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AN APPRECIATION FOR VULNERABILITY TO DECEPTION AT THE
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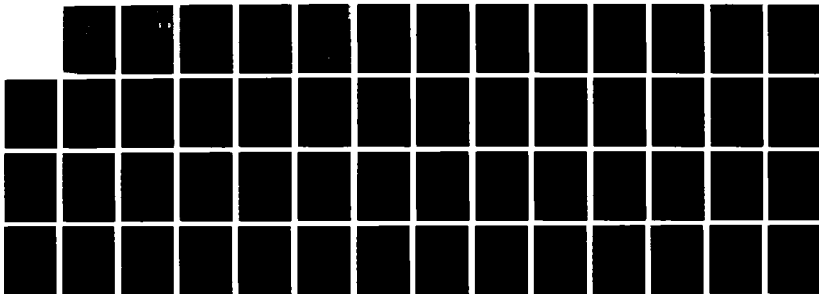
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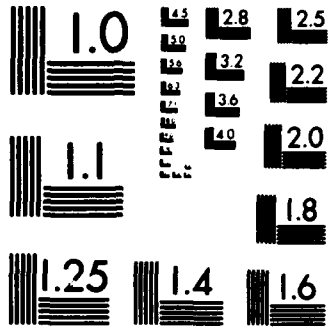
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AN APPRECIATION FOR VULNERABILITY TO DECEPTION
AT THE OPERATIONAL LEVEL

by

Major Charles E. Burgdorf
Infantry

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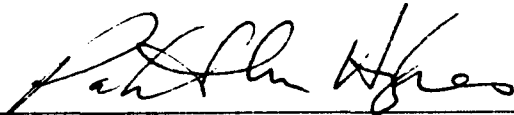
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From this examination the study derives potential U.S. vulnerabilities to deception at the operational level. Having proposed these vulnerabilities it examines implications for training, doctrine, and planning of current operations.

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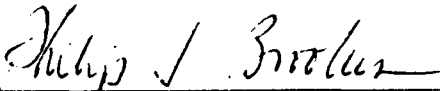
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ABSTRACT

AN APPRECIATION FOR VULNERABILITY TO DECEPTION AT THE OPERATIONAL LEVEL

U.S.

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→ Historically, the army that concentrates adequate deception effort against specific enemy vulnerabilities to deception has usually been successful in its operation. The army that neglects its potential for vulnerability to deception is often not successful, when an opponent chooses to exploit that vulnerability. The United States Army has recently renewed its interest in deception as a proactive means of gaining surprise. More recently, the issue of deception at the operational level has received attention. ~~The Soviet Union on the other hand~~ has steadily maintained and increased an emphasis in this area since World War Two. Applying this historical condition to the apparent imbalance in developed deception doctrine, the operational planner becomes concerned, if not alarmed, at the potential for U.S. vulnerability to deception at the operational level.

This study reviews historical examples of vulnerability to deception. It examines the Soviet concept of deception, or maskirovka, and the corresponding U.S. progress in developing organizations and doctrine for deception. And filtered through the screen of modern warfare conditions, historical vulnerabilities are compared to U.S. conditions to determine current applicability of those vulnerabilities.

From this examination the study derives potential U.S. vulnerabilities to deception at the operational level. Having proposed these vulnerabilities it examines implications for training, doctrine, and planning of current operations.

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SECTION ONE - INTRODUCTION

"All warfare is based on deception. A skilled general must be master of the arts of simulation and dissimulation; while creating shapes to confuse and delude the enemy he conceals his true dispositions and ultimate intent."

BG (Ret) Samuel Griffith's paraphrase of Sun Tzu's prose is elegant in its simplicity and timeless in its applicability. He refers to an aspect of the art of war that has had significant effect from the biblical account of the battle of Ai (ca 1400 B.C.) to the British campaign in the Falklands. This aspect continues to be important in the strategic, operational, and tactical thinking of every organized military force in the world today.

In particular, the USSR counts deception, or maskirovka to use their term, as a critical ingredient of surprise which that nation considers essential to success in modern warfare. That alone is sufficient reason for a U.S. army to examine the concept in great detail. Yet, the preponderance of our current effort is aimed at how U.S. forces can deceive opponents and keep opponents from learning our plans and intentions. There is very little written that examines the other side of the coin - that gets to the question of how to minimize vulnerability to an opponent's deception efforts, beyond the standard security techniques and denial efforts that accompany any operational plan. On the other hand, there is much written in both American and Soviet literature that points to a significant Soviet awareness of the principles and necessity of deception at every level. If two opponents diligently apply deception, the one which has looked least to its own vulnerability may be most deceived. It

seems appropriate then, to attempt to look at ourselves through Soviet eyes and determine where we may be vulnerable.

The issue in this monograph is the extent to which U.S. forces have incorporated the concept of deception into their operational thinking. More specifically, the study will derive, from an appreciation of historical and modern considerations, how U.S. forces might be vulnerable to deception at the operational level.

To arrive at this appreciation the paper will first review the concept of deception - what it is, what it leads to, and how the concepts are differently represented in U.S. and Soviet literature. The threat orientation throughout this paper will be Soviet; as that nation represents the primary threat to U.S. interests and has produced the largest body of literature on the subject. The paper will describe deception at the operational level and how it differs from tactical and strategic deception.

Following these basic descriptions the paper will review some well known examples of deception at the operational level. In The Battle of the Bulge, the German Wehrmacht achieved surprise against an allied army centered on American forces. The important lesson in this example is that even after brilliant success in Operation FORTITUDE American and other allied forces demonstrated significant vulnerability to the same principles they had exploited just six months before. The Soviet invasion of Manchuria demonstrates how far they had come in this area from their own surprise at the hands of the Germans in Operation BARBAROSSA. For the Soviets the invasion of Manchuria represents the example of set piece offensive action with surprise and deception playing a central role. They refer to it

often and openly in discussing what they expect to achieve in any similar scale modern conflict.³ The Egyptian attack across the Suez in October 1973 represents surprise in a modern setting. Neither the much vaunted Israeli nor American intelligence systems prepared the Israeli Defense Force for an attack at that point in time. Masterful deception, either orchestrated or taught by the Soviets, contributed immeasurably to that initial success. The lessons in vulnerability are important. Finally, additional historical reference, such as the Soviet operations in Belorussia will be used to reinforce points as they arise.

After setting the historical stage, the paper will examine what is the same and what is different between the historical and modern environments that either facilitates or hinders deception efforts, and conversely, the vulnerability to those efforts.

These initial sections will provide the background for assessing U.S. vulnerability to deception at the operational level. A review of U.S. doctrinal literature as it refers to deception and operational security will provide the basis for an evaluation of U.S. appreciation of the concept. From this evaluation, historical indicators, and a similar picture of the Soviet appreciation, it will be possible to suggest areas in which U.S. forces may or may not be vulnerable to deception at the operational level.

As most of the research material readily available relates to the operation of combined ground and air forces in a mid to high intensity environment, that range will be the focus in this paper. But deception is not the exclusive domain of superpowers in conflict with each other. The suggestions made at the conclusion of this

paper should have relevance across the whole spectrum of conflict and throughout the various permutations of opposing forces. While the paper will focus on deception at the operational level, much of the discussion will also be applicable at the strategic or tactical levels. Finally, almost all literature relevant to the modern setting focuses on the initial maneuver in a short war scenario. Although that may be the initial concern, discussion in this paper should also be applicable to branches and sequels in a continuing scenario.

SECTION II - DECEPTION AT THE OPERATIONAL LEVEL

Battlefield deception is a deliberate attempt to manipulate the enemy's perception of the battlefield. Its purpose is to cause the enemy to do or fail to do something that benefits the friendly side. There are many means by which a force deceives another force on the battlefield and certain conditions which should be met to insure that a deception operation has the best chance of success.

The methods of deception are aimed at distorting, concealing, or falsifying indicators of friendly intentions, capabilities, or dispositions.¹ The standard deception operations are demonstrations, displays, feints, and ruses, but these include a host of subcategories. The principal planning considerations or conditions that should be met to insure a successful operation are an identifiable deception objective, an adequate deception story, a reachable target of the deception operation, and a means of evaluating the success of the deception effort.

The deception story is that perception of the battlefield that the enemy should form as a result of the deception effort. It must be consistent with the target's understanding of the friendly side's real capabilities and probable intentions. The means of portraying the story to the enemy should be such that the enemy can verify the story from more than one collection source. The story must be coordinated so that what the enemy sees is consistent from source to source and throughout the friendly force. And the story should not be so complex that it is difficult to coordinate or execute, is implausible, or is beyond the enemy's ability to collect.² The foregoing general description is applicable to both tactical and operational deception. But there is a difference between these two levels:

"At corps level, deception supports operational as well as tactical objectives. At division and below, deception is conducted in support of tactical objectives. The operational deception objective is to influence the enemy major commands and commanders. Operational deception is planned at theater Army level and may be executed by theater through corps. Tactical deception involves specific techniques that smaller units use as a combat multiplier. Tactical deception is usually planned at corps and executed by divisions."³

Current doctrine indicates the difference as stemming from the level at which it is planned, the level of target at which it is aimed, and the level at which it is executed. MAJ Thomas A. Savoie, in an excellent monograph, further explains this differentiation between tactical and operational deception as one between resources used and emphasis placed. He contends that deception at the operational level is significantly different in timing, intelligence assets both used and targeted, and scale of operation. He describes

a need for solid plausibility, security, and broader scope of coordination essential for deception at the operational level.⁴

"It is better described as a sequenced and time-phased operation consisting of a series of multilayered supporting deception operations, each of which must be carefully integrated, deconflicted and orchestrated in the dimensions of time, space, resources, and aim."⁵

The issue of timing refers to the longer lead required to interact with the opposing operational commander's decision cycle and the duration of the effort itself. It is an important issue because a longer duration places a greater strain on security and coordination. The intelligence assets refer to those upon which the operational commander relies in his focus ahead of the current battle. The assets of the opposing commander must be known and "played to," while those of the friendly commander must concentrate on the necessary priority intelligence requirements (PIR) and essential elements of friendly information (EEFI) that serve to monitor the deception scheme and the enemy's receipt of and reaction to that scheme. These assets may provide less timely data than tactical intelligence assets and their employment is also an important part of the timing issue.

The scale of deception at the operational level may be the most significant difference. That issue refers to the size of forces involved in the deception operation, the aim of the operation (what you want the enemy to do or not do), the level at which it would have an effect, and the means available to carry it out. As the operational level of war bridges the gap between strategic and tactical levels, deception operations at this level interconnect strategic and tactical deception. The aim, then, applies at the

theater level. The means include psychological warfare, HUMINT, double agents, media, rumor, and national intelligence assets.⁶

This broader view of deception at the operational level is well understood by the Soviets. Their word for the concept, maskirovka, literally translates as "camouflage," but in terms of Western thought maskirovka includes OPSEC, cover and concealment, and deception, as well as demonstrations, feints, imitation, and disinformation.⁷ The scale is throughout the Soviet Union, and the implementation of the concept is considered essential for the protection and combat readiness of troops and equipment. Further, it is considered essential for the achievement of surprise at the tactical, operational, and strategic levels.⁸ The Soviets regard maskirovka as an integral part of operations at every level and practice it in peacetime as well as in war. Its primary purpose is its contribution to the Soviet concept of surprise:

"Vnezapnost [Surprise] is one of the most important principles of military art, entailing the selection of (proper) timing, the mode and manner of military action, allowing strikes when the enemy is least prepared to repel them, and, moreover, paralyzing the enemy's will to mount organized resistance. It is achieved by confusing the enemy of your intentions, by keeping secret your intentions for battle, by concealing preparations for action...⁹ by conducting deceptive actions and camouflage..."

As to the level of implementation and coordination:

"Operational maskirovka is to be implemented by commanders at the front, army, and theater levels and is used to conceal the preparation of major operations. Lieutenant General Ya. Dashevskiy also points out that operational maskirovka is an inseparable part of an operational decision and requires coordination with commanders of adjacent fronts based on a unified plan developed and issued by the Soviet Supreme Command."¹⁰

In addition to high level coordination, the USSR provides strict guidelines to its commanders for the application of deceptive practices. The measures taken must be action oriented to confuse the enemy and lead him to choose nonproductive courses of action. The maskirovka must be convincing. That is, it must realistically depict the story being portrayed - this guideline would impact on the scope of resources used to achieve the effort. The maskirovka must be continuous and timely. Lapses in the effort are regarded as breaches of security. And finally the application of maskirovka must be varied and diverse. This requirement recognizes that repetitious applications might be discovered as false and therefore threaten the plan. It recognizes that maskirovka is an art, requiring creativity and imagination.¹¹

From this description of the Soviet view of maskirovka and its importance in their operational scheme, one will detect a distinct difference in degree between Soviet and U.S. appreciation of the issue. That difference is the first indication of potential U.S. vulnerability to Soviet maskirovka. Before drawing any conclusions however, a review of selected historical examples of the use of deception will illustrate other vulnerabilities apparent in those historical circumstances.

SECTION III - HISTORICAL REVIEW

In December 1945 the Allies were preparing for a winter offensive across the Rhine and into Germany. They had achieved a small breach in the West Wall, or Siegfried Line, near Aachen, and it was

reasonable to assume that they would attempt to exploit that breach into the important Ruhr industrial region. Hitler was on the defensive in the east and in the west. There was some time to develop a plan, granted by space in the east and the stubborn defenses and Allied logistical posture in the west. But even a neophyte theorist could see that a continued defensive posture would lead eventually to the total defeat which the Allies sought. Unwilling to concede that inevitability, Hitler resolved to strike an offensive blow against the Allies in the west. He would attack to secure the port of Antwerp, Belgium, divide the American and British sectors, and possibly induce these Allies to accept a separate peace. It was a desperate gamble that required surprise to achieve success.

The Germans devised and implemented an elaborate deception plan that clearly illustrates classic deception principles. Based on the existing defensive plan, ABWEHRSCHLACHT IM WESTEN (Defensive Battle in the West), the story was that a buildup of forces was occurring near Cologne, opposite the West Wall breach, in preparation for a stronger defense against a continued Allied offensive. The objective was to prevent the western Allies from reinforcing the sector chosen for Hitler's bold counteroffensive - the Ardennes.¹

To depict this story the German Sixth Panzer Army actually moved onto the open plain near Cologne in mid November. They intentionally bungled their security, making preparations "obvious" to Allied intelligence. The Fifth Panzer Army Headquarters shifted from Lorraine to an area near Aachen, from where they would presumably control forces against expected Allied armor. A fictitious Twenty-

fifth Army Headquarters created a signature near Aachen.² Other adjustments were made or depicted that established necessary forces, command and control, and supplies for the real operation opposite the Ardennes. The Germans were following one of Sun Tzu's basic dictums on deception - "...When near, make it appear that you are far away; when far away, that you are near."³

Security for this German counteroffensive was rigid. ULTRA, the Allied code-breaking system, failed to provide a clear picture of the developing offensive because Hitler required that most communication regarding it be carried by courier.⁴ While troop movements in support of the deception story were permitted to be observed, those in support of the real plan were done at night. Troops in assembly areas opposite the Ardennes were issued charcoal to avoid the telltale smoke of wood fires. Vehicle sounds in those areas were muffled and masked by aircraft overflights. Only a few key personnel knew the real plan up to just before the attack. And even the name of the operation, WACHT AM RHEIN (Watch on the Rhine), portrayed a defensive orientation.

Planned by the Chief of Operations in the German High Command, the operation enjoyed coordination and consistency throughout the German Army. For example, resources were carefully allocated between the strategic reserve forming opposite the Ardennes and Von Rundstedt's continuing effort to halt the American offensive around Aachen. Newly formed Volksgranadier divisions were named for an honor they had not yet earned, but were inspired by the name to efforts beyond their apparent capabilities.⁵

The results of this deception effort are well known and need not be belabored here. The Germans achieved significant surprise and posed a temporary operational threat to the Allies. That they reached an early culmination point is a reflection on the desperation of the scheme and not the fault of the excellent deception plan. But the lessons to be learned about vulnerability to deception can, in retrospect, be counted.

First and foremost, the Allies were overconfident, and some might say even complacent. They had enjoyed consistent success, knew they were facing a battleweary foe, and fully anticipated eventual victory. They expected no real fight in the area of the Ardennes. It was called a ghost front and units went there to rest. For that reason the active effort to collect intelligence in that area was poor.

Secondly, the Allies were victims of predisposition, which is closely related to the plausibility built into the German deception plan. Hugh M. Cole, the official U.S. Army historian for this action recorded, "...Here the enemy capability for reacting other than to direct Allied pressure had been sadly underestimated. American and British had looked in a mirror for the enemy and seen there only the reflection of their own intentions."⁶

Another vulnerability, still related to overconfidence, was a critical weakness in the planning effort. Even if the intelligence estimate rated the potential of an enemy offensive as low, some rudimentary plan in response to that "what if" might have been better formed. Had the planners done so appropriate priority intelligence requirements might have been generated to sound a warning. The

lesson is to "what if" the low probabilities as seriously as the high ones.

Failure to appreciate the mind of the enemy commander was another vulnerability. In this case it was more a matter of failing to identify who was in charge. The Allies appreciated Von Rundstedt as fairly conservative. Hitler was not, and had already demonstrated willingness to do the implausible through this very terrain!

Finally the Allies showed that overreliance on technology can be a serious vulnerability. They had come to depend on ULTRA for the majority of or at least for confirmation of operational intelligence. The Germans largely bypassed this technology with the use of couriers. Even when ULTRA provided piecemeal indicators of an offensive, such as requests for overflights and transportation to the counteroffensive assembly areas, the Allies continued to doubt the direction. It is possible that they were so accustomed to receiving a clear operational picture from ULTRA that they were disinclined to give credence to more traditional sources of intelligence. The lesson here is that overreliance on friendly technology can be risky, especially if that reliance has proceeded for some time.

These lessons on vulnerability to deception from the Battle of the Bulge demonstrate that even an army familiar with deception practices can fall into a carefully laid trap. The next example repeats many of these lessons, but also highlights an operational technique highly regarded by the Soviets.

The Soviet invasion of Manchuria in 1945 deserves study because the Soviets themselves study it and regard it as their set piece attack. From it they derive much of what they envision in a modern,

high intensity surprise attack.⁷ The Soviet invasion of Manchuria is impressive for two primary reasons. The first is the sheer size of the force buildup immediately prior to the attack:

"During the four months from April to August 1945, the Soviets moved 39 divisions and brigades and units from Europe to bolster their forces in the far east. They collected a total of over one and one-half million men for the campaign - with 5500 tanks and self propelled guns, 5000 combat aircraft; and 27,000 artillery pieces and mortars."

The second primary reason that the campaign was impressive is that they achieved a significant measure of surprise in spite of the size of the buildup. The manner in which they accomplished this feat perhaps better demonstrates the meaning of maskirovka than could any simple definition. It was a stupendous combination of strategic, operational, and tactical schemes and efforts.

At the strategic level the Soviets fortuitously timed their operation to coincide with Japanese preoccupation with the atomic bomb dropped on Hiroshima. At the diplomatic level they skillfully waited until literally the last minute before actually declaring war on Japan. By the time the Japanese government learned of the declaration, the Red Army had opened an offensive against them on all fronts.⁹

At the operational level the Soviets combined timing, secrecy, and plausibility to play on Japanese expectations. For the Japanese did expect an invasion. The Soviet buildup was too large to be completely concealed, and given the contentious history of their relations with Russia over the Manchurian border it was logical to expect military action. They had carefully analyzed the strategic situation and believed that the Soviets would attack, but not until

the fall of 1945. In the Spring of that year they revised their estimate for the earliest attack date to September, believing that the Soviets could not be ready before then and that the heavy rains during August would give them time to either prepare or seek a diplomatic solution.

One part of the Soviet deception story, then, was that they would not attack until the Japanese expected them to. They built this story by concealing the extent of their preparations. Assembly areas from which the attack would commence were well removed from the capability of Japanese intelligence to detect. Elaborate and strict camouflage measures were imposed and special teams of officers circulated to insure compliance. They were careful to preserve the routine of border life, both from the standpoint of the existing troop structure and the civilian population in the area. All radio traffic was to be conducted over existing radio nets and operational orders were carried by courier. Troop units were not permitted to assemble near or visit local villages. Reconnaissance was kept to an absolute minimum. Key figures in the newly arriving headquarters wore fictitious names and insignia that belied their true ranks. In short, the Soviets were so rigid in the application of operational security that the Japanese were unable to detect the enormous extent of the buildup.¹⁰

The Soviets had absolutely maximized the potential of their limited transportation systems and had stockpiled massive amounts of equipment in forward assembly areas. All the mechanical equipment that could move forward from midlevel transshipment points under its own power did so, leaving the railroad free to move supplies.

Infantry units walked literally hundreds of kilometers. The net result was that the Soviets were in position to attack several weeks before the Japanese expected them to.

Another aspect to the deception story was the location of the main effort. The Soviet Union's horseshoe-shaped joint frontier with territories held by Japan in Manchuria stretched about 5000 Kilometers. Its length permitted the Soviets to structure an invasion from three fronts - the 1st Far Eastern Front in the Maritime Region, the 2nd Far Eastern Front along the Amur River to the west, and the Transbaikal Front farther west of the Great Khingan Mountains and the Mongolian Desert. The Japanese Kwantung Army in Manchuria, with a total of 24 divisions and 11 brigades, could not concentrate everywhere. They correctly evaluated the Soviet Maritime Region as the most strategically important to the Soviet Union: "At first the Japanese General Staff saw increased Soviet preparations as a natural defensive response to their own Army's preparations along the eastern border."¹¹ They wrongly assumed that the major thrust would come from that region. The Soviets encouraged that view by hiding their buildup elsewhere and by building a strong secondary attack from that direction which in fact had good success against the stiffest Japanese defenses. But the Soviets massed over half their combat power in the Transbaikal Front and struck its main blows from that unexpected direction. To do so those armies attacked from the march after crossing the Trans-Baikal desert in Mongolia. They eventually crossed the Great Khingan Mountains, a most inhospitable place to armored forces, before the war's end. The effect of this indirect approach was to unhinge the Japanese defensive plan and present them

with the fait accompli of surrounded armies.¹² A note here from B.H. Liddell-Hart is pertinent to the use of the indirect approach, as many great deception operations are based on it:

"History shows that rather than resign himself to a direct approach, a great Captain will take even the most hazardous indirect approach - of necessary, over mountains, deserts, or swamps, with only a fraction of force, even cutting himself loose from his communications. Facing, in fact, every unfavorable condition rather than accept the stalemate which a direct approach would involve. Natural hazards, however formidable, are inherently less dangerous and less uncertain than fighting hazards. All conditions are more calculable, all obstacles more surmountable, than those of human resistance. By reasoned calculation and preparation they be can overcome almost to 'timetable.'¹³

The Soviets had approached the scale and boldness of the Manchurian operation in their attack against the Germans from Belorussia in June, 1944. In that case the Germans were convinced that an attack would come from the Ukraine and an elaborate deception scheme was designed to confirm that preconception. At the same time, the Soviets completed an awesome buildup of men and equipment in Belorussia. Based on the Germans' preconception they were able to portray this as preparation for a feint.¹⁴ The Germans believed it to their detriment.

The review of the Manchurian and Belorussian operations and their attendant deception plans serves to demonstrate a number of lessons in vulnerability to deception at the operational level. The first is that preconception can be a significant weakness if the enemy detects it and develops a plausible deception plan to exploit it. The Japanese based their defense on their perception of the Soviet priorities and were therefore out of position to counter the main Soviet thrust when it came from an unexpected direction. The second

vulnerability is an overreliance on the deterrent value of difficult terrain. Great Captains throughout history have been able to exploit this vulnerability to the continual surprise of their adversaries. The deception effort to disguise an action through such terrain is half accomplished if the target already believes he can defend the terrain with a reduced force. A third vulnerability is overreliance on analysis of the enemy's time schedule. The Japanese felt they had time to prepare for the Soviet offensive from indications in the diplomatic sphere, from weather patterns in that part of the world, and from their understanding of the extent of the Soviet buildup. By hiding their preparations the Soviets contributed to the confidence that the Japanese High Command had in its analysis of when the Soviets would attack. By heroic logistical effort, boldness of plan, and willingness to risk bad weather and difficult terrain, the Soviets forced a timetable just different enough from the Japanese analysis to achieve significant surprise. And a final vulnerability is perhaps the inability to conceive of the magnitude, of the enormous scale with which the Soviets mounted the operations both in Manchuria and in Belorussia. In fact, it is entirely possible that the Japanese in Manchuria would have been overwhelmed even without the diligent application of maskirovka; such a broad front might have been impossible to defend in any event. But not appreciating the potential size of the force opposing them might have prevented the Japanese from pursuing more diligent collection efforts. These efforts, in turn, might have spurred an earlier capitulation and saved them untold suffering. To be fair, it may not have been reasonable for the Japanese to have anticipated the massive extent of

the Soviet buildup for it was a remarkable feat by any standard. It is listed as a vulnerability though, precisely because the Soviets had demonstrated that potential in Belorussia the previous year.

These first three examples - operations in the Ardennes, Belorussia, and Manchuria - illustrate vulnerability to operational deception in the context of continuing total war, when large armies and vast spaces stressed the concentration of operational planners. The last example - the 1973 Arab-Israeli conflict - demonstrates that vulnerability to operational deception can just as readily exist in the modern era, with smaller forces, and in a more confined space.

Briefly, Egyptian forces surprised the Israeli Defense Force by crossing the Suez Canal on the sixth of October 1973, beginning the fourth in a series of wars since 1946 in which Arabs sought to prevent the establishment of or eliminate the existing nation of Israel. The most remarkable aspect of this war, for purposes of this paper, is the extent and manner in which Arab forces achieved surprise. In essence, they achieved what was thought to be impossible - they fooled the vaunted Israeli intelligence machine, which had attained worldwide recognition as the best of its kind.¹⁵ There are many reasons for this success, not the least of which was the elaborate deception which preceded the Egyptian attack. But the other side of any successful deception plan are the vulnerabilities which that plan exploited.

"The sixth of October had special significance for the Arabs. It was reputed to be the 1350th anniversary of the start of Mohammed's drive to enter Mecca. It also had special significance for the Jews. It was Yom Kippur, the day of atonement, the holiest day in the Jewish calendar."¹⁶

This aspect of timing suggests another parameter of which opposing planners should be aware. Historical successes around which an enemy might rally or traditional holidays that draw attention away from fighting are important in the moral realm. While not itself a matter at the operational level, awareness of this timing factor might serve to focus attention on indicators at that level.

Operational indicators might be changes in the disposition or preparedness of forward deployed forces, the strengthening of those forces with new or recently mobilized units, an increase in reconnaissance efforts along expected avenues of approach, or the positioning of key equipment at critical locations. In a " Suez Canal" situation or any other barrier/obstacle type dividing line, a strong indicator might be the forward movement of breaching or crossing equipment.

The Arab deception plan included strategic and operational aspects and was more than reminiscent of Soviet maskirovka. Its objective was to prevent the Israelis from mobilizing, conducting a preemptive strike, or reinforcing the strongpoints of the Bar-Lev line. Its target was the Israeli cabinet and ultimately the Prime Minister. And the story was simple. It was first that the Arabs had neither the resolve nor the unity to launch a concerted attack. Next it sought to convince Israel that indicators of heightened preparedness, those operational indicators listed above, were mere repetitions of previous displays and exercises.

The plan worked. For weeks prior to the event, up until the morning of 6 October, the Israeli government and military commanders debated among themselves whether or not war was imminent. Even

though Israeli tactical commanders on the Bar-Lev line along the canal sent increasingly urgent reports that Egyptian preparations presaged more than an exercise, the strategic and operational level leaders wavered. That indecision, until the very day of the attack, gave the Arabs the time they needed to complete preparations and take the initiative.

What did the Arabs do at the operational level that so bewitched the Israelis? The answer is important because, again, it reveals a number of vulnerabilities that must be analyzed.

One of the key features of the plan was repetition. For the previous ten years, except for 1967, the Egyptian Army had held maneuvers every autumn. For the past two or three years these exercises had seemed to concentrate on the canal, but as that was the obvious obstacle to be crossed, such an emphasis was understandable.¹⁷ As to the Egyptian mobilization, reservists had been called up and then demobilized twenty-two times during the previous year. With boring regularity, bridging equipment had been brought up to the canal and then taken away again. Israel was accustomed to its presence. For the Israelis to countermobilize every time that happened would have been ruinous to their economy. This has been called the "cry wolf" scheme. It causes the victim to believe what he expects to be true rather than what is true. After several iterations of a process a sort of anesthetization to the process takes place in the victim.¹⁸

Next the Egyptians disguised, for as long as they could, the massing of troops and critical equipment along the canal. During the day, brigade size forces would venture forth in maneuver oriented

activity. At night only a battalion would return to bivouac areas, leaving two thirds of the force, camouflaged, near attack positions along the canal. To dissipate these concentrations the buildup of key assault troops was disguised by random movements along the length of the canal. The Egyptians delayed in bringing up their crossing equipment as long as possible. They made special crates for some of the equipment so that routine surveillance could not detect what was being carried or that the huge trucks carrying them were engineer corps trucks. And when the equipment finally did arrive at the canal, by night, it was put into pits which had been dug especially for the purpose.¹⁹

On the Golan front, the Syrians were also massing. Since Israeli troops could readily observe the marshalling of Syrian armor from their observation post on Mount Hermon, the Syrians built a story that exploited this. They mobilized in defensive formation, supporting a story that they feared Israeli retaliation for a previous military action. The Syrian tanks assumed "hull down" positions, dug in to resist an assault rather than to mount one. Their artillery was placed more to the rear than an offensive posture would dictate.²⁰

This misdirection was copied by the Egyptians at the strategic level. Several days previously, a pair of Arab gunmen held up at the Austrian border a train carrying Jews from Moscow to Vienna. They took hostages and demanded that the Austrians close a transit center in Vienna, used by Soviet Jews on their way to Jerusalem. Austria's Chancellor agreed to the demand, and let the gunmen go free. Israel was understandably furious. As Egyptian preparations became more and

more difficult to disguise for what they really were, they floated the story that they feared Israeli retaliation for the terrorist action in Austria and that the large maneuvers were a means to be prepared. The alibi was plausible.²¹

To understand how this deception exploited specific vulnerabilities, one must understand it as a continuation of the strategic level deception that had preceded it. When they saw the enemy that was about to attack them the Israelis continued to believe what they were already predisposed to believe.

The Israelis were overconfident. In describing his analysis of Israeli weaknesses, Egypt's War Minister, General Ismael, included that perception: "He [the Israeli] is, moreover, an enemy who suffers the evils of wanton conceit."²² When that overconfidence causes one to underestimate the potential for an enemy to improve, it becomes a vulnerability.

The basic intelligence estimate was badly flawed and the Israelis had weakened vital resources that might have revealed that. Their first assumption was that Syria would not attack without Egypt. In that they were correct. But their second basic assumption was that Egypt would not attack until its air force could neutralize the Israeli air force. Their analysis, encouraged by the Egyptians, was that such a condition would not occur for several years, if at all.²³ And the security that the Egyptians attached to their planning was inadvertently enhanced by a reorganization of the Israeli intelligence apparatus. In forming an organization to combat the Palestinian guerrilla network outside the Middle East, the Israelis drew scarce manpower from other sources. From Egypt they took a

considerable number of their most able intelligence personnel. After that, the quality of information from Cairo perceptibly declined.²⁴ The psychological effect of the timing, as previously mentioned, cannot be overestimated. Of any time during the year, Yom Kippur is calculated to evoke inward reflection, prayer, and an unwarlike demeanor in the Jewish personality.²⁵

So the Israelis failed to appreciate that the Arabs could prepare for a war in a manner different than they had estimated. They had significantly weakened their intelligence effort against their principle foe. They suffered from an overconfidence that partially blinded them to the resolution of a new enemy leader. And at that particular time they, as a people, were psychologically disinclined to go to war. Arab deception at the operational level was fully integrated with the overall scheme to exploit every one of these vulnerabilities.

SECTION IV - DECEPTION IN A MODERN ENVIRONMENT

Having reviewed a number of historical examples that illustrate the exploitation of vulnerability to deception, it is appropriate to discuss differences in historical and modern environments as they might apply to the application of and continued vulnerability to deception. While the 1973 Arab-Israeli war is reasonably contemporary, significant technical advances have occurred in the fifteen years since it took place.

It is possible to question the potential return of a significant effort at deception in a modern setting due to the increased sophistication of surveillance technology. Satellites for example can reveal minute changes in facility or force disposition. There is a widespread capability to monitor most types of strategic and operational communication. Electronic support measures can receive and analyze almost any kind of electromagnetic transmission, which has been essential for the guidance of modern weapons systems. Electronic countermeasures can interfere with those transmissions to foil the weapons systems they guide. These modern conditions would seem to make the practice of deception, especially operational deception involving large forces, very difficult. While admitting as much, Major General F.W. Von Mellethin, in his book NATO UNDER ATTACK, adds a significant caution:

"...suggests...that intelligence means have made it unlikely that a Warsaw Pact offensive in Central Europe could achieve strategic surprise. However, he cautions that history is replete with examples of successful surprise attacks achieved under equally difficult circumstances through secrecy, deception, and the shuttered mind-set of the defender."

It is important to understand in any modern day contemplation of deception that the Soviets, at least, count it as an essential ingredient to their concept of war. That is because it is a chief contributor to the achievement of surprise, a sine qua non for success in their thinking. As previously stated in Section III, the Soviets regard the Manchurian Campaign as the textbook case on how to conduct a campaign. They did not achieve total surprise but were sufficiently successful to outmaneuver the Japanese Kwantung Army:

"While the massiveness of the Soviet movements made them impossible to conceal completely, clever and imaginative deception measures obscured the scale of the Soviet deployments and caused the Japanese to underestimate the Soviet capability to attack."²

Similarly, the Israelis expected an Arab attack - sometime. Deception measures aimed at the strategic and operational levels caused them to delay in reacting until the last days before the attack - precisely the effect that the Soviets would aim for in any general conflict in the future.

The key to appreciating the potential for deception in the future is not the sophistication of surveillance technology, but an understanding of the mind of the enemy. That mind has already determined the value of deception and announced the intention to use it. And just as in the field of electronic warfare, a technological advantage in surveillance is temporary at best.³ That is, the more sophisticated one side gets in its surveillance technology, the harder another side will try to develop countertechnology, camouflage and security techniques that frustrate that enemy efforts. The Soviets note with interest, for example, any progress that NATO makes in deception and camouflage techniques.⁴ One must assume that their own capabilities have progressed significantly since WW II, given the stress they place on surprise and its key ingredient, maskirovka, and their demonstrated willingness to devote significant assets to its accomplishment. So the question is not whether deception can be effective in modern combat, but how an enemy will seek to use it.

"Although modern means make it difficult to fully conceal preparations for a large scale offensive, Soviet General S.P Solov'ev states that concealment of

the true scale, and especially the direction and timing of the main attack is '...a quite achievable task which always occupy the centre of attention.' "5

Moreover, the Soviets believe that some aspects of technology have made deception and surprise easier to achieve. Longer range missiles and aircraft, the great mobility of motorized and mechanized formations, and the greater ease with which they can collect and evaluate strengths and weaknesses all contribute to their ability to implement and exploit successful deception. "It does not have to work for very long, nor does it have to be totally successful either. An ambiguous picture will often be enough to prevent the enemy from reacting in time."6

In addition to technology, perhaps the most significant difference in the modern environment is tempo. Its impact on the ability to perceive deception is that a deception only has to work for a short while. By the time an opposing force has identified it as a deception and not the principal action, it may well have accomplished its objective. The combined effect of tempo and technology on the conduct of deception might just negate the advances that technology has made in the detection of deception.

SECTION V - ASSESSMENT OF U.S. VULNERABILITY TO DECEPTION AT THE OPERATIONAL LEVEL

Sections III and IV identified historical vulnerabilities to deception at the operational level, and suggested that in spite of modern technology the Soviets, at least, feel that deception can be effective. With that background it is important to discuss the U.S.

potential for vulnerability to deception in a modern environment. One should keep in mind that deception, and vulnerability to it at the operational level, flows from deception at the strategic and tactical levels. In the Soviet concept of maskirovka the operational blends naturally with the strategic.

One means of detecting deception would be through an intelligence capability that could largely remove uncertainty about the enemy's activities. Analysts can calculate, from a variety of sources, not only the main enemy effort but any adjustment to initial commitments which might reinforce success. To do this, the United States has, as recently as 1975, placed great reliance on signals intelligence (SIGINT), from which it derived most of its strategic and tactical information, at least in Southeast Asia. This kind of intelligence was potentially misleading and subject to manipulation by the enemy. For example, a North Vietnamese regiment might be represented by a small communications detachment.¹ More recently, there has been a certain attraction in the intelligence community to prediction based on the IPB (Intelligence Preparation of the Battlefield) process. That process, which relies on the G2's hypotheses of what the enemy might do, may focus scarce collection resources on those possibilities rather than on an enemy's actual course of action.² Such methodical, logically calculated predictions are reminiscent of the predispositions that plagued allied planners prior to the Battle of the Bulge.

The current intelligence estimate process is based on more than an IPB. Recognizing that overreliance on a predominant system is dangerous, G2s seek information from as many sources as possible.

Through fusion of the various data they strive to anticipate enemy activity and confirm their predictions.

However a cogent question is: how fast can the quantity of data be analyzed and disseminated? The operational commander has very little time to decide where and how to adjust his forces. He will in all probability have to accept risk in making operational level adjustments, basing them ultimately on his best estimate of enemy intentions. The enemy deception then does not need to be completely successful, but rather may achieve its intended effect if it merely causes hesitation.

Another concern in the reliance on various technical systems for intelligence collection is the electronic linkage to analysis centers and subsequent use of electronics for dissemination. "The Soviets have studied the NATO command, control, and communications (C³) structure in detail and believe the high degree of NATO dependence upon electronic control systems constitutes a significant vulnerability that can be exploited," said John Clark, intelligence manager for the USAF electronic combat intelligence group.³ Presumably, the Soviets have extended this effort to all forms of C³, and the same threat would exist in other than NATO environments where the U.S. might find itself opposed by Soviets or Soviet surrogates.

A final point that would frustrate the acquisition of a clear picture of enemy intentions and actions is found in Chapter 5 of Field Manual 100-5. It describes a combat environment in which "friction" is manifested through a host of impediments. The destructive, confusing, and generally stressful, resistant

environment would serve to obscure the larger enemy scheme and hinder the ability to react to it.⁴

It is in this environment of uncertainty that deception would thrive. It is exactly in this environment that the Soviets would like to introduce an operational maneuver group in an avenue of approach that had not been identified, or was identified too late.

If one presumes then that the capability to identify the enemy deception scheme is suspect, what else might be a defense against vulnerability to that deception? It is certain that heightened sensitivity to the probability of deception and awareness of friendly vulnerabilities to it would enhance the likelihood of earlier recognition. One way to evaluate that sensitivity and awareness is to examine current U.S. doctrine and training for the presence of counterdeception information in proportion to its importance in future campaigns.

The Army's keystone doctrinal manual, FM 100-5, Operations, describes deception as an important function that commanders at both operational and tactical levels must coordinate.⁵ Until recently however, there has been little available in other manuals that would help commanders plan and conduct deception operations at the operational level and virtually nothing that addresses the issue of how to counter the enemy's deception. In September 1986, The U.S. Army Intelligence Center and School (USAICS) published a coordinating draft of FC 90-2, Battlefield Deception. It develops the information in FM 90-2, Tactical Deception and the previous FC 90-2, Deception Operations Planning Guide. It discusses in greater detail the role of the Corps in planning and executing deception operations. While

the Corps may execute deception operations in support of operational objectives, its planning for subordinate operations is generally of a tactical nature. The operational planner is left without implementing doctrine at the Army or Army Group level. To be sure, deception principles would remain essentially the same; the primary differences at operational levels would be, as previously stated, in scale, timing, and resources required.

Stipulating, then, that deception has gained a foothold in recent doctrine, the next test would be whether or not that doctrine has been resourced and whether or not meaningful training is being conducted. The Battlefield Deception coordinating draft proposes a Corps Battlefield Deception Cell (BDC) which would provide deception planning support, support the execution of Corps deception operations, and execute limited deception events with organic resources, such as decoys, communications deception, and logistics/critical node replication.⁶ Having recently worked on a Corps staff in a USAREUR level command post exercise, the author could detect no evidence of such an organization in either Corps or Army headquarters, but that is understandable given the recent nature of the proposed organization.

What is not understandable is the short shrift that deception has earned in Army schools and in training and evaluation exercises. MAJ Thomas A. Savoie, writing in Military Review, offers that, "One of the most valid indicators of the importance an Army attaches to a particular skill is the amount of training resources dedicated to it. Adequate training in deception operations is lacking throughout the training base." His experience in the US Army Command and General

Staff College (USACGSC), an experience confirmed by this author, was that deception occupied disproportionately little time on the schedule and that in operations orders and exercises it was never evaluated for content. Only one Army Training and Evaluation Program⁷ incorporates even a limited facet of deception operations. Wargame models and simulations gloss over deception operations because it is difficult to portray or measure. MAJ Savoie concludes, "...as an Army, we do not appear ready to make the commitment of training time, evaluation instruments and other resources necessary to become proficient."⁸

If intelligence capability does not portray a clear enemy situation to include their deception activity, and sensitivity to and awareness of deception operations is not in the forefront of the planner's thinking, is there any other program or system that would protect the force from vulnerability to an enemy's deception operations? To answer that, one must understand that, in order to deceive, the enemy must know or be able to derive how the friendly force intends to act or would react in given situations.

It is the function of operations security to prevent the enemy from gaining that knowledge. Operations Security (OPSEC) is defined as, "All measures taken to maintain security and achieve tactical surprise. It includes electronic countermeasures, countersurveillance, physical security, signal security and information security. It also involves the identification and elimination or control of indicators which can be exploited by hostile intelligence organizations."⁹ It is manifested in the utilization of secure codes and communications, limiting access to

classified material, concealing order of battle information or force dispositions to the extent possible, avoiding situations in which the enemy might observe new technology, obscuring the capabilities of friendly intelligence assets, and numerous other means. It does not include methods or techniques to directly counter deception.

However, OPSEC and deception are inextricably linked. Deception is an OPSEC technique, and OPSEC is critical to the success of a deception operation. One means of denying information to the enemy is to deceive him as to the true nature of that information. But to do so requires additional efforts to prevent the enemy from learning that what he is seeing is a deception. One might say that OPSEC both leads and follows deception.

Counterintelligence (CI) support is vital to successful OPSEC. Essentially, the CI effort develops the enemy collection capability against which OPSEC measures are aimed; it develops a friendly force profile to provide a clear picture of how a given friendly unit looks to the enemy; and it recommends and assists in planning and execution of OPSEC measures to exploit enemy vulnerabilities and minimize the unintended exposure of friendly information to the enemy.¹⁰

If OPSEC works, the enemy should ideally be denied sufficient information about friendly capabilities and intentions to deceive the friendly force effectively. But consider the operational level and consider what information is readily available to an enemy.

In the NATO environment for example, U.S. operational force dispositions are well known. There is ample discussion in the military and popular press about maldeployment of forces and what that would mean in the case of a surprise attack by the Warsaw Pact.

As far as order of battle is concerned, every major reconnaissance or terrain walk of the general defense plan is observed by East Bloc personnel. These occur with sufficient frequency for the Warsaw Pact to create an accurate picture of which battalion sized units will defend in which regimental sized avenues of approach.¹¹

U.S. doctrine clearly suggests a broad scheme of operational maneuver, and analysis of limited terrain pretty well defines the areas in which that maneuver could occur, at least in Europe. Doctrinal discussion of such things as "no go" terrain combined with careful observation of which units conduct reconnaissance of such terrain might alert the enemy to potential ground for exploitation. Exercises such as REFORGER provide any watching enemy with an excellent appreciation of U.S. capability to maneuver large forces, to change direction quickly, and to move sustainment in support of maneuver.

The force structure which implements the doctrine would not be difficult to determine. The general capabilities and limitations of major weapons systems could be easily derived. And the quality of soldiers manning those systems could be observed at close hand.

There would seem to be much information then, in spite of the best efforts of the OPSEC managers, that is readily evident to enemy intelligence agencies.

Having reviewed a number of vulnerabilities internal to the operational forces, it is appropriate to discuss two historical vulnerabilities and their applicability to U.S. forces.

The first is the issue of preconception. LTC A.L. Elliot, writes in the Air University Review that orthodox perceptions about a Soviet attack on NATO have existed for years. He contends that NATO would anticipate an attack only during a period of tension, and that unambiguous signals of the attack would provide time for NATO to react and defend successfully.¹² He also maintains that a preconception of Soviet rigidity exists. That rigidity is supposed to make it difficult for Soviet forces to respond with flexibility at the operational level. It presupposes a lack of imagination and initiative in the execution of plans.¹³ If LTC Elliot is correct, and there are many who agree with this view, it appears that NATO, and by implication the U.S. forces in NATO, have some degree of preconception about the abilities of Soviet forces.

The second issue is U.S. perception of its own ability. The popular press periodically publishes balance of power articles which purport to examine whether the U.S. or Soviets are "on top." The general tenor of these articles is that the Soviets have surpassed the U.S. in quantity of most kinds of weapons systems but that the U.S. still holds the edge in technological superiority. It is on that technology that U.S. forces primarily rely to meet any imbalance created by quantity differentials. Further, there is a general impression, both in the military and in the public, that the American soldier is psychologically superior to any East Bloc foe. In a clutch, that psychology is counted on as a force multiplier.

SECTION VI - CONCLUSIONS AND IMPLICATIONS

The discussion on deception at the operational level suggests a number of conclusions. From the historical perspective it is apparent that a well planned deception, designed to exploit an opposing force's specific susceptibility to deception, has every potential of achieving significant success. Further, it is apparent that such vulnerabilities are identifiable to the deception planner. And finally, in spite of the lessons of history, it is apparent that similar vulnerabilities exist from army to army, age to age.

The specific issue to be addressed in this paper was whether or not U.S. forces might be vulnerable to deception at the operational level. The weight of this discussion suggests that they are.

To begin with, U.S. intelligence systems and assets may not discover the intentions of the enemy. While not an unexpected revelation, it must still be counted as a vulnerability insofar as it contributes to that uncertain environment in which U.S. forces must accept risk and react to most likely enemy actions.

Next, U.S. forces, in a NATO environment at least, are burdened with certain preconceptions. The analysts consider that a certain combination of international tension and Soviet preparation will clearly signal the imminent start of hostilities. Two thoughts apply to this preconception. First, the Israelis thought the same about the Arabs in 1973, and second, the tempo of modern combat means that a slight misjudgment in calculating that start date could be fatal.

Another preconception is that the Soviets and their Warsaw Pact allies will be sufficiently predictable in their operational scheme for NATO to counteract it with planned dispositions. Included here is the notion, although it is slowly dissipating as we study the Soviets, that they lack the flexibility to take advantage of operational opportunities.

It is interesting to suggest that the notion of Soviet rigidity is partially the product of another preconception - that of our own moral superiority in terms of temperament for this fast, uncertain battlefield environment. While reluctant to label this preconception as blatant overconfidence, one might find it difficult to justify claiming any significant moral superiority. It would seem prudent to regard the Soviet operational commander as at least equal to our own.

A third vulnerability is that much of the U.S. operational doctrine, force structure, and disposition is known to the Soviets. They might be quite justified from this knowledge in claiming the same predictability of U.S. and NATO reactions that the U.S. and NATO perceive of them. Further, it is generally easier for the Soviets to track changes in U.S. methodology than the reverse.

A fourth vulnerability might be the great reliance on technology. It dominates the U.S. ability to plan and to execute. The Soviets know this, and given their emphasis on imagination and initiative in maskirovka, must surely be devising means of exploiting this dependence.

And finally, U.S. forces simply do not have a good appreciation for the importance and potential of deception. Lacking the real appreciation that the Soviets do have, it is reasonable to assume

that the U.S. is far behind the Soviets in developing material for use in deception operations.

There then are a number of vulnerabilities, applicable to the U.S., that have been exploited in the past to significant advantage for the exploiter. It is useful to consider how they should impact on training and doctrine, so they might be minimized or eliminated.

Perhaps the first step is to create in the force a greater awareness of the whole subject, to include the vulnerabilities.

"The Soviet Army approaches deception with considerably more sense of purpose and history than the U.S. Army. Consequently, we are at substantial risk of becoming victims of sophisticated deception during the next war. It would be prudent to heavily emphasize counterdeception in our training and exercises, educate our leaders and units in Soviet deception methods, and develop those methods and technological tools by which we may best expose their deception."¹

FC 90-2, Battlefield Deception (Coordinating Draft), cites more specific advantages:

"This process will also encourage more thoughtful and imaginative approaches to friendly doctrine and habits. Deception training will contribute to our understanding of what we look like to the human eye, the camera, electronic devices, etc.; what we look like under specific conditions; how long it takes us to undertake specific tasks; and what are the indicators that the enemy looks for to determine our capabilities and our intentions."²

In fairness, the U.S. Training and Doctrine Command (TRADOC) has begun the process. In coordination with the U.S. Army Intelligence Center and School, the Army Development and Employment Agency, the Combined Arms Combat Development Activity, and the U.S. Army Materiel Command, TRADOC has constructed and is implementing an Armywide battlefield deception program which redresses most current doctrinal,

training, force structure and materiel deficiencies. A Battlefield Deception Office (BDO) was created at Fort Huachuca after the U.S. Army Intelligence Center and School assumed overall proponency for the subject.³

As to preconceptions, diligent study of the Soviet operational commander from both a historical and modern viewpoint should be sufficient to develop in most professionals a high regard for his capabilities. Further study of U.S. involvement in past wars should likewise convince most professionals that any past superiority usually required an expensive learning period. That is time that may not be available in the next war. The learning must occur now.

If technology is a vulnerability, it is a necessary one. The way to minimize the vulnerability is to recognize how it can fail or how it can be fooled and plan to counteract those situations. And while it is working, absolutely maximize its potential. We must master its complexities and use its full potential to close the quantity differential.

Regarding the nature of a predictive intelligence system and its SIGINT based technology, it seems that judicious oversight by deception sensitive human operators and analysts would temper the potential failures of statistical analysis. However, any system that relies solely or even primarily on a single program for intelligence collection should be reexamined. That would make the job of the deceiver just too easy.

To the extent possible, OPSEC should be emphasized and expanded to cover operational level friendly information. Granted, there are some things that are difficult to hide, but it is perhaps those things that should be considered for deception coverage.

And finally, but by no means least important, operational planners should not overly endorse popular descriptions of Soviet tactical and operational limitations. Specifically, they should be very skeptical of estimates that favor one avenue over another because of better mobility factors. Field Manual 100-5, Operations, states that, "The most promising approaches are often those which appear unlikely."⁴ As the Soviets have demonstrated more than once, that applies to them as well.

This paper has attempted to identify U.S. vulnerabilities to deception as they might be seen from Soviet eyes. To do so requires an understanding of the Soviet concept of deception, or their term, maskirovka. The real point behind this task was made by Sun Tzu long ago:

"If you know the enemy and know yourself, you need not fear the results of a hundred battles. If you know yourself, but not the enemy, for every victory gained you will also suffer a defeat. If you know neither the enemy nor yourself, you will succumb in every battle."

ENDNOTES

SECTION I - INTRODUCTION

1. Sun Tzu, The Art of War, Oxford University Press, London, Oxford, NY, 1963, p.41
2. Any Christian Bible, Book of Joshua, Chapter 8, verses 4-7
3. MAJ H. L. Eaton, "The Soviet Invasion of Manchuria, 1945: An Analysis of the Element of Surprise," MMAS Thesis, USACGSC, 1976, pp.6-7

SECTION II - DECEPTION AT THE OPERATIONAL LEVEL

1. FC 90-2, Battlefield Deception (Coordinating Draft), USAICS, Fort Huachuca AZ, September 1986, p.v
2. FC 90-2, Deception Operations Planning Guide, USACACDA, Fort Leavenworth KS, September 1985, p.1-4,5
3. FC 90-2, Deception Operations Planning Guide, p.1-1
4. MAJ Thomas A. Savoie, "Deception at the Operational Level of War," AMSP Monograph, Fort Leavenworth KS, May 1986, pp.3,4
5. MAJ Thomas A. Savoie, "Deception at the Operational Level of War," Army Magazine, April 1987, p.37
6. MAJ Thomas A. Sovoie, "Deception at the Operational Level of War," pp.4-6
7. FC 90-2, Battlefield Deception (Coordinating Draft), p.1-12
8. Ibid., p.1-12
9. M.M.Kir'ian, "Vnezapnost," Sovietskaia Voennaia Entskiklopediia, VOL 2, Voennoe Izdatel'stvo Ministerstva Oborony SSSR, Moscow USSR, 1976, p.161
10. Jennie A. Stevens and Henry S. Marsh, "Surprise and Deception in Soviet Military Thought: Part II," Military Review, July 1982, p.26
11. Ibid., pp.27,28

SECTION III - HISTORICAL REVIEW

1. COL Basil J. Hobar, "The Ardennes, 1944 - Intelligence Failure or Deception Success?" Military Intelligence, Oct-Dec 1984, p.10

2. Charles B. MacDonald, A Time For Trumpets, Bantam Books, Dec 1985, pp.40, 41
3. Sun Tzu, The Art of War, p.66
4. Charles B. MacDonald, A Time For Trumpets, Bantam Books, Dec 1985, p.40, 41
5. Ibid., p.43
6. COL Basil S. Hobar, "The Ardennes, 1944 - Intelligence Failure or Deception Success?" p.9
7. MAJ Charles C. Campbell, "Surprise: The Precursor to Soviet Operational Success, AMSP Monograph, USACGSC, Fort Leavenworth KS, May 1986, p.6
8. Garthoff, Raymond L., "Marshall Malinovsky's Manchurian Campaign," Military Review, October 1966, p.50
9. Ibid., p.55
10. MAJ H.L. Eaton, "The Soviet Invasion of Manchuria, 1945: An Analysis of the Element of Surprise," MMAS Thesis, USACGSC, Fort Leavenworth KS, 1976, pp.98-103
11. MAJ H.L. Eaton, "The Soviet Invasion of Manchuria, 1945: An Analysis of the Element of Surprise," MMAS Thesis, USACGSC, Fort Leavenworth KS, 1976, p.87
12. Ibid., pp.3-5
13. B.H. Liddell Hart, Decisive Wars of History, G. Bell & Sons, LTD., London, 1929, pp.143-144
14. MAJ Thomas A. Savoie, "Deception at the Operational Level," Army Magazine, April 1987, p.31
15. COL Bill C. Powell, "Did Israeli Intelligence Fail?" MI Magazine, Summer 1976, p.22
16. Ibid., p.22
17. Insight Team of the London Sunday Times, The Yom Kippur War, Doubleday and Company, Inc., Garden City NY, 1974, p.91
18. MAJ Thomas A. Savoie, "Deception at the Operational Level," Army Magazine, April 1987, p.32
19. Insight Team of the London Sunday Times, The Yom Kippur War, p.110
20. Ibid., p.106
21. Ibid., p.101, 111

22. Ibid., p.66

23. Ibid., p.95

24. Ibid., p.64

25. Abba Eban, Abba Eban: An Autobiography, Random House, New York, 1977, p.501

SECTION IV - DECEPTION IN A MODERN ENVIRONMENT

1. MAJ Charles C. Campbell, "Surprise: The precursor to Soviet Operational Success," p.19

2. MAJ Charles C. Campbell, "Surprise: The Soviet Precursor to Success," p.8

3. Mario de Arcangelis, Electronic Warfare, Blandford Press, Poole, Dorset, 1985, p.183

4. Zarubezhnoye voyennoye obozreniye, No.2, 1986, pp.26-32

5. C.J. Dick, "Catching NATO Unawares - Soviet Army Surprise and Deception Techniques," International Defense Review, September 1985, p.24

6. Ibid., p.25

SECTION V - ASSESSMENT OF U.S. VULNERABILITY TO DECEPTION AT THE OPERATIONAL LEVEL

1. GEN Bruce Palmer, Jr., The 25-Year War: America's Military Role in Vietnam, The University Press of Kentucky, Lexington KY, 1984, p.167

2. MAJ Richard J. Quirk III, "Seeking a Theory of Tactical Intelligence to Support the AirLand Battle," School of Advanced Military Studies Monograph, USACGSC, Fort Leavenworth KS Dec 1985, pp.28,29

3. Michael Feazel, "Warsaw Pact Improving Radar Jamming Abilities," Aviation Week and Space Technology, July 16, 1984, p. 70

4. Field Manual 100-5, Operations, HQ Department of the Army, Washington DC, May 1986, p.75

5. Ibid., p.53

6. FC 90-2, Battlefield Deception, p. 4-6

7. Army Training and Evaluation Program (ARTEP) 34-167, Collection and Jamming Company TOE 43-167 requires the recommendation of cover and deception measures
8. MAJ Thomas A. Savoie, "Are We Deceiving Ourselves?" Military Review, March 1987, pp.42,43
9. Field Manual 101-5-1, Operational Terms and Symbols, HQ Department of the Army, Washington DC, October 1985, p.1-53
10. Ibid., Chart: The OPSEC PROCESS, p.2-4
11. During two tours in Europe with different mechanized Infantry battalions, the author participated in numerous GDP reconnaissance and terrain walks. He was often advised by battalion and brigade intelligence officers to safeguard both plans and his own identity because of the presence of unfriendly agents, whose function was to observe friendly unit activities. Unit FTXs covered the same terrain, with prominently displayed unit symbols on the sides of vehicles (although bumper numbers were always taped over).
12. LTC A.L. Elliot, Air University Review, March-April 1979, p.60
13. Ibid., p.63

SECTION VI - CONCLUSIONS AND IMPLICATIONS

1. MAJ Thomas A. Savoie, "Are We Deceiving Ourselves?" p.44,45
2. FC 90-2, Battlefield Deception (Coordinating Draft), p.B-1
3. Thad S. Strange Jr., "Deception Plan Revealed," Military Review, April 1987, p.87, and LTC Robert F. Brown, "MR Update: Deception," Military Review, March 1987, pp.46-47
4. Field Manual 100-5, Operations, p.78
5. Sun Tzu, The Art of War, p.84

BIBLIOGRAPHY

Books

Mario de Arcangelis, Electronic Warfare, Blandford Press, Poole-Dorset, 1985

Army Times, Editors of, The Tangled Web - True Stories of Deception in Modern Warfare, Robt. B. Bruce Inc., Washington DC, 1963

William P. Baxter, Soviet AirLand Battle Tactics, Presidio Press, Novato CA, 1986

Ralph Bennett, Ultra in the West/The Normandy Campaign of 1944-45, Charles Scribner's Sons, New York, 1979

Ladislaw Bittman, The Deception Game, Ballantine Books, New York, 1981

Charles Cruickshank, Deception in WW II, Oxford University Press, New York, 1979

Abba Eban, An Autobiography, Random House, New York, 1977

Shai Feldman and Heda Rachnitz-Kijner, Deception, Consensus and War: Israel in Lebanon, Tel Aviv University, Tel Aviv, 1984

Chaim Herzog, War of Atonement, Little, Brown and Company, Boston, 1975

Holy Bible, Book of Joshua

Insight Team of the London Sunday Times, The Yom Kippur War, Doubleday and Company, Inc., Garden City NY, 1974

B. H. Liddell-Hart, Decisive Wars of History, G. Bell and Sons LTD, London, 1929

Charles B. MacDonald, A Time for Trumpets, Bantam Books, New York, 1985

Mannstein, Lost Victories, Presidio Press, Novato CA, 1982

General Bruce Palmer, Jr., The 25-Year War: America's Military Role in Vietnam, University of Kentucky Press, Lexington KY, 1984

Sun Tzu, The Art of War (translated and with introduction by Samuel B. Griffith, foreward by B.H. Liddell-Hart), Oxford University Press, New York, 1971

John Toland, Battle: The Story of the Bulge, Random House, New York, 1959

P.H. Vigor, Soviet Blitzkrieg Theory, St. Martin's Press, New York, 1983

Dennis Wheatley, The Deception Planners: My Secret War, Hutchinson, London, 1980

Articles

Richard K. Betts, "Surprise Despite Warning: Why Sudden Attacks Succeed," Political Science Quarterly, Vol 95, No. 4, Winter 1980-81

R. K. Betts, "Hedging Against Surprise Attack," Survival, Jul/Aug 1981

LTC Robert F. Brown, "MR Update: Deception," Military Review, March 1987

C.J. Dich, "Catching NATO Unawares: Soviet Army Surprise and Deception Techniques," International Defense Review, Vol 19, No. 1/1986

J.D. Douglas, Jr., "Soviet Disinformation," Strategic Review, Winter 1981

LTC A.L. Elliot, USAF, "The Calculus of Surprise Attack," Air University Review, March-April 1979

Michael Feazel, "Warsaw Pact Improving Radar Jamming Abilities," Aviation Week and Space Technology, July 16, 1984

MAJ Gregory Fontenot, USA, "The Promise of COBRA: The Reality of Manchuria," Military Review, September 1985

Raymond L. Garthoff, "Marshall Malinovsky's Manchurian Campaign," Military Review, October 1966

LTC Robert P. Hand, USA, "Deception Planning," Military Review, September 1967

COL Basil J. Hobar, USA, "The Ardennes, 1944: Intelligence Failure or Deception Success?" MI Magazine, Oct-Dec 1984

Edwin H. Miller, "Tactical Deception in WW II," Journal of Electronic Defense, October 1985

COL Bill C. Powell, "Did Israeli Intelligence Fail? The October 1973 War," MI Magazine, Summer 1976

MAJ Thomas A. Savoie, "Are We Deceiving Ourselves," Military Review, March 1987

MAJ Thomas A. Savoie, "Deception at the Operational Level of War," Army Magazine, April 1987

COL L. Sergeyev, USSR, "The Means of Camouflage and Deception in NATO Country Armies," Zarubezhnoye voyennoye obozreniye, No. 2, 1986

Jennie A. Stevens and Henry S. Marsh, "Surprise and Deception in Soviet Military Thought: Parts I and II," Military Review, June, July 1982

Thad S. Strange, "Deception Plan Revealed," Military Review (Letters Section), April 1987

Edgar Ulsamer, "The Fog of War," Air Force Magazine, October 1985

Papers

MAJ (P) Charles P. Campbell, USA, "Surprise: The Precursor To Soviet Operational Success," School of Advance Military Studies Monograph, USACGSC, Ft Leavenworth KS, April 1986

MAJ H.L. Eaton, USA, "The Soviet Invasion of Manchuria, 1945: An Analysis of the Element of Surprise," MMAS Thesis, USACGSC, Fort Leavenworth KS, 1976

LTC David M. Glantz, USA, "August Storm: Soviet Tactical and Operational Combat in Manchuria, 1945," Leavenworth Paper No. 8, Combat Studies Institute, USACGSC, Fort Leavenworth KS, June 1983

MAJ Charles L. Hacker, USA, "Deception, Countersurveillance and the AirLand Battle," MMAS Thesis, USACGSC, Fort Leavenworth KS, 1985

MAJ Richard J. Quirk III, USA, "Seeking a Theory of Tactical Intelligence To Support the AirLand Battle," School of Advanced Military Studies Monograph, USACGSC, Fort Leavenworth KS, December 1985

MAJ Thomas A. Savoie, USA, "Deception at the Operational Level of War," School of Advanced Military Studies Monograph, USACGSC, Fort Leavenworth KS, May 1986

Reports

Mark Kronman, "The Deceptive Practices of the 23rd Headquarters, Special Troops, During World War II," Tactical Operations Analysis Office Interim Note No. T-11 (Revised), Aberdeen Proving Ground, Maryland, January 1978

Doctrinal Manuals

Field Manual 34-3, Intelligence Analysis, Headquarters DA, Washington DC, January 1986

Field Manual 34-60, Counterintelligence, Headquarters DA, Washington DC, August 1985

Field Manual 90-2, Tactical Deception, Headquarters DA, Washington DC, August 1978

Field Manual 100-5, Operations, Headquarters DA, Washington DC, May 1986

Field Manual 101-5-1, Operational Terms and Symbols, Headquarters DA, Washington DC, October 1986

Field Manual 100-15, Corps Operations (Final Draft), USACGSC, Fort Leavenworth KS, February 1985

Field Circular 90-2, Deception Operations Planning Guide, USACACDA, Fort Leavenworth KS, September 1985

Field Circular 90-2, Battlefield Deception (Coordinating Draft), U.S. Army Intelligence Center and School, Fort Huachuca AZ, September 1986

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