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Design, Mission Command and the Network: Enabling Organizational Adaptation

Todd A. Schmidt

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**Design, Mission Command and the Network:
Enabling Organizational Adaptation**

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The Institute of Land Warfare
ASSOCIATION OF THE UNITED STATES ARMY

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LAND WARFARE PAPER NO. 97, August 2013

Design, Mission Command and the Network:

Enabling Organizational Adaptation

by Todd A. Schmidt

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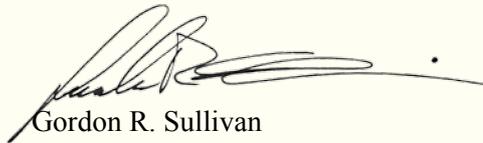
Foreword

For more than two decades, U.S. Army leaders have worked to define and utilize the potential power lent to the military by the advances in information technology. As innovation in this field is ongoing, says the author of this paper, the Army has yet to grasp the specific nature of the challenges it will face and the optimal method of responding to those challenges in the coming decades. It must build an ability to adapt to these unknown future circumstances.

With this end in mind, the Army has adopted an overarching concept—Army Design Methodology—to help its leaders understand the environments and problems they will face in the future. It has also adopted the philosophy of Mission Command to provide the underlying fundamentals of how best to enter into conflict with future adversaries and the imminent accompanying challenges that will require continual reassessment and adaptation.

The changing nature of the future operational environment is most clearly manifested in the world of cyberspace, a world difficult to define because of its constant evolution. It is not easy to face an unknown enemy or to fully and efficiently utilize an unknown tool. According to this author, it is with a union of the cyberspace network, Army Design Methodology and Mission Command that the Army will be capable of moving forward with the greatest success.

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19 August 2013

Design, Mission Command and the Network: Enabling Organizational Adaptation

Introduction

Since the end of the Cold War, the military has had a simmering discussion regarding the military potential of the “Information Age,” emerging technology and innovation and the nature of the future operational environment (FOE).¹ More than two decades later, despite what some may think, civilization is still in the infant stages of the Information Age. Although much great intellectual effort has been and continues to be invested in forecasting and building a strategic and operational approach to the challenges ahead, the potentials remain vast and unknown for how the Army will fight in the decades ahead, as well as the hybrid nature of the challenges and threats our nation will face. The question looming over the United States Army centers on its ability to adapt to this great unknown.

In an effort to evolve and adapt with the FOE, the Army has adopted an overarching concept, forged in the fires of a decade in combat, to help leaders better understand the strategic, operational and tactical environment and problems they will face in the FOE, as well as a fundamental philosophy undergirding how they fight. The concept and philosophy are the Army Design Methodology and Mission Command, respectively.² Army Design Methodology and Mission Command share two imperative principles—creating shared understanding and providing clear commander’s intent. A major impetus behind design theory and Mission Command, however, is an FOE that is described as being fraught with emerging systems that are multidimensional, offering interdependent problems and challenges that possess qualities of subtle, counterintuitive and layered causality. As it has been described so many times, the FOE is complex, nonlinear and chaotic, requiring continual reassessment and adaptation.

Army Design Methodology, a continuous process led by the commander, enables the ability to take data, information and knowledge about a given environment and penetrate the interdependent complexities of strategic, operational and tactical variables inherent in unfamiliar problems to better create and construct a conceptual framework, common understanding and operational approach to the challenges to be confronted, as well as the commander’s overall intent in achieving a desired endstate.

Directly related to Army Design Methodology is the philosophy of Mission Command. Mission Command works under the premise of creating a shared understanding of the

operational environment while empowering and enabling disciplined initiative to be taken by agile and adaptive leaders in the conduct of unified land operations and decisive action. Mission Command requires disciplined, well-trained units led by vigilant leaders imbued with creativity and an unfailing intellectual curiosity and desire to learn.

As the Army endeavors to peer into the “deep future” of conflict, it must be prepared to engage across multiple domains simultaneously. Of particular importance for the future is the cyber domain, commonly referred to as “cyberspace,” and the network of networks that is its virtual matrix. This is cause for debate and disagreement as the military works to doctrinally define and figure out what all this means. For instance, the military is challenged in defining exactly what “the network” actually is. Is it a synonym for cyberspace? Is it a separate and unique domain? Or are networks cyber versions of ecosystems that exist within cyberspace? Do networks enable the development and deployment of cyber weapons or can they be used as weapons themselves?

For the present, the network is the system of telecommunications links, technologies and capabilities that facilitate command, control, communications, information sharing, data analysis, collaborative effort, situational awareness, synchronization and integration across the force. The network provides an enabling capability that, as technology continues to develop, can and will be fundamental to truly operationalizing the full potential of Army Design Methodology and Mission Command. The linkage between Army Design Methodology, Mission Command and the network is necessary for a greater end, however—achieving organizational adaptation and continuous strategic, operational and tactical advantage.

The challenge to the Army is to understand the capabilities and limitations of this trinity in the present and how to fully realize its potential to enable continuous organizational adaptation and advantage over adversaries in an FOE that the defense establishment cannot yet entirely and accurately understand, visualize, describe and forecast. Before attempting to understand the potential synergy behind a marriage of Army Design Methodology, Mission Command and the network, however, it is imperative to understand some of the history and evolution of ideas that underpin each of these concepts.

Evolution of Ideas

In an effort to ensure future success and relevance, the Army, at the end of 2012, published its *Army Capstone Concept (ACC)*. The *ACC* sets an azimuth into the future and lays a course for the Army as it moves towards the FOE. The pamphlet, nested with joint doctrine, serves as the foundational document of the Army’s conceptual framework and strategic approach to the FOE. It describes the anticipated FOE and the roles, responsibilities and capabilities the Army, as part of the joint force, will be required to fulfill and provide in order to maintain a position of continuous advantage over potential adversaries. It outlines how the Army will allocate and manage its limited resources to achieve an evolution from its current state to a desired future state—a vision of preventing conflict, shaping the environment and winning the nation’s wars.³

The *ACC* offers a solution for the Army to achieve its vision. In summary, the *ACC* advocates for an institutional and operating force consisting of organizations, leaders, Soldiers, and civilians trained and educated, exhibiting and imbued with the principle of “operational adaptability.”⁴ But where does this concept of “adaptability”—organizational, individual, operational or otherwise—come from? How does the Army get it, gain it or know that it has it?

Ideas Behind Army Design

Following World War II, as American industry continued to grow and develop, business leaders sought to stay on the cutting edge, always one step ahead of the competition. Many principles—used then and today to understand burgeoning companies and the challenges they face—came from renowned social psychologist Dr. Kurt Lewin at the Massachusetts Institute of Technology’s (MIT’s) Research Center for Group Dynamics and his groundbreaking research in social and organizational psychology in the 1950s. Dr. Lewin postulated that organizational transformation is a continual process of understanding, planning, taking action and assessing results that provide feedback for future advantageous change. This theoretically unending process results in continuous adaptation, competitiveness and improvement.⁵ The principles underpinning Lewin’s findings bear a striking resemblance to the Army’s current Design Methodology. Key elements that enable organizational adaptation include understanding the environment, understanding the problem or challenge facing the organization and constructing an approach to the problem. Also fundamental to this adaptation process, as Lewin found, are organizational leadership and culture. Organizations must have the leadership and culture that nurture, foster and enable continuous reexamination and reassessment of a fluid and changing environment, as well as enabling and empowering ideas and initiatives that bring about successful adaptation, relevance and advantage in relationship to the environment and competition.⁶

In the context of the U.S. Army, study of design methodology and organizational adaptation provides leaders with insight into how the Army can remain competitive, relevant and viable in the face of the FOE. It is a continuous intellectual process that calls for and requires leaders with a trained, educated and disciplined intellectual curiosity and capability. For decades, Army doctrine consistently and routinely emphasized the importance of adaptability in the face of uncertainty, whether at the individual–tactical level or the organizational–strategic level. The Army’s keystone warfighting manual of the 1980s, Field Manual 100–5, *Operations*, clearly indicates that the Army’s doctrine, organization, strategy and tactics “must be adapted to a fluid, global environment.”⁷ The Army’s 1990s doctrine on leadership, Field Manual 22–100, *Army Leadership*, describes “the ability to adapt” in an ever-changing environment as an imperative that “will carry the day.”⁸ The current *Army Capstone Concept*’s central theme relates directly to “adaptability,” calling it the fundamental characteristic required to decisively execute its core competencies and missions.⁹

Political scientist Dr. Chad Serena, author of *A Revolution in Military Adaptation: The U.S. Army in Iraq*, recently wrote,

The Army’s capacity to adapt to changing operational environments and adaptive threats is fundamental to achieving organizational success. . . . Regardless of the nature of the threat faced . . . the Army will have to adapt. As an organization, the Army adapts as events, circumstances, and organizational missions change and evolve. For any organization to . . . achieve mission success, it must adapt.¹⁰

However, for an organization such as the Army—a large, centralized, hierarchical government bureaucracy—organizational adaptation can be a cumbersome and exceedingly slow process. Serena’s findings show that an organization’s ability to adapt is directly proportional to its contact with the operating environment and the enemy. The closer an organization is to the enemy, the more adaptable it must be to survive. Conversely, the further removed an organization is from the operating environment, the more cumbersome it becomes and the “slower the

pace” of its ability to adapt.¹¹ So, while the Army may be adaptable at the tactical level, it is progressively less adaptable at the operational and strategic levels.

Experts have found that successful adaption is neither an aspiration nor an endstate. Rather, as Lewin found in the 1950s, it is a continual requirement, a continual commitment to constant reappraisal and a quest for understanding of a changing environment, changing threats and a changing international landscape. It involves constant, comprehensive internal auditing of core competencies, approaches to problem-solving and key requirements, capabilities and resource allocations required to lead and achieve successful change.¹² For the Army in particular, it requires a vigilant and dedicated commitment to critical, creative thinking and intellectual investment, directing organizational inertia toward constant innovative evolution in how the Army thinks, talks, writes, fights, equips, resources, organizes, trains, bases, houses, mans and deploys.¹³

Understanding Mission Command

Above all else, the philosophy of Mission Command is about building a team first. Building great teams takes time. It requires investments in professional development, leadership development and fundamental training at every level of the Army. Through this concrete, tangible process, leaders begin to build a foundation of discipline, trust and communication. Commanders begin to understand those subordinate leaders who can be trusted to take disciplined initiative within their intent and mission orders. Commanders also begin to develop within themselves a greater awareness and trust in their own abilities. The commander, staff and subordinate leaders and units grow together as a team, gaining a common understanding of how they work together, as well as the character, integrity, intentions, credibility and competence within each team member, both up and down the chain of command. A common understanding and awareness grow out of this process that builds trust.

As trust grows, so does the ability to take risks. Trust and risk are intricately related; they have a direct and proportionate relationship. The more leaders trust themselves and their own abilities, as well as the abilities of their teammates, the greater their ability to take and underwrite risk, to empower and enable agile and adaptive subordinate leaders. According to Jim Collins—author of *Good to Great: Why Some Companies Make the Leap . . . and Others Don't*—good organizations with good leaders focus foremost on creating an organizational vision and a procedural roadmap, followed by building and developing the team necessary to accomplish the mission. Great leaders focus foremost on building, developing and investing in the team, getting the right people in place, *followed by creating a vision and a roadmap to success*.¹⁴

Harvard business consultant John Kotter subscribes to this “first who, then what” principle. In *Leading Change*, Kotter writes that to lead successful organizational change, a guiding team and coalition must first be established, built on mutual respect and trust. A top reason for failure in organizational change is neglect in first building the team.¹⁵ The Army strives to inculcate these tenets in its Mission Command philosophy—admonishing leaders to build cohesive teams, create common understanding of the challenges they face, empower the team to take disciplined initiative and underwrite the risks, if and when certain initiatives may fail.

In his book *The Fifth Discipline: The Art and Practice of Learning Organizations*, Dr. Peter Senge discussed the challenge of organizational adaptation in terms of failure. His lessons relate directly to Mission Command. Senge determined that organizations fail to learn

and adapt when culture and leadership put more emphasis on treating symptoms than on understanding and solving limiting factors and underlying problems. This causes organizations to perform inconsistently over time, leading to long-term drift toward ever-increasing challenges. Unsuccessful organizations focus on symptomatic versus fundamental issues and on short-term versus long-term metrics of success. They tend to have a culture of compliance, reward for pleasing superiors and management by fear. They value uniformity of thought versus diversity and detailed planning in an effort to achieve predictability and controllability. Finally, they promote excessive competition in an effort to improve performance. Organizations fitting this description cannot successfully adopt an enterprise approach to the Mission Command philosophy.¹⁶

The Network as a Weapon?

The phrase “the network as a weapon” is frequently tossed around, but its meaning is confusing and dubious; it sounds like a salesman’s advertising tagline. Those who use the phrase would be hard-pressed to explain it simply; those who hear the phrase would be challenged in understanding it wholly. It is misleading and misappropriated. Ironically, the usage of this confusing phraseology is symptomatic of the challenges the Army faces in the near future and in the FOE.

Networks have existed since the beginning of mankind. Clans of our ancestors were a network—a family network. Indeed, there are all kinds of networks—social, religious, business, government, academic and computer. Computer networks, for example, are systems of telecommunication linkages that enable the sharing and exchange of data. The global system of interconnected computer networks is commonly referred to as the Internet. The Internet is, more accurately, a network of networks, interconnected and increasingly interdependent.

As with nearly every other aspect of humanity, the advent of the Internet has changed the character of war and, indeed, given rise to an entirely new domain of war. This burgeoning domain is commonly referred to as “cyberspace.” The term “cyberspace” traces its origins to William Gibson’s 1984 novel *Neuromancer*. Gibson coins the term and gives the first definition of cyberspace:

Cyberspace. A consensual hallucination experienced daily by billions of legitimate operators, in every nation, by children being taught mathematical concepts. . . . A graphic representation of data abstracted from the banks of every computer in the human system. Unthinkable complexity. Lines of light ranged in the nonspace of the mind, clusters and constellations of data. Like city lights, receding.¹⁷

Cyberspace comes from the root term “cybernetics.” Cybernetics is the study and exploration of systems or networks—how they are structured and regulated, the causal relationships that exist within them and how they adapt, evolve, emerge and communicate. Cyber-systems or networks, like the multitude of ecosystems within the physical environment, exist within cyberspace. They are fueled by energy and exist for the sole purpose of exchanging and sharing data. Given this argument, how then is the network to be used as a weapon?

The “weapons” used in the cyber domain would more appropriately be in the form of computer codes that make up malicious software commonly referred to as “worms,” “viruses” or “Trojan horses”—and the list of terms goes on. A different “weapon” that can and has been used and developed takes the form of the information and data exchanged that is meant to

inform, misinform, deceive, misrepresent, confuse, harm, damage, disable and overwhelm an intended recipient or adversary. Finally, a “weapon” that will increasingly be used in the cyber domain comes in the form and analysis of what is loosely referred to as “big data.”

“Big data” is the term used to describe what is currently and exponentially emerging from the Internet. Each and every day, the Internet facilitates the exchange of data to millions upon millions of users. In fact, the exchange of data—how it is exchanged, with whom it is exchanged, what data is exchanged, when it is exchanged, why it is exchanged, etc.—creates its own emerging set of data. There must be something to be learned from all this data.

Kenneth Cukier and Viktor Mayer-Schoenberger, writing in *Foreign Affairs*, suggest that “the idea is that we can learn from a large body of information things that we could not comprehend” when we accessed, used or had the capability to analyze only smaller amounts of data. Imagine the potential applications of a capability to mine and analyze enough digitalized information that, if stored on a stack of CDs, would reach the moon five times over!¹⁸ Today’s technology is allowing scientists to determine the likelihood and location of influenza outbreaks, how to spot infections in infants and how to program cars to drive themselves.

Thinking of the network as a weapon is misguided. The future weapon of the cyber domain lies in the capability to harness, access, mine and analyze big data in an effort to determine, with increasing accuracy, correlations and probabilities in the actions of adversaries; predict events and actions counter to national interests; and tap into, influence and shape how adversaries communicate with, comprehend and see the world. To realize this future requires a key assumption. The assumption is not in the physical or technological capability—that is a given; the capability is coming and in some ways is already here. The real assumption to be validated is the Army’s ability to evolve, adapt, recruit, retain and nurture the intellectual capability, those agile and adaptive leaders who can harness this truly exciting potential behind the marriage of Army Design Methodology, Mission Command and the network. Will the Army get it right? What does history have to say about past preparations for future conflict and the changing character of war? Do Army leaders have what it takes to successfully adapt the Army organization?

The Decade of the 1990s as a Case Study

In the early 1990s, the Army, despite having just experienced victory in the Gulf War, was still a Cold War-era force, designed and developed to deter and defeat the Soviet Union. However, the Soviet Union soon collapsed as a political state. America’s military power was no longer challenged by a true peer competitor; the bipolar international system was no more. The United States was the world’s sole remaining superpower.

President George H. W. Bush wrote in the preface to the 1990 U.S. *National Security Strategy*, “[T]he international landscape is marked by change that is breathtaking in its character, dimension and pace,” requiring a strategic transformation that would be challenged by political turbulence, uncertainty, unknown sources of instability and an “advance into historically uncharted waters.”¹⁹ Speaking at the Aspen Institute, President Bush described the challenge facing the military: “What we need are not merely reductions, but restructuring.”²⁰ The Commander-in-Chief was directing the military to change, adapt and evolve in the face of an uncertain FOE.

Following the Gulf War and the collapse of the Soviet Union, however, it was critical for the Army to evolve based on collective recognition that the FOE would be filled with

complexity and chaos; and that modern warfare was on the cusp of a revolution in military affairs with far- and wide-reaching consequences.²¹ As Frederick Kagan wrote in *Finding the Target: The Transformation of American Military Policy*, “Army leaders saw Desert Storm as . . . the last major ground conflict of its kind and rejected the idea of building future force structure to fight similar wars in the future.”²²

To successfully prepare for a forecasted future of increased conflict, crisis and turmoil, the Army leadership generally agreed that it was imperative that the Army transform.²³ To this end, the Army attempted to adapt its organizational structure through several evolutionary initiatives, including “Force XXI,” “Army After Next” and “Army Transformation.” They were generally driven by five factors: lessons learned from recent conflict and combat operations; perceived organizational shortfalls; assessments of future threats and operational environments; technological and informational advancements; and prescribed changes based on political and fiscal environment.²⁴

Army leadership understood that they faced looming budgetary cuts and force reductions. Indeed, Congress and the Department of Defense (DoD) mandated budget cuts of 4 to 6 percent from 1991 to 1994.²⁵ In “The Base Force Study” and the “Bottom-Up Review,” the Joint Staff advocated significant reductions of 11 to 17 percent in the size of the military. The burden of these manpower reductions would fall disproportionately on the Army, resulting in a downsizing from 18 to 10 active-duty combat divisions.²⁶ Although organizational adaptation was believed to be imperative to the relevance of the Army and its ability to accomplish its mission, the process languished, stalled by a myriad of internal and external variables that included economic-political dynamics as well as organizational and bureaucratic culture, competing parochial interests and the uncertainty of the FOE.²⁷

The Army’s organizational adaptation process during the 1990s placed a premium on investing in and transforming the Army’s organizational structure, as well as revolutionary technological advances and capabilities that would change the character of how future wars would be waged. Building the “digital force” came at a cost of billions annually and led to the important developments of precision-guided munitions and the Global Positioning System (GPS), all enabled by networks of datalinks sharing information in increasingly larger volumes and at increasingly faster speeds.²⁸

The investments in organizational structure changes and research, development and acquisition of advanced technologies came at a price. With finite resources, investments in technology come at a cost to investment of resources in other equally important areas. The “bill payers” for investments in technology in the 1990s came at a cost to the development of the Army professional, education and the evolution of the Army’s organizational culture to be better intellectually, mentally and psychologically prepared for the types of warfare the Army would face in a post-9/11 world.

Implications of Investments

In 2010 Dr. James G. Pierce, with the Strategic Studies Institute at the U.S. Army War College, published a little-known study on Army organizational culture. He investigated organizational culture in relation to the professional development of future strategic leaders and the potential divergence between how Army leaders see themselves and how they best survive in the FOE. Analyzing data from a sample of students attending the Army War College in 2003 and 2004—students who had “grown up” in the Army of the 1990s—Dr. Pierce postulated that

“the ability of a professional organization to develop future leaders in a manner that perpetuates readiness to cope with future environmental and internal uncertainty depends on organizational culture.”²⁹ This hypothesis was based on the assumption that organizational culture enables organizational adaptation; organizational culture perpetuates adaptability and promotes relevance and continued existence. Pierce’s conclusion is alarming. He finds that Army leadership “*may be inadequately prepared to lead the profession toward future success.*”³⁰

The ability of a military organization and its leadership to successfully and effectively adapt and cope with an uncertain future is directly related to organizational culture. Understanding organizational culture is crucial to understanding how an organization and its members function, perform, interact, behave and make decisions.³¹ According to Pierce’s findings, Army culture is characterized by an overarching desire for stability, caution and control; rigid, formal rules and policies; coordination and efficiency; short-term goal-setting and results-oriented performance; hard-driving competitiveness; and adherence to continuity of operations and standard operating procedures. Pierce finds that this is incongruent with an anticipated FOE characterized by uncertainty, complexity and chaos; and obstructive to fostering organizational adaptability. Pierce believes that a culture characterized by flexibility, discretion, innovation, collaboration, creativity, risk-taking and a long-term commitment to professional growth and development is decidedly more conducive to successful change and organizational adaptability. According to Pierce, this incongruence and disconnect is cause for concern.³² For the Army to continuously and relentlessly adapt to survive, to remain relevant and ready and to win our nation’s wars requires an organizational culture that values and self-perpetuates organizational adaptation.

Award-winning authors David Cloud and Greg Jaffe charge that the Army has an intellectually soft culture and does not truly tolerate officers with candor who are willing to engage superiors in intellectual debate.³³ According to Harvard political scientist Dr. Graham Allison, avoiding uncertainty, attempting to negotiate and control the environment, managing change versus leading change and regularity are primary interests within military organizations.³⁴ Others propose that the Army is made up of careerists and promotion is dependent on demonstrated devotion to the service’s mission. Institutionally desirable characteristics include caution, adherence to rules and regulations and submission to authority.³⁵ Colonel Douglas Macgregor, U.S. Army (Retired), PhD, author of *Breaking the Phalanx: A New Design for Landpower in the 21st Century*, takes this critique further, indicting Army culture and processes as destructive elements. Macgregor charges that Army leaders generally tend to resist change and that Army culture encourages the sycophant. “If you speak up and challenge the status quo, you’re dead,” he states. Mavericks are castigated, held back and forced out; the true “talent of the Army naturally leaves.”³⁶

Related to challenges of organizational culture is the challenge of competing organizational, political and economic interests. Within DoD, the Army competes with other military services for finite resources and funding. During the 1990s, this was particularly challenging. In a resource-constrained environment, Dr. James Wilson, former Harvard professor and author of *Bureaucracy: What Government Agencies Do and Why They Do It*, observes that an organization’s ability to adapt and implement change is also constrained. He notes that the military, as an agency of the government, must increasingly compete and lobby for political favor and support in order to secure funding and resources.³⁷

Finally, Army leadership is faced with challenges of uncertainty in leading organizational adaptation. Leading and driving change involves risk and uncertainty. Leaders sometimes get it wrong. Organizational azimuths must be corrected from time to time. For an organization that

values stability and control, dealing with an uncertain future, coupled with the uncertain results or outcomes of a directed organizational change—particularly when success and the lives and safety of Soldiers are on the line—is a strategic leader’s greatest challenge. As Murray wrote, the Army “must innovate with less money and greater ambiguities about potential future opponents and the nature of wars” it will have to fight in the future. Add the political and economic dynamics of competing for limited resources during peacetime, when the Army is not fulfilling its primary purpose, and the challenge of uncertainty can cause anxiety in the minds of senior military leaders.³⁸

As U.S. Military Academy professor and Strategic Studies Institute scholar Dr. Suzanne Nielsen wrote, the risks of leading the “wrong” organizational change, for military leaders, is uniquely high when innovation or adaptation may lead to future loss of Soldiers’ lives.³⁹ This dynamic of contradictions—in which the military’s organizational culture craves clarity, order and linearity while preparing for a forecasted future of nonlinearity, chaos and complexity; seeking and pursuing political and economic interests and support while not fulfilling primary missions and functions—was exactly what the Army faced in the decade of the 1990s.⁴⁰

Critics of this period in Army history submit that the entire process was a “general floundering around for a new definition of strategic objectives, rather than in response to any specific events . . . having more to do with job protection than strategic analysis.”⁴¹ According to Macgregor, the status quo and job security were exactly what senior leaders were trying to protect. “Post-1991 force reductions mirrored the past reductions following World War I and World War II,” he stated, characterizing transformation in the 1990s as a farce, as a “Potemkin village—trying, with great effort, to look like we were really changing.”⁴²

Lessons Learned from the 1990s

General Peter J. Schoomaker, the 35th Chief of Staff, Army (CSA), reflected on the organizational adaptation initiatives of the 1990s in relationship to the first years of the wars in Afghanistan and Iraq:

I have thought for years that the Army needed to . . . change the way we develop leaders. . . . Transformation is not about equipment. It’s about intellect; it’s about judgment; it’s about the development of leaders and Soldiers. You’ve got to make that intellectual transformation before you can make the visible transformation.⁴³

To Schoomaker, the challenge was clear. The previous decade’s work to formulate how the Army must organizationally adapt had produced an extensive body of knowledge but had not brought about lasting change. The Army’s collective institutional and warfighting structures, bureaucratic systems and weapons platforms, organizational culture and leadership were still clinging to an outdated construct. For all the theoretical work to affect organizational adaptation that occurred in the 1990s, the U.S. Army of the 21st century was still a remnant of the Cold War.⁴⁴

Schoomaker believed that to be truly successful, the Army first had to change its leadership, training and culture. He envisioned the driving force of Army adaptation and transformation to be sophisticated, adaptive “pentathletes” serving in “an adaptive organization full of problem solvers. We want them to know how to think, not just what to think.”⁴⁵ Reflecting years later, his opinion is unchanged: “The old system didn’t work! It resulted in . . . unprepared leadership and untrained Soldiers. It created liabilities on the battlefield.”⁴⁶

Schoomaker's first priority would be to rebuild and reenergize the Army team from the ground up, focusing intently on the individual Soldier and indoctrinating the entire force with a warrior ethos. He knew the importance of building a cohesive team with a common ethos and noble undertaking. In Schoomaker's mind, for any transformation to be successful, he first had to change, transform and adapt the way the Army, specifically individual Soldiers, operated, acted and thought about themselves. They were to be warriors first.⁴⁷

The case study of the 1990s is significant for several reasons. First, it demonstrates the magnitude of importance of the approach and vision the Army undertakes in preparing for the FOE and how choosing an organizational azimuth has significant impact on the future force, on Soldiers on the ground and in battle and on how they will fight. Second, it demonstrates the immense organizational, institutional and cultural challenges of undertaking the implementation of lessons learned in previous wars—in this case the Gulf War—and all of the conceptual work undertaken during the 1990s, hitting roadblocks, collecting dust and resulting in relatively little action. Third, it demonstrates the leadership qualities required to successfully implement, pilot and guide organizational adaptation across a huge institutional and operational force. Ego, personality, relationships, background, historical context and experience all play a part in how successful or unsuccessful a leader can be in influencing, coordinating and choreographing organizational adaptation initiatives.

Finally, it demonstrates that regardless of investments in organizational structure and technological advancements and how they may revolutionize warfare, there are continuities in war, regardless of age, that are constant variables. Dr. Colin Gray, Professor of International Relations and Strategic Studies at the University of Reading (England), writing about how to plan for the FOE, stated that although the conduct and character of war may change, the nature of war is constant. So, although the "Information Age" was well under way and technology was rapidly advancing during the case-study time period, human factors, social-cultural influences, politics, economics, history and geographic/geopolitical relationships were playing a constant role and providing context to the FOE.⁴⁸

Avoiding Pitfalls from the Past

On 19 August 2010 the remaining combat troops of 4th Stryker Brigade Combat Team (BCT), 2d Infantry Division, left Iraq, fulfilling President Barack Obama's pledge to have all U.S. combat troops out by the end of August.⁴⁹ With the official end of the war in Iraq and combat troops poised to exit Afghanistan by 2014, the Army is faced with refocusing on the future. Once again, the forecasts foretell a future fraught with uncertainty, complexity and chaos. As it sets its azimuth, the Army should pay heed to lessons of the past two decades. As in the past, the Army is driven to adapt by five factors: prescribed changes based on political and fiscal environment; perceived organizational shortfalls; lessons learned from recent conflict and combat operations; assessments of future threats and operational environments; and technological and informational advances.⁵⁰ Success and lasting change, however, are dependent on the individual Soldier and organizational culture.

Today, the Army clearly confronts a political-economic environment challenged by limited resources and demands for downsizing. In echoes from the past, DoD issued its 2012 *Defense Budget Priorities and Choices*, which stated, "After every major conflict, the U.S. military has experienced significant budget drawdowns," in reference to impending decreases in military spending. Senior DoD leadership expects defense spending cuts to be "manageable," promising

the resulting drawdown will result in a “joint force” that is “smaller and leaner . . . agile, flexible, innovative and technologically advanced. It will be a force that is . . . adaptable.”⁵¹

Regardless of DoD’s public diplomacy surrounding downsizing, “fiscal cliffs” and sequestration, military services are currently competing for increasingly limited funding. Significant budgetary cuts force organizational reductions and restructuring as the Army discusses cutting 80,000 to 180,000 troops across the total force and deactivating at least eight BCTs.⁵² To this end, in June 2012, Army Chief of Staff General Raymond T. Odierno outlined his strategic guidance in regard to creating the Army of 2020, stressing the imperative for organizational adaptability, flexibility and versatility.⁵³

In an effort to ensure that lessons learned from a decade of combat are addressed along with perceived organizational shortfalls, Odierno has initiated a multitude of changes. Coupled with the *Army Capstone Concept*, the Army’s azimuth to the FOE, Odierno and Secretary of the Army John McHugh have published the *Army Strategic Planning Guidance (SPG)*, a framework for how they plan to move and develop the force in the near term. The Army’s *SPG* centers on providing a force capable of strategic deterrence, preventing the emergence of future threats, reducing the potential for large-scale military operations and, finally, preventing, shaping and winning conflicts as “an indispensable partner . . . in a joint, interagency, intergovernmental and multinational environment.”⁵⁴

At the strategic level, force design must provide an Army that is credible, capable and willing to defend and protect national interests. Army forces help to influence and shape the environment through military-to-military engagements; education, training and exercises; partner capacity-building; civil support, stability, relief, reconstruction and development efforts; and foreign internal defense, as well as humanitarian and security assistance. Finally, Army forces must be capable of winning across the full range of military operations; projecting sustainable force packages that provide decisive, operational superiority; and seizing the initiative and positional advantage in relationship to the enemy, unreliant on territories and allies within the theater of operations.⁵⁵

At the operational level, organizational construct must be measured against four overarching criteria: interoperability, deployability, maneuverability and lethality. First, in support of interoperability, future force structure must possess the “appropriate functional augmentation to operate . . . as the Army component of a joint task force.”⁵⁶ In a 2012 study of the Army’s current modular force structure, the RAND National Defense Research Institute found that the current BCT provides better interoperability in comparison to earlier force structures, owing to “its ability to contribute landpower to current and foreseeable joint operations.”⁵⁷ To improve interoperability, Odierno is moving to regionally align the Army’s forces in support of combatant commands globally. This should foster predictability and habitual relationships in the joint force generation process, as units train regularly and deploy in accordance with their regional alignment.⁵⁸

Second, to provide responsive combat power to regional combatant commands, future force structuring must provide for combat formations that are rapidly deployable.⁵⁹ Supporters of the current BCT construct argue that the Army can go even further in flattening organizational structure, advocating the design and fielding of self-sufficient, combined-arms battalions and companies to increase rapid deployability, responsiveness and tailorability.⁶⁰ Odierno has publically entertained the idea of a force-generation model capable of training and deploying tailorable and scalable forces from the size of a squad to that of a corps.⁶¹ He is also looking

at maximizing efficiencies in the management of strategic prepositioned stocks and “how that helps us to not only be prepared for contingency operations” but also in supporting training and engagements with regional partners and allies.⁶²

Third, on arrival these rapidly deployable combat formations must be maneuverable and able to conduct the full range of military operations across the combined-arms maneuver–wide-area security spectrum. RAND’s study found the modular BCT construct had more versatility and flexibility in adapting to the full range of military operations, owing to increased capability in headquarters staff, combat support and combat service support functions.⁶³ Current BCTs have proportionately greater organic support units and the capability of self-sustainment for definable periods of time.

Finally, the future force must possess overwhelming lethality encapsulated in the ability to find, fix and eliminate an array of hybrid threats in the joint FOE. RAND’s 2012 study of the current BCT construct specifically looked at tactical risk through interviews with former BCT commanders; the majority of them indicated that, under the new BCT design, total risk declined due to increased organic capabilities and resources. However, the same cohort of former BCT commanders indicated a desire for a third maneuver battalion to increase lethality and, more important, to improve their ability to conduct long-term, post-conflict stability operations.⁶⁴ To that end, in October 2012 Odierno stated, “We have done a significant amount of technical and tactical analysis to come up with a new [BCT] design. The one thing that is absolutely essential is that we must have a third maneuver battalion in each of our brigades.” He also advocates improving the BCTs’ vertical and horizontal engineering capability, as well as intelligence, surveillance and reconnaissance capabilities.⁶⁵

As force design takes shape below the operational level, it must increasingly account for additional dynamics. These dynamic qualities include tailorability, stability and command and control. First, tactical units must be tailorable, capable of gaining or shedding nonessential capabilities and resources and of facilitating and providing the interoperability required in a joint environment. This provides commanders the ability to shift and prioritize limited capabilities and resources, as required, as well as providing for a higher level of agility and adaptability in response to the full spectrum of combat operations.⁶⁶ Second, to take full advantage of and exploit the FOE, tactical units must have stability, particularly in regard to personnel, to provide for effective training, leadership, teamwork and unit cohesion.

Finally, the function of command and control of force structure in the FOE has the potential to unlock and unleash the Army’s greatest asset, the leadership and initiative of leaders down to the individual Soldier level. Discussing future strategic challenges facing the military, Chairman of the Joint Chiefs of Staff (CJCS) General Martin E. Dempsey stated, “What you will see in the future is that we will build the force intending to be able to disaggregate it and mass it only as necessary.”⁶⁷ Conflict and engagements in the FOE will not be centrally planned and executed but, rather, globally integrated and increasingly executed independently on a complex, nonlinear battlefield. To accomplish this vision, the Army, nested with joint doctrine, has developed its design methodology and continues to develop the philosophy, practice and system of Mission Command as imperative to future success.⁶⁸

Thus, the Mission Command philosophy, a core concept for how the Army will operate in the FOE, designates the adaptive leader as the essential building block. Given this concept, the military education and professional development system becomes immensely important. As posited by Dr. Colin Gray,

So, how does one attempt to improve guesswork for the future concerning war, warfare, and strategy? *The most basic answer is that one can only educate in the hope that judgment will be improved so that good, as opposed to poor, strategic choices will be made.* You cannot know today what choices in defense planning you should make that will be judged correct in ten or 20 years' time . . . one cannot know what is unknowable. Rather than accept a challenge that is impossible to meet, however, pick one that can be met well enough . . . *develop defense planners and military executives that are intellectually equipped to find good enough solutions to the problems that emerge or even erupt unpredictably years from now.* And, one has to emphasize, develop and maintain capabilities sufficiently adaptable to cope with a range of security challenges, since particular threats and opportunities cannot be anticipated with high confidence.⁶⁹

Recommendations for the Future

In September 2012, speaking to students at the Army's School of Advanced Military Studies (SAMS), Major General Edward C. Cardon, commanding general of the 2d Infantry Division in South Korea, stated that the expectations of today's Army leaders are that they know how to manage transitions and complexity. They have to be problem solvers, comfortable with ambiguity and uncertainty, capable of developing and leading concepts for change. "Transitions are the most important events you will have to manage," Cardon said. "We have to organize for the operations we will be expected to conduct in the future. We must be flexible enough to adapt to an ever-changing environment. This will be your challenge again and again over the next ten years."⁷⁰

General Robert W. Cone, commanding general of U.S. Army Training and Doctrine Command (TRADOC), reinforced this view: "We are at a critical time in our Army, as we transition from an 'Army of War' to an 'Army of Preparation.'" Cone laid out the priorities for TRADOC for the foreseeable future, stressing the importance of investing in the future, balancing near- and long-term readiness and emphasizing intellectual and leader development. Cone believes that today's senior leaders are setting the conditions and building the "investment portfolio" for the future Army, as it focuses on the Army profession.⁷¹

As the Army considers future investments, its top priority should be investing in human capital. This truly is the foundation to ensuring that the Army can unlock the potential of Army Design Methodology, Mission Command and the network together through development and implementation of the Mission Command philosophy and the education and professional development required to make it a reality. Regardless of how the future force is structured and the dilemmas presented by an uncertain FOE, organizational adaptation should be focused on ensuring that efforts are nested across the strategic, operational, tactical and individual levels.

The focus of education and professional development—according to Eliot Cohen and John Gooch, authors of *Military Misfortunes: The Anatomy of Failure in War*—must be on developing the organizational and individual ability to learn from past experience, anticipate the future and adapt to unexpected circumstances.⁷² Focusing on individual-level education and professional development is the *sine qua non* building block for developing adaptive leaders who exercise initiative, adapt to fluid circumstances and exercise Mission Command. Adaptive leaders are the cornerstone for development of an organizationally and operationally adaptive Army.

Collins, Kotter and Senge advocate this "build the foundation first" approach: invest in and develop individuals first in order to build adaptable, learning organizations. Soldiers must

be professionals, possess a sense of belonging to a profession and actively contribute to the betterment of the profession. Soldiers must consistently seek to learn, share, collaborate and improve themselves, one another, their unit and the Army organization as a whole. This defines a professional *community of practice*—an organization of people who share a profession. They inherently learn, adapt and evolve because of an intrinsic and dedicated effort to improve through collaboration and experience.⁷³

Four of General Odierno's top five priorities center on the training, professional education and development of Soldiers.⁷⁴ Advocating and implementing this approach was Major General Gordon B. Davis, Jr., former Deputy Commanding General, U.S. Combined Arms Center for Leader Development and Education and former Deputy Commandant, U.S. Army Command and General Staff College, at Fort Leavenworth, Kansas—the Army's "Mission Command Center of Excellence." Davis believes that the Army is currently in the process of correcting its azimuth regarding military education and its focus on individual professional development.⁷⁵ Over the past decade, the Army has increased overall capacity in its ability to educate Soldiers but misplaced its priorities in emphasizing the importance of education. Davis provided examples of how this was manifested: The Warrior Leader Course was shortened and the First Sergeants' Course was eliminated. For officers, the Command and General Staff College was expanded but became an afterthought behind rushing officers into key developmental jobs. "Senior Service College" selectees were able to continually "defer, defer, defer" school attendance. The Army failed to take a long view as it tried to keep up with requirements and developments in the field. It is imperative that the Army correct its azimuth if it is to implement Mission Command. "Mission Command pervades all that we do in the Army," Davis stated. He firmly believes that if the Army is to truly pursue and retain comparative advantage with its adversaries, on a global scale, it must take an enterprise-wide approach with the Mission Command philosophy.⁷⁶

It all starts with the individual Soldier. The greater the uncertainty the Army faces in the FOE, the greater range of skill sets Soldiers will be required to possess. For the Army to achieve "operational adaptability," as outlined and defined by the ACC, requires adaptive leaders and an organizational culture that places emphasis, priority and investment in learning. Adaptive leaders are the building block of dynamic "learning organizations." A learning organization is, inherently, organizationally adaptable. An adaptable organization thus will be operationally adaptable.⁷⁷

It may seem naïve to suggest that the correct azimuth and course of action to prepare for the FOE starts with focusing on the individual Soldier and organizational culture. Yet, to this end, the Army must continuously reinforce the importance of professional development, education and a sense of professionalism, rather than attempting to gain more immediate, short-term gratification by investing in efforts to improve organizational structure and technological advances.⁷⁸ Both are important. They are not mutually exclusive choices to be made.

However, when it comes to a question of prioritizing investments, James Q. Wilson, Professor of Public Policy at Pepperdine University, finds that the average layperson focuses on developing, designing and equipping organizational structures to cope with future challenges. Why? Because, as Wilson finds, it is not very complicated in the grand scheme of the adaptation process to change the structure and outward appearance of an organization. Making changes to organizational wire diagrams to achieve greater efficiencies does not necessarily, and by itself, drive long-term change—it is merely cosmetic. Rather, great leaders—true professionals with

vision, leading the most successful efforts in organizational adaptation—understand that the most difficult challenges are internal. Changing the way an organization thinks, learns and acts takes greater skill. Knowing that it can be done only by guiding, developing, educating and leading a team effort from the bottom up takes even greater skill and is the only way to achieve lasting change.⁷⁹

Building the Bench of Strategic Leadership

To groom and grow the senior leadership of tomorrow that the Army requires, it is critical that increased investments be made in the education and professional development of today's Soldiers. Colonel Thomas C. Graves, Director of the School of Advanced Military Studies, expressing personal passion and concern for officer selection, promotion and professional development, submits that the Army must invest more in developing educational programs for "education's sake." Today's successful tactical leaders and tomorrow's operational and strategic leaders must be more engaged, with a greater ability to communicate and react to their understanding of the human dimensions in war.⁸⁰ Graves' passion for increased educational opportunities is well-founded.

Military historian Dr. Williamson Murray, having studied military innovation and adaptation extensively, concludes in *Military Innovation in the Interwar Period* (1998) and *Military Adaptation in War* (2011) that innovation and organizational adaptation are driven by well-educated, intellectually curious leaders who take the time to study, reflect and critically examine organizational challenges.⁸¹ The future, more so than the past, demands Soldiers and leaders who adapt swiftly in fluid environments. By extension, the Army, as an organization and institution, historically the slowest to adapt and change, must also improve. To do this, education and professional development must be the top priority. If education is to be the top priority, the organizational culture of the Army needs to change.⁸²

If much of history is chance, Murray writes, the Army must invest in its human capital to improve its ability to understand and learn from history and the context it provides for future conflict and war. By investing in human capital, the Army improves its ability to provide the right leader, at the right place and right time, as it relates to future conflict. Organizationally, the Army cannot retreat from recent experience but must incorporate lessons learned from the past decade, continually and critically reexamine its doctrine, retain its combat-veteran experience and nurture a dedicated commitment to the profession among a warrior community of practice. For the Army to avoid rigidity and irrelevance in its doctrine, organizational structure, institutions and culture, a deliberate, long-term investment in the professional development of the Army's future senior leaders is critical.⁸³ For the benefit of tomorrow's senior leaders, today's senior leaders must focus on improving the military institutionally, organizationally and culturally.

According to General Davis, senior military leadership believes that the Army is at a critical inflexion point.⁸⁴ General William E. DePuy, the first commanding general of TRADOC, explained in 1979, following the Vietnam War, that "people aren't smart enough to see what we'll need." The Army's mentality is formed by current events, operations and reality. In the end, forecasting and conceptualizing the future force creates a reflection of the current force, "with some gimmicks," as DePuy describes, but the Army's information and consciousness are hopelessly stuck in the present.⁸⁵ If anything has been learned over the course of the past two decades about predicting the future, it is that discourse and theory do not drive reality and

practice. Rather, it must be the opposite. Reality and practice must drive the discourse and theory on how to plan and prepare, as the Army will never be able to discern the FOE with any accuracy.

Major General H. R. McMaster, Commanding General, Maneuver Center of Excellence, at Fort Benning, Georgia, insists that the Army cannot prepare for the wars it wishes to fight but for the wars it must fight—against real enemies with real capabilities and real objectives—if it is to remain relevant and ready for future conflict. Referring to the past, he admonishes current Army senior leaders: “Correcting the persistent flawed thinking about future conflict requires . . . acknowledging that adversaries will force real rather than imaginary wars upon modern military forces until those forces demonstrate the ability to defeat them.”⁸⁶ McMaster echoes Clausewitz’ writing that, “the first, the supreme, the most far-reaching act of judgment . . . is to establish the kind of war” the Army faces in the present and near future, “neither mistaking it for, nor trying to turn it into something” that it is not.⁸⁷

McMaster believes that “fantastical theory about the character of future war rather than clear visions of emerging threats” must not lead to “self-delusion about the character of future conflict.” He has criticized former senior Army leaders and the Army Transformation initiatives of the 1990s for failing to accurately predict and prepare the Army for the wars in Iraq and Afghanistan. In his view, there was too much emphasis on and investment in emerging technologies and tinkering with organizational structure at the expense of intellectual preparation for future war. Yet McMaster clearly places the greatest responsibility for intellectual preparation for future conflict on the individual, the professional Soldier, imploring, “*Embrace your duty to study. . . . It is our duty as leaders to develop our own understandings of our profession and the character of armed conflict.*”⁸⁸ Again, reality and practice must drive the discourse and theory.

Conclusion

In an effort to understand past failures in leading change, the U.S. Army Combat Studies Institute (CSI) found that adaptation initiatives often fail if there is no Army-wide buy-in and support. Failure is often due to entrenched beliefs, bureaucratic turf battles and parochial interests that are destructive and undermine change.⁸⁹ Revolutionary, successful organizational adaptation requires a dynamic involving a sense of urgency, empowered leadership, vision and understanding of the political environment.⁹⁰

Brigadier General John Sloan Brown, U.S. Army (Retired), PhD, author of *Kevlar Legions: The Transformation of the United States Army 1989–2005*, suggests that current senior leaders should consider several lessons learned from the 1990s. First, he warns against anticipating a strategic pause, or “window of opportunity,” from the requirement that the Army remain at a high state of readiness. Second, he cautions against overreliance on technological advancements and the belief that incorporating new technology is equivalent to organizational adaptation. Third, as past CSAs have experienced, during any period of transformation there will be several stakeholders protecting narrow interests. Fourth, he counsels that any organizational adaptation must be fully funded: “A ‘vision’ without funding is a hallucination.” Finally, he advises that the endstate will change as challenges arise and predictions of the FOE fail to come to fruition.⁹¹

Lieutenant General David W. Barno, U.S. Army (Retired), a Senior Fellow at the Center for a New American Security, recently warned: “During any military drawdown, equipment, training, force structure and endstrength will inevitably be sacrificed. But the ‘crown jewel’ that must

be preserved in order to be able to fight and win in the years ahead is human capital.” Retaining the vast combat experience the Army currently has will be crucial in the years ahead. However, it requires the institutional Army to adapt organizational culture, processes and procedures to better select, promote and assign the Army’s most talented. Barno admonishes today’s senior leaders to make a greater effort to recruit, retain and incentivize the best and brightest talent to remain committed to the Army as a “guarantor of success in future conflicts.”⁹²

CJCS General Martin Dempsey admonishes audiences to expect the unexpected as the United States confronts an era of persistent conflict: “We like to think we can pick our conflicts, but in reality, conflict picks you.”⁹³ Strategy is important in an attempt to prepare for the FOE, but the military must be cognizant that it will not get it right. Dempsey advises that in order for the military to remain adaptable, its strategy must be intentionally vague and ambiguous: “Strategy is about context and choice . . . choices have consequences and consequences produce new context.” In the current and future operational environments, the most successful military organizations will be more decentralized, distributed and networked. Capabilities will be pushed down to units in closest proximity to the operational environment and the enemy. For leaders to be successful, they require the education, experience and ability to understand the context of the problems and challenges they face—historically, politically, diplomatically, socially, militarily, strategically, operationally and tactically.⁹⁴

Army leaders are charged with preparing for future war, a war whose timing they cannot anticipate, against an opponent that they cannot accurately predict, in a political–economic environment they cannot control, in a location they do not choose and of a nature that cannot be foretold. However, assumptions regarding future trends, constraints, restraints and the FOE are based on several variables—e.g., global rebasing initiatives; fiscal restraint; required assistance to joint, interagency, interdepartmental and multinational communities for unified actions; contested operations in the cyber and space domains; and increased enemy anti-access and area-denial capabilities. The Army’s description of the FOE is one of persistent conflict and ever-increasing uncertainty, unpredictability, complexity and disorder—in a word, chaos.⁹⁵ General Odierno has stated that the Army is facing “the most uncertain future I’ve ever experienced” in more than 37 years of service.⁹⁶

Although unlikely, it is within the realm of possibility that the Army could regress to a cultural comfort zone of forcing adaptation and change from the top down, dependent on a culture that values hierarchy, stability, control and order, in an effort to cope with a complex, chaotic and ever-changing environment. Given internal and external studies of Army culture, this “shut up and color” mentality may, at times, seem instinctual and more natural to the Army’s organizational character and culture. A true and complete “changing of the guard” has not taken place in the Army. Recent and historical instances and examples of this reversion demonstrate that the Army and its leadership are not immune to episodes of organizational hubris, parochialism, arrogance, entitlement, cynicism, toxic leadership and complacency. These events and instances, regardless of their predominantly individual nature, tear at the fabric of the Army’s culture and profession. They undermine, corrode and destroy the trust and confidence of civilian leadership and public opinion, and they endanger organizational progress and the Army’s efforts toward organizational adaptation.

The many challenges facing the Army today are echoes from the past. Indeed, the echoes heard today can be traced not only to the 1990s but to the early years of the 20th century. Following World War I, under the banner of “Return to Normalcy” the Army’s personnel

strength and budgetary resources fell by nearly 95 percent. The national economy was the government's primary focus and consideration, and the Army did not have enough money to modernize, train and maintain authorized endstrength.⁹⁷ Yet then, just as it does today, responsibility for preparedness rested squarely on the shoulders of the Army's leadership. They were, and continue to be, responsible for ensuring that, given the constraints of the political-economic environment, the Army has a viable strategic approach to the FOE that matches ends, ways and means with national strategy and is synchronized with doctrine, organizational structure, modernization, equipping, training and education programs and initiatives. This will be the greatest challenge for today's generation of senior Army leaders.⁹⁸

In regard to emerging hybrid threats, how does the Army prepare to deal effectively with the unexpected? For the individual, a vigilant commitment to intellectual preparation, curiosity and study is required. For the Army organization, rather than leveraging technological development and conducting predictive analysis based on relative future probabilities as it did in the 1990s, the Army needs to focus on real-world events based on their relative consequences. In other words, it must plan, equip, train, prepare and wargame for realistic and more immediate potential threat scenarios and related outcomes and consequences. More important, however, the Army must develop, intellectually equip and prepare leaders and units for the full complexity and uncertainty they will confront.⁹⁹ This is exactly what Army Design Methodology and Mission Command, coupled with the capabilities of the network, can do.

Considering the future in the context of the Army's organizational adaptability, three priorities seem to be abundantly clear. In the first priority, the FOE and the future of warfare continue to require significant and continuous analysis and reassessment. The responsibility of today's senior leadership is not to predict the future but rather to set the Army on an azimuth to the FOE. In the second priority, it is imperative that senior Army leadership remain vigilant in ensuring that the Army remains organizationally adaptive. This requires ensuring that its greatest investment is in its human capital—the individual Soldier—and creating an organizational culture that provides opportunity and places emphasis on individual professionalism, education and learning. In the final priority, the utility of current organizational structure must be continually reexamined to determine its suitability for the FOE and the future of warfare. As technological advances continue to revolutionize military capabilities and the character of warfare, investments should be made to maintain relative advantage against all adversaries. Regardless of the level of uncertainty in the FOE, the negative aspects that may be inherent in the Army's culture or the political-economic interests both internal and external to the military, the Army must embrace an adaptive organizational construct that can meet the challenges of the FOE.

As Charles Darwin postulated more than 150 years ago, in the struggle for survival, “profitable” change and adaptation by organisms in relationship to complex, chaotic environments, regardless of the impetus, provide preservation and relevance in the present and into the future.¹⁰⁰ The same principle applies to large organizations. Organizational adaptability is *sine qua non* to any business, nonprofit, government agency or military, if that organization is to maintain any sense of relevance and worth in relation to an ever-changing environment. Organizations must be able to profitably innovate, change and adapt their vision, mission, values, priorities, personnel, doctrine, practices, procedures and organizational structure. Failure of an organization to innovate, change and adapt risks irrelevance and relegation to the dustbin of history.

Endnotes

- ¹ Department of the Army, TRADOC Pamphlet 525–5, *Force XXI Operations: A Concept for the Evolution of Full-Dimensional Operations for the Strategic Army of the Early Twenty-First Century* (Fort Monroe, VA: U.S. Army Training and Doctrine Command, 1 August 1994), <http://www.dtic.mil/cgi-bin/GetTRDoc?AD=ADA314276>. See General William W. Hartzog’s introductory comments. Note that the elements of instability outlined in the 1994 *Force XXI Operations* pamphlet bear a striking resemblance to the description of the future operational environment (FOE) as outlined in the current *Army Capstone Concept*.
- ² According to Army doctrine, the Army Design Methodology is a collaborative and iterative process for applying critical and creative thinking to understand, visualize and describe unfamiliar, complex problems and formulate related approaches for solving them. Mission Command is defined as the exercise of authority and direction by the commander using mission orders to enable disciplined initiative within the commander’s intent to empower agile and adaptive leaders in the conduct of unified land operations. According to the Mission Command Center of Excellence, the doctrinal meaning of the term “mission command” includes a philosophy, a warfighting function and an enabling system. It is now much more than a command technique based on decentralization.
- ³ Department of the Army (DA), *The U.S. Army Capstone Concept (ACC)* (Fort Eustis, VA: U.S. Army Training and Doctrine Command, 19 December 2012), pp. 4–11, <http://www.tradoc.army.mil/tpubs/pams/tp525-3-0.pdf>. Of note, the *ACC* functions as a strategic-level Army Design Methodology narrative. It describes the FOE, the problems and challenges the Army will encounter and a strategic approach that serves as a roadmap to navigate future years and achieve desired end-states and outcomes.
- ⁴ DA, *Army Capstone Concept*, pp. iii–11. For the past several decades, the Army’s doctrine consistently referenced the vital nature and essential element of “adaptability” both organizationally and operationally. A review of historical documents and Army Field Manuals—FMs 100-5 and 3-0, *Operations*, FM 22–100, *Military Leadership*, and FM 6–22, *Army Leadership*—from the past 50 years, demonstrates the imperative that doctrine, strategy, operations, tactics, organizations and leaders must be flexible and adaptable in the face of fluid, changing environments, missions, requirements and adversaries, as circumstances may require.
- ⁵ Kurt Lewin, *Group Decision and Social Change* (New York: Holt, Rinehart and Winston, 1958), p. 201.
- ⁶ Readers familiar with Dr. Kurt Gödel’s “incompleteness” theorem; Everett Carl Dolman’s *Pure Strategy: Power and Principle in the Space and Information Age* (London and New York: Frank Cass, 2005); Henry Mintzberg’s *The Rise and Fall of Strategic Planning* (New York: Free Press, 1994); and John Boyd’s OODA (Observe, Orient, Decide, and Act) Loop will also find related commonalities with these concepts. The general idea is that adaptation and refinement in action is a continual process as observations of the environment change and context evolves. See also Donald A. Schön’s *The Reflective Practitioner: How Professionals Think in Action* (New York: Basic Books, 1983) and his concepts “knowing in action” and “reflection in action.”
- ⁷ DA, FM 100-5, *Operations* (Washington, DC: Headquarters, Department of the Army, 1986), p. i, <http://cgsc.contentdm.oclc.org/utills/getfile/collection/p4013coll9/id/893/filename/894.pdf>.
- ⁸ DA, FM 22–100, *Leadership* (Washington, DC: Headquarters, Department of the Army, 31 August 1999), p. vii, <http://www.survivablebooks.com/free%20manuals/1999%20US%20Army%20%20Army%20Leadership%20-%20Be,%20Know,%20Do%20377p.pdf>.

- ⁹ DA, *Army Capstone Concept*, p. iii.
- ¹⁰ Chad Serena, *A Revolution in Military Adaptation: The U.S. Army in the Iraq War* (Washington, DC: Georgetown University Press, 2010), pp. 2–6.
- ¹¹ *Ibid.*, p. 161. See also Eliot Cohen and John Gooch, *Military Misfortunes: The Anatomy of Failure in War* (New York: Random House, 1990), pp. 5–28.
- ¹² Again, note the similarities between Lewin’s findings and the elements of the Army Design Methodology.
- ¹³ Geoffrey Moore, *Dealing with Darwin: How Great Companies Innovate at Every Phase of Their Evolution* (New York: Penguin Group, 2005), p. xiv. Moore asserts that true organizational adaption is manifested in all major core competencies. Organizationally, this relates to the Army’s DOTMLPF (Doctrine, Organization, Training, Materiel, Leadership, Personnel and Facilities) functions. It also relates to the Army’s current operational core competencies of combined-arms maneuver and wide-area security, both stressing a foundational need for organizational and operational adaptability.
- ¹⁴ Jim Collins, *Good to Great: Why Some Companies Make the Leap . . . and Others Don’t* (New York: HarperCollins, 2001), pp. 20–21, 47.
- ¹⁵ John P. Kotter, *Leading Change* (Boston: Harvard Business Review Press, 1996), pp. 16–23.
- ¹⁶ Peter Senge, *The Fifth Discipline: The Art and Practice of Learning Organizations* (New York: Crown Business, 2006), p. xiv. Senge notes that successful “learning” organizations and leaders seek to understand past mistakes and cause–effect relationships. They patiently work to understand the process of change and the interrelationships of organizational variables. This allows for better anticipation of challenges and successful adaptation in uncertain and complex environments.
- ¹⁷ William Gibson, *Neuromancer* (New York: Berkley Publishing Group, 1984). See also Scott Thill, “March 17, 1948: William Gibson, Father of Cyberspace,” *Wired Magazine*, 17 March 2009, http://www.wired.com/science/discoveries/news/2009/03/dayintech_0317.
- ¹⁸ Kenneth Cukier and Viktor Mayer-Schoenberger, “The Rise of Big Data,” *Foreign Affairs*, May/June 2013, p. 28.
- ¹⁹ George H. W. Bush, *National Security Strategy of the United States* (Washington, DC: The White House, 1990), p. 5, <http://nssarchive.us/NSSR/1990.pdf>. See also Martin van Creveld, *The Transformation of War* (New York: Free Press, 1991), p. 2; and Samuel Huntington, “The Clash of Civilizations?” *Foreign Affairs*, Summer 1993.
- ²⁰ George H. W. Bush, “Remarks at the Aspen Institute Symposium in Aspen, Colorado,” 2 August 1990, <http://www.presidency.ucsb.edu/ws/index.php?pid=18731>.
- ²¹ “Revolution in Military Affairs” (RMA) is defined by Williamson Murray and Allan Millet as a phenomenon characterized by a complex mix of tactical, organizational, doctrinal and technological innovations in order to implement a new conceptual approach to warfare. Williamson Murray and Allan R. Millet, eds., *Military Innovation in the Interwar Period* (New York: Cambridge University Press, 1996), pp. 1–5. In this particular case, the RMA was based on the development of what was being referred to as the “Information Age.”
- ²² Frederick Kagan, *Finding the Target: The Transformation of American Military Policy* (New York: Encounter Books, 2006), p. 160.
- ²³ DA, TRADOC Pam 525–5, *Force XXI Operations*, pp. 1–2.

- ²⁴ Murray, *Military Innovation in the Interwar Period*, p. 1. Murray specifically discusses innovation driven by technology, national defense spending and technology's improvement of command and control capabilities. See also Department of the Army, *Sixty Years of Reorganizing for Combat: A Historical Trends Analysis* (Fort Leavenworth, KS: U.S. Army Combat Studies Institute, 1999), <http://usacac.army.mil/cac2/cgsc/carl/download/csipubs/sixty.pdf>. According to the Combat Studies Institute (CSI), over the past 100 years the Army attempted organizational adaptation 11 times, motivated by forecasted threats in the FOE, technological innovations and fiscal austerity.
- ²⁵ Mark Sherry, *The Army Command Post and Defense Reshaping, 1987–1997* (Washington, DC: U.S. Army Center for Military History, 2008), pp. 37–39.
- ²⁶ Lorna Jaffe, *The Development of the Base Force, 1989–1992* (Washington, DC: Office of the Chairman of the Joint Chiefs of Staff, Joint History Office, 1993), pp. 11–15, <http://www.dtic.mil/doctrine/doctrine/history/baseforc.pdf>. See also Sherry, *The Army Command Post*, p. 87.
- ²⁷ Suzanne C. Nielsen, *An Army Transformed: The U.S. Army's Post-Vietnam Recovery and the Dynamics of Change in Military Organizations* (Carlisle, PA: U.S. Army War College, 2010), pp. 5–35, <http://www.strategicstudiesinstitute.army.mil/pubs/display.cfm?pubID=1020>. It would take the catastrophic, system-shocking events of 9/11 to truly be a catalyst of change for the Army. The horror of that day brought the sense of urgency, political support, leadership, drive and mandate for change necessary for bringing about a turning point in the Army's adaptation process.
- ²⁸ Association of the United States Army, "Critical investments must be made now for Army's Future Force," *AUSA News*, June 2013, p. 3, <http://www.ausa.org/publications/ausanews/archives/2013/06/Pages/CriticalinvestmentsmustbemadenowforArmy%E2%80%99sFutureForce.aspx>.
- ²⁹ James G. Pierce, *Is the Organizational Culture of the U.S. Army Congruent with the Professional Development of its Senior Level Officer Corps?* (Carlisle, PA: U.S. Army War College, 2010), p. iii, <http://www.strategicstudiesinstitute.army.mil/pubs/display.cfm?pubid=1015>.
- ³⁰ *Ibid.*, p. 5 (emphasis added).
- ³¹ *Ibid.*, pp. 1–5.
- ³² *Ibid.*, p. iv.
- ³³ Greg Jaffe and David Cloud, *The Fourth Star: Four Generals and the Epic Struggle for the Future of the United States Army* (New York: Three Rivers Press, 2010), p. 295.
- ³⁴ Graham Allison and Phillip Zelikow, *Essence of Decision: Explaining the Cuban Missile Crisis* (New York: Pearson, 1999), p. 168.
- ³⁵ Eliot A. Cohen and John Gooch, *Military Misfortunes: The Anatomy of Failure in War* (New York: Random House, 1990), pp. 5–28.
- ³⁶ Douglas Macgregor, phone interview by Todd Schmidt, Washington, DC, 23 January 2013. Dr. Macgregor recognizes that his views and opinions are, in his own words, "controversial and sometimes scathing."
- ³⁷ James Q. Wilson, *Bureaucracy: What Government Agencies Do and Why They Do It* (New York: Basic Books, 1991), pp. 115–181. See also Richard Stubbing and Richard Mendel, *The Defense Game: An Insider Explores the Astonishing Realities of America's Defense Establishment* (New York: Harper & Row, 1986), p. xii. In *The Defense Game*, Dr. Richard Stubbing, former Duke University professor and 20-year veteran of the Office of Management and Budget, observes that defense spending involves the effort of Army civilians and military officers building and nurturing

political constituencies within the Office of the Secretary of Defense (OSD), Congress and the White House. Senior military leadership must build and gain favor with politicians through promotion of programs and facilities that benefit key states and congressional districts. Funds are dedicated to pet projects and cannot be shifted, in times of austerity, to protect and ensure readiness, training and modernization.

³⁸ Murray and Millett, *Military Innovation in the Interwar Period*, p. 300.

³⁹ Nielsen, *An Army Transformed*, pp. 11–12.

⁴⁰ Alan Beyerchen, “Clausewitz, Nonlinearity, and the Unpredictability of War,” *International Security*, Winter 1992–1993, pp. 87–88.

⁴¹ Lawrence Freedman, “Escalators and Quagmires: Expectations and the Use of Force,” *International Affairs*, vol. 67, no. 1, January 1991, p. 16.

⁴² Macgregor, phone interview, 23 January 2013.

⁴³ James Kitfield, “Army Chief Struggles to Transform Service During War,” *National Journal*, 29 October 2004, <http://www.govexec.com/federal-news/2004/10/army-chief-struggles-to-transform-service-during-war/17929>.

⁴⁴ Government Accountability Office, GAO-01-401, *Kosovo Air Operations* (Washington, DC: Government Accountability Office, 2001), pp. 1–4. Investigations into the lessons learned from the Task Force Hawk deployment found issues for improvement in five broad areas: Army doctrine must better support joint service operations; vast improvements in command, control, communications, computers and intelligence were needed; unit and individual training must be updated to reflect the requirements of the FOE and joint operations; the Army had significant capability shortfalls that impeded its deployment and performance requirements; and, last, the Army required significant force structure changes to remain relevant in the 21st century.

⁴⁵ Barbara Starr, “Battle of the generals continues with article defending Rumsfeld: Four retired generals fire back at critics of Defense Secretary,” CNN, 17 April 2006, <http://www.cnn.com/2006/POLITICS/04/17/rumsfeld>.

⁴⁶ Peter J. Schoomaker, phone interview by Todd Schmidt, Tampa, FL, 12 January 2013.

⁴⁷ Michael Shaler, phone interview by Todd Schmidt, Steamboat Springs, CO, 29 January 2013. According to Shaler, Schoomaker considered the indoctrination of a warrior ethos, more so than the transformation of the Army, as his most important effort. Upon retirement as the CSA, Schoomaker was recognized in Senate Resolution 139 (110th Congress) for what he considered to be both his greatest achievement and his most important legacy—instilling a warrior ethos.

⁴⁸ Colin Gray, “War: Continuity in Change, Change in Continuity,” *Parameters*, Summer 2010, pp. 5–13.

⁴⁹ Ernesto Londoño, “Operation Iraqi Freedom ends as last combat soldiers leave Baghdad,” *Washington Post*, 19 August 2010, <http://www.washingtonpost.com/wp-dyn/content/article/2010/08/18/AR2010081805644.html>.

⁵⁰ Murray, *Military Innovation in the Interwar Period*, p. 1. See also Department of the Army, *Sixty Years of Reorganizing for Combat* (Fort Leavenworth, KS: U.S. Army Combat Studies Institute, 1999).

⁵¹ Department of Defense, *Defense Budget Priorities and Choices* (Washington, DC: Office of the Secretary of Defense, 2012), p. 1, http://www.defense.gov/news/Defense_Budget_Priorities.pdf.

- ⁵² *Ibid.*, pp. 1–11. Commonly referred to as the “fiscal cliff” and sequestration, an additional \$500 billion in defense spending reductions was written into the American Taxpayer Relief Act of 2012, dependent upon congressional actions in March 2013, to reduce national debt and deficit spending.
- ⁵³ Paul McLeary, “Odierno Outlines Combat, Budget Strategies,” *DefenseNews*, 1 November 2012, <http://www.defensenews.com/article/20121101/DEFREG02/311010008>. For example, in November 2012 General Odierno announced that the Army, the Marine Corps and the Special Operations Command were joining together to form the Office of Strategic Landpower in an attempt to protect budgetary interests and the future of ground forces. More recently and more telling, Odierno and Secretary of the Army John McHugh issued a 13 January 2013 memorandum, “Risk Mitigation in the Face of Fiscal Uncertainty,” that outlines a 30 percent cut to the Army’s Operation and Maintenance budget. The impacts are deep and wide-ranging, impacting 74 installations worldwide, stalling all major contracts for research and development, freezing all civilian hiring and terminating temporary employees, reducing community and recreational activities, and, most profound, cutting resources that recruit, equip and train Soldiers. The Joint Chiefs of Staff, in a show of solidarity, issued a grave warning in a letter to Congress on 14 January, signed by all seven members. The letter declares that “the readiness of our armed forces is at a tipping point” and that DoD is on the brink of creating a hollow force. It is unable to train and equip force levels it cannot support and does not need, while being forced to pursue procurement programs it cannot afford and does not want. Secretary of Defense Leon Panetta, three days later, on 17 January 2013, declared this episode of fiscal uncertainty to be the greatest threat to national security. See also Lance Bacon, “Belt-tightening Orders: Training, Gear and Maintenance Take Deep Cuts,” *Army Times*, 28 January 2013, pp. 18–19.
- ⁵⁴ Raymond T. Odierno and John McHugh, *Army Strategic Planning Guidance* (Washington, DC: Headquarters, Department of the Army, 2012), <http://usarmy.vo.llnwd.net/e2/c/downloads/243816.pdf>.
- ⁵⁵ *Ibid.* See also Huba Wass de Czege and Richard Hart Sinnreich, *Conceptual Foundations of a Transformed U.S. Army*, Land Warfare Paper 40 (Washington, DC: Association of the United States Army, March 2002), pp. 7–16, <http://www.ausa.org/SiteCollectionDocuments/ILW%20Web-ExclusivePubs/Land%20Warfare%20Papers/lwp40.pdf>.
- ⁵⁶ Wass de Czege and Sinnreich, *Conceptual Foundations*, p. 31.
- ⁵⁷ Stuart E. Johnson et al., *A Review of the Army’s Modular Force Structure* (Santa Monica, CA: RAND, 2012), p. xi, http://www.rand.org/content/dam/rand/pubs/technical_reports/2012/RAND_TR927-2.sum.pdf.
- ⁵⁸ Raymond T. Odierno, “Today’s Army: The Strength of Our Nation,” *ARMY*, October 2012, p. 25, http://www.ausa.org/publications/armymagazine/archive/2012/10/Documents/Odierno_1012.pdf.
- ⁵⁹ In Wass de Czege and Sinnreich, *Conceptual Foundations*, p. 31, this is defined as 96 hours or less.
- ⁶⁰ Richard Hart Sinnreich, “For Army Combat Units, How Small Is Too Small?” *ARMY*, February 2013, p. 16.
- ⁶¹ Raymond T. Odierno, “The Way Ahead,” address to students, Command and General Staff College, Fort Leavenworth, KS, 10 April 2013. General Odierno’s comments were for attribution. See also McLeary, “Odierno Outlines Combat, Budget Strategies.”
- ⁶² Odierno, “The Way Ahead.” See also Jacquelin Hames, “Chief of Staff of the Army hopes to create balanced, stronger Army for 2020,” *Soldiers Magazine*, June 2012, p. 18.
- ⁶³ Johnson et al., *A Review of the Army’s Modular Force Structure*, p. xi.

- ⁶⁴ *Ibid.*, p. 41. The study suggests that the desire for a third maneuver battalion is driven by BCT commanders who were, most likely, unfamiliar, and thus uncomfortable, with the capabilities of their organic reconnaissance, surveillance and target acquisition (RSTA) squadrons.
- ⁶⁵ Vago Muradian, “Odierno pushes BCT revamp, 4 must-have programs,” *Army Times*, 5 November 2012, pp. 26–27. Of note, adding a third maneuver battalion to the current BCT construct would require the additional deactivation of five BCTs to meet this potential change. Michelle Tan, “Plan to Revamp BCTs Still Months Off,” *Army Times*, 25 February 2013, p. 20.
- ⁶⁶ Wass de Czege and Sinnreich, *Conceptual Foundations*, pp. 7–20.
- ⁶⁷ General Martin E. Dempsey, Chairman, Joint Chiefs of Staff, speaking at the Association of the United States Army’s inaugural General Bernard W. Rogers Strategic Issues Forum, 20 September 2012, quoted in Dennis Steele, “Setting the Azimuth for Joint Force 2020: Globally Integrated Operations and Mission Command,” *ARMY*, November 2012, p. 27, http://www.ausa.org/publications/armymagazine/archive/2012/11/Documents/Steele_1112.pdf.
- ⁶⁸ DA, FM 6–22, *Army Leadership*, describes adaptive leaders as being capable of identifying changes in the operational environment and possessing the mental agility and sound judgment to respond with well-reasoned, critical, creative thinking and innovative behavior that is effective in dealing with the change. They are comfortable with the concepts of Mission Command and mission orders and with the ambiguity and uncertainty inherent in unfamiliar, complex operational environments. They understand and embrace the importance of dialogue, collaboration, consensus and continuous learning. See also Edward C. Cardon and Steve Leonard, “Unleashing Design: Planning and the Art of Battle Command,” *Military Review*, March–April 2010, http://usacac.army.mil/CAC2/MilitaryReview/Archives/English/MilitaryReview_20100430_art004.pdf; and William J. Cojocar, “Adaptive Leadership in the Military Decision Making Process,” *Military Review*, Mission Command Symposium Special Edition, June 2012, http://usacac.army.mil/CAC2/MilitaryReview/Archives/English/MilitaryReview_20120630MC_art007.pdf.
- ⁶⁹ Gray, “War: Continuity in Change, Change in Continuity,” p. 6 (emphasis added).
- ⁷⁰ Edward C. Cardon, “Expectations of SAMS Graduates,” address to Class 13-01, School for Advanced Military Studies, Fort Leavenworth, KS, 17 September 2012. Major General Cardon’s comments were for attribution. He was speaking in the context of serving as a current division commander, having also served as Deputy Commanding General, U.S. Combined Arms Center for Leader Development and Education, and Deputy Commandant, U.S. Army Command and General Staff College at Fort Leavenworth.
- ⁷¹ General Robert Cone, Commanding General, U.S. Army Training and Doctrine Command, “Transitioning the Army,” address to students, Command and General Staff College, Fort Leavenworth, KS, 8 April 2013. General Cone’s comments were for attribution.
- ⁷² Cohen and Gooch, *Military Misfortunes*.
- ⁷³ Etienne Wenger, *Communities of Practice: Learning, Meaning, and Identity* (Cambridge: Cambridge University Press, 1999), pp. 3–17.
- ⁷⁴ Odierno, “The Way Ahead.”
- ⁷⁵ Major General Gordon B. Davis, Jr., personal interview by Todd Schmidt, Fort Leavenworth, KS, 28 March 2013. Davis is currently serving as the Deputy Chief of Staff, Operations and Intelligence, Supreme Headquarters Allied Powers Europe, North Atlantic Treaty Organization in Casteau, Belgium.

⁷⁶ *Ibid.*

⁷⁷ *Ibid.* Davis elaborates that adaptive leaders must possess skill sets that include: how to think, both critically and creatively; how to collaborate; how to communicate, both orally and by written word; how to use sound judgment and assessment; how to be more self-aware and self-regulating, i.e., more disciplined; and how to show empathy and interpersonal tact. Last, and most important, according to Davis, is the ability to listen and understand others.

⁷⁸ Note that in 2013, the Army launched a new organizational campaign, “The Army—Our Profession.” According to the Army’s Center for the Army Profession and Ethic official website, <http://cape.army.mil/aaop>, “the Secretary of the Army and Chief of Staff, Army directed the Commander, Training and Doctrine Command, to conduct a critical review to assess how protracted years of war impacted members of the Profession of Arms. This Army-wide review took the form of a year-long campaign of learning with focus groups at five major installations, 15 symposiums and two Army-wide surveys that reached more than 40,000 members of the active and reserve components and the DA Civilian Corps. The results of this assessment led to the development of this program for calendar year 2013.” The goals of the campaign are to rebuild the Army profession by reaffirming a common understanding of the profession and recommitting to a culture of service and Army ethic.

⁷⁹ Wilson, *Bureaucracy*, pp. 16–26.

⁸⁰ Colonel Thomas Graves, personal interview by Todd Schmidt, Fort Leavenworth, KS, 10 January 2013.

⁸¹ Williamson Murray, *Military Adaptation in War: With Fear of Change* (New York: Cambridge University Press, 2011), pp. 308–315; Murray and Millett, *Military Innovation in the Interwar Period*, pp. 300–328; Davis, *The Challenge of Adaptation*, pp. 111–117.

⁸² Murray, *Military Adaptation in War*, pp. 308–315.

⁸³ Murray and Millett, *Military Innovation in the Interwar Period*, pp. 300–328; Davis, *The Challenge of Adaptation*, pp. 111–117.

⁸⁴ Davis, personal interview. Davis echoes General Cone’s earlier characterization of the Army transitioning from an “Army of War” to an “Army of Preparation.”

⁸⁵ Senior Officer Oral History Program, “Changing the Army: An Oral History of General William E. DePuy,” interviewed by LTC Ronnie L. Brownlee and LTC William J. Mullen (Carlisle Barracks, PA: U.S. Army Military History Institute, 1986), p. 181.

⁸⁶ H. R. McMaster, “On War: Lessons to be Learned,” *Survival: Global Politics and Strategy*, vol. 50, no. 1, 2008, p. 26.

⁸⁷ Carl von Clausewitz, *On War*, Michael Howard and Peter Paret, eds. and trans. (Princeton, NJ: Princeton University Press, 1984), pp. 88–89.

⁸⁸ McMaster, “On War,” p. 19 (emphasis added); H. R. McMaster, “Moral, Ethical, and Psychological Preparation of Soldiers and Units for Combat,” *Naval War College Review*, Winter 2011, pp. 8–10, <http://www.usnwc.edu/getattachment/f643a1d2-e5b7-46eb-8f26-10c2dcb21e24>.

⁸⁹ Department of the Army, *Sixty Years of Reorganizing for Combat: A Historical Trend Analysis*, CSI 14 (Fort Leavenworth, KS: Combat Studies Institute, 1999). This study was a historical trends analysis of the last 60 years of the 20th century.

- ⁹⁰ Examples include both Antulio J. Echevarria II, “What Is Wrong with the American Way of War?” *PRISM*, vol. 3, no. 4, September 2012, <http://www.ndu.edu/press/american-way-of-war.html>; and John W. Kingdon, *Agendas, Alternatives, and Public Policies*, 2nd ed. (Boston: Addison-Wesley Educational Publishers, 1995).
- ⁹¹ John S. Brown, “Historically Speaking: Defense Transformation Redux,” *ARMY*, November 2012, pp. 23–26, http://www.ausa.org/publications/armymagazine/archive/2012/11/Documents/HistoricallySpeaking_1112.pdf.
- ⁹² David Barno, “Military Brain Drain: The Pentagon’s top brass is driving away all the smart people,” *Foreign Policy*, 13 February 2013, http://www.foreignpolicy.com/articles/2013/02/13/military_brain_drain.
- ⁹³ James Kitfield, “The View from the E Ring,” *National Journal*, 28 July 2012, <http://m100group.wordpress.com/2012/07/28/the-view-from-the-e-ring-by-james-kitfield>. In a separate but related article, Kitfield warned, “Washington nearly always gets drawdowns wrong,” stating that it paves the way for military calamity. Kitfield, relying on selective historical examples, cautions that the United States continually mishandles interwar periods, cutting budgets and manpower too deeply over extended timeframes and “ruining military preparedness and goading opportunistic foes.” James Kitfield, “The Risks of Military Drawdowns,” *National Journal*, 28 July 2012, <http://m100group.com/2012/07/29/the-risks-of-military-drawdowns-by-james-kitfield>.
- ⁹⁴ Martin E. Dempsey, General Dempsey’s Remarks at the Ambassador S. Davis Phillips Family International Lecture Series at Duke University, 12 January 2012, <http://www.jcs.mil/speech.aspx?id=1673>.
- ⁹⁵ *Ibid.*
- ⁹⁶ Odierno, “The Way Ahead.”
- ⁹⁷ DA, *Sixty Years of Reorganizing for Combat*, pp. 3–6; Michael Matheny, *Carrying the War to the Enemy: American Operational Art to 1945* (Norman, OK: University of Oklahoma Press, 2011), pp. xiv, 45.
- ⁹⁸ Schoomaker, personal interview, 12 January 2013.
- ⁹⁹ McMaster, “On War,” p. 26; Peter P. Perla and ED McGrady, “Why Wargaming Works,” *Naval War College Review*, vol. 64, no. 3, Summer 2011, p. 126, <http://www.usnwc.edu/getattachment/413220cd-a209-4447-bac2-af6cdaeabd4f>.
- ¹⁰⁰ Charles Darwin, *On the Origin of Species by Means of Natural Selection* (London: W. Clowes and Sons, 1860), p. 62, <http://www.gutenberg.org/files/22764/22764-h/22764-h.htm>.