

1979

Perspectives on Strategic Arms Limitations

Lawrence J. Korb

George F. Brown Jr

Follow this and additional works at: <https://digital-commons.usnwc.edu/nwc-review>

Recommended Citation

Korb, Lawrence J. and Brown, George F. Jr (1979) "Perspectives on Strategic Arms Limitations," *Naval War College Review*: Vol. 32 : No. 4 , Article 6.

Available at: <https://digital-commons.usnwc.edu/nwc-review/vol32/iss4/6>

This Article is brought to you for free and open access by the Journals at U.S. Naval War College Digital Commons. It has been accepted for inclusion in Naval War College Review by an authorized editor of U.S. Naval War College Digital Commons. For more information, please contact repository.inquiries@usnwc.edu.

The questions raised by and answered by strategic arms are of importance not merely during SALT negotiation and ratification periods but such periods do demand that a more complete consideration of military, political, and economic elements be made. This paper emphasizes the need to determine the appropriate questions to ask.

PERSPECTIVES ON STRATEGIC ARMS LIMITATIONS

by

Lawrence J. Korb and George F. Brown, Jr.

Introduction. In an age in which reassessment of traditional wisdom is being regularly called for—witness the debates over the past year regarding such topics as the Panama Canal treaties, the nature of U.S. interests in the Middle East, the normalization of relations with the People's Republic of China, and the role of government in solving domestic social problems—few subjects have the potential importance for the future of the United States than does the subject of strategic nuclear forces. Because of the essentiality of the U.S. strategic nuclear arsenal in guaranteeing the viability of our national objectives and those of our allies, any proposed Strategic Arms Limitation Treaty should and must receive careful scrutiny.

John Newhouse concluded his book on the initial treaties with the observation that "Because it is wrapped in the technology and other kindred abstractions

of strategy, SALT is an obscure, certainly an elusive, enterprise."¹ The elusive military, economic, and political arguments upon which SALT decisions must be based likely will dominate national security discussions over the next several months and possibly years. While much of the actual debate is likely to move rapidly toward the specifics of any proposed treaty or amendments to it—what weapons are included and excluded, what numerical levels are set, what development and testing efforts are allowed and disallowed, etc.—it is essential that these specifics be analyzed in an appropriate framework. Drawing upon the previous history of strategic arms and arms limitations, this paper suggests the nature of these underlying questions, providing a basis for discussion of the essential prerequisite to productive debate: The need to determine the right questions to ask.

52 NAVAL WAR COLLEGE REVIEW

U.S. Strategic Force Objectives. Since they were first employed at the end of World War II, strategic nuclear forces have played a critical role in the U.S. military arsenal. At the same time that they have served as the backbone of our national defense efforts, they have provided the greatest possible impetus to the deterrence of war. This unique combination of lethality and dismay at the thought of its usage has made the process of defining strategic force objectives difficult. Emerging from analysis of strategic force options has been the notion of strategic deterrence as the key force planning objective. In its many manifestations, the concept basically suggests that the possession of such lethal forces deters their actual use by an enemy, and then by us, if it can be guaranteed that the result of the enemy's calculation would be that the losses from nuclear war would far outweigh the gains from military action.

Defining objectives for strategic nuclear forces has been further complicated by the fact that in three short decades the United States has moved from a monopoly position following World War II to a state of strategic superiority during the 1950s and 1960s to a state of no more than "essential equivalence" today. As the U.S. edge in nuclear weapons has evaporated, renewed looks at strategic force objectives have been required. Over the 30-year post-World War II period, arguments have been raised (and have in fact served as the basis of defense policy) that range from the requirement for superiority to guarantee deterrence to the belief that equivalence is the best deterrent.

The present status of strategic force objectives is well reflected by the words of Secretaries of Defense Rumsfeld and Brown. In the *FY 1977 Department of Defense Annual Report*, Rumsfeld stated:

Our basic objectives continue to be credible deterrence and

continued strategic stability. The conditions under which our main offensive forces satisfy these objectives are when they:

—Contain a high survivable second-strike capability that can, if necessary, retaliate with devastating force against an enemy's basic economic and political assets;

—Have the combination of warheads, accuracy, command-control and retargeting capability so that, whatever the contingency, they can execute a variety of second-strike attacks on military and other targets of value to an enemy, and at the same time minimize collateral damage to civilian populations;

—Are known to be equivalent to the enemy's offensive forces in the important dimensions of military power;

—Remain well-hedged, through active research and development programs, against future vulnerabilities that an enemy might attempt to exploit.²

Secretary Brown, in his *FY 1979 Department of Defense Annual Report*, stated:

The general functions of the strategic nuclear forces are by now well established. The possibility of a strategic nuclear attack on the United States itself is very low. But since the consequences of such an attack would be so catastrophic, we must maintain a powerful strategic force to deter it. Because of our unique role in the collective security system of the West, we have a special obligation to deter nuclear attacks on our allies, on other nations the security of which is deemed essential to the United States, or on our forces overseas. In addition, the United States and its allies must be free from any coercion

and intimidation that could result from perceptions of an overall imbalance or particular asymmetries in nuclear forces. The strategic forces, in conjunction with U.S. and allied theater nuclear and conventional forces, also have a role to play in deterring non-nuclear attacks—particularly large-scale conventional attacks on NATO and our Asian allies.

The Soviets have developed, and are fully capable of maintaining, powerful strategic forces of their own. As a consequence, we must also acknowledge that unless one side or the other is careless—and allows a major imbalance to develop—or makes serious miscalculations, a condition of mutual deterrence and essential equivalence is likely to prevail in the future, just as it does today. As long as strategic nuclear forces exist in the world, this is an acceptable situation, the most acceptable available; in fact, it is in everyone's interest to accept it. We want mutual deterrence to be so stable that it cannot be upset in a crisis. We want it to be so well designed that neither side will be tempted to try to upset it over the longer term. These are the two essential types of strategic stability that we seek.³

Contributions of Strategic Arms Limitations. Viewing the underlying U.S. objectives of deterring threats to its essential national interests and deterring nuclear war itself, a succession of U.S. leaders has concluded that negotiated arms limitations provide an attractive alternative to unchecked arms competition. The initial SALT I negotiations were thus entered into with the purposes of enhancing long-term strategic stability and constraining the costs of the U.S.-Soviet strategic arms competition. The resulting treaty, which

provided limits on antiballistic missile defense systems, has been viewed generally as successful in achieving these objectives. The present negotiations, however, differ from the first in the sense that the focus is on offensive strategic weapons rather than defensive systems. From the U.S. perspective, the underlying question is whether an agreement can be reached that enhances—or at minimum does not threaten—the underlying objectives described above. Two early statements by U.S. leaders suggest the dimensions that such an accord must take for this purpose. The U.S. negotiating team at the SALT I conference stated that "The U.S. delegation believes that an objective of the follow-on negotiations should be to constrain and reduce on a long-term basis threats to the survivability of our respective strategic retaliatory forces."⁴ Shortly thereafter President Nixon outlined the following requirements:

In sum, a future agreement should:

- establish an essential equivalence on strategic capabilities among systems common to both sides;

- maintain the survivability of strategic forces in light of known and potential technological capabilities;

- provide for the replacement and modernization of older systems without upsetting the strategic balance;

- be subject to adequate verification;

- leave the security of third parties undiminished.⁵

Both of these citations suggest the emphasis placed on the need to guarantee the survivability of offensive systems and to ensure that no first strike can seriously damage the strategic capabilities of the other side. While this emphasis on second strike capabilities correctly belongs at the forefront of attempts to assess potential accords,

54 NAVAL WAR COLLEGE REVIEW

other factors also require consideration.

Nuclear War. Viewpoints regarding the nature of nuclear war itself have undergone major evolution over the last several decades. During the initial years of the nuclear age, massive retaliation—the destruction of significant fractions of an enemy's population and industry—was viewed as the basis of deterrence. As recently as 1969, Defense Secretary McNamara stated in the *FY 1969 Department of Defense Annual Report* that:

I would judge that a capability on our part to destroy, say, one-fifth to one-fourth of (the U.S.S.R.'s) population and one-half of her industrial capacity would serve as an effective deterrent. Such a level of destruction would certainly represent intolerable punishment to any 20th century industrial nation.⁶

By the midseventies, other dimensions of retaliatory capabilities began to emerge as relevant to deterrence. In the *FY 1978 Department of Defense Annual Report*, Secretary Rumsfeld commented that "an important objective of the assured retaliation mission should be to retard significantly the ability of the U.S.S.R. to recover from a nuclear exchange and regain the status of a 20th century military and industrial power more rapidly than the United States," and specifically noted the relevance of "the size and capability of the enemy's military capability surviving for postwar use."⁷ His comments focused attention on the need to include military targets among those that must be hit by a retaliatory strike.

However, even this expanded view of the mutual assured destruction philosophy of deterrence has come under recent criticism. Fundamentally, critics have argued that asymmetries exist in U.S. and Soviet views of nuclear warfare with the Soviets placing both

nuclear and conventional weaponry in the same general arsenal to be drawn upon as military requirements and tactics dictate. In 1976, the CIA stated:

The Soviets are committed to the acquisition of "warfighting capabilities," a decision which reflects a consensus on the need to assure the survival of the Soviet Union as a national entity in case deterrence fails. It also accords with a long-standing tenet of Soviet military doctrine that a nuclear war could be fought and won, and that counterforce capabilities should be emphasized in strategic forces. Mutual assured destruction as a desirable and lasting basis for a stable strategic nuclear relationship between superpowers has never been accepted in the U.S.S.R. But Soviet political and military leaders probably regard it as a reality which will be operative at least over the next decade.⁸

A similar viewpoint is suggested by Frank in his 1977 study of Soviet nuclear planning, in which he presents a tabular listing of targets for Soviet forces in priority sequence (see Table 1).

The table clearly imputes an active warfighting role to Soviet strategic forces, one in which they are explicitly integrated with their conventional forces. Secretary Brown acknowledges this emerging viewpoint regarding Soviet nuclear doctrine in the *FY 1979 Department of Defense Annual Report*, stating:

With the expansion of the Soviet strategic offensive forces and the advances in Soviet command-control-communications (C³), we have had to take several other possibilities into account as well. The Soviets, among other options, could avoid attacking our main population centers. They could withhold some of their

TABLE 1—SOVIET OBJECTIVES AGAINST U.S. FORCES IN A NUCLEAR WAR⁹

Targeting Priority	Objective	Combat Tasks
1	Destruction of enemy nuclear attack capability	<p>Early warning sites and anti-sub ships in U.S.A. and United Kingdom; U.S. TRIAD (ICBM, SLBM, bombers)</p> <p>U.S. national command links, North American Defense Command and SLBM communications</p> <p>U.S. forward-based aircraft carriers</p> <p>U.S.-West German <i>Pershing</i> rocket bases</p> <p>U.S. Air Force Europe, West German and British strike command nuclear-capable aircraft bases</p> <p>Nuclear rocket sites in People's Republic of China</p> <p>Tanker bases in France</p> <p>British and French ballistic rocket submarines</p> <p>Nuclear storage sites in West Germany</p>
2	Destruction or disruption of enemy troop basing system	<p>U.S. SEVENTH Army bases and casernes in West Germany</p> <p>Major ports of entry and supply, for example</p> <p>Antwerp, Belgium (port)</p> <p>Wiesbaden, West Germany (base)</p> <p>Hamburg, West Germany (port)</p> <p>Charleston, S.C. (port and base)</p> <p>Dover, Del. (base)</p> <p>Rota, Spain (port)</p> <p>Holy Loch (Scotland)</p> <p>United Kingdom (port)</p> <p>Rhein-Main, West Germany (base)</p> <p>Fayetteville, N.C. (base)</p> <p>Ft. Hood, Tex. (base)</p>
3	Destruction of enemy military-industrial support facilities	<p>Tank farms in northeast U.S.A., United Kingdom, Chicago and Los Angeles areas</p> <p>Nuclear power reactors in United Kingdom, Belgium, West Germany</p> <p>Oil refineries in Sicily, Virgin Islands, south-east U.S.A., United Kingdom</p> <p>Thermal-electric generating plants in northeast U.S.A., Pacific coast, midwestern cities</p>
4	Destruction or disruption of enemy control of state and other military activities	U.S. capital region, alternate command posts, communications transmitters
5	Destruction and disruption of enemy rear services and transport	U.S. and NATO highway, rail, barge "choke-points," nuclear storage sites in U.S.A.

NOTE: Combat tasks and targeting priorities developed from objectives cited in Marshal A.A. Grechko, "On Guard for Peace and the Building of Communism," 2 December 1971, translated in U.S. Senate, Committee on the Judiciary, Staff Study, p. 61.

56 NAVAL WAR COLLEGE REVIEW

offensive capabilities for follow-on strikes. They could attack a wide range of military and economic targets in addition to our strategic forces. They could even use their forces quite selectively against a small number of targets. In short, the Soviets are acquiring capabilities that will give their nuclear forces some of the flexibility that we have associated previously with only the more traditional military capabilities.¹⁰

These several possible Soviet uses of nuclear weapons complicate the process of assessing any potential arms limitation treaty. Specifically, they dictate the need for an assessment of residual U.S. capabilities under a wide range of Soviet nuclear initiatives, an assessment that must include counterforce as well as the traditional countervalue considerations. In that worst case analysis is appropriate to these policy questions more so than to any other, a conclusion that risk must be kept to an acceptable level in all circumstances is prerequisite to satisfaction with a proposed treaty. This expanded requirement greatly complicates the analysis necessary for such an assessment, as traditional single exchange models as have been used in previous strategic studies¹¹ are insufficient to deal with the dynamics of a nuclear campaign.

In the FY 1980 *Department of Defense Annual Report*, Secretary Brown indicated that he understood the fact that U.S. strategic capabilities must now be assessed under a much more comprehensive set of criteria. While acknowledging that essential equivalence is an important objective of any arms control agreement, the Secretary argues that equivalence alone would not ensure deterrence or even assured destruction. Rather, forces are required in sufficient numbers and quality so that they can: (1) survive a well-executed surprise attack; (2) react with the timing (both promptness and endurance) needed, to

assure the deliberation and control deemed necessary by the National Command Authorities (NCA); (3) penetrate any enemy defenses; and (4) destroy their designated targets. These forces must also have sufficient redundancy and diversity to ensure against the failure of any one component of the capability, to permit the cross-targeting of key enemy facilities, and to complicate the enemy's defenses as well as his attack.¹²

Other Military, Political and Economic Considerations. While the various factors cited above alone guarantee the difficulty inherent in evaluating a proposed SALT treaty, a wide range of other factors also bears heavily on final conclusions. Among these are:

Verification and recovery from Soviet violations. The very need to maintain strategic forces against the Soviet Union implies a basic mistrust and hostility that requires unilateral U.S. ability to determine compliance and to react effectively. Thus the fundamental issues of whether the United States can verify Soviet compliance (particularly in light of the changes in Iran) and the extent to which the United States can counterbalance secret Soviet initiatives emerge. If the conclusion is reached that the terms of the treaty—if followed—meet the requirements for deterrence, stability, and war-fighting described earlier, these questions then become paramount.

Linkages with conventional forces. Despite their frequent separation in the U.S. defense literature, strategic and conventional forces have always been linked. In the years of monopoly, strategic forces provided an umbrella over potentially inferior conventional forces. In the years of strategic stalemate, the requirement emerged for a conventional force balance. Under postulated conditions of combined nuclear and conven-

tional warfare, the requirements for conventional forces must be carefully reassessed. The effect of SALT-induced changes in the strategic balance must be meshed with the ongoing evolution of Soviet conventional forces as a consideration in overall U.S. defense policy and force structures. In that the budgetary implications are potentially much greater for conventional forces than for strategic forces, SALT-induced linkages take on added importance.

Perceptions of other nations. Although only the United States and the U.S.S.R. are explicit players in the strategic game, the effect of SALT on the perceptions of other nations assumes a relevance for broad political and economic reasons. One can cite a host of reasons why it is especially critical today that the United States not be seen as weakened by any SALT accord. Unopposed Soviet adventurism in Africa, the Panama Canal treaties, the Southeast Asia debacles, shifting allegiances in the Middle East and in Asia, and other factors all have placed U.S. capabilities and resolve under an international microscope. The effect of SALT on perceived U.S. strength will certainly contribute to future third party assessments of the balance of power.

The U.S. technological and industrial base. Even if the parties to the SALT accord are assumed to have the best of intentions presently, concern over the U.S. base for some postaccord period must enter into deliberations. The effect of treaty limitations on research, development, and production must be assessed and projected into the post-treaty period.

The increased costs of strategic forces if SALT II is not ratified. In FY 1979, spending for strategic nuclear forces accounts for under 7 percent of the defense budget. In constant dollars,

spending for these forces in FY 1979 will be less than at any time since prior to the Korean war and \$13.7 billion (or 60 percent) less than in FY 1964, the last pre-Vietnam year. If SALT II is not ratified, spending on strategic forces will have to increase by from \$5 to \$7 billion per year over the next decade.¹³ These increased funds will result either in an increase in the budget deficit, a decrease in the level of funding for conventional forces, or, as is more likely, some combination of the two. None of these alternatives is particularly palatable at this time.

The conflict between the executive and legislature over the right to control national security policy. The Carter administration, like its predecessors, is committed to SALT both as a policy and a process. The Congress virtually abdicated its role in foreign policy during the first two post-World War II decades, giving the executive branch a blank check to conclude agreements, form alliances, and conduct prolonged wars. Many Congressmen view the SALT negotiations as a way to make up for past decades of inertia. Repudiating an agreement negotiated by the executive branch over a period of 8 years would indeed signify that the Senate has resumed its traditional pre-World War II role in the making of national security policy. On the other hand, turning down a treaty negotiated by the President could fatally weaken the ability of President Carter and his successors to conduct foreign relations successfully.

The whole context of Soviet-American relations. Many in the Congress and in the informed public wish to link SALT to Soviet actions in other areas, while the Administration and others wish to have SALT considered on its own merits. Proponents of "linkage" assert that the United States should not "reward" the Soviets with a SALT agreement as long as they continue to

58 NAVAL WAR COLLEGE REVIEW

build up their forces in Europe, foment instability in the Third World, and ignore the Helsinki accords on human rights. Opponents of linkage argue that the benefits of SALT to the United States and the world are so great that the agreement should be accepted regardless of Soviet behavior in other areas. As President Carter said at Georgia Tech on 26 February 1979, "Because this carefully negotiated and responsible arms control agreement (SALT II) will make the world safer and more secure, it is in our national interest to pursue it, even as we continue competition with the Soviet Union elsewhere in the world."¹⁴ Proponents of linkage are not only on this side of the Atlantic. Indeed, the Soviet leadership has used SALT as leverage to limit U.S. flirtation with China. Many officials inside the Carter administration now concede that it was a serious mistake to normalize relations with China, let alone allow Deputy Chairman Deng Xiaoping to take a tour of the United States, without having first made sure of the SALT deal.

The 1980 Presidential campaign. For all practical purposes, the 1980 Presidential season will begin in earnest in the autumn of 1979. Because President Carter's chances for reelection could be seriously jeopardized if the Senate repudiates the SALT agreement during the Presidential season, his opponents in both parties may seize upon that opportunity to embarrass him. On the other hand, the President, being aware of this situation, may choose not to complete the negotiations, to postpone submitting the treaty to the Senate, or to conclude an executive agreement rather than a treaty.

Summary. The process of evaluating proposed constraints on U.S. strategic arms, in itself complex because of the criticality of these forces to our national survival, has become greatly compli-

cated as the result of evolving military, political, and economic factors. Military considerations revolve around the emerging flexibility of nuclear weapons, requiring assessments of possible Soviet employment doctrines and the potential linkages between strategic and conventional forces. Additional military considerations focus on the requirements for verification of Soviet compliance with the agreement and the ability of U.S. forces and technology to respond rapidly and effectively should violations occur. International political considerations reflect the continuing competition between the political, economic, and

BIOGRAPHIC SUMMARY



Lawrence Korb is Professor of Management, Naval War College and an Adjunct Scholar of the American Enterprise Institute. He has been a consultant to the Office of the Secretary of Defense, the National Security Council, and the Office of Education and has served on the faculties of the University of Dayton and the U.S. Coast Guard Academy. He specializes in national security organization, process, and policy and his most recent publication is *Fall and Rise of the Pentagon: Defense Policies of the 1970s*.

BIOGRAPHIC SUMMARY



George F. Brown, Jr. is presently employed by Data Resources, Inc. in Washington. His position includes management responsibility for all consulting and research done by DRI in support of DOD and NASA clients. Prior to joining DRI, George Brown was Theodore Roosevelt Professor of Economics and Coordinator of the Quantitative Factors course at the Naval War College.

cultural systems and values of the United States and the Soviet Union. An assessment of the proper role of the proposed treaty within the overall context of this competition must be made, one that takes into account the effect of the agreement on the perceptions of other nations, including both our allies and the nations in the Third World. Domestic political considerations reflect not only the inevitable competition among parties and candidates, but also the diverse viewpoints regarding the proper role of the United States in foreign affairs and the nature of the Soviet threat to our national security. These considerations are compounded by the implied linkages between strategic arms limitation decisions and the size of the defense budget, which in turn assures linkage with the visible

trade-offs within the Federal Government budget among strategic forces, conventional forces, and nondefense programs, as well as between the private and public sectors of the economy. A final complexity involved in assessing the proposed agreement is added by the necessity to weight these various factors in arriving at a final decision regarding the merits of the treaty. As is the case with each individual factor, many viewpoints regarding the relative importance of military, political, and economic factors are likely to emerge from the debate. Nonetheless, all of these factors must be clearly analyzed and debated if SALT is to shed the label of being an "obscure and elusive enterprise" and instead reflect the clear and logical decisionmaking that such a vital policy question deserves.

NOTES

1. John Newhouse, *Cold Dawn: The Story of SALT* (New York: Holt, Rinehart & Winston, 1973).
2. Donald H. Rumsfeld, *Report of the Secretary of Defense Ronald H. Rumsfeld to the Congress on the FY 1977 Budget and Its Implications for the FY 1978 Authorization Request and the FY 1977-1981 Defense Programs* (Washington: U.S. Govt. Print. Off., 1976).
3. Harold Brown, *Report of the Secretary of Defense Harold Brown to the Congress on the FY 1979 Budget* (Washington: U.S. Govt. Print. Off., 1978).
4. U.S. Arms Control and Disarmament Agency, *Arms Control and Disarmament Agreements* (Washington: U.S. Govt. Print. Off., February 1975).
5. Richard M. Nixon, *U.S. Policy for the 1970's: Shaping a Durable Peace*, Report to the Congress, 3 May 1973.
6. Robert S. McNamara, *Statement of the Secretary of Defense Robert S. McNamara before the Senate Armed Services Committee on the FY 1969-1973 Defense Program and the 1969 Defense Budget* (Washington: U.S. Govt. Print. Off., 1968).
7. Donald H. Rumsfeld, *Report of the Secretary of Defense Donald H. Rumsfeld to the Congress on the FY 1978 Budget, FY 1979 Authorization Request and FY 1978-1982 Defense Programs* (Washington: U.S. Govt. Print. Off., 1977).
8. Central Intelligence Agency, *Hearings before the Subcommittee on Priorities and Economy in Government, Joint Economic Committee, Congress of the United States, 24 May-15 June 1976*.
9. Lewis A. Frank, *Soviet Nuclear Planning* (Washington: American Enterprise Institute, 1977).
10. Brown, *op. cit.*
11. See, for example, *Operations Research*, Treatment of Operations Research Questions in the 1969 Safeguard Debate, September 1971.
12. Harold Brown, *Report of the Secretary of Defense Harold Brown on the FY 1980 Budget, FY 1981 Authorization Request and FY 1980-1984 Defense Programs* (Washington: U.S. Govt. Print. Off., 1979).
13. Senate Committee on the Budget, *Markup Materials for the First Concurrent Resolution on the Budget for FY 1979*, 31 March 1978.
14. Jimmy Carter, "America's Role in a Turbulent World," 20 February 1979, Georgia Institute of Technology, Atlanta, Georgia.