

Operational Concepts and Military Strength

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What are operational concepts, and how do they contribute to military strength? Essentially, operational concepts are generic schemes of maneuver. They provide the conceptual basis for operational planning and influence the design and employment of military forces. We can think of a military force as a specific slice of military strength. A party's military strength is, in other words, the aggregate of its military forces. Operational concepts provide a way to convert military strength into military power: the ability to employ military force where and when we want to employ it.

Military power is, of course, relative; it depends as much on our own capabilities as it does on those of our rivals. An Air Force that cannot penetrate an opponent's air defenses, for example, does not offer much in the way of genuine military power. Operational concepts can tilt the balance (or imbalance) in our favor by creating a functional or employment advantage, and the magnitude of that advantage can mean the difference between success and failure. Operational concepts can be tacit or explicit, planned or emergent. As generic schemes of maneuver, they link "ends" to "means" in military strategy and generally serve as the glue that holds it together.

At the same time, operational concepts have significant downsides. Specifically:

- They usually are poorly defined in military doctrine or shrouded in jargon, which in turn leads to confusion.
- The process by which they are developed is decidedly subjective. Despite many and varied efforts to make that process more objective, it invariably reflects service biases and preferences. That influence can be a virtue or a vice; often, it is a combination of both.
- While operational concepts clearly enable the exercise of military power, they also surely hinder it. This is true mainly because turning an operational concept into doctrine requires a broad and sustained commitment or buy-in, which in turn means opportunity costs in the form of exploring other ideas. This is especially the case with successful concepts such as AirLand Battle, which can breed complacency.

Operational Concepts in Joint Doctrine

The U.S. military's definition of an operational concept can be found in the Joint Chiefs of Staff's Joint Publication 1 (JP-1), the current version of which states:

Joint concepts examine military problems and propose solutions describing how the joint force, using military art and science, may

operate to achieve strategic goals within the anticipated future security environment. Joint concepts lead to military capabilities, both non-materiel and materiel, that significantly improve the ability of the joint force to overcome future challenges.¹

Unfortunately, this definition tells us what an operational concept does, not what it is. The failure to define something occurs frequently in U.S. military doctrine and stems from the dogmatic overuse of the active voice and a misplaced aversion to the verb “to be.” It amounts to a failure to communicate that undermines the chief purpose of doctrine, which is to establish a baseline for how the U.S. military operates. Such an understanding benefits not only all of the services, but also our allies and strategic partners. Achieving that purpose requires defining what things are, not just what they do.

Despite these definitional shortcomings, JP-1 does provide useful information about how the U.S. military develops its operational concepts. The purpose of such concepts is to propose “solutions to compelling, real-world challenges both current and envisioned.”² Operational concepts must offer “clear alternative[s]” to existing doctrine or capabilities and “demonstrate evidence of significant operational value relative to the challenges under consideration.” They are to be “idea-focused” and thus not “constrained by existing policies, treaties, laws, or technology.”³ Each concept is to be developed “collaboratively” with the participation of all U.S. military services and evaluated “rigorously” in war games, workshops, and other forums to identify its strengths and weaknesses and to ensure that it actually solves the specified problem.⁴

The evaluation process (Joint Concept Development Process) consists of five phases or steps: prospectus development, concept research and writing, concept evaluation, coordination and approval, and implementation.⁵ Once an operational concept is approved, which can take between 18 and 24 months, it is then fed into the “Joint Force Development Life Cycle.”⁶ The purpose of this cycle is to

identify any changes in military doctrine, professional education and training, and equipment required by the new concept. Once operational concepts have passed through the joint development life cycle, they become the overarching “ways” that link “ends” and “means” within the framework of contemporary military strategy.

Today, military strategy is typically thought of in terms of four critical variables: ends or objectives (what we want to achieve); ways or courses of action (how we propose to achieve it); means or resources (what we can reasonably make available); and risk (our assessment of the probability of success).⁷ As generic ways to influence force structure and design, operational concepts can also affect the level of risk, both favorably and unfavorably.

However, there are notable pitfalls in this process. For instance, stripping away political constraints may allow for maximum intellectual creativity, but it also creates an artificial environment wherein policies can be set aside, which in turn leads to operational approaches divorced from the most important kind of real-world challenges: policy constraints. This particular pitfall seems all the more egregious given how the U.S. military’s experiences in Afghanistan and Iraq have revealed the necessity for greater interagency coordination, or a “Whole of Government Approach.”⁸ Would it not be better to acknowledge political realities, perhaps as both constraints and opportunities, at the outset and then develop an operational concept within them and with full interagency participation?

Moreover, while operational concepts can pinpoint the need for new military hardware, they can also be reverse-engineered to justify developing or retaining preferred pieces of equipment or force structure. Because operational concepts influence force structure and military strategy, the stakes are high for each service, which in turn makes cross-service collaboration and objective evaluation that much more difficult. As a consequence, the process of concept development can devolve into a form of horse-trading, with one service

supporting another in return for an endorsement of its own concept later. The result might be a concept that simply avoids making the hard choices.

An example of a concept that avoided hard choices was *Joint Vision 2010*⁹ and its successor *Joint Vision 2020*.¹⁰ It essentially permitted each of the services to continue to develop its own suite of capabilities under the umbrella concept of Full Spectrum Operations. These capabilities—Dominant Maneuver, Precision Engagement, Focused Logistics, Full-Dimensional Protection—put a “mark on the wall” but ultimately meant business as usual for each of the services.¹¹

Operational Concepts in Practice

Given the vulnerabilities in the Joint Concept Development Process, it should not be surprising that our track record has been mixed. Some concepts, like AirLand Battle,¹² have proved successful; others, such as Effects-Based Operations,¹³ have failed; and still others, such as Air-Sea Battle,¹⁴ are under development.

AirLand Battle. AirLand Battle, one of the most prominent examples of a successful operational concept, was true to most of the criteria specified in joint doctrine. In 1982, AirLand Battle became the foundation for U.S. military doctrine.¹⁵ It also served as one of the principal “ways” in the West’s military strategy of deterrence during the Cold War, which in turn supported its grand strategy of containment. Although it was never tested against the Warsaw Pact, it was the basis for the operational plan that defeated the Iraqi army in Operation Desert Storm in 1991. AirLand Battle provided a blueprint, a generic scheme of maneuver, for how air and ground forces should operate to stop and ultimately destroy a Soviet-style attack in Central Europe.¹⁶

The compelling, real-world problem that the concept addressed was how to defeat a numerically superior foe while avoiding a costly war of attrition in a highly lethal environment, particularly one that might include nuclear and chemical weapons.

The answer was to put a premium on quality: highly trained troops with better morale, armed with superior weapons, and able to shoot, move, and communicate more efficiently than their foes. Maintaining mobility and a high tempo of operations was essential, as was striking at vital elements beyond the first echelon of the enemy force. Armored and mechanized formations were to block and channel the first echelon of an enemy’s advance, while attack helicopters and fixed wing aircraft were to strike along the enemy’s flanks and concentrate on destroying the command-and-control elements in its second and third echelons.

The key methodological innovation, therefore, was attacking in a synchronized manner throughout the depth of the “extended battlefield.”¹⁷ That, in turn, meant tying the distance between each echelon to the time available to act, all of which was based on a doctrinal template of how the Soviets should attack. Had the Warsaw Pact been able to deviate from that template in any significant way, which was considered highly unlikely, AirLand Battle would have become unhinged, though it might not necessarily have failed outright.

AirLand Battle profoundly influenced the Army’s operational doctrine. It propelled the operational level of war from a matter of debate to an item of doctrine, and it converted Clausewitz’s theory of “center of gravity”¹⁸ and the concentration of superior combat power against it.¹⁹ It also reinforced the need for new land-power requirements: the M1 Abrams Tank, Bradley Fighting Vehicle, Patriot Antiaircraft System, Apache Attack Helicopter, and Blackhawk Utility Helicopter, which became known as the “Big Five.”²⁰ These systems, it bears noting, were still outnumbered by the Soviets’ “Big 7” (T-72 Tank, BMP Amphibious Assault Vehicle, ZSU-23/4 Anti-Aircraft System, Hind-D Helicopter, 152mm SP Gun, 122mm SP Gun, and SA-3 Surface-to-Air Weapon) but were considered more than a match qualitatively.²¹

AirLand Battle also had the advantage of replacing an unpopular, short-lived, and

perhaps dubious concept called Active Defense.²² This concept embraced rather than eschewed attrition—withdrawing just ahead of the Soviet advance, forcing it to deploy, attriting it while it did so, and withdrawing again before becoming decisively engaged. It was less about trading space for time than it was about achieving favorable exchange ratios (better than 3:1) on a relentless basis. As its critics noted, however, it aimed more at avoiding defeat than winning in a manner that might give political leaders something to bargain with at the negotiating table.

Collaboration between the U.S. Army and U.S. Air Force in the development of AirLand Battle was extensive, if fraught with friction.²³ The U.S. Navy was involved only tangentially, since it already had a major mission, detailed in the 1986 *Maritime Strategy*: to protect sea lines of communication and supply across the Atlantic Ocean and the Mediterranean Sea, to provide supporting air cover where possible over Western and Central Europe, and to maintain the ability of its submarine fleets and carrier battle groups to strike targets inside the Soviet Union.²⁴ The Navy's mission clearly supported deterrence in Western Europe and containment, and because its service equities were not threatened, it had no reason to obstruct the development of AirLand Battle.²⁵

AirLand Battle was not without its opportunity costs. Those came in the form of “military operations other than war” (MOOTW, or missions ranging from shows of force to humanitarian assistance), which were treated as “lesser included.”²⁶ However, not all such operations could be treated as miniature AirLand Battles. Some examples were the interventions in El Salvador (1979–1991) and Colombia (1978–2011); the aborted rescue operation in Iran (1980); the interventions in Grenada (1983) and Panama (1989); and the humanitarian assistance operation in Somalia (1992–1994). From this sample, the United States might claim four “wins” and two “losses,” or a 66 percent success rate—simply not good enough.²⁷

Effects-Based Operations. In contrast to AirLand Battle, Effects-Based Operations (EBO) did threaten service equities: specifically, those of the Army and Marine Corps. EBO was officially defined as a “process for obtaining a desired strategic outcome or ‘effect’ on the enemy through the synergistic, multiplicative, and cumulative application of the full range of military and other national capabilities at the tactical, operational, and strategic levels.”²⁸ In short, it was to afford policymakers a menu of “effects” from which they might choose the one they desired.

EBO belonged to an umbrella concept referred to as Network-Centric Warfare, credit for which belongs chiefly to the late Admiral Arthur K. Cebrowski of the U.S. Office of Force Transformation.²⁹ It did not respond to a specific real-world challenge, but rather attempted to leverage information technology in a manner that would make warfare more precise, less costly, and ultimately more useful as an instrument of policy.

Coalition forces attempted a version of EBO during the Kosovo conflict in 1999 and in the early stages of the campaigns in Afghanistan and Iraq. While destruction of matériel and disruption of infrastructure and communications were readily accomplished, effects beyond these accomplishments remained elusive. In 2008, the U.S. Joint Forces Commander, U.S. Marine Corps General James Mattis, shelved the concept for being inimical to war's unpredictable nature.³⁰ By then, however, EBO and NATO's counterpart EBAO (Effects-Based Approach to Operations) were already integrated into several nations' operational doctrines.

As happened with AirLand Battle, the West's experiments with EBO led to significant opportunity costs in terms of exploring other concepts. In theory, EBO could be employed broadly across the diplomatic, informational, military, and economic (DIME) dimensions of national power; in practice, it was applied only to a narrow segment of the spectrum of operations, a segment in which the U.S. military already excelled. The other

agencies within the U.S. government failed to embrace it.

Consequently, EBO amounted to a refinement of military operations in a single portion of the spectrum of conflict; not unlike AirLand Battle, it proved ill-suited to humanitarian assistance or similar operations requiring physical control and human presence and interaction: in other words, shoes as well as boots on the ground.³¹ Put differently, if the post-Cold War security environment was really characterized by unprecedented uncertainty, as many claimed, it would have been wiser to develop a broad array of capabilities and ways of thinking to avoid what historian Sir Michael Howard famously referred to as “being too badly wrong.”³²

Air-Sea Battle. Although EBO was shelved, it was by no means dead. Its principles resurfaced in the concept of Air-Sea Battle, which was unveiled (perhaps prematurely) in 2010. Air-Sea Battle generated controversy almost immediately, but it did respond to a specific real-world challenge. The version unveiled in 2010 was a “point-of-departure” concept designed to address China’s growing anti-access/area-denial (A2/AD) capabilities along the Pacific Rim. As its authors explained:

These capabilities threaten to make US power projection increasingly risky and, in some cases and contexts, prohibitively costly. If this occurs, the United States will find itself effectively locked out of an area that has been declared a vital strategic interest by every administration for the last sixty years.³³

The U.S. military already had a doctrine for conducting “forcible entry” operations, which was barely two years old, but it applied mainly to the kinetic use of force in time of war.³⁴ It did not address the larger strategic goal of maintaining a “favorable conventional military balance throughout the Western Pacific region” with the ability to “deter China from acts of aggression or coercion in the region.”³⁵ Thus, the problem posed by the People’s Liberation Army’s growing A2/AD capabilities was (and remains) a compelling real-world challenge

worthy of a revised operational concept—provided that concept also addresses how to augment military capabilities with other forms of power in order to gain more deterrence value. The unclassified versions of Air-Sea Battle have not yet addressed this issue.

In addition, several failures related to insular thinking and timing undercut Air-Sea Battle. The concept’s authors did not adequately incorporate Army and Marine Corps equities into its development. That *faux pas* was later corrected, at least partially, when Air-Sea Battle was subordinated to the Joint Operational Access Concept (JOAC), which took a more service-integrated approach to solving the access problem.³⁶ Nonetheless, it was an egregious error of omission at a time when rumors of significant downsizing across the Department of Defense (DOD) were gaining momentum.

The lack of full cross-service integration led senior Army and Marine Corps leaders to believe that their services were to be the “bill-payers” for the “Pacific Rebalance” and for implementing Air-Sea Battle. It is little wonder, then, that the concept was greeted with such hostility.

Second, although its authors took pains to explain that Air-Sea Battle was not about “containing” or “rolling back” China, but rather about “offsetting the PLA’s unprovoked and unwarranted military buildup,” it did not play that way in the media.³⁷ Critics reacted sharply, claiming that Air-Sea Battle was a poor substitute for a military strategy (which, however, it was not intended to be) and that it would likely provoke China precisely when the United States wanted to avoid doing so. As official documents tried to make clear, Air-Sea Battle was not intended to function in isolation, but to be combined with “security assistance programs, and other whole-of-government efforts.”³⁸ It signaled a commitment by the United States to maintain an “escalation advantage” in conflict while sustaining “security and prosperity” in peacetime.³⁹

The central idea of Air-Sea Battle in its unclassified form is “to develop networked,

integrated forces capable of attack-in-depth to disrupt, destroy, and defeat adversary forces.”⁴⁰ In this regard, it shows the influence of network-centric operations, a concept first advanced in the 1990s as part of a DOD-wide effort to capitalize on the revolution in military affairs (RMA).

- A “networked” force is one in which command and control can be exercised instantaneously across service-specific barriers or protocols not only through technological means, but also through “habitual relationships across service, component, and domain lines.”⁴¹
- The notion of an “integrated” force goes beyond the traditional idea of task-organizing for a mission; instead, units are to be “pre-integrated” with regard to joint and combined training and procedures well before arriving in theater and, ideally, in terms of material management, thereby ensuring interoperability and minimal redundancy.
- The ability to “attack-in-depth” refers to the use of kinetic and non-kinetic means in the form of offensive and defensive fire and movement to accomplish one of three outcomes or some combination of them: disrupting an adversary’s “effects chains” (the opponent’s process of finding, fixing, tracking, targeting, engaging, and assessing) by impeding command and control and the flow of information; destroying A2/AD platforms and systems; and defeating weapons and formations “post-launch.”⁴² Attack-in-depth thus reflects the influence of the ideas that underpinned EBO, though the term itself is avoided.

In fairness, Air-Sea Battle was exactly what it claimed to be: a single answer to a specific operational challenge. While that challenge is not new, the relentless advance of technology is making it more difficult. The concept placed

a very high, perhaps idealistic “mark on the wall” with regard to the level of capabilities and competencies necessary to execute it. It is still under development as part of the Joint Operational Access Implementation Plan.⁴³

In the interim, the JOAC serves as the doctrinal concept for the U.S. military’s working solution to the contemporary A2/AD challenge. In brief, the JOAC says we can project force in an A2/AD environment by using “cross-domain synergy” to achieve superiority in specific domains, which will then lead to a certain amount of “freedom of action.”⁴⁴ Interestingly, the tone is reminiscent of the optimism that characterized military theory on the eve of World War I, which proposed using firepower superiority to overcome the anticipated strength of the defense.

Emergent Concepts

Some operational concepts are emergent. These concepts develop not in anticipation of future problems, but as responses to challenges that arise during a conflict.

An example occurred most recently in the campaigns in Iraq and Afghanistan with the emergence of U.S. counterinsurgency doctrine. The doctrine was not new; rather, it was a rediscovery of previously accepted principles. Both the Army and Marine Corps already had a substantial number of official publications addressing guerrilla warfare and insurgencies,⁴⁵ but that doctrine had all but faded from institutional memory, partly because of the residual influence of AirLand Battle and partly because of the enthusiasm with which the Office of the Secretary of Defense pushed its technology-based transformation program in the 1990s. It thus had to be rediscovered and updated.

When enemy fighters shifted to insurgent techniques, therefore, many Coalition formations had to adapt without the benefit of either explicit or tacit operational concepts. Nonetheless, some American units were employing counterinsurgency techniques by 2004 and 2005, well before official U.S. counterinsurgency doctrine appeared.⁴⁶ Several

scholars described this adaptation as a revolution from the top down, while others portrayed it as coming from the “bottom-up.”⁴⁷

In truth, it was neither. The emergence of counterinsurgency techniques came into play more or less from a “sideways” direction, or laterally, through mid-level officers and noncommissioned officers who exercised reach-back capabilities and consulted with civilian experts and with each other to exchange information and share knowledge about what worked and what did not. Many counterinsurgency principles and practices (as well as healthy criticism of them) emerged through sheer trial and error and through the common sense (or experienced judgment) of brigade and battalion commanders.

Official U.S. counterinsurgency doctrine, when it did appear, helped to codify and standardize—that is, render explicit—many of the procedures that were already in play, albeit unevenly and perhaps even poorly in some cases, and augmented them with others. It also situated such practices within a generic scheme of maneuver, which in turn rationalized them. The various stances in the counterinsurgency debate are well known and need not be addressed here.⁴⁸

The U.S. military’s rediscovery of counterinsurgency techniques was part of the process of adaptation that occurs relentlessly in wartime. Adaptation is simply how we cope with a situation or an adversary; in contrast, innovation is how we overcome one or the other—or, in some instances, both.⁴⁹

Conclusion

As we have seen, operational concepts are integral to military strength. They help to convert potential military strength into military power, an unquestionably essential function. However, they also have significant downsides. In part, these downsides stem from the processes by which operational concepts are developed. As JP-1 revealed,

operational concepts are to be developed in a manner that affords a maximum amount of intellectual creativity. Paradoxically, this approach is also what makes operational concepts—whether AirLand Battle, Effects-Based Operations, Air-Sea Battle, or counterinsurgency doctrine—vulnerable.

In theory, each service should know best what it needs to be able to operate in the future security environment. In practice, however, what the services know is sometimes exquisitely irrelevant to the needs of policymakers. Armed conflict can have the effect of forcing policymakers and military professionals outside of their comfort zones. That, in short, is what led to the emergence of counterinsurgency as an operational concept; it was an answer of sorts, however flawed, to a situation that the concept development process, and all of its attendant evaluation and war-gaming, ought to have anticipated and yet did not.

The evaluation part of the process ought to force political and military leaders outside of their comfort zones long before the fighting starts. Otherwise, we are engaging in a tautology in which our operational concepts are designed to fight the abstract battles we like instead of the real wars we do not like. The bitter irony is that sometimes the tautology works. Operation Iraqi Freedom was the real war that suited the abstract battle. We would do well to remember, though, that such victories will offer little comfort when the opportunity costs of our tautology come due.

What about the future? Events in Eastern Europe and East Asia suggest that there is a need for an operational concept capable of exerting better deterrent and coercive leverage. Might we see some form of an intellectual blend—a maneuver-oriented concept that can coerce, married to an A2/AD concept that can deter? Certainly, the real-world challenge is there.

Endnotes:

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46. U.S. Department of the Army, Field Manual 3-24/Marine Corps Warfighting Publication 3-33.5, *Counterinsurgency*, December 2006, <http://usacac.army.mil/cac2/Repository/Materials/COIN-FM3-24.pdf> (accessed July 1, 2016).

47. David Ucko argues the former view, and James Russell and Chad Serena make a case for the latter position. See David H. Ucko, *The New Counterinsurgency Era: Transforming the U.S. Military for Modern Wars* (Washington: Georgetown University Press, 2009); James A. Russell, *Innovation, Transformation, and War: Counterinsurgency Operations in Anbar and Ninewa Provinces, Iraq, 2005–2007* (Stanford, CA: Stanford University Press, 2010); and Chad C. Serena, *A Revolution in Military Adaptation: The US Army in the Iraq War* (Washington: Georgetown University Press, 2011).
48. For more on the debate, one might start with Fred Kaplan, *The Insurgents: David Petraeus and the Plot to Change the American Way of War* (New York: Simon & Schuster, 2013), and Douglas Porch, *Counterinsurgency: Exposing the Myths of the New Way of War* (New York: Cambridge University Press, 2013).
49. For recent contributions to the debates over adaptation and innovation, see Theo Farrell, Frans Osinga, and James Russell, eds., *Military Adaptation in Afghanistan* (Stanford, CA: Stanford University Press, 2013), and Williamson Murray, *Military Adaptation in War: With Fear of Change* (New York: Cambridge University Press, 2011).