urgent. But that uncertainty had been in the air for months before the completion of the GDR deployment. It seems highly doubtful that IRBM deployments in the GDR had an impact on decisions on the Berlin negotiations, especially when one considers that the intelligence community did not complete its assessment of the data on the GDR until the last days of the Eisenhower administration.³⁷

Khrushchev, however, probably did not intend an escalation of the crisis to reach the point of a war. The Soviet premier's tactics in the Berlin Crisis were much more bluff-oriented. For Khrushchev, the nuclear missiles in the GDR might have served as a special “trump” in the game of power poker. At no point, however, was the Soviet leader prepared to risk a World War III over Berlin.³⁸ When he recognized that a military conflict would develop in the

case of continued confrontation, Khrushchev moved to pull back his missiles stationed in the Soviets' front guard—perhaps intended (but not noticed) as a visible symbol of a relaxation of tensions.

In August 1959, the missile unit left its positions in the GDR in great haste. The officers and the soldiers of the unit, many of whom had hoped to be stationed in the GDR for a long term and had already begun to develop plans for a life in East Germany, were taken completely by surprise by the order to relocate. Within the span of a few weeks, the missiles were moved to the area around Kaliningrad on the Baltic coast. Paris and London were once again outside the range of the R-5M.³⁹

Even today, most of the officers and soldiers of the 72nd Engineer Brigade who took part in the stationing and withdrawal are unable to explain the hasty retreat of the missile unit. They suspect, however, that the retreat to the Soviet territory was based on political motives.⁴⁰ In fact, the withdrawal occurred just as Eisenhower and Khrushchev announced their decision to exchange visits, with Khrushchev to visit the US in September. With détente in the air, the Soviet leader may have worried that it would be awkward for Soviet policy if the US discovered the missiles in Germany. Given that two years later the Soviet leader launched “Operation Anadyr,” the stationing of Soviet nuclear weapons on Cuba, Khrushchev’s motives in deploying and removing nuclear missiles in the GDR raises intriguing questions—which only further access to the relevant archives will help to answer. Was “Operation Atom” a prelude to “Operation Anadyr”?



DOCUMENT

STATEMENT BY THE CENTRAL COMMITTEE OF THE COMMUNIST PARTY OF THE SOVIET UNION AND THE COUNCIL OF MINISTERS OF THE USSR ON THE TRANSFER OF THE 72ND ENGINEER BRIGADE TO EAST GERMANY, 26 MARCH 1955

Top Secret

Return to Group Number 1 of the Special Division of the Administrative Section of the Council of Ministers of the Soviet Union within 24 hours required

Central Committee of the Communist Party of the Soviet Union and Council of Ministers of the USSR

Decision of 26 March 1955

Top Secret

Moscow, The Kremlin

About Measures to Increase the Battle-Readiness of the Engineer Brigades of the Supreme Command Reserve Units.

With the goal of increasing the battle-readiness of the engineer brigades of the Supreme Command's Reserve Units, the Central Committee of the Communist Party of the Soviet Union and the Council of Ministers of the Union of Soviet Socialist Republics have decided that:

The Defense Ministry of the Soviet Union (Comrade Zhukov) is assigned with carrying out the following measures:

1. From 1955 to 1956, four engineer brigades of the Supreme Command Reserve Units are to be transferred to areas that correspond with the plans for their battle deployment:

A. The 72nd RVGK [*Rezerv Verchovnogo Glavnokomandovanija*—Reserve of the High Command] Engineer Brigade is to be transferred to the territory of the GDR and is to be incorporated into the troops of the Soviet military forces in Germany;

B. The 73rd RVGK Engineer Brigade is to be transferred to the territory of the People's Republic of Bulgaria, and the Foreign Ministry of the USSR (Comrade Molotov) is to gain the agreement of the Bulgarian government to this stationing;⁴¹

C. The 90th RVGK Engineer Brigade is to be transferred to the territory of the Trans-Caucasian Military Zone;

D. The 85th RVGK Engineer Brigade is to be transferred to the Far Eastern Military Zone

2. The 72nd, 73rd, 85th, 90th and 233rd Engineer Brigades of the RVGK are to be brought up to full strength and are to be fully staffed, and armed with the necessary special weaponry and technology.

3. The 80th RVGK Engineer Brigade is to be transformed into a training unit for engineer brigades RVGK, and will be responsible for training the new non-commissioned officers and soldiers for all engineer brigades, as a substitute for those released to the reserves.

It is to be guaranteed that the training unit for RVGK engineer brigades can be transformed into battle-ready engineer brigades RVGK. In this instance, the specialists necessary for training the replacements coming from the reserves are to be left out of the transformation process. The training unit for RVGK engineer brigades is to be stationed on the territory of the Central State Artillery Range.⁴²

4. The size of the Soviet Army is to be increased by 5,500 men in order to guarantee that the measures listed in points 2 and 3 are carried out.

5. In the period 1955-56, the Ministry of Defense of the USSR is allowed to use 30 R-1 and 18 R-2 missiles that have passed their maximum guaranteed storage life in the reserve of the Ministry of Defense to

improve the battle training of the 7 engineer brigades.

The Secretary of the Central Committee
The Chairman of the of the Communist Party of the Soviet Union, Council of Ministers of the USSR,

N. Khrushchev
N. Bulganin

[Source: Archive of the President of the Russian Federation (AP FR), Moscow, Register 93 (Documents with Decisions of the Council of Ministers of the USSR for the Year 1955) as printed in *Pervoe raketnoe soedinenie vooruzennykh sil strany: Voенno-istoriceskij ocerk* (Moscow: CIPK, 1996), pp. 208-209. Translated from Russian for the CWIHP by Matthias Uhl.]

Dr. Matthias Uhl recently defended his dissertation on "Stalin's V-2: The Transfer of German Missile Technology to the USSR and the Development of the Soviet Missile Production, 1945-49." He is currently a research fellow at the Berlin office of the Institute for Contemporary History (Munich), working on a larger documentation project on the 1958/62 Berlin Crisis. Dr. Vladimir I. Ivkin is a Russian historian.

¹ See "Decision of the Central Committee of the Communist Party of the Soviet Union and the Council of Ministers of the Soviet Union, Nr. 589-365," Top Secret, 26 March 1955, printed in *Pervoe raketnoe soedinenie vooruzennykh sil strany: Voенno-istoricesky ocerk* (Moscow: CIPK, 1996), pp. 208-209. The original is located in the *Archiv Prezidenta Rossijskoj Federacii* [Archive of the President of the Russian Federation, Moscow, AP RF], Register 93 (Documents with Decisions of the Council of Ministers of the USSR for 1955).

² On the activity of the German missile specialists in the Soviet Union, see Jürgen Michels, *Peenemünde und seine Erben in Ost und West: Entwicklung und Weg deutscher Geheimwaffen*, (Bonn: Bernard & Gräfe, 1997); Ulrich Albrecht, Andreas Heinemann-Grueder and Arend Wellman, *Die Spezialisten: Deutsche Naturwissenschaftler und Techniker in der Sowjetunion* (Berlin: Dietz, 1992). The author is currently working on a monograph on the same topic that will soon appear under the title: *Stalins V-2: Der Transfer der deutschen Raketentechnik in die UdSSR, 1945-1955*.

³ See *Raketno-kosmiceskaia korporacia "Energiia" imeni S. P. Koroleva* (Moscow: RKK "Energiia", 1996), pp. 31-51; T. Kochran, U. Arikin, R. Norris and Dz. Sends, *Jadernoe vooruzenie SSSR* (Moscow: IzDAT, 1992), pp. 230-233.

⁴ See M. A. Pervov, "Ballisticeskie rakety velikoj strany" *Aviacija i kosmonavtika: Vcera, segodnja, zavtra*, no. 7 (1998), pp. 17-23; see also A.V. Karpenko, A. F. Utkin and A. D. Popov, *Otecestvennye strategiceskie raketnye komplekсы* (Sankt-Peterburg: Nevskij bastion: Gangut, 1999), pp. 38-44.

⁵ See *Strategiceskoe jadernoe vooruzenie Rossii* (Moscow: Izdat 1998), pp. 160-161, see also B. E. Certok, *Rakety i ljudi* (Moscow: Masinostroenie 1995), pp. 389-390; *Jadernye ispytanija SSSR* (Moscow: Izdat 1997), p. 147; *Chronika osnovnykh sobytij istorii Raketnykh vojsk strategiceskogo naznachenija* (Moscow: CIPK, 1996), p. 35.

⁶ See *Raketnye komplekсы*, p. 43f. see also S. G. Kolesnikov, *Strategiceskoe raketno-jadernoe oruzie* (Moscow: Arsenal-Press, 1996), p. 19-20.

⁷ See M. A. Pervov, *Raketnoe oruzie Raketnykh vojsk strategiceskogo naznachenija* (Moscow: Violanta, 1999), p. 51.

⁸ See "The Decision of the Central Committee of the Communist Party of the Soviet Union and of the Council of Ministers of the USSR," no. 589-365, Top Secret, 26 March 1955, printed in *Pervoe raketnoe*, pp. 208-209.

⁹ During my interview with General Heinz Kessler, who was the Defense Minister for the GDR from 1985 to 1989, on 24 October 1999, Kessler stated: "The Soviet Army leadership did not give the GDR military leadership any information about the stationing of missiles in Vogelsang and Fürstenberg. In my position at the time as head of the GDR air force, I had no knowledge of any action of that type. Neither the GDR Defense Minister at the time, Willi Stoph, nor his first assistant, Lieutenant-General Heinz Hoffmann had received any information, as far as I know. In addition, in my later position as Defense Minister, this 1959 event was never mentioned in any way by the commander of the Group of Soviet Forces in Germany or the Supreme Command of the Warsaw Pact. This type of behavior matches my later experiences. The Soviet military, for example, never told us which Soviet installations in the GDR had nuclear weapons in storage during my time in that position."

¹⁰ See *Sozdateli raketno-jadernogo oruzija i veterany-raketaikij rasskazyvajut* (Moscow: CIPK, 1996), pp. 250-252, see also *Voennyj enciklopediceskij slovar' Raketnykh vojsk strategiceskogo naznachenija* (Moscow: Naucnoe izdatel'stvo "BRE", 1999), p. 619.

¹¹ See *Pervoe raketnoe*, p. 124-125

¹² See Draft Decision for the Council of Ministers of the USSR, "About the Production of a Trial Series of Long-Range Missiles V-2 and Measures to Their Further Improvement," not dated (probably August 1946), Russian State Archive for Economics [RGAE], Moscow, Register 8157, Section 1, document 1149, sheet 126-128.

¹³ See Ju. A. Jasin and N. K. Monachov, "Pervaja otecestvennaja" *Nezavisimoe voенnoe obozrenie*, no. 3 (1998), p. 5; see also *Raketnye vojska strategi'eskogo naznachenija: Voенno-istoriceskij trud* (Moskva: RVSН, 1994), pp. 51-53; M. V. Sacharov, *Die Streitkräfte der*

UdSSR: Abriß ihrer Entwicklung von 1918 bis 1968 (Berlin: Militärverlag d. DDR, 1974) p. 637.

¹⁴ See *Pervoe raketnoe*, pp. 11–13, see also M. A. Pervov, *Mezkontinental'nye ballisticskie rakety SSSR i Rossii: Kratkij istoriceskij ocerk* (Moscow: [publisher not identified], 1998), p. 29–30.

¹⁵ See Standortkartei der Militärischen Auswertung des BND: “Allgemeine Beobachtungen in Vogelsang, 22. Mai 1958 bis 11 August 1958”, [Card Catalog of the BND’s Military Evaluations: General Observations in Vogelsang], Federal Archives, Koblenz [henceforth BA Koblenz], Collection B 206/114, sheet 18–19.

¹⁶ *Ibid.*, sheet 18.

¹⁷ *Ibid.*, report E 14136, mid-September 1958, BA Koblenz, collection B 206/114, sheet 20.

¹⁸ See information sent to the author by the BND on 22 April 1998 and 4 May 2000.

¹⁹ A. Bondarenko, “Osobaja tajna Vtoroj armii,” *Aviacija i kosmonavtika: Vcera, segodnja, zavtra*, no. 7 (1998), pp. 24–25; also see *Pervoe raketnoe*, p. 13.

²⁰ Card Catalog of the BND’s Military Evaluations: General Observations in Fürstenberg, report E 21235, late January, 1959, BA Koblenz, B 206/109, Sheet 6.

²¹ *Ibid.*, sheet 6. The Soviets’ procedures for unloading their cargo, which corresponded exactly to the instructions for transporting missiles of the R-5M category, also indicates that it was actually missiles being delivered at that time. See “Security Instruction to the Troop Section 15644 for Testing the R-5M and Other Analog Varieties,” 31 July 1954, RGAE, Register 397, Section 1, Document 201, Sheets 101–112.

²² See *Pervoe raketnoe*, p. 13.

²³ See Pervov, *Raketnoe oruzie*, p. 51; also see *Slovar RVSN*, p. 204–5.

²⁴ See *Pervoe raketnoe*, p. 133–34.

²⁵ See Bondarenko, “Osobaja tajna Vtoroj armii” p. 25.

²⁶ *Voencal'niki Rakenych vojsk strategiceskogo naznacenija* (Moscow: CIPK, 1997), p. 88.

²⁷ See Wolfgang Bayer “Geheimoperation Fürstenberg,” *Der Spiegel*, no. 3, 16 January 2000, p. 42–44; also see Bondarenko, “Osobaja tajna Vtoroj armii” p. 25–26.

²⁸ See *Das Albanien des Enver Hocha*, “Arte” TV Production, 1997.

²⁹ See *Raketnyj scit otecestva* (Moscow: CIPK, 1999), p. 68. In 1959, the missile troops of the Soviet Union had only 32 battle-ready atomic missiles at their disposal. All of them were R-5M model types. By 1960, they had two intercontinental missiles, model R-7A, as well as 36 medium-range missiles, model R-5M, and 172 R-12 missiles.

³⁰ See Bondarenko, “Osobaja tajna Vtoroj armii” p. 26; *Pervoe raketnoe*, p. 120–22.

³¹ See *Standortkartei der Militärischen Auswertung des BND: Allgemeine Beobachtungen in Vogelsang, Februar-Juni 1959* [Card Catalog of the BND’s Military Evaluations: General Observations in Vogelsang, February–June 1959], BA Koblenz, B 206/114, Sheets 25–29.

³² See *Standortkartei der Militärischen Auswertung*

des BND: Allgemeine Beobachtungen in Fürstenberg, Meldung von USAREUR (United States Army in Europe), April 1959, BA Koblenz, collection B 206/109, sheet 6; “Meldung von Aster,” *ibid.*; *Standortkartei der Militärischen Auswertung des BND: Allgemeine Beobachtungen Baustelle VOGELSANG - BURGWALL, Meldung von Narzisse, September 1959*, BA Koblenz, collection B 206/114, sheet 1. ASTER is the BND’s code name for the British intelligence agency, and the information delivered to the BND by the French Foreign Intelligence Service was classified under the codename NARZISSE. In addition, there are the code names DIANA and BSSO, which have not yet been positively linked to a particular foreign intelligence service.

³³ *Editor’s Note*: See “Intelligence Note: Deployment of Soviet Medium Range Missiles in East Germany,” Memorandum from Hugh S. Cumming Jr (INR) to the Secretary of State, 4 January 1961, National Archives, Record Group 59, Lot 65D478: Records of the Special Assistant to the Secretary of State for Atomic Energy/Country and Subject Files Relating to Atomic Energy Matters, 1950–1962, box 5, 1961/USSR/Intelligence Reports.—I would like to thank William Burr (National Security Archive) for bringing this document to my attention.

³⁴ Quoted in John Lewis Gaddis, *We Now Know: Rethinking Cold War History* (New York: Oxford UP, 1997), p. 242.

³⁵ See William Burr, “Avoiding the Slippery Slope: The Eisenhower Administration and the Berlin Crisis, from 1958 to 1959,” *Diplomatic History*, 18:2 (Spring 1994), pp. 177–205; see also “Geheimoperation Fürstenberg” *Der Spiegel*, p. 46; see also Christian Bremen, *Die Eisenhower-Administration und die zweite Berlin-Krise 1958–1961* (Berlin: de Gruyter, 1998); John Lewis Gaddis, Philip H. Gordon, Ernest R. May, and Jonathan Rosenberg, eds. *Cold War Statesmen Confront the Bomb: Nuclear Diplomacy Since 1945* (Oxford: Oxford University Press, 1999), pp. 111–115.

³⁶ Whatever data the West might have had on Soviet deployment in East Germany did not lead to a clear clamor among the Western European NATO members for corresponding MRBMs—only Turkey and Italy responded favorably to Eisenhower’s offer for them. See Phil Nash, *The Other Missiles of October* (Chapel Hill: The University of North Carolina Press, 1997).

³⁷ See footnote 33.

³⁸ See Michael Jochum, *Eisenhower und Chruschtschow: Gipfeldiplomatie im Kalten Krieg 1955–1960* (Munich, et al.: Schoenigh, 1996), p. 107; Vladislav Zubok and Constantine Pleshakov, *Inside the Kremlin’s Cold War: From Stalin to Khrushchev* (Cambridge: Harvard University Press, 1996), p. 199.

³⁹ See *Pervoe raketnoe*, pp. 122, 135; see also *Slovar RVSN*, p. 440.

⁴⁰ *Ibid.*, pp. 126, 135.

⁴¹ The Bulgarians may have refused to grant their permission, because there are no references to a stationing of the 73rd Engineer Brigade RVGK in Bulgaria.

⁴² The Central State Artillery Grounds were established on 13 May 1946 and located in Kapustin Yar.

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Our country is undergoing a truly revolutionary upsurge. The process of restructuring is gaining pace; We started by elaborating the theoretical concepts of restructuring; we had to assess the nature and scope of the problems, to interpret the lessons of the past, and to express this in the form of political conclusions and programs. This was done. The theoretical work, the re-interpretation of what had happened, the final elaboration, enrichment, and correction of political stances have not ended. They continue. However, it was fundamentally important to start from an overall concept, which is already now being confirmed by the experience of past years, which has turned out to be generally correct and to which there is no alternative. [...]

We intend to expand the Soviet Union's participation in the monitoring mechanism on human rights in the United Nations and within the framework of the pan-European process. We consider that the jurisdiction of the International Court in The Hague with respect to interpreting and applying agreements in the field of human rights should be obligatory for all states.

Within the Helsinki process, we are also examining an end to jamming of all the foreign radio broadcasts to the Soviet Union. On the whole, our credo is as follows: Political problems should be solved only by political means, and human problems only in a humane way. [...]

Now about the most important topic, without which no problem of the coming century can be resolved: disarmament. [...]

Today I can inform you of the following: The Soviet Union has made a decision on reducing its armed forces. In the next two years, their numerical strength will be reduced by 500,000 persons, and the volume of conventional arms will also be cut considerably. These reductions will be made on a unilateral basis, unconnected with negotiations on the mandate for the Vienna meeting. By agreement with our allies in the Warsaw Pact, we have made the decision to withdraw six tank divisions from the GDR, Czechoslovakia, and Hungary, and to disband them by 1991. Assault landing formations and units, and a number of others, including assault river-crossing forces, with their armaments and combat equipment, will also be withdrawn from the groups of Soviet forces situated in those countries. The Soviet forces situated in those countries will be cut by 50,000 persons, and their arms by 5,000 tanks. All remaining Soviet divisions on the territory of our allies will be reorganized. They will be given a different structure from today's which will become unambiguously defensive, after the removal of a large number of their tanks. [...]

By this act, just as by all our actions aimed at the demilitarization of international relations, we would also like to draw the attention of the world community to another topical problem, the problem of changing over from an economy of armament to an economy of disarmament. Is the conversion of military production realistic? I have already had occasion to speak about this. We believe that it is, indeed, realistic. For its part, the Soviet Union is ready to do the following. Within the framework of the economic reform we are ready to draw up and submit our internal plan for conversion, to prepare in the course of 1989, as an experiment, the plans for the conversion of two or three defense enterprises, to publish our experience of job relocation of specialists from the military industry, and also of using its equipment, buildings, and works in civilian industry. It is desirable that all states, primarily the major military powers, submit their national plans on this issue to the United Nations. [...]

Finally, being on U.S. soil, but also for other, understandable reasons, I cannot but turn to the subject of our relations with this great country. [...] Relations between the Soviet Union and the United States of America span 5 1/2 decades. The world has changed, and so have the nature, role, and place of these relations in world politics. For too long they were built under the banner of confrontation, and sometimes of hostility, either open or concealed. But in the last few years, throughout the world people were able to heave a sigh of relief, thanks to the changes for the better in the substance and atmosphere of the relations between Moscow and Washington. [...]

We acknowledge and value the contribution of President Ronald Reagan and the members of his administration, above all Mr. George Shultz. All this is capital that has been invested in a joint undertaking of historic importance. It must not be wasted or left out of circulation. The future U.S. administration headed by newly elected President George Bush will find in us a partner, ready—without long pauses and backward movements—to continue the dialogue in a spirit of realism, openness, and goodwill, and with a striving for concrete results, over an agenda encompassing the key issues of Soviet-U.S. relations and international politics.

We are talking first and foremost about consistent progress toward concluding a treaty on a 50 percent reduction in strategic offensive weapons, while retaining the ABM Treaty; about elaborating a convention on the elimination of chemical weapons—here, it seems to us, we have the preconditions for making 1989 the decisive year; and about talks on reducing conventional weapons and armed forces in Europe. We are also talking about economic, ecological and humanitarian problems in the widest possible sense. [...]

We are not inclined to oversimplify the situation in the world. Yes, the tendency toward disarmament has received a strong impetus, and this process is gaining its own momentum, but it has not become irreversible. Yes, the striving to give up confrontation in favor of dialogue and cooperation has made itself strongly felt, but it has by no means secured its position forever in the practice of international relations. Yes, the movement toward a nuclear-free and nonviolent world is capable of fundamentally transforming the political and spiritual face of the planet, but only the very first steps have been taken. Moreover, in certain influential circles, they have been greeted with mistrust, and they are meeting resistance. [...]

[Source: CNN.com]