

Long-Range Strike

The Bedrock of Deterrence and America's Strategic Advantage

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Let us, therefore, beware of being lulled in to a dangerous security. . . . The expenses required to prevent a war, are much lighter than those that will, if not prevented, be absolutely necessary to maintain it.

—Benjamin Franklin, 13 May 1784

Long-range strike (LRS) and the often-associated phrase *strategic attack* are perhaps the most discussed but least understood terms in current military use.¹ Despite, or perhaps because of, numerous definitions and formulations, we tend to overlook the real value of LRS capabilities in the minor details of numerous acquisition plans and concepts of operations. Many components comprise America's power to influence. Yet its ability to project conventional and nuclear military power across the globe at a time and place of our choosing represents the influential backstop for other US instruments of power. The latent threat of violence supported by a credible capability to hold an enemy's most valued resources at risk with little notice or chance for defense gives LRS its ultimate strategic value. Similarly, nations that maintain a robust LRS historically retain a strategic advantage against peer or near-peer state actors. Although the platform, plan, or strategy may change, the purpose of LRS remains the same—to undergird political will by demonstrating credible, flexible, survivable, and visible military power. If the United States wishes to maintain a strategic advantage across the globe, it should heed lessons learned by past global powers and place capable LRS among the highest priorities for

development, investment, and modernization—even in a fiscally constrained environment.

Sun Tzu, Carl von Clausewitz, and Henri Jomini all agreed that military strategy seeks to meet national objectives through the use of armed force in conjunction with all other available means—often described as instruments of power. Contemporary military theorists also concur with the premise that the use of armed force to attain national objectives still applies, even after increased globalization and the rapid development of technology. In his highly regarded work *Military Strategy: A General Theory of Power Control*, Adm J. C. Wylie posited that “the aim of war is some measure of control over the enemy,” which can be “direct, indirect, subtle, passive, partial or complete.”² Wylie makes two important points regarding military power—it must effectively exert some level of control over the enemy system, but one need not necessarily use it to exert control. In fact, the most effective control from LRS may come from weapons never physically employed against an enemy—specifically, nuclear weapons. Thomas Schelling echoes this conviction in his book *Arms and Influence*: “It is the *threat* of damage, or of more damage to come, that can make someone yield or comply. It is *latent* violence that can influence someone’s choice. . . . It is the expectation of *more* violence that gets the wanted behavior, if the power to hurt can get it at all” (emphasis in original).³ The more credible our capability to impose unacceptable damage or hinder an enemy’s critical interests, the greater our power to control his actions, even if military power is never independently sufficient to guarantee the results we desire.

Bernard Brodie, the father of modern strategic studies, speculated in *The Absolute Weapon: Atomic Power and World Order* that the introduction of nuclear LRS changed the character of warfare forever: “Thus far the chief purpose of our military establishment has been to win wars. From now on its chief purpose must be to avert them.”⁴ The deterrent effect of the force inherent in LRS assets can be much greater than the actual destructive effects. For instance, our bomber force might have

destroyed any worthwhile target in Korea and Vietnam, but the tactical and operational results proved insignificant compared to the strategic advantage gained by an LRS nuclear deterrent. The United States' LRS supplied a military power backstop for its containment strategy against the spread of Chinese and Soviet communism. Despite the difficulties of measuring the success of deterrence, we may reasonably conclude that a believable LRS deterrent constrained Chinese and Soviet actions.⁵ Thus, although the power to destroy other societies with nuclear weapons has kept nuclear states out of *existential* wars, it has not preserved them from challenges of armed conflict. Consequently we need to maintain a comprehensive and credible LRS capability.

Long-Range Power Projection: A Strategic Imperative

The basic concept behind LRS—using military power projection to influence the behavior of others—is as old as human conflict itself. Whether it took the form of naval expeditions by Athenian amphibious forays deep into Sparta, overwhelming ground attacks by Mongol light cavalry archers, or the massive aerial bombardment of the Combined Bomber Offensive of World War II, projecting power with speed across a wide span of the enemy's territory and interests has made attacking or defending against such forces increasingly difficult. Napoleonic warfare, as described by Jomini and Clausewitz, led subsequent military planners to seek ways to identify and attack an enemy's decisive points and centers of gravity.⁶ These concepts of power projection framed early ideas of how to break the bloody stalemate of World War I. Col Edgar S. Gorrell consolidated the innovative ideas of military theorists and aviators like William “Billy Mitchell, William Sherman, Sir Hugh Trenchard, and Giulio Douhet, leading to the development of a practice commonly called “strategical bombardment.” In his World War I publication *The Final Report*, Gorrell called for a strategy using the flexibility and reach of airpower to bypass the strength of the enemy's military formations and defenses to attack vulnerable, war-supporting

infrastructure.⁷ Though never implemented because hostilities ended in 1918, this idea served as the intellectual bedrock for the strategic bombing concepts developed in World War II.

During the 1930s, students at the Air Corps Tactical School studied the writings of Gorrell and Lord Tiverton to formulate the industrial web theory, which held that one could disrupt or destroy certain bottlenecks of production and thereby incapacitate an enemy's ability to make war.⁸ Unfortunately, the early theorists overestimated the destructive and moral effects of bombing and underestimated the effectiveness of ground- and air-based defenses, as well as the resilience and regenerative capabilities of modern societies and their industrial complexes. Early bombers did not have the range, precision, or payload to deliver a decisive blow to the enemy's heartland. By the time air forces had sufficiently established air superiority, which would allow truly long-range platforms to deliver atomic weapons, the war had come to a close.

Despite the continuing debate concerning strategic bombing as an independent war winner, World War II demonstrated that ultimate victory came to the side that could project forcible power at a longer distance, preserving its own war capability while denying the same to its opponent. The proposed German strategy leading up to World War II offers an example of how a lack of LRS can affect a conflict. Agreeing with the LRS premise, Germany's first chief of the General Staff, Gen Walther Wever, advocated a strategy of long-range strategic bombing. He based his strategy on bombing enemy bases, aircraft factories, war-sustaining industries, and logistical networks in order to paralyze the enemy's war-making capabilities.⁹ Fortunately for the Allies, General Wever's untimely death in 1936 prevented his strategy from coming to fruition. His immediate successors and, ultimately, Hermann Göring, commander in chief of the Luftwaffe, fatefully steered the latter away from the long-range bombing strategy. Göring's decision to develop shorter-range bombers such as the He-177 Griffon and the Ju-87 Stuka, emphasizing tactical close air support of ground forces, allowed

aircraft-production facilities in England to survive the Battle of Britain. Despite the fact that Germany enjoyed a formidable tactical fighter force, its lack of strategic focus on LRS eventually conceded the strategic advantage to the Allies by allowing British Avro 683 Lancasters and US B-17s and B-24s to project airpower from longer range without fear of long-range counterstrikes.¹⁰ The Allies were victorious in large part because they could continue war production unhindered, while the Axis powers found their war-fighting prowess constantly degraded by a combination of short- and long-range attacks. One may debate the effects of LRS in Europe, but after the use of atomic bombs on Hiroshima and Nagasaki and the end of World War II, the value of long-range power projection became readily apparent. The latent threat of further violence by LRS proved valuable to the United States and the allies because it contributed significantly to the end of the war.

The value and capability of LRS had matured exponentially by the late 1950s with the introduction of intercontinental ballistic missiles (ICBM) armed with nuclear warheads. ICBMs enhanced the value of LRS by increasing standoff range and overcoming the lack of precision evident in World War II with nuclear yields. In the end, the ability of the United States and Union of Soviet Socialist Republics to project power through LRS developed to the point where, for all practical purposes, each country could hold the entire planet at risk of instantaneous annihilation. LRS subsequently became the backbone of each country's comprehensive deterrent strategies.

As the concepts of massive retaliation and mutually assured destruction emerged to deal with the reality of the new strategic standoff, theorists such as Schelling, Brodie, and Lawrence Freedman came to grips with the implications of using LRS for deterrence in the nuclear age. By definition, deterrence is "the prevention of action by the existence of a credible threat of unacceptable counteraction and/or belief that the cost of action outweighs the perceived benefits."¹¹ It depends solely on the adversary's perception of what the opposition (United States) is *willing* and *capable* of doing. The first component of the equation—a

country's will—ebbs and flows with the political climate. Yet without a credible capability to strike, the will to act becomes a paper tiger because a lack of capability would nullify the ability to act. Thus, capability is a prerequisite to any successful deterrent strategy. Compared to other instruments of military power, LRS platforms historically provide the best requisite capability to hold any target at risk, at any time, and therefore enable successful deterrence strategies. Assuming a nation's will to act, the strategic foresight to develop, modernize, and adequately fund LRS has paid invaluable dividends by lending credibility to that country's deterrent threats. Consequently, the value and importance of LRS with respect to national defense and security remain evident today and into the foreseeable future.

Nearly every conflict since World War II has demonstrated the United States' willingness and ability to use conventional LRS assets for limited objectives while retaining sufficient nuclear capability as a plausible deterrent. Despite the demonstrated capacity to destroy targets from long range at will—in Serbia, Iraq, Libya, or Afghanistan—air strikes alone cannot bring about desired political outcomes. Diplomatic engagement, effective strategic communications, economic embargoes, governance aid, and financial incentives for commercial investment are all part of resolving and recovering from wars. Yet without LRS, these forms of soft power possess less coercive power over the enemy. Even in today's complex world, the power of LRS remains the essence of deterrence and a foundational element of America's strategic advantage. However, as Mark Gunzinger points out, for the United States, “that advantage is dissipating.”¹²

Long-Range Strike: The United States' Strategic Advantage

Nations that can maintain freedom of action and the ability to threaten and apply violent force without retaliation will hold the ultimate strategic advantage. Failure to maintain credible LRS capabilities

diminishes the effectiveness of the other instruments of national power. Although the US military has provided a dependable backdrop of international security for over 60 years, the size of that force has diminished recently even though the need for a strong force has not. In light of the present situation, one that closely resembles the slow demise of the British and Roman global powers, we would do well to heed Julian Corbett's remarks about the intrinsic advantage of sea control during the waning years of Britain's global preeminence: "Yet the fact remains that all the great continental masters of war have feared or valued British intervention . . . because they looked for its effects rather in the threat than in the performance. . . . Its operative action was that it threatened positive results unless it were strongly met."¹³ Just as sea control and power projection proved critical for Britain, so is LRS valuable for today's leading nations. Global actors such as China, Russia, and India recognize LRS's strategic value, considering it imperative to a successful national security strategy. These rising global competitors, especially China and Russia, seek to obtain or develop their own LRS and to cultivate antiaccess and area denial capabilities to diminish the enduring strategic advantage of the United States. For example, China has fielded over 1,000 short- and medium-range missiles, multiple double-digit Russian-made surface-to-air missile systems, and a dozen Russian *Kilo*-class submarines capable of launching the Sizzler cruise missile.¹⁴ China's DF-21 ballistic missile, boasting a range of approximately 1,500 miles, can reach US bases in Korea, Japan, the Philippines, and Thailand.¹⁵ The Chinese also developed the H-6K aircraft, having a 2,000-mile combat radius and carrying six CJ-10 cruise missiles, which can strike US installations in Guam, Wake Island, and Australia.¹⁶ China continues to add to its stockpiles each year, creating a lethal engagement zone for US fighter and bomber crews well outside the first island chain.¹⁷ Without an authentic LRS capability, the United States will become more reliant on other global basing options to project forcible power at shorter ranges. These basing options, however, will pose a substantial risk to US and allied forces.

Over the past half century, the United States has become accustomed to fighting for objectives in relatively permissive operating environments with virtually unlimited access to worldwide basing—two advantages that may not continue into the future. The likely strategic environment of global uncertainty that faces us will be marked by religious extremism and nationalism, resulting in regional instability. The proliferation of ballistic missiles and advanced integrated air defense systems (IADS) that protect mobile, hardened, multidimensional, and asymmetrical enemies will further complicate this environment. Separately, the United States is experiencing unprecedented financial pressures, dwindling industrial might, and an aging, shrinking military infrastructure. In addition, the safety and security of previously unassailable forward operating locations and communications networks are in doubt. As we regroup outside the growing threat envelopes, investing in LRS technology, developing associated intellectual capital, honing technical industrial skills, and sustaining LRS operational prowess are essential to preserving our deterrence and maintaining a strategic advantage. Assuming that global basing options decline, the absence of updated LRS will restrict the United States' freedom of movement and maneuver.

With the loss of dependable global basing options, the factors of space and time create a tyranny of distance that requires a long-range solution to the power-projection problem. LRS solutions, then, must include a combination of seven essential elements: range, speed, payload, flexibility, precision, survivability, and persistence.¹⁸ Although labeled by some critics as a repetition of Cold War clichés, the “new triad” still provides a valuable threat of violence required for today’s successful deterrence strategies. Whether it calls on tanker-supported intercontinental bombers with sufficient range, payload, precision, and flexibility; submarine forces offering payload, persistence, and survivability; or ICBMs maintaining payload, speed, persistence, and survivability, the United States can still hold an enemy’s most valued resources at risk and send the strategic messaging necessary for current-day international relations. Notwithstanding the Cold War effectiveness of

LRS, our LRS forces confront a much more complicated threat environment and must remain much more flexible. The United States must be able to engage flexibly or hold at risk targets anywhere in the world with conventional or nuclear payloads. Those LRS capabilities will need to act against either very precise or ambiguous coordinates in pursuit of a variety of military and political objectives. This important change in the characteristics of future conflicts calls for the modernization of LRS strike assets. These operations will necessitate more responsive space assets and intelligence, surveillance, and reconnaissance aircraft with penetration capability supported by electronic attack or other standoff weapons capable of degrading a modern IADS. The development and sustainment of LRS systems are critical to retaining the US strategic advantage.

Conclusion

The fundamental value of wielding a credible, flexible, survivable, and visible demonstration of military power to realize national objectives has not changed. The strength of the American military is based on its ability to project long-range conventional and nuclear power across the globe at a time and place of its choosing. That prowess has remained a key component of our successful deterrent posture for more than 70 years. Many forms of global power exist (e.g., economic influence, diplomatic engagement, strategic communication), but only the United States currently maintains a legitimate capacity for persistent, precise, long-range global strike. Historically, however, great powers tend to believe that the sources of power will remain valid forever, even though they fail to make the requisite investments to maintain them. Without a concerted focus on LRS as a key component of the military instrument, our influence on global events will undoubtedly prove this axiom true. LRS gives America the military strategic advantage necessary to remain a preeminent global power. In the early 1980s, President Ronald Reagan confronted the same growing concerns (fiscal constraints and a declining military) as he challenged the

American people to make the difficult choice to secure the country against a rising Soviet threat. President Reagan rightly said, “We maintain the peace through our strength; weakness only invites aggression. This strategy of deterrence has not changed. It still works.”¹⁹ History has proven him correct. As we balance complex rising threats while holding debates about the country’s fiscal future, we can say once again, “Now is a time for choosing.” As long as we retain our LRS capabilities and our strategic military advantage, we can remain a preeminent global power. To do otherwise would expose us to the same decline in influence experienced by the British as their naval power projection diminished during the economic hard times of the mid-twentieth century. ✪

Notes

1. LRS encompasses the family of platforms, weapons, or systems that operate at long range with relative speed to employ precision payloads. See Robert P. Haffa Jr. and Michael W. Isherwood, “Long Range Conventional Strike: A Joint Family of Systems,” *Joint Force Quarterly* 60 (1st Quarter 2011): 102–7, http://www.ndu.edu/press/lib/images/jfq-60/JFQ_60_102-107-Haffa-Isherwood.pdf. *Strategic attack* refers to those operations intended to produce strategic effects by striking directly at the enemy’s centers of gravity. These operations are designed to achieve their objectives without first having to directly engage the adversary’s fielded military forces in extended operations at the operational and tactical levels of war. See Air Force Doctrine Document 3-70, *Strategic Attack*, 12 June 2007, <http://www.e-publishing.af.mil/shared/media/epubs/AFDD3-70.pdf>.
2. J. C. Wylie, *Military Strategy: A General Theory of Power Control* (New Brunswick, NJ: Rutgers University Press, 1967), 151, 89.
3. Thomas C. Schelling, *Arms and Influence* (New Haven, CT: Yale University Press, 2008), 3.
4. Frederick S. Dunn et al., *The Absolute Weapon: Atomic Power and World Order*, ed. Bernard Brodie (New Haven, CT: Yale University Press, 1946), 76.
5. See Nina Tannenwald, “Nuclear Weapons and the Vietnam War,” *Journal of Strategic Studies* 29, no. 4 (August 2006): 675–722, http://www.watsoninstitute.org/pub/vietnam_weapons.pdf.
6. *Decisive point* refers to “a geographic location or source of military or nonmilitary power whose destruction or capture, control or defense, or continuous surveillance and monitoring would give an immediate and marked advantage over the opponent in accomplishing one’s military objective.” Milan N. Vego, *Joint Operational Warfare: Theory and Practice* (Newport, RI: US Naval War College, 2009), IV-61. A *center of gravity* is “a source of

massed strength—physical or moral—or a source of leverage whose serious degradation, dislocation, neutralization, or destruction would have the *most decisive impact* on the enemy's or one's own ability to accomplish a given political/military objective" (emphasis in original) (*ibid.*, VII-13).

7. Col Edgar S. Gorrell, *The U.S. Air Service in World War I*, vol. 1, *The Final Report*, ed. Maurer Maurer (Washington, DC: Office of Air Force History, Headquarters USAF, 1978).

8. Maj Scott D. West, *Warden and the Air Corps Tactical School: Déjà Vu?* (Maxwell AFB, AL: Air University Press, 1999), 17–20, <http://www.au.af.mil/au/awc/awcgate/saas/west.pdf>.

9. Alan J. Levine, *The Strategic Bombing of Germany, 1940–1945* (New York: Praeger, 1992), 16–17.

10. *Ibid.*

11. Joint Publication 1-02, *Department of Defense Dictionary of Military and Associated Terms*, 8 November 2010 (as amended through 15 January 2012), 96, http://www.dtic.mil/doctrine/new_pubs/jp1_02.pdf.

12. Mark A. Gunzinger, *Sustaining America's Strategic Advantage in Long-Range Strike* (Washington, DC: Center for Strategic and Budgetary Assessments, 2010), [ix], <http://www.csbaonline.org/wp-content/uploads/2010/09/2010.09.14-Sustaining-Americas-Strategic-Advantage-in-Long-Range-Strike.pdf>.

13. Sir Julian Stafford Corbett, *Some Principles of Maritime Strategy* (London: Longmans, Green and Co., 1918), 57.

14. Haffa and Isherwood, "Long Range Conventional Strike," 103.

15. *Ibid.*

16. *Ibid.*

17. *Ibid.*

18. Rebecca Grant, *Return of the Bomber: The Future of Long-Range Strike*, Air Force Association Special Report (Arlington, VA: Air Force Association, 2007), 21–24, <http://www.afa.org/Mitchell/Reports/0207bombers.pdf>.

19. President Ronald Reagan, "Address to the Nation on Defense and National Security," 23 March 1983, Ronald Reagan Presidential Library, accessed 22 February 2012, <http://www.reagan.utexas.edu/archives/speeches/1983/32383d.htm>.



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