

JANUARY–FEBRUARY 2014

ARMY SUSTAINMENT

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LOGISTICS CHALLENGES IN AFRICOM

Plus:

Gen. Cone on

**Strategic
Landpower for the
Company Commander**

*Accounting for Government
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**A Decisive Action
Training Environment
for Lieutenants**

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“By focusing on how operations affect the human domain, strategic landpower provides a unique capability to prevent and shape conflicts, as well as win them.”

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Sustainment's Next Challenge: Strategic Landpower

■ By Maj. Gen. Larry D. Wyche



“ Our leaders and Soldiers must be trained and ready. They must understand the equipment and systems on hand and the capabilities of our strategic partners, contractors, and the global environment. Solutions must be precise and responsive, driven by forecasted requirements and deliverables. ”

The Army is in a significant period of transformation. Its mission, focus, and resources are shifting to meet the needs of a global environment unlike any we have ever faced. Our leaders are determining how the Army will prepare for future conflicts.

Although our exact future challenges are unknown, we know strategic success lies in winning the clash of wills. This is accomplished by influencing human behavior through support or, if necessary, compelling our adversaries. These actions most often occur on land between humans face to face.

These physical, cultural, and social environments are referred to as the “human domain.” The Army, Marine Corps, and U.S. Special Operations Command have partnered to create the Office of Strategic Landpower to leverage their expertise within this domain.

The Office of Strategic Landpower

The Office of Strategic Landpower will explore the confluence of land, cyber, and human domains. It seeks to integrate the best lessons learned from our recent conflicts and add mechanisms to address the new and varying environments we will face. We know that our reflections must not be limited to the lessons from the past 12 years but must also include conflicts over our entire history. This includes the military conflicts in Vietnam, Bosnia, and Kosovo that highlighted the need for increased consideration of the human domain.

Accompanying the mission changes is an adjustment in regional focus. Strategic guidance has indicated a pivot in foreign policy efforts from the Middle East to the Asia-Pacific region. Sustainment must be prepared to respond to this drastically

different strategic environment and develop appropriate capabilities—organizational structures, equipment, and sustainment practices. At the same time, each regional force, which is aligned with a geographic combatant commander, must be supported by a sustainment organization tailored to provide the appropriate sustainment support to match its assigned area and mission.

Strategic landpower requires continual support across the entire prevent, shape, and win framework. By focusing on how operations affect the human domain, strategic landpower provides a unique capability to prevent and shape conflicts, as well as win them.

For sustainment to be effective across the entire prevent, shape, win framework, we must be in tune with the needs of every combatant commander throughout the world. Responding to their demand signals, sustainers must recognize and support unique needs within each theater based on culture and language, training requirements, and equipment needs. Combatant commanders deserve support forces that are versatile and trained for both ongoing and contingency operations.

Globally Responsive Sustainment

Several initiatives within the Combined Arms Support Command have laid the groundwork for initial efforts to support strategic landpower. Chief of these is the globally responsive sustainment concept, which emphasizes six attributes that must define any sustainment system supporting our future force:

- ☐ Agile and flexible.
- ☐ Integrated.
- ☐ Protected.
- ☐ Trained and ready.

- Precise and responsive.
- Affordable.

Every tenet of globally responsive sustainment is essential for sustainment organizations to successfully support and execute strategic landpower.

Strategic landpower's requirements can be viewed through an analysis of how globally responsive sustainment will transform sustainment. As the Army returns to focusing on garrison operations and responds to overseas conflicts, sustainment must be agile and flexible to appropriately leverage personnel, support structures, and technology when required.

This demands the ability to support multiple operations in a variety of environments with vastly different infrastructures. These operations must be integrated and interoperable, not just within the Army but also across joint and strategic partners. Sustainment units must be able to defend their formations and safeguard their systems, to include shared mobility and communications, ensuring they maintain the firepower of the fighting forces they sustain.

Our leaders and Soldiers must be trained and ready. They must understand the equipment and systems on hand and the capabilities of our strategic partners, contractors, and the

global environment. Solutions must be precise and responsive, driven by forecasted requirements and deliverables. With a smaller and fiscally constrained force comes a smaller sustainment footprint, practical and affordable solutions, and the removal of redundancies and inefficient processes.

Leader Development

Leader development is the basis for success in strategic landpower. A properly trained leader will adapt to the rapidly changing environment and react quickly and precisely. Leaders must be capable of deeply considering the operational environment and the effects their actions will have on themselves, Army forces, partners, the enemy, and civilians alike.

As we transition, we have to fill some identified gaps. Over the past 12 years, we have experienced atrophy in some of our sustainment skills. We must repair those skills in order to support future requirements.

To facilitate becoming masters of our craft, we have published training support materials on the Sustainment Unit One Stop website to enhance units' operational readiness. Our efforts so far have been focused on brigade combat teams (BCTs) but will expand to the echelons above the

BCT in the near future. These efforts will eventually extend to training support systems so units can leverage live, virtual, and constructive capabilities. Realistic training will be paramount to creating adaptive and responsive sustainment units.

These are just the beginning of initiatives that will have an impact on strategic landpower and the direction for our future force. Despite the excellent accomplishments already made, the work is far from complete. A feature article in the next issue of *Army Sustainment* will discuss the impact of strategic landpower on the sustainment community. It will explain current initiatives and their compatibility with strategic landpower and explore a way ahead for future efforts. Supporting strategic landpower is an opportunity to better meet the needs of the future force—an opportunity that sustainers are ready for and prepared to accept.

Maj. Gen. Larry D. Wyche is the commanding general of the Combined Arms Support Command and Sustainment Center of Excellence at Fort Lee, Va.



The Sustainment Unit One Stop can be accessed at http://www.cascom.army.mil/g_staff/g3/SUOS/index.htm.



Strategic Landpower for the Company Commander

Leading the U.S. Army into the 21st Century

■ By Gen. Robert W. Cone and Capt. Jon D. Mohundro

A generation of officers grew up solving strategic dilemmas at the company and platoon levels in Iraq and Afghanistan. Well versed in the requirements and responsibilities of an Army at war, this generation must guide the Army into an ever-evolving and uncertain future.

In order to navigate through the complexities in front of us, the Army needs capable, adaptable leaders now more than ever who champion the Army's strategic purpose and goals. One of the most important discus-

sions over the next few years will be how company commanders understand and implement the Army's central role in strategic landpower.

Over the last two years, the Army has put a lot of great people to work examining every facet of our training, doctrine, and warfighting capability. We did not do this to examine where we stand today. Rather, this effort was aimed at figuring out two things: what kind of Army we will need to meet future challenges, and what we have to do to build that Army as we continue fighting

in Afghanistan and remain engaged throughout the world.

Much of what we concluded is available in a single brief document: Training and Doctrine Command Pamphlet 525-3-0, The U.S. Army Capstone Concept, <http://www.tradoc.army.mil/tpubs/pams/tp525-3-0.pdf>. If you have not read it yet, please do so.

We won't summarize an already brief document in this article. Instead, we will discuss how the newest and most vital ideas relate to the execution level—the company.



Capt. Brian D. Costa waits for a change of command ceremony to begin at Joint Base Balad, Iraq, May 22, 2009. (Photo by Spc. Kiyoshi C. Freeman)

Company-Level Strategic Landpower

While things have been written about strategic maneuver, nothing has been written about its application at the tactical level. Some ideas may be new, but much of what must be done remains the same—training, standards, and understanding the human environment. This is a result of the unchanging character of the Army's basic strategic problem and mission. As part of the joint force, our Army must retain its ability to protect U.S. national interests, execute any mission assigned to us, and win on any battlefield around the world.

Given our national strategy, we are

to thrive within the parameters of mission command. Developing leaders who can do so, while providing clear task and purpose to their subordinates, will be critical to the success of any mission across the range of military operations.

Effective Army commanders, including those at the company level, do not use fiscal constraints as an excuse for failing to develop the best possible mix of training, equipment, and regional expertise they can within their formations. Rather, they motivate their people and guide their units in a way that makes optimal use of available resources to create adaptive, effective forces.

It was often platoon and company leaders who took the lead solving strategic issues in Iraq and Afghanistan. It will continue to be platoon and company leaders who keep the Army the well-trained and globally responsive force our nation needs to deter our adversaries, protect our friends, and defeat our enemies in the 21st Century.

required to field an Army capable of waging war decisively. Fielding a ready and responsive force with sufficient depth and resilience to wage sustained land combat is central to our mission, and that force must be able to conduct both combined arms maneuver and wide area security. A ready, robust, responsive force deters adversaries, reassures allies, and when necessary, compels our enemies to change their behavior.

Maintaining such a force requires high levels of adaptability throughout each echelon of the Army. Only Soldiers with tactical skills and operational flexibility can effectively respond to changing tactical situations in support of our nation's strategic goals and interests.

This is where company commanders fit into the concept of strategic landpower. Much like company-grade officers did in Iraq and Afghanistan, the company commander of the future must be mentally agile enough

Our Army has three primary and interconnected roles: prevent conflict, shape the international environment, and win the nation's wars. The company commander has important responsibilities in each of these.

Prevent Conflict

It is prudent here to define conflict. Since the term gets thrown around a lot and attached to a lot of different situations, it is easy to misunderstand the doctrinal meaning. Conflict is an armed struggle or clash between organized groups within a nation or between nations in order to achieve limited political or military objectives. Irregular forces frequently make up the majority of enemy combatants we face now, and may continue to do so in the future. Conflict is often protracted, geographically confined, and constrained in the level of violence. Every conflict holds the potential to escalate into major combat operations.

Many of the contingencies to

which the United States responded militarily in the past 50 years have been appropriately defined as conflicts. These same types of contingencies can reasonably be expected in the future, but with the addition of cyberspace.

As was true during the Cold War, many of our greatest successes in the future will not occur on the battlefield; rather, maintaining peace may be our greatest achievement. This will be no easy task, as global tensions and instability increase in ungoverned or weakly-governed spaces around the world. History has taught us that without a capable, highly trained land force, the United States has little influence in many of those spaces. That land force, our Army, must remain the best equipped, best trained and most combat ready force in the world if it is to have the strategic effect we seek. That level of readiness is built from the bottom up.

This is the first critical point where company commanders must help shape the future. As owners of the training schedule, commanders have a critical role in developing team, squad, and platoon skills. Commanders ensure that broadening training like language, geographical, and cultural familiarization is done effectively and rigorously.

Soldiers from the generation that fought in Iraq and Afghanistan will not be satisfied with training focused on artificial scenarios and made-up adversaries, so their commanders need to be innovative about preparing well-coordinated, realistic training. Subordinates must be challenged and feel their challenges have a direct linkage to future operations. In order not to lose 12 years of combat-proven leader development, company-grade officers must find a balance between building an Army prepared for the range of military operations and succumbing to pressure to "get back to the way it used to be."

Unfortunately, possessing such a trained and ready force is useless if it cannot affect regions where trouble is brewing. As units reposition

from overseas bases and return to the United States, it becomes more crucial than ever for the Army to adopt an expeditionary mindset and improve its expeditionary capability.

To do so, the Army is aligning units to specific geographical regions and arranging them into scalable and tailored expeditionary force packages that meet the needs of the joint force commander across the range of military operations. In short, our Army will be better postured to generate strategic influence anywhere in the world and, as part of the joint force, deter aggression.

In this construct, company commanders must conduct operational environment training specific to their regions. Becoming familiar with the people, cultures, and languages of the region in which one's unit will operate is critical to the success of a CONUS-based Army. Conventional-force companies learned much over the past 12 years as they executed missions historically reserved for special operations forces.

War is fundamentally a human endeavor, and understanding the people involved is critically important. Company commanders cannot ignore the hard-won lessons of their predecessors by ignoring one of the special operations forces' key tasks of understanding the operational environment. Those who meet this intent and enforce standards during this training will ensure we pay those lessons forward to the next generation.

Shape the Operational Environment

During peacetime, the Army is continuously engaged in shaping the global environment to promote stability and partner nation capabilities. We do this for several reasons, the most important of which is maintaining peace in pursuit of American national security interests.

Where conflict has already broken out, engagement helps keep it contained and may even lead to a peaceful resolution. By helping to build partner capacity and trust, forward-engaged Army units greatly add to



Capt. Sarah N. Holley, the Headquarters and Headquarters Company commander for the 3rd Sustainment Command (Expeditionary), passes the flag to 1st Sgt. Jonathan Napier, during a change of command ceremony at Natcher Physical Fitness Center, Fort Knox, Ky., Jan. 13, 2011. (Photo by Staff Sgt. Michael Behlin)

regional and global stability. Moreover, by building strong relationships of mutual trust, we facilitate access and set the conditions for success in any future combined operation in a particular region or country.

But what are shaping operations, and how are they executed at the company level? Shaping operations are defined as those operations occurring at any echelon that create or preserve conditions for the success of the decisive operations. Thus, engagement by regionally aligned forces positively shapes the environment in which the Army operates throughout the range of military operations.

This aligns with the notion of the "strategic corporal," which recognizes that in the information age the actions of individuals and small groups can have widespread impact well beyond what was intended at the time. Every action has a reaction, and it is necessary for junior officers to be aware of the role their Soldiers and units play in the overall strategic goals of our nation.

As part of regionally aligned shaping operations, the Army will employ a careful mix of rotational and forward-deployed forces, develop relationships with foreign militaries, and conduct recurring training exercises with foreign partners to demonstrate the nation's enduring commitment to allies and friends.

When we share mutually beneficial interests with an ally, the Army enhances that partner's self-defense capacity and improves its ability to serve as a capable member of a future military coalition. More capable allies generate a stabilizing influence in their region, and tend to reduce the need for American military interventions over time.

Shaping operations do not end with planned training engagements by forward deployed units. Other actions the units or even small groups of individual Soldiers take can have a shaping effect. Those actions will run the gamut from brigade- or division-sized assistance after a natural disaster to a single act of kindness to a for-

eign student in an Army school who later rises to high levels in his nation's armed forces.

Regardless of the specific activities that have a shaping effect, all should convey to our intended audiences the clear message that, while we are committed to peace, our nation protects its friends and defends its interests. Instilling this understanding among our Soldiers and junior NCOs is one of the vital roles the company-grade officer plays in the execution of strategic landpower.

But there is a caveat. What may be the standard for us is not necessarily useful or welcomed by our host nation partners. So, shaping also entails tailoring our delivery of security assistance to our counterparts in ways appropriate for their culture and military capabilities. Company commanders can gain great success here by applying key interpersonal skills to be understanding and humble when dealing with officers, NCOs, and soldiers from other armies.

Win the Nation's Wars

Despite our best efforts to shape a stable global environment and prevent conflict, violence is likely to remain endemic to the human condition. It has been said, "Only the dead have seen the end of war." While we do everything possible to prevent the outbreak of war, we must ensure there never will be a day when the U.S. Army is not ready to fight and win wars in defense of our nation.

What is a war? Historically, war has been defined as a conflict carried out by force of arms, either between nations or between parties within a nation. However, as we consider hostile acts in cyberspace, the definition of war and acts of war will continue to evolve. For example, large-scale cyber attacks against government operations or critical infrastructure—such as in the 2008 Russian-Georgian conflict—can reasonably be considered acts of war. Leveraging the technological savvy of today's Soldiers requires leaders with an en-

gaged interest in their development. This will require junior leaders from the same generation who are as adept at leader development as they are technologically competent.

To defend our nation, the Army must maintain the capacity to conduct strategically decisive land operations anywhere in the world. Though we will always conduct such operations as part of a joint force, we also acknowledge that war is a clash of wills that requires the ethical application of violence to compel change in human behavior.

Here, company commanders make a dramatic contribution to the application of strategic landpower by being tactically and technically proficient in the execution of combined arms maneuver and wide-area security. Without successful tactical execution, the best strategic concepts are doomed to failure.

The U.S. Army Capstone Concept lays out the details of what capabilities the Army must sustain and provides some guidance on how the force may be employed in the future. But it all boils down to one crucial point; an Army that cannot win on the battlefield is of little worth to the security of the nation.

As everyone is aware, we are facing austere times ahead. This fiscal reality cannot be an excuse for not doing our duty or losing sight of our purpose. This country will one day—maybe soon—ask us to deploy to some distant land, close with and destroy an enemy, and then build a secure and lasting peace. Our Army is uniquely qualified to ensure the training necessary to make those things happen, thanks to the strength of our NCO corps. Commanders must leverage the experience of their senior NCOs and find creative ways to properly train the fundamentals, despite resource constraints. We've successfully done it before in our Army, and we are counting on our young leaders to do it again.

It was often platoon and company leaders who took the lead solving

strategic issues in Iraq and Afghanistan. It will continue to be platoon and company leaders who keep the Army the well-trained and globally responsive force our nation needs to deter our adversaries, protect our friends, and defeat our enemies in the 21st Century. The U.S. Army must have company commanders who understand Strategic Landpower and their role in it. Seek out opportunities to ingrain your training events within the framework of Strategic Landpower. Write articles for your branch's professional journal discussing the impacts of Strategic Landpower.

You can find the Strategic Landpower White Paper at http://www.arcic.army.mil/app_Documents/Strategic-Landpower-White-Paper-28OCT2013.pdf, and on company commander discussion forums. This white paper is the primary reference for Strategic Landpower concepts and the one jointly approved by the Army Chief of Staff, the Marine Corps Commandant, and the commander of U.S. Special Operations Command.

It is the responsibility of senior Army leaders to set the conditions to make you, and our Army, successful. Your senior leaders appreciate what you do every day. These will be challenging but exciting times, and I thank you for your service and sacrifice as we move toward making the Army of 2020 and beyond the best in the world.

Gen. Robert W. Cone is the commanding general of Training and Doctrine Command, Fort Eustis, Va.

Capt. Jon D. Mohundro is a strategic planner in the Training and Doctrine Command Commander's Planning Group. He is a logistics officer with eight years experience. His previous assignments include command of a Forward Support Company in the 1st Cavalry Division.

The “Clausewitz” of Logistics: Henry E. Eccles

■ By Dr. Christopher R. Paparone and George L. Topic Jr.

The influence of strategists and military theorists ebbs and flows over time based on an array of factors. For example, the seminal work of Carl Von Clausewitz, *On War*, was relegated to relative obscurity from the late 1800s until the end of the Vietnam War when the U.S. military “discovered” its value. Writings about military logistics, especially from a theoretical perspective, are prone to quickly lose influence and relevance because of changes in technology, operational support concepts, the nature of military operations, and the perceived technical nature of logistics.

We offer that this is not the case with the writings of Navy Rear Adm. Henry E. Eccles.

Eccles enjoyed a long and remarkable career, serving as a line officer in combat against the Japanese during World War II, then as a logistician, a strategic planner, and ultimately a key faculty member of the Naval War College in Rhode Island. After his retirement in 1952, Eccles remained active as a writer, strategist, and supporter of the Naval War College until his death in 1986. Shortly before Eccles’ death, the college named its library in his honor.

Eccles’ ideas have remained relevant through the years and his most important work, *Logistics in the National Defense*, contains insightful frameworks and concepts applicable today. In fact, the book is remarkable for both its scope and its historical references to World War II and Cold War logistics challenges that could be recontextualized for current operations in Afghanistan.

Our short column offers no chance to describe or even summarize the

many important ideas and insights from Eccles’ writings. However, we want to offer an appreciation of some of the ways that his thinking presaged how military logistics would evolve in later decades.

In 1959, *Logistics in the National Defense* was the first significant attempt to describe the relationship of logistics to strategy and tactics. Eccles’ writings illustrate what we call today the operational level of war and outline the complex interrelationships that exist across the government, the services, and the force generating components of the enterprise.

Eccles’ deep and clear understanding of these relationships makes his derivative concepts useful today. The most important aspect of his synthesis is the recognition that all of the relationships combine—and must be managed—to produce the required outcome: effective support to the combat force. Eccles is credited with perhaps the most powerful idea in all of military logistics theory: logistics serves as the bridge between a nation’s economy and its forces and defines the operational reach of the joint force commander.

Eccles also depicted the “spectrum of conflict” relevant enough that it could come out of a freshly printed operational doctrine manual today. One of the most interesting concepts that Eccles developed was the metaphor of “the logistics snowball,” which illustrates that the larger the size of logistics forces forward, the more self-consuming they become. This is the reason that today we seek to keep a small logistics footprint forward. Similarly, his writings described the now-ubiquitous disci-

pline of supply chain management—more than 20 years before the term was first used—as a central aspect of military logistics.

Eccles’ time in the academic community gave him the freedom to develop much of the work and many of the ideas he is known for today. We urge our senior logistics officers to follow this calling. It may well be that some officers’ greatest contributions to our future can be made after they finish their military service.

We ask the logistics community to think about who might be the Henry Eccles of today. It is clear that we will need him or her to face the challenges that await us and, more importantly, the next generation of logisticians in the years ahead.

Dr. Christopher R. Paparone is the dean of the College of Professional and Continuing Education at the Army Logistics University at Fort Lee, Va.

George L. Topic Jr. is a retired Army colonel and the vice director for the Center for Joint and Strategic Logistics at the National Defense University at Fort McNair, Washington, D.C.

Editor’s note: Eccles’ book Logistics in the National Defense is available online as Marine Corps Fleet Marine Force Reference Publication 12-14, <http://www.marines.mil/Portals/59/Publications/FMFRP%2012-14%20Logistics%20in%20the%20National%20Defense.pdf>.

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Changing Personnel Readiness Reporting to Measure Capability

This article explains the Army's personnel readiness reporting process and its unintended consequences and proposes changing one of the personnel metrics that the Army uses.

■ By Col. Jack Usrey

"Our focus areas for the [fiscal year 2013] budget demonstrate our concerted effort to establish clear priorities that give the Nation a ready and capable Army while being good stewards of all our resources....With a leaner Army, we have to prioritize and also remain capable of meeting a wide range of security requirements."

—Secretary of the Army
John M. McHugh
and Chief of Staff of the Army
Gen. Raymond T. Odierno

"The Army must continually adapt to changing conditions and evolving threats to our security. An essential part of that adaptation is the development of new ideas to address future challenges."

—Chairman of the
Joint Chiefs of Staff
Gen. Martin E. Dempsey

The Army's unit status report (USR) personnel readiness metrics are assessed using the criteria prescribed in Army Regulation (AR) 220-1, Army Unit Status Reporting and Force Registration—Consolidated Policies. These metrics directly support the calculation and determination of resource measurements, capability assessments, and overall assessments that are required to be reported.

The current method of determining these metrics results in a product that does not adequately assess the Army's ability to maintain strategic land power capabilities. Specifically, the available duty military occupa-

tional specialty qualified (DMOSQ) metric does not measure capability; it measures an administrative process. This miscalculation has the following unintended negative consequences:

- The Army unnecessarily reports lower readiness assessment (RA) levels and lower yes, qualified yes, or no (Y/Q/N) assessment ratings to the Joint Chiefs of Staff within the Chairman's Readiness System.
- Measured units report lower C-levels to higher headquarters relative to their ability to accomplish core functions and designed capabilities. Measured units are Army units, organizations, and installations that are required by AR 220-1 to report their resource measurements and capability assessments. The C-level readiness assessment reflects the unit's ability to accomplish core functions, provide designated capabilities, and execute the standardized mission-essential tasks.
- The Army factors in inaccurate capability variables during its planning, programming, budgeting, and execution process planning phase.
- The Army considers invalid benchmarks when making decisions to adjust strategic doctrine, organization, training, materiel, leadership and education, personnel, and facilities (DOTLMPF) levels to increase future readiness.

As we move toward a leaner Army

and tighter budget constraints, we must adjust how we assess personnel readiness so that the Army is appropriately reporting its capabilities and making decisions with useful variables at the strategic, operational, and tactical levels.

For the purpose of this article, the term Soldier refers to enlisted personnel, warrant officers, and officers. MOS refers to the military occupational specialties and branches within the enlisted and officer corps and grade refers to their ranks.

Measuring the P-Level

The personnel level (P-level) is one of four areas a unit measures that factor into its overall C-level, which is the overall assessment of core functions and capabilities. The Army measures its P-level by comparing available strength, available DMOSQ, and available senior-grade composite-level metrics as defined in AR 220-1. These are determined as follows:

- Available strength is determined by dividing the available personnel by the required personnel.
- Available DMOSQ is calculated by dividing the number of currently available assigned and attached Soldiers considered DMOSQ by the number of required personnel.
- Available senior-grade composite level is determined by averaging the applicable category levels and then applying the results in a reference table to identify the composite level.

The unit reports its P-level using the metric with the lowest level as noted in figure 1. For example, if a unit's available strength is 91 percent (P-1) and its available DMOSQ is 73 percent (P-3), the unit must report P-3 in its monthly USR.

A unit's lowest recorded level in any of its individually measured resource areas (personnel, equipment and supplies on hand, equipment condition, and training) will be its C-level. Therefore, a low P-level derived from an invalid DMOSQ metric will drive down a C-level.

The Army established the available DMOSQ metric without a Title 10 or regulatory mandate. Subsequently, the Army routinely reports its personnel readiness lower than it should because most of the units reporting below P-1 do so because their available DMOSQ is in the P-2 or lower range.

Classifying units as P-2 and lower because DMOSQ Soldiers are unavailable hides units that need help with available strength and senior-grade deficiencies. The Army as a whole loses countless man-hours engaging P-2 and lower concerns that the unavailability of DMOSQ Soldiers unnecessarily creates.

I will provide evidence supporting this assertion, but first it is important to understand contextually the Army's requirement to report its capability assessment and how measuring the wrong metric can have negative strategic implications.

Readiness Reporting

Title 10 directs the secretary of defense to "establish a comprehensive readiness reporting system for the Department of Defense" that will "measure [personnel readiness] in an objective, accurate, and timely manner." More specifically, on a monthly basis the Department of Defense must measure "the capability of units (both as elements of their respective armed force and as elements of joint forces)..., critical warfighting deficiencies in unit capability," and "the level of current risk based upon the

readiness reporting system relative to the capability of forces to carry out their wartime missions."

The secretary of defense executes the Title 10 mandate through Department of Defense Directive (DODD) 7730.65, Department of Defense Readiness Reporting System (DRRS), and DODD 7730.66, Guidance for the Defense Readiness Reporting System. DODD7730.65 "establishes a capabilities-based, adaptive, near real-time readiness reporting system," and DODD 7730.66 instructs service secretaries to "develop and monitor task and resource metrics to measure readiness and accomplish core and assigned missions" monthly.

The chairman of the Joint Chiefs

of Staff (CJCS) established the Chairman's Readiness System to accomplish the secretary of defense's mandate to "measure the preparedness of our military to achieve objectives as outlined in the National Military Strategy." Units use the Global Status of Resources and Training System (GSORTS) and DRRS to capture data and report readiness. The CJCS uses the quarterly Joint Force Readiness Review as the vehicle to apply the services' RAs from GSORTS and DRRS to an overall RA, relative to the ability of the services to support the National Military Strategy. (See figure 2.)

The Joint Force Readiness Review further requires each service to as-

Level	Available Strength	Available DMOSQ	Available Senior Grade	
			By Category	Composite
1	100-90 percent	100-85 percent	100-85 percent	1.54 or less
2	89-80 percent	84-75 percent	84-75 percent	1.55-2.44
3	79-70 percent	74-65 percent	74-65 percent	2.45-3.34
4	69 percent or less	64 percent or less	64 percent or less	3.35 or more

Figure 1. AR 220-1 Metrics for Determining Personnel Levels

RA Level	Definition
RA-1	Issues or shortfalls have negligible impact on readiness and ability to execute assigned missions in support of the National Military Strategy (NMS) as directed in the Guidance for Employment of the Force (GEF) and the Joint Strategic Capabilities Plan (JSCP).
RA-2	Issues or shortfalls have limited impact on readiness and ability to execute assigned missions in support of NMS as directed in the GEF and JSCP.
RA-3	Issues or shortfalls have significant impact on readiness and ability to execute assigned missions in support of the NMS as directed in the GEF and JSCP.
RA-4	Issues or shortfalls preclude accomplishment of assigned missions of the NMS as directed in the GEF and JSCP.

Figure 2. Readiness Assessment Level Definition

Rating	Definition
Y (yes)	Unit can accomplish task to established standards and conditions.
Q (qualified yes)	Unit can accomplish all or most of the task to standard under most conditions. The specific standards and conditions, as well as the shortfalls or issues impacting the unit's task, must be clearly detailed in the mission essential task assessment.
N (no)	Unit unable to accomplish the task to prescribed standard and conditions at this time.

Figure 3. Three Tiered Readiness Metric

sess its ability to accomplish a task to standard under conditions specified in its assigned joint mission essential tasks and assigned mission essential tasks using a Y/Q/N rating. (See figure 3.)

The purpose of addressing GSORTS, DRRS, and the Joint Force Readiness Review is to highlight the complexities involved in assessing and reporting personnel readiness at the strategic level and the importance of using relevant metrics at the input level. As depicted in figure 1, personnel status measurements cascade into capability assessments at the strategic level that have national command authority repercussions.

Figure 1 can also help visualize how a P-level acquired from irrelevant metrics will affect the C-level, ultimately affecting how services derive RA and Y/Q/N capability levels.

CJCS Instruction (CJCSI) 3401.02B, Force Readiness Reporting, is the first document to establish P-level metrics. It mandates two joint metrics and offers one that is optional. The Army uses all three: total available strength, critical personnel, and critical grade fill.

Total available strength. This required metric is the total available personnel divided by required personnel.

Critical personnel. This required metric consists of the designated critical MOS available strength divided by the critical MOS structured strength.

Critical grade fill. This optional

metric, if service directed, calculates a critical grade fill P-level. The Army directed available senior-grade strength to calculate this metric.

The Army directed available DMOSQ to achieve this mandate. This is where the Army misses the mark by measuring an administrative process instead of a capability.

Army Personnel Readiness Reporting

Although the CJCSI directs the services to measure critical personnel, it does not require available DMOSQ to do so. The Army, in choosing available DMOSQ and the method to measure the metric, not only increases the requirement but also uses a flawed method to execute it. As a result, the Army does not measure its personnel capability; it measures its ability to execute a process.

The Army's current method does not determine if the unit has all of the Soldiers it is authorized by MOS and grade; it measures a process in which a battalion human resources specialist is supposed to conduct a transaction in the Electronic Military Personnel Office (eMILPO) to align, or "slot," a Soldier's name against the correct paragraph and line number in the unit's modified table of organization and equipment (MTOE).

In many cases the units have every MOS and grade required by their authorization document, but they have failed to properly code

them in an Army personnel software program. As a result, units have the personnel capabilities required but the current reporting standard mandated a misleading assessment to senior Army military and civilian leaders.

DMOSQ Disadvantages

Measuring a unit's ability or inability to slot a Soldier correctly in eMILPO does not measure capabilities. Moreover, the available DMOSQ metric measures personnel available within the category, exacerbating the problem by essentially counting unavailable personnel twice: once in the available strength metric and again in the available DMOSQ metric.

Therefore, we must question the Army's use of available DMOSQ as one of the metrics to determine P-levels, and we must determine the advantages and disadvantages of this process. My research neither identified an advantage for using available DMOSQ nor determined the original rationale behind the decision to use it to execute the CJCSI requirement to measure critical personnel.

In fact, a senior Army officer with 31 years of service stated that the Army has been using available DMOSQ as a metric since he was a second lieutenant and he does not know why. His conclusion was that it fell into the unfortunate category of "that's how we have always done it."

Using available DMOSQ as a metric has several disadvantages, with the initial being that units report lower P-levels and thus lower C-levels relative to their ability to accomplish core functions and designed capabilities. Consequently, senior Army leaders make strategic decisions based on distorted data. This leads to the Army reporting lower RA levels and lower Y/Q/N assessments within the Chairman's Readiness System.

Other disadvantages include the Army using inaccurate capability variables during the planning phase

of the planning, programming, budgeting, and execution process; considering invalid benchmarks when making decisions about DOTLMPF changes; masking units that need help with available strength and available senior-grade deficiencies; and losing countless man-hours while engaging P-2 and lower concerns.

Remembering that the C-level is derived from the lowest level recorded in any of the unit's individually measured resource areas and that the current available DMOSQ method measures an administrative process, it is imperative that the Army's metrics and methodologies used to assess a unit's C-level are altered so it best portrays actual capability assessments, not process assessments.

An example of distorted data is a Human Resources Command (HRC) G-3 analysis on the October 2012 USR. Of the 127 rotational forces, 26 (20 percent) reported a P-1 status, and 101 units (80 percent) reported P-2 or lower. Of 101 units, 31 reported P-2 or lower because their available DMOSQ percentage was below 85 percent. If the units had used this article's recommended metric vice the available DMOSQ, 57 units (45 percent) would have been P-1, more than doubling the number of units with P-1 levels.

The HRC commander noted that virtually every unit affected by this calculation had their MOSs and grades assigned to the unit, but the units had not slotted the Soldiers correctly in eMILPO. Without the available DMOSQ metric, the Army would have a more useful assessment of its capabilities to perform core functions and assigned missions and would be able to better focus resources to aid the 70 rotational force units that did not reach P-1 because of unavailable strength or unavailable senior-grade personnel.

The December 2012 USR analysis continues this trend. An HRC Enlisted Personnel Management Directorate analysis indicates that 48 of the 127 units (38 percent) re-

ported P-1. Thirty-eight of the 79 units reporting P-2 or lower did so because of unavailable DMOSQ. Of the 38 units reporting P-2 or lower, 28 would have been P-1 if measured by the proposed assigned and authorized metric. This would have increased P-1 units to 76, or 60 percent, an increase of 22 percent.

Dissatisfaction With DMOSQ

Removing the available DMOSQ metric would provide more relevant personnel capability assessments and would allow the Army to focus resources to assist the 51 units that did not make P-1 because of available strength and available senior-grade composite levels.

Some may assert that changing the metric simply makes the Army's P-1 "scores" look better. That claim holds no merit. The Chairman's Readiness System is about assessing and reporting capabilities. Simply put, the available DMOSQ metric does not measure capability.

In the Army G-1 information paper, "Improving the Duty Occupational Specialty Qualification (DMOSQ) metric within the Unit Status Report (USR)," Chief Warrant Officer 5 Andre Davis, Lt. Col. Tom Burke, and Lt. Col. Bill Haas recommend changing available DMOSQ to a more relevant metric. They contend that the available DMOSQ metric is "the most restrictive personnel readiness indicator of the three P-level metrics... and the available DMOSQ metric provides an inaccurate readiness assessment."

I agree that the available DMOSQ provides an inaccurate assessment, but this article's appeal for change is not because the metric is restrictive. Restrictive is acceptable if it measures a capability and is the right metric to meet the P-level requirement defined in the Force Readiness Reporting CJCSI.

The Army G-1 information paper further supports this article's assertion by stating that the avail-

able DMOSQ component of the P-level metric is the cause of most units' low P-levels.

General Officer Steering Committee Review

A December 2012 strategic readiness general officer steering committee (GOSC) discussed removing the available DMOSQ as a USR metric, stating "rules for calculating the MOSQ [available DMOSQ] metric in Army units promotes artificially lower P-levels, hence creating conditions that may overstate [the] magnitude of degraded readiness." The GOSC identified personnel incorrectly slotted in eMILPO and the DMOS box not checked in the

Net-Centric Unit Status Report (NetUSR) application as two reasons units do not report P-1.

During the GOSC, key data highlighting the negative impact of using available DMOSQ was found in a Forces Command (FORSCOM) review of P-levels that 55 FORSCOM brigade combat teams and combat aviation brigades reported on their USRs during the six months leading up to their deployments from 2008 to 2012. The review aggregated the 55 units' USRs and discovered that 70 percent of the brigades reported below P-1 because of available DMOSQ, yet every unit was P-1 on its first deployed USR. This further confirms that the available MOSQ metric does not measure the capability of a unit to execute its core functions and assigned missions. The units had the MOSs and grades required (the capability) to accomplish their assigned missions. However, they were constrained by the AR 220-1 requirement to use

available DMOSQ as a metric to assess and report personnel readiness in the months leading up to their deployment.

Having been a division G-1 for 36 months, I know that the P-levels these units reported before their deployment are common and invariably create angst and scrutiny at every level, resulting in untold man-hours of staff responding to unnecessary

□ Execute this metric precisely; it should measure the number of assigned MOSs and grades against the MOS and grade authorizations to prevent an excess in one MOS or grade to increase the percentage and thus the P-level.

Following these instructions, a rating of 94 percent means that 94 percent of the authorizations on

check box. This is needed when an RC Soldier goes to basic training and returns home before attending advanced individual training or when he transfers to a new MOS and needs additional training to become DMOSQ.

This process will not change. Using the assigned and authorized metric, the RC will continue to import its data into NetUSR and uncheck the DMOS box for those E-3s and below who are not DMOSQ. This will remove the Soldier from the authorization line and result in the same capability measurement the AC uses. Both AC and RC will measure their true personnel capability while allowing the RC to know which Soldiers are not DMOSQ and need training.

Some may believe that available DMOSQ is the correct metric and method to measure personnel readiness. This article clearly presents its failed method both from a logical review of what it measures and from empirical data.

Measuring a process does not measure capability. Every Soldier is a capability, and the unit's MTOE identifies by paragraph and line number the exact capabilities the unit requires. The best way to measure that unit's capability is to measure if it has every Soldier assigned that is authorized, hence the proposed assigned and authorized metric.

Others may assert that the commander's ability to subjectively upgrade the C-level or A-level is sufficient to counter low P-levels that available DMOSQ creates. That assertion is flawed. It is clear that the available metric does not measure capability from the start. Measuring a process creates an invalid starting point from which a commander can consider a subjective upgrade. This renders any upgrade null and void.

Some may agree with the assigned and authorized metric but do not want to use the FY13-15 ACMG mitigation strategies as part of the metric. The chief of staff of the Army approved the ACMG as the

Changing the available DMOSQ metric to an assigned and authorized metric in order to properly measure the Army's P-level will not solve all the challenges the Army faces in the days to come, but it is a step in the right direction. Every Soldier counts; every Soldier is a capability.

questions. The extra work created by these inaccurate P-levels created by using available DMOSQ keeps commanders and staffs at every level from spending more time preparing their units to deploy.

Recommendation

The Army should replace the available DMOSQ metric with an assigned and authorized metric with the following instructions:

- The assigned and authorized metric is defined as the total assigned strength divided by the unit's MTOE authorizations, to include the explicit mitigation strategies defined in the Headquarters, Department of the Army (HQDA), Fiscal Year 2013 to 2015 (FY13-15) Active Component Manning Guidance (ACMG).
- Slot lower enlisted personnel, noncommissioned officers, warrant officers, and officers correctly in eMILPO.
- Use officer and enlisted substitutions within the same grade, one grade lower, or two grades higher to fill shortages.
- Count promotable populations as the next higher grade.
- Maximize grade and MOS substitutions to fill critical needs.

that unit's MTOE are filled by exact MOS and grade or in accordance with the HQDA FY13-15 ACMG substitution rules. That is a true measurement of capability.

Counterargument

I suspect the primary argument against replacing available DMOSQ with assigned and authorized is that it does not give Reserve component (RC) units the ability to accurately report Soldiers who have not completed the training required to be MOSQ. The Active component (AC) does not have this challenge since AC Soldiers are reported in a training, transit, hold, and student status until they are fully trained and report to the unit; only then do units report them on their USRs. However, RC units can have Soldiers assigned to them who have not completed their training and are not DMOSQ.

NetUSR provides the solution for RC units. Currently RC data is imported into NetUSR and RC units can indicate their MOSQ Soldiers who have not completed the required MOS qualification training.

The NetUSR software functionality allows the unit to adjust the DMOSQ data for pay grades E-3 and below to accurately report their status by simply clearing the DMOS

rules of engagement for manning. This ensures consistency in how the Army distributes Soldiers to units, which is required when anyone defends a method.

One might argue that replacing available DMOSQ will take the focus off of the need for unit personnel officers to properly slot Soldiers in eMILPO, but that is misguided. Measuring the Army's capability is serious business. Senior civilian leaders make decisions with the readiness information the Army reports. Having proven that available DMOSQ does not measure our Army's personnel readiness correctly, it is imperative that the Army adopt the assigned and authorized metric in order to accurately measure capability.

Commanders can use other venues, such as the FORSCOM Personnel Readiness Review, to measure a unit's ability to properly slot a Soldier in eMILPO, and unit S-1s can run this report as frequently as their commanders require. The USR and the strategic decisions that it drives are not the places to measure an administrative function.

Lastly, some may assert that changing the metric simply makes the Army's P-1 "scores" look better. That claim holds no merit. The Chairman's Readiness System is about assessing and reporting capabilities. Simply put, the available DMOSQ metric does not measure capability. The proposed assigned and authorized metric measures capability. It has nothing to do with higher scores or looking better. It is about the Army executing the Title 10 mandate to "measure in an objective, accurate, and timely manner the capability of the armed forces."

Cost of Not Adopting Proposal

The cost of not adopting this proposal is simple and exacerbated by the current operational environment. It is simple in that it is clear that units are using a metric that measures a process and not a capability to assess and report its personnel capabilities

at the highest levels. Rejecting this proposal means the Army will continue to make strategic internal decisions and recommendations to the Joint Staff and civilian leaders based on irrelevant information.

One has only to review the 2012 Army Posture Statement to see how the cost of not adopting this proposal is exacerbated by the current operational environment: The "global fiscal environment is driving defense budgets down for our partners and allies, as well as our Nation." The Army has more than 190,000 Soldiers committed in nearly 150 countries. Our military is drawing down from 570,000 to 490,000 personnel. The days of excesses are gone. The Army has to measure its capabilities correctly in order to shape the future force.

Secretary of the Army John McHugh and Gen. Raymond T. Odierno made the following statement to the Senate and House of Representatives:

"As we look to the future, the uncertainty and complexity of the global security environment demands vigilance. In these changing economic times, America's Army will join Department of Defense efforts to maximize efficiency by identifying and eliminating redundant, obsolete and or unnecessary programs, responsibly reducing end-strength and by evolving our global posture to meet future security challenges."

As noted in the Army's 2012 Posture Statement, in order to meet our nation's future security challenges in this difficult fiscal environment, the Army must challenge all of its current paradigms to ensure it is maximizing its resources in its task of sustaining "the Nation's Force of Decisive Action" and providing combatant commanders "with the capabilities, capacity and diversity needed to be successful across a wide range of operations."

Several areas beyond the scope of this article need to be reviewed to

ensure that we are properly measuring and reporting personnel readiness to strategic leaders. Is the Army using the correct method to measure available senior-grade composite level? The Army's method is not prescribed by law or joint policy.

Why is the Army USR process reactive instead of predictive? The Army currently looks in the rear-view mirror each month, preventing opportunities at the strategic level to shape the future. Why can a commander manually reslot Soldiers in NetUSR without it being tied to eMILPO, effectively presenting one capability measurement to the Army chief of staff (NetUSR) and a different measurement to HRC (eMILPO)? There can only be a single data point if the Army wants to maximize its limited resources.

Changing the available DMOSQ metric to an assigned and authorized metric in order to properly measure the Army's P-level will not solve all the challenges the Army faces in the days to come, but it is a step in the right direction. Every Soldier counts; every Soldier is a capability.

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A Marine from the Special-Purpose Marine Air-Ground Task Force Africa demonstrates combat engineer skills for Burundi National Defense Forces personnel.

Helping African Union Forces With Peacekeeping Operations in Somalia

Through a building partner capacity program, the U.S. Africa Command has enabled East African nations to be better prepared to confront their national security threats.

■ By Maj. Michael A. DeCicco

The U.S. military has a rich history of long-term achievements in building partner capacity (BPC). Continuing the tradition, the Special-Purpose Marine Air-Ground Task Force (MAGTF) Africa is currently engaged in a BPC program in East Africa.

Conflict, overseas contingency op-

erations, and peacekeeping missions over the past decade have revealed the military's institutional adaptability in expanding force protection and sustainment to overmatch destabilizing enterprises.

In East Africa, the U.S. Africa Command (AFRICOM) has been developing partner-nation capabili-

ties in an enduring campaign against violent extremism.

AMISOM Versus Al-Shabab

Marine Corps Forces Africa, one of AFRICOM's components, has led an ongoing project to share best practices with a coalition of African nations performing peacekeeping

operations in Mogadishu under the African Union Mission in Somalia (AMISOM) charter. The project's success is a contributing factor to AMISOM's breakthrough against al-Shabab, an al-Qaida affiliate, and ultimately will result in a more secure Somalia.

When AMISOM forces, led by more than 5,000 troops from the Uganda People's Defense Force and the Burundi National Defense Forces, initiated their first peacekeeping operations in Mogadishu, Somalia, in 2007, they were hemmed in by a tough and determined terrorist network. Al-Shabab, which means "the youth," preyed upon Somalia's lack of governance and committed extremist violence in the name of stability while using maritime proximity to illegally finance its operations.

AMISOM's progress ebbed and flowed until early 2012. Constant pressure by AMISOM forces encouraged a major turning point by driving out al-Shabab and returning near total control of Mogadishu to the coalition. Simultaneously, Kenya Defense Forces advanced from the south to wrest control from al-Shabab in the key port city of Kisumu, Somalia.

Although tactical unit-level sustainment was less complex when peacekeeping operations were confined to one city, the achievements in early 2012 reformulated battlefield space and time dynamics. These operations made AMISOM's lines of communication longer than they had been in the previous five years. Without the resource flexibility needed to adapt to such changes, AMISOM quickly recognized its sustainment capability gaps.

Expanding BPC programs with AFRICOM, such as basic combat skills through the Africa Contingency Operations Training and Assistance program, became a priority for this partnership, particularly as AMISOM's force structure grew from 10,000 to 17,000 troops with contributions from Djibouti and Sierra Leone.

Sustaining Peacekeeping Operations

Infantry and armored combat units delivered the punch to return Somalia's key urban terrain to its people, but the principle effort in peacekeeping operations is sustainment.

Several AMISOM troop-contributing countries have combat experience gained during regional conflicts

first focusing on force protection using combat engineers.

The objective was to develop the capabilities of the Uganda People's Defense Force and Burundi National Defense Forces to maintain freedom of maneuver within the expanding battlespace.

Sustainment needs were the criti-

By sharing U.S. military tactics, techniques, and procedures with partners engaged in East African operations, AFRICOM is enhancing force protection, sustainment, and combat engineer mission capabilities. As a result, Somalia has a vastly improved security situation and a recognized elected government.

in the 1990s and 2000s. During that time, they obtained critical tactical and operational skills in small to mid-sized units.

Unfortunately, logistics employment practices were not as proactively developed, possibly because of a lack of funding and equipment or a pattern of living off the land during war.

Through staff talks, conferences, cooperation plans, exercises, and training events, AFRICOM has accessed these nations' strategic and institutional leaders and set the conditions for maturing their enduring sustainment capabilities. The United States has invested tens of millions of dollars and dozens of U.S. forces to share best practices with units deploying to AMISOM.

Through the global force management model for apportioning troops to commanders, the U.S. Marine Corps deployed the 150-troop Special-Purpose MAGTF Africa to Sigonella Naval Air Station, Sicily, under Marine Corps Forces Africa for BPC programs—specifically in Uganda and Burundi.

Using the 2006 National Defense Authorization Act sections 1206 (authority to build the capacity of foreign military forces) and 1207 (security and stabilization assistance), the Marines began BPC by

cal reason for protecting the lines of communication from al-Shabab, and force protection weighed heavily on the mission. Given the competition for counterterrorism funds among all geographic combatant commands, it was important to place force protection as a high priority.

The interagency teams that were anchored to the capability gap solutions process (including AFRICOM, the Office of the Under Secretary of Defense for Policy, the Department of State–Africa Bureau, the Defense Security Cooperation Agency, and U.S. Ambassadors and Chiefs of Mission) determined the most pressing need was protecting forces from an increasing number of asymmetric threats, such as antipersonnel and vehicle-borne improvised explosive devices.

Until counterterrorism funding was made available, AMISOM forces would need to continue supporting themselves through organic logistics capabilities. Food, ammunition, and spare parts were delivered from their home countries monthly through flights sponsored by the Department of State and the United Nations.

Training AMISOM Forces

The first of approximately 35 Marines and Sailors from Special-Purpose



Uganda People's Defense Force troops receive combat training from a Marine from the Special-Purpose Marine Air-Ground Task Force Africa.

MAGTF Africa deployed in January 2012 to Uganda and Burundi. Programs of shared learning for peace-keeping operations were repeated in 10-week cycles. The programs included instruction in obstacle clearing, fighting position improvement, marksmanship, combat lifesaving, and counter-improvised explosive device awareness.

After two years of performing this mission, the Ugandans and Burundians now have seven combat engineer companies operating in Somalia. Sustainment training, which began in January 2013 and included convoy training, maintenance management, and supply system accountability, has generated four new logistics companies.

Before each cycle of training, instructors prepare by assessing the incoming class, conducting after action reviews of previous courses, and reviewing the curriculum. The whole-of-government approach synchronized the Department of Defense national military strategy with

Department of State policies.

The training is further complemented by contracted mentors who have partnered with AMISOM forces since 2007. These mentors solidify concepts learned from Special-Purpose MAGTF Africa for everyday operations, such as the equipment training (on wreckers, fuel trucks, water trucks, and bulldozers) that was delivered in Mogadishu through the 2006 National Defense Authorization Act.

Historically, BPC programs stem from a need to address factors such as instability and little or no governance. AMISOM was established to counter extremist threats imposed by those factors in Somalia. Designing and implementing a BPC program is a multiyear and multi-interest shared vision process.

By sharing U.S. military tactics, techniques, and procedures with partners engaged in East African operations, AFRICOM is enhancing force protection, sustainment, and

combat engineer mission capabilities. As a result, Somalia has a vastly improved security situation and a recognized elected government.

Special-Purpose MAGTF Africa demonstrates that when the objectives of BPC are synchronized with a common operational picture across services and government entities, the United States can influence global partners to be better poised to confront their national security threats.

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Army Garrison Operations for 2014 and Beyond

As the Army shifts from regular deployments to steady garrison operations, its success depends on managing effective maintenance programs, optimizing resources and allocations, and developing leadership fundamentals.

■ By Maj. Matthew S. Arbogast

Over the past decade, the Army has adapted to overcome the challenges of extended conflicts in Iraq and Afghanistan. These largely successful adaptations were vast and complex.

Modularity, doctrine updates, combat system developments, and the increased autonomy of junior leaders are only a small slice of the Army's evolution. The details of these changes and the success of the U.S. military since Sept. 11, 2001, are well documented.

However, meeting the demands of the Global War on Terrorism was not without an opportunity cost. Now that the mission in Iraq is complete and operations in Afghanistan are projected to culminate this year, the Army is returning to a posture dominated by garrison operations.

The overwhelming majority of our unit-level leaders were not on active duty before 9/11, yet they will lead our brigade combat teams to regain proficiencies in a garrison environment that they have never truly experienced.

The importance of garrison proficiencies during eras of peace cannot be overstated. Now is a critical time for developing the basics in training, leader development, and readiness.

The Army must revisit the core competencies of our military craft and refocus leaders on the fundamentals of managing human and capital

resources. Rejuvenating maintenance programs, optimizing resources and allocations, and developing leadership fundamentals are essential to the Army's success in garrison and our nation's future conflicts.

Pre-9/11 Maintenance

Before 9/11, unit maintenance programs were the heart of the operational Army and the essential battlefield tenants of shoot, move, and communicate. Training exercises started and ended with a strict maintenance focus.

Every maintenance function or process was treated as a training opportunity, and junior leaders in the late 1990s truly understood and prioritized the importance of equipment readiness.

Weekly command maintenance was always a top priority before 9/11. Most units marched in formation to organizational motor pools, and participation was mandatory. Even scheduled appointments during command maintenance were frowned upon; only in the most unique circumstances were they approved.

In the 2nd Armored Cavalry Regiment in 2000, section sergeants stood in front of the maintenance line and read each maintenance check from the technical manual. Soldiers scrambled around the vehicle, methodically executing each preventive maintenance check as noncommissioned officers barked out the checklist and supervised.

Each week consisted of a pre-planned maintenance focus and class. If the week's focus was battery boxes, for example, the motor sergeant would ensure command maintenance started with a detailed instruction session that specifically targeted battery installation, cleanliness standards, and key indicators of system problems.

After completing a command maintenance morning, platoon leaders met with the troop executive officer to prioritize part requisition requirements and plan labor allocations for the motor section.

Equipment services also faced the same vigorous methodology and were a battalion-level priority. Platoon leaders prepared a two-week service schedule that incorporated exact times and locations of services for every item in the platoon.

Approvals from the troop commander and squadron executive officer were required prior to execution, and the squadron commander routinely inspected platoon leaders during their service weeks.

Platoons were fenced from competing tasks and training events during their service schedule, and they ensured service packages and parts were ordered at least 30 days in advance. Services were treated as a critical training event.

Similar to competition during a field exercise, platoon leaders felt healthy pressure to compete against peers and lead their platoons

through an efficient, well-organized service.

Post-9/11 Maintenance

Since 9/11, Army maintenance processes have evolved significantly. Now the burden of ensuring combat readiness is largely tied to contractor performance and sustainment-level maintenance programs.

Reset, left-behind equipment, theater-provided equipment, new equipment fielding, and rapid fielding initiatives have been essential to enabling readiness. These programs, along with an increased reliance on contracted maintenance support, have helped to optimize Soldier manpower.

Commanders have rightfully enjoyed the ability to focus on training and combat operations while depending on military programs and processes to ensure effective maintenance programs and equipment readiness.

With minimal time between deployment rotations, leaders have simply not prioritized maintenance for equipment that remains unused at home station. Although logical and necessary because of deployment cycles, the robust post-9/11 echelons-above-brigade maintenance support resulted in lost learning and leading opportunities.

The aggressive and methodical leader involvement that was common before 9/11 is less common in today's Army. We now have a generation of company-grade officers who have little experience executing garrison maintenance programs and systems. Even more concerning is the lack of awareness at the field-grade-officer level. Many of today's junior majors did not experience the pre-9/11 Army.

On the surface, these leaders are well aware of readiness importance, but few have had to depend on detailed management of rigorous maintenance systems. Additionally, our dependence on echelons-above-brigade enablers has limited Soldiers' experiences and

reduced their ability to maintain their own combat systems.

Fiscal constraints will restrict the flow of monetary resources to our contractor-dependent maintenance framework. An increasing reliance on Soldier labor is inevitable, and commanders will need to rejuvenate their maintenance programs with a large population of officers and Soldiers that some consider to be maintenance neophytes.

Although returning to pre-9/11 maintenance fundamentals may seem like a step backward, disciplined and methodical maintenance processes are exactly what the Army needs, especially given future growth projections for unmanned vehicles and aircraft.

Resource Stewardship

Declining resources and monetary constraints present another legacy challenge for the Army: resource and fiscal stewardship. Before 9/11, units operated with limited budgets. Most monetary allocations were distributed monthly down to the company level.

Executive officers had to review and prioritize requisitions for repair parts and other supplies. Requisitions that were not associated with not-mission-capable items were often delayed to ensure funding was available for critical parts and supplies. Even small-scale training events were sometimes deferred until proper funds were available.

Platoon leaders were scolded for ordering non-mission-essential items. Placing a requisition for a vehicle drip pan would gain unwanted attention immediately. Supply rooms were detailed and regimented.

Most supply sergeants ensured all expendable supplies were signed out of the unit supply room and any component of end items and basic issue items were added to sub-hand receipts promptly at the time of issue.

Optimizing and managing resources was part of our culture, and regulatory procedures were enforced. The culture affected daily

requisitioning behavior and encouraged strict command supply discipline programs that were enforced and monitored.

Today we have a generation of company-grade and junior field-grade officers who have enjoyed mostly unlimited budgets. Some of these young leaders even regard the discussion of cost as obscene; if a Soldier needs an item for combat, then surely we should not tell him no.

The post-9/11 culture encouraged leaders and Soldiers to view monetary constraints as simply an administrative obstacle that could be easily breached with proper justification. The idea is that we simply should not say no to the needs of Soldiers in combat.

This is a tremendously supportive principle that has been cultivated by unwavering support for the U.S. Soldier. This altruistic mindset is ideal during combat; however, as with our extensive maintenance support system, it comes with a hidden cost.

Command teams are also indoctrinated into this consumption-driven culture. When an organization overspends, it is often rewarded with additional monetary allocations. Thus, it is natural and wise for commanders to ensure all funds are obligated early to increase the opportunity to receive additional resources.

In fact, if a unit fails to expend its annual allocation at least 30 days before the end of the fiscal year, its allocation will most likely be redirected to another unit or simply fenced for control by higher echelons.

Essentially, the fiscal structure rewards resource indulgence while hoping for supply and monetary discipline. There are no actual repercussions for over-indulgence, and this organizational behavior fosters a leadership climate that simply searches for ways to expend funds, regardless of need. Overall, this goal blindness feeds a resource consumption machine that is nearly impossible to control.

The post-9/11 era has made us ad-

dicted to a somewhat endless supply of resources. In 1999, Soldiers purchased their own elbow flashlights. Today, Soldiers are issued everything from multipurpose utility knives to eye protection. Although these items have obvious applications on the battlefield, it is unlikely this support will continue in coming years of fiscal austerity.

Pre-9/11 Leadership and Training

Before 9/11, leaders made every task a training opportunity. Leaders would even use simple red-cycle tasks to help reinforce Soldier discipline, precombat checks and inspections procedures, vehicle load plans, and other fundamental competencies.

In 2000, the regimental commander (RCO) for the 2nd Armored Cavalry Regiment executed precombat inspections (PCIs) for each troop before a major field exercise. These PCIs were brutally long and thorough. Troops stood on line according to published standard operating procedures called “dragoon standards,” and the troop commander would escort the RCO through the inspection.

There was no mercy; either the standard was met or the unit was not allowed to depart from the motor pool. The RCO personally checked everything from AA batteries to tie-down standards.

The execution of the PCI started with a simple salute and individual weapon inspection. If the weapon was clean, serviceable, and free of rust, the RCO moved on to the next check. However, any trace of dirt or deficiency on the weapon opened the door to a deeper look. If the deficiency was not recorded on the Department of Army Form 5988-E, Equipment Maintenance and Inspection Worksheet, then every individual weapon in the troop was inspected.

To ensure proper vehicle rollover preparation, the RCO would tug on the night-vision devices and other equipment stowed in the vehicle to

ensure proper equipment tie-down. If the equipment was properly secured in the vehicle according to the published standards, he would simply move to the next check. If not, equipment that was not secured was inspected for serviceability, component shortfalls, and batteries.

These PCIs consumed an entire day in garrison. The rigorous process was met with much criticism; “micromanagement” was often used to describe the RCO’s PCI requirements. However, the inspection was in direct compliance with the Army’s “two levels down” training concept, and the entire regiment executed it accordingly.

The leader-guided inspection was a powerful forcing function and showed junior leaders the importance of readiness and standards. The result was a hands-on leadership training event—led directly by the RCO—before the troop even started the field exercise.

The leadership culture was also somewhat unforgiving before 9/11. Training was executed daily, either through formal training or informal actions. Junior leaders openly disparaged their peers and subordinates for failures and poor standards. Officers and noncommissioned officers helped each other through outspoken critiques and healthy harassment.

Some view this type of direct scorn as cruel, but it established balance among the leaders. If a leader strayed too far from the standard, he would eventually comply with the norms or be pushed out of the competition.

Post-9/11 Leadership and Training

Today our leaders are combat hardened and operationally focused. They can easily decipher what is important and adapt quickly to the operational environment to successfully execute the mission. Our junior leaders have an overwhelming breadth of experience and have operated with an unprecedented amount of autonomy at the platoon

and squad levels.

Post-9/11 leaders are also well-versed in interoperability. The joint operational environments in Afghanistan and Iraq have increased Soldiers’ proficiency at integrating sister-service and interagency capabilities.

Furthermore, the Army’s conventional forces have fully integrated their efforts with special operations forces and have benefited from special operations technologies, information systems, and intelligence-gathering tools. This level of tactical proficiency is an advantage we must harness to train the next generation of warfighters.

However, operational requirements over the past 12 years created a noticeable gap in our leaders’ ability to prioritize training requirements. They have had little opportunity to master the ability to plan and execute training properly.

Compounding the problem was the outsourcing of some mandatory training requirements to civilian contractors. Contracted training programs had short-term success at the detriment of long-term leader development. It subjugated some unit training, which was the commander’s responsibility, to external agencies.

The Army’s recently published Army Doctrine Publication 7-0 and Army Doctrine Reference Publication 7-0, Training Units and Developing Leaders, are a good first step in addressing this issue.

Regaining Garrison Efficiency

Garrison operations are largely viewed as archaic, and leadership in this environment is generally foreign to many officers and noncommissioned officers. However, units can establish leader training programs that change the existing culture to capitalize on garrison productivity.

Establishing training plans to improve maintenance programs and awareness, reducing excess equipment, managing requisitions, and developing creative training plans

are the keys to garrison success.

The Army has an opportunity to reinforce Soldier discipline, raise standards, and revive core competencies during garrison operations. Despite projected funding constraints, leaders can optimize training opportunities through creative execution of nontactical requirements.

Leaders can develop core competencies within their units by treating the following requirements as major training events:

- ☐ Command maintenance.
- ☐ Equipment services.
- ☐ Recovery operations.
- ☐ Precombat checks and inspections.
- ☐ Training without troops exercises.
- ☐ Supply economy initiatives.
- ☐ Supply accountability and command inventory events.

- ☐ Command supply discipline program requirements and inspections.
- ☐ Materiel and unit readiness reporting and analysis.
- ☐ Exchange pricing processes, shop stock lists reviews, and reconciliation procedures.
- ☐ Leadership development and counseling programs.

Units can also prepare extensive training plans to prepare for Army-wide command programs and competitions, such as the Chief of Staff of the Army Supply Excellence Awards, Chief of Staff of the Army Maintenance Excellence Awards, and Philip A. Connelly Awards Program.

Our future battles are won now, through preparation and sustainment during garrison operations. Today's leaders must attack maintenance and

resource management aggressively to ensure an efficient readiness posture while minimizing resource consumption.

We have a generation of leaders who delivered tangible security benefits in a combat environment. Now the challenge is to develop an Army culture that recognizes the intangible benefits of enforcing the basics and optimizing our processes in readiness, resource management, and training.

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Maj. Charles Rozek (left), I Corps, and Sgt. 1st Class Otis Cadd, 593rd Expeditionary Sustainment Command, track and coordinate transportation of supplies and personnel Dec. 6, 2013, during Yama Sakura 65, the 5-day bilateral military simulation exercise at Camp Higashi-Chitose located on the northern island of Hokkaido, Japan. (Photo by Staff Sgt. David Chapman)

Using the Gap Reduction Model to Analyze Military Logistics Support

The Gap Reduction Model is a framework for analyzing and evaluating logistics support required by operating forces.

■ By Capt. Mike Carter, USAF

Professional logisticians working in the field understand that providing the best possible logistics support for the warfighter in an ever changing environment is a complicated and continuous effort. But planning logistics can be even more complicated.

Usability is the governing factor for successfully implementing a logistics support framework. The concept needs to be simple to understand,

sound in construct, and scalable to a multitude of situations.

Complex framework concepts have their place in the science of critical logistics information, but if they are too complicated and rigid in execution, then their applications are limited to a small subset of circumstances. Too many hard-and-fast rules and requirements restrain a planner's ability to tailor data and information. As a result, vital information might

be tossed aside if it does not fit neatly into the complex framework.

Conversely, a system with too vague of a structure is just as difficult to use. A method with no rules or constraints provides a veritable tsunami of information and circumstances that clogs thinking and clouds perception. Logisticians are forced to wade through information, both pertinent and not, to determine what is applicable to their situations.

Even though no framework is completely right or wrong, the most useful example is one that provides a basic construct with a core, overarching rule set that ensures maximum effort and focus is provided to the task at hand. The basic rules provide the metaphorical right and left limits, and the framework is flexible enough to adapt to the current situation.

The Gap Reduction Model

The Gap Reduction Model provides a framework for logisticians to analyze challenges and situations. It is not a replacement for other proven frameworks. It is simply another means of creating situational awareness for the logistician. In its most basic structure, the model provides a logistics perspective of the support required by operating forces.

The model uses a foundation that is almost deceptively simple and consists of a source of supply, the end user, and the gap between, which the logistician must bridge with the lines of communication. (See figure 1.)

At first glance it may seem that the model has too little structure. However, the value of the model comes from the ability to build on this foundation to match any situation. Logisticians often want to see an entire network of gaps across their area of responsibility. While this broad view can be helpful, the Gap Reduc-

tion Model was designed to force logisticians to break larger networks into workable segments that can be analyzed and adjusted appropriately. Keeping this in mind, we will focus on a single gap for this article.

Definitions

Before we add onto the basic framework, the terminology of the model needs defining.

End user. This is any function, unit, or person that requires logistics support from the source of supply. The end user is typically called the war fighter. Companies, battalions, squadrons, and even brigades or wings all require support from the source of supply and fit the basic description of a war fighter. The end user is not limited to military fighting formations. Humanitarian relief forces, nongovernmental organizations, civil-response organizations, and others can be classified as end users. The need for support is the only requirement to be an end user.

Source of supply. This term references any organization or entity that supports the end user. Sources of supply can include warehouses, forward operating bases, aerial ports, sea ports, repair depots, host nation sources, or even industrial production sites. Logisticians at these sources of supply will typically have to provide support to many end users concur-

rently, requiring the management of multiple gap models.

Line of communication. The conduit that carries the logistics support between the source of supply and the end user is called a line of communication. There are three primary types, or modes, of lines of communication—air, sea, and ground movement. Each mode can be comparatively measured in terms of time, cost, and capacity.

Air movement, which includes both fixed- and rotary-wing assets, delivers the ability to rapidly move materiel and logistics support to nearly any point on the globe unimpeded by most geographical restrictions. However, air movement is expensive and limited in volume when compared to the other modes of transportation.

Fixed-wing air movement requires airfields capable of handling tasked airframes. Rotary-wing air movement has far fewer physical requirements for operating locations, but it also has a more limited capacity. Finally, air movement has the advantage of bypassing most enemy activities and reduces the need for route clearance of ground lines of communication.¹

Logisticians provide a mind boggling amount of support through sea movement. Transiting the oceans and interior waterways, sea movement has the capacity to move large volumes of equipment and supplies in comparison to the other modes.



Figure 1. The foundation of the Gap Reduction Model.

¹ Army Tactics, Techniques, and Procedures 4-0.1, Army Theater Distribution, Department of the Army, Washington, D.C., May 20, 2011, p. 3-15.

The trade-offs for such massive capacity are slower speed and the fact that movement can only take place between sea ports capable of loading and offloading the requisite vessel.² If the end user is located away from the port facilities, then the logistician is required to either completely rely on another mode or use multiple modes to deliver the required support.

Ground movement includes both vehicle and rail movement and is often the final link in moving support to the end user. Although ground transportation pales in comparison to air in terms of speed and sea in terms of capacity, it provides greater flexibility for the logistician when paired with one of the other modes.³

When representing the different lines of communication on the gap model, each mode is shown with its own line. This allows logisticians to visualize all options. This view ensures they are prepared to provide alternate means if access is lost to any line of communication. Depending on the situation, one, two, or all three lines can be represented on the model.

Access and Security

Logisticians must ensure they have access and security for the lines of communication they want to use to provide support. In the Gap Reduction Model, access includes both political and physical considerations. Political access means that the relevant political entities have granted approval for transit through the lines of communication. For example, political access must be granted before a U.S. aircraft travels an air line of communication that transits another country's air space.

Physical access is the capability of the line of communication to handle the required transport vehicle. The infrastructure determines physical access for the specified line of communication.⁴ Physical access is not attained

if a ship cannot dock at the port or a truck cannot transit the road network because of damage or poor infrastructure. If either political or physical access is not achievable, then the line of communication is not viable.

No matter the location or situation, no line of communication is ever 100-percent secure. In an active con-

to the end user. Although relocating is a potential solution, generally it is not an easy proposition. Sources of supply are typically well established locations that occupy strategic locations in conjunction with major sea or aerial ports and service multiple end users.

Instead of shifting the entire source

The strength of the Gap Reduction Model lies in its ability to break out the different end users and illustrate how the support flows to their operating locations in a simple and understandable framework.

flict zone, enemy action can restrict or disable lines of communication that are vital to supporting the end user.⁵ Likewise, in humanitarian relief situations, inclement weather or the destruction of infrastructure can compromise the security of a line of communication.

Understanding the security threat is the responsibility of logisticians because they will need to make recommendations based on the ability to mitigate risk and the level of acceptable risk determined by the value of the support the line of communication provides.

Gap Reduction

The logistician's primary mission is to provide the best possible support to the end user; the Gap Reduction Model seeks to further refine that responsibility. The logistician needs to shorten the gap between the source of supply and the end user to provide better support. There are two ways to accomplish this task—either shorten the physical distance between the two or shorten the time it takes to travel the line of communication.

To shorten the distance between the end user and the source of supply, an intuitive method is to move closer

of supply, logisticians have other tools at their disposal to significantly shorten the distance to the end user: using another pre-existing source of supply or pre-positioning materiel closer to the end user's operating location. Keep in mind that, even if an alternative source of supply is used, the original source is still available for additional support or for classes of supply that are not available through the alternate source. (See figure 2.)

When using an alternate source of supply, the requirements are increased and the system becomes more complicated. Logisticians must maintain the lines of communication for the alternate source in addition to the original lines of communication. Although complexity is typically considered the bane of operations, adding complexity is acceptable if it enables the logistician to provide better support to the end user.

The other method to shorten the gap between the source of supply and the end user is to reduce the time it takes for the support to travel the line of communication. Reducing transit time is typically accomplished by using different lines of communication. The Gap Reduction Model forces the logistician to review each option in-

² Joint Publication 4-01.2, Sealift Support to Joint Operations, Office of the Joint Staff, Washington D.C., June 22, 2012, p. I-2.

³ Army Tactics, Techniques, and Procedures 4-0.1, p. 3-8.

⁴ Joint Publication 3-35, Deployment and Redeployment Operations, Office of the Joint Staff, Washington D.C., May 7, 2007, p. III-7.

⁵ Ibid., p. III-5.

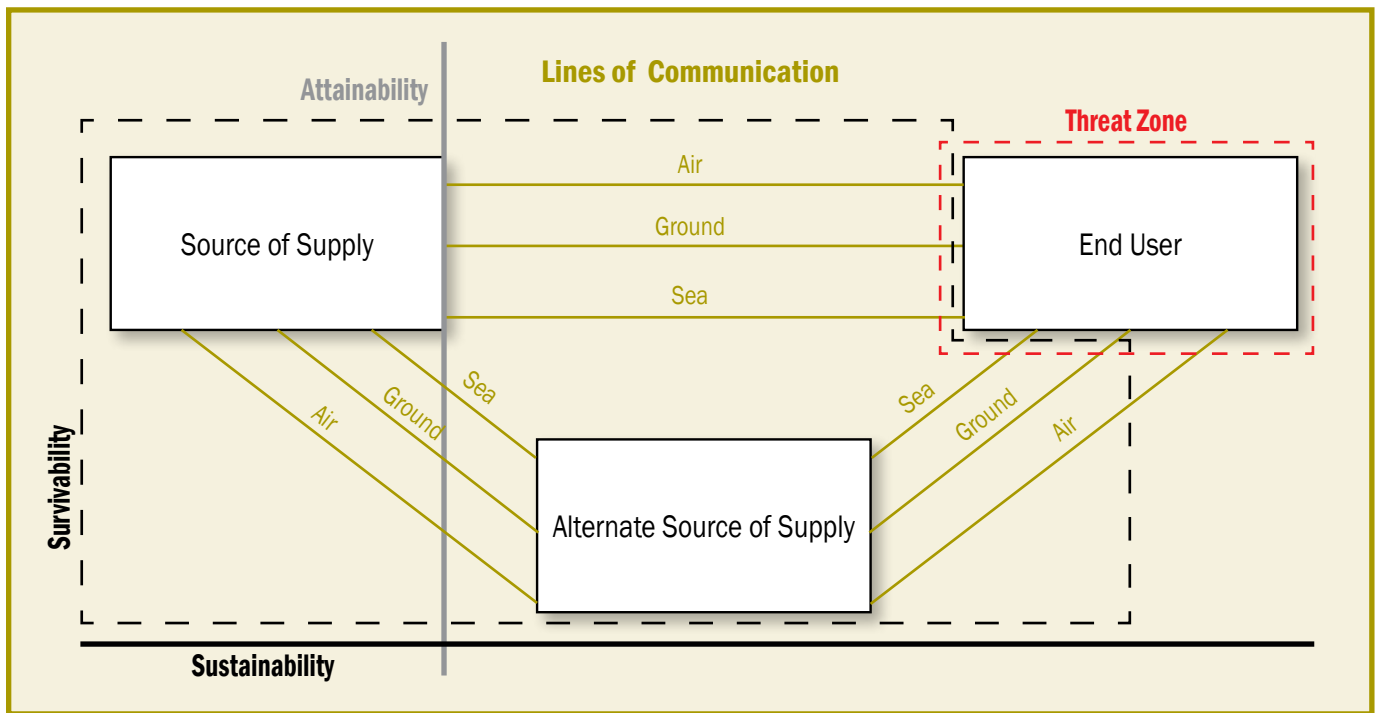


Figure 2. The Gap Reduction Model.

dividually and as a multimodal system option. The key is to balance the use of the different modes.

Threat

When working to close a gap, many factors must be taken into account, including cost, manpower, facilities, transportation, and, most importantly, the threat. Operations, regardless of the scale or location, must take into account threats, from both enemy forces and environmental impacts, which have the potential to interrupt support. It is important that logisticians recognize these potential threats and maintain the bulk of their logistics support outside of the threat zone.

In a high-threat insurgency environment, the threat has the potential to encompass the end user and the entire line of communication. In a conventional force-on-force conflict, the threat may be much more restricted to a specific battlespace. A red dashed line surrounding the end user represents a threat zone that

varies with each operational environment. (See figure 2.)

This addition to the model enables logisticians to evaluate where the threats lie in order to plan potential sources of supply and lines of communication. The impetus to keep logisticians and the logistics system outside of the threat zone is not that logisticians themselves cannot or will not fight. Logisticians have to balance responsiveness and the protection of their sources of supply and lines of communication.

Principles of Logistics

The final level of the Gap Reduction Model encompasses the three key principles of logistics—attainability, survivability, and sustainability. Although all of the principles of logistics can be applied to the gap model, to maintain the focus on usability, I have decided to focus on just these three.

Attainability. To achieve attainability, the logistician needs to make sure that the end user has all the re-

quired support for the operation as planned.⁶ This means that the mission planned by the end user will not include every potential set of circumstances that may affect execution.

Logisticians must follow the same mentality, wherein they provide the end user with the support required for the mission as it is conceived and executed. Logisticians must ask themselves if they have provided everything the war fighter has identified as being required for attainability before the mission starts and if any shortfalls have been identified that need to be accounted for by the operational commander.

It is vital that logisticians peer into the fog of war and prepare to respond to additional requirements that evolve after mission execution. Pre-positioning, readying, packaging, and moving forward to alternate sources of supply are all actions logisticians can take to provide additional support to the end user.

It is sometimes labor intensive and frustrating to prepare addition-

⁶ Joint Publication 4-0, Joint Logistics, Office of the Joint Staff, Washington, D.C., July 18, 2008, p. xvi.

al support that is not used, but if the support is required and it means the difference between life and death to the end user, then ultimately it is worthwhile. Attainability is depicted as a vertical line between the initial source of supply and the lines of communication. (See figure 2.)

Survivability. Defined as the “capacity of an organization to prevail in the face of potential threats,” survivability correlates with the imperative that the logistics system stays removed from the threat zone to the maximum extent possible.⁷ Logisticians have to balance keeping the support close enough to the end user to provide the best possible support while at the same time ensuring the survival of the system. It is important to note that survivability is not geared to the survival of personnel or assets. Instead, it is focused on ensuring that the entire logistics system survives.

One of the primary ways logisticians provide survivability is to use multiple lines of communication. For example, ground lines of communication can move a large amount of support fairly rapidly, but they have greater potential to be disrupted by enemy action, natural disasters, or inclement weather.

To ensure that the end user receives the support required, logisticians will often add an air line of communication to shift the burden if the ground mode is disrupted. Another way of providing survivability is to use alternate sources of supply to augment or replace the primary.

The area of survivability ties directly to the threat zone. As one line shifts, the other also must shift. Afghanistan is an example of a high-threat insurgency environment, and the threat is all around. As soon as logistics support leaves the confines of the source of supply, it enters the active threat zone. The only areas where the logisticians can affect survivability are at the locations that

house the sources of supply. In this type of environment, mitigating risk to the system consists primarily of using the mode that offers the least risk, typically air movement, and relying on alternate sources of supply that may be less threatened.

The model only identifies the logistics capabilities that must be survivable or redundant; it does not provide threat mitigation options or threat assessments. It is an awareness tool to ensure logisticians understand the threats and their responsibilities. In figure 2, survivability is depicted as the dashed line surrounding the different sources of supply and the lines of communication all the way up to the end user. Note that the line of survivability extends into the threat zone.

Sustainability. This final and most important logistics principle of the Gap Reduction Model is the concept of “a function of providing for and maintaining those levels of ready forces, materiel, and consumables necessary to support military effort.”⁸ Providing overwhelming logistics support to end users for extended periods of time is the hallmark of U.S. military logistics.

Sustainability must always be incorporated into the logistics system since no plan ever proceeds exactly as planned. Even if an operation is projected to take only a couple of hours, logisticians must have a plan for the sustainment of the end user when—not if—circumstances change. If the situation changes and the duration and scale of the operation expand, then the plan for sustainability developed by the logisticians in the initial stages needs to be put in motion.

Sustainability must be tailored to the size of the end users and based on their priorities. It is imperative that the requirements come directly from the end users so superfluous materiel and support do not occupy limited space in the lines of communication.

The model is designed to demon-

strate the need and fluctuation of sustainability. The model forces the planner to work out the potential logistics needs in the event of an escalation of the operation. This ensures the logistician is prepared to respond.

Sustainability in the model in figure 2 is a horizontal line that spans the breadth of the logistics system. It crosses both the survivability and threat lines to encompass both the end user and the different sources of supply. This line showcases that logisticians can provide the identified and required support to the end user across the spectrum of mission execution.

The strength of the Gap Reduction Model lies in its ability to break out the different end users and illustrate how the support flows to their operating locations in a simple and understandable framework. Logisticians can balance the information flowing in with the different lines of communications available and the requirements levied by the end user. This ability takes a fair amount of time and experience to develop.

The model is not necessarily the only way to analyze situations; it is just a different way. It is intended not to replace current methods that are used but to provide another tool for logisticians. Ultimately, all of these methods are just that—tools. The knowledge, skill, and experience of the individual logistician will determine the success in providing support.

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⁷ Ibid., p. xvii.

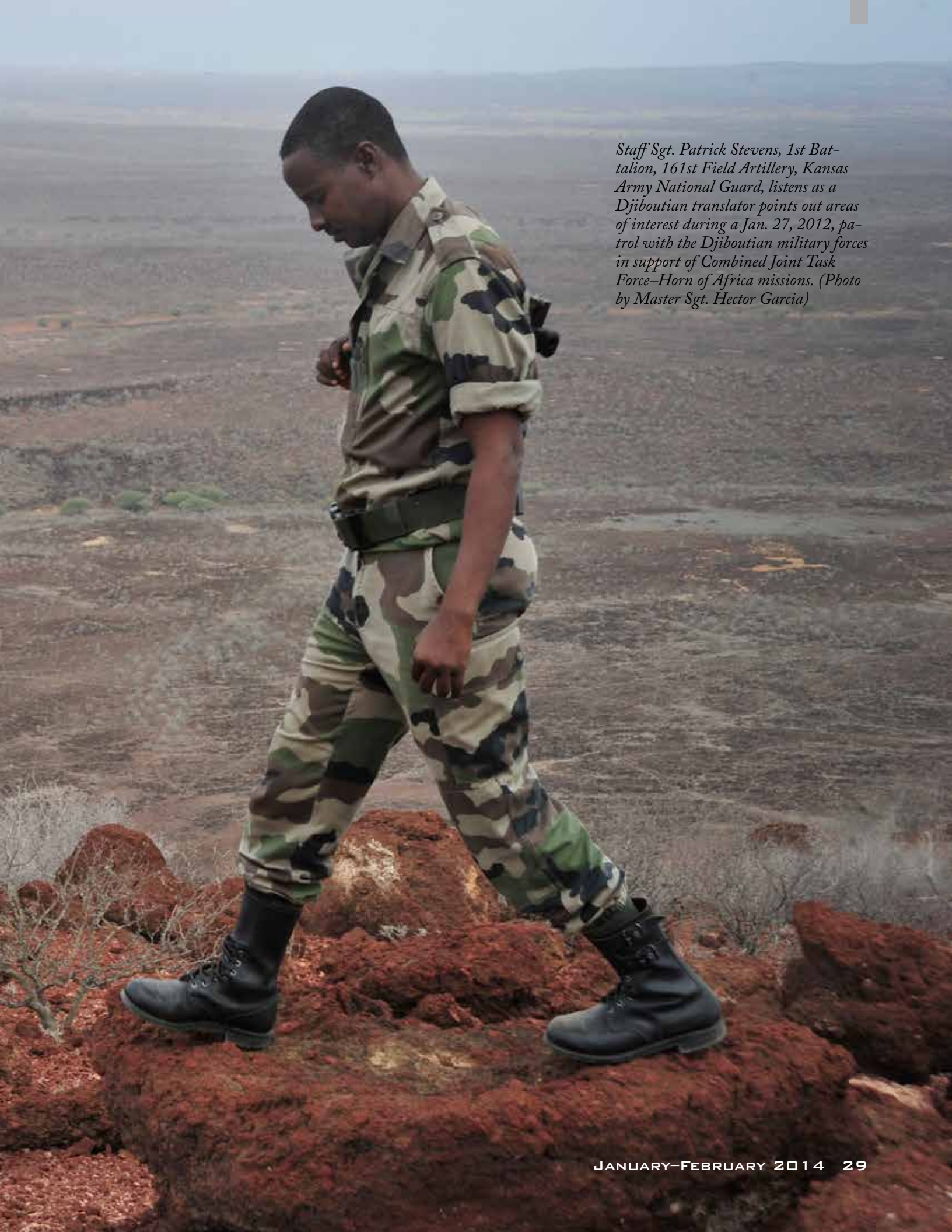
⁸ Ibid., p. xvi.

Overcoming Logistics Challenges in East Africa

The Combined Joint Task Force–Horn of Africa has established a presence in East Africa to strengthen organic security capabilities, prevent conflict, and build partner-nation capacity.

■ By Lt. Cmdr. Akil R. King III, USN, Capt. Zackary H. Moss, USA, and Lt. Afi Y. Pittman, USN



A full-page photograph of a soldier in a desert environment. The soldier, a Black man, is wearing a camouflage uniform with green, brown, and tan patterns. He is walking on a rocky, reddish-brown terrain, looking down at the ground. The background shows a vast, flat, arid landscape under a clear sky. The text is positioned in the upper right corner of the image.

Staff Sgt. Patrick Stevens, 1st Battalion, 161st Field Artillery, Kansas Army National Guard, listens as a Djiboutian translator points out areas of interest during a Jan. 27, 2012, patrol with the Djiboutian military forces in support of Combined Joint Task Force–Horn of Africa missions. (Photo by Master Sgt. Hector Garcia)

Logisticians from the Army, Navy, Air Force, and Marine Corps have faced many overwhelming logistics obstacles over the course of our nation's illustrious military history. Logistics is the lifeline of military forces, and without the reliable availability and resupply of the requisite "bullets, beans, and black oil" necessary to sustain operations, warfighters are left in vulnerable situations and unable to accomplish their missions.

From those very first colonial-era battles to Operations Iraqi Freedom and Enduring Freedom, U.S. military supply professionals have adapted and overcome logistics hardships exacerbated by poor communications, inadequate planning, extreme weather, and a host of other issues.

Logisticians have benefited from logistics lessons learned from various conflicts on several continents over the last few centuries. So what challenging environment have we yet to encounter? It is the rarely mentioned continent and the one that remains largely undeveloped with tremendous potential for growth: Africa.

Attention on Africa

Africa is the world's second largest and second most populous continent, and it is also the poorest one. In recent years, powerful countries, such as the United States and China, have been paying increased attention to Africa.

The United States has come to realize that Africa holds significant strategic, political, and economic importance to its national interests. With 54 internationally recognized sovereign nations, at least one thousand languages, a multitude of distinct ethnicities, untold amounts of untapped valuable minerals and fossil fuel, and more than one billion people, Africa could be a vital player on the world stage.

With the 2002 stand up of the Combined Joint Task Force–Horn of Africa (CJTF–HOA) at Camp Lemonnier, Djibouti (CLDJ), the United States established a positive

and enduring presence in East Africa and is now focused on helping to strengthen organic East African security capabilities, prevent conflict, and build partner-nation capacity.

U.S. Africa Command (AFRICOM) is one of six unified geographic combatant commands within the Department of Defense unified command structure and has been headquartered in Stuttgart, Germany, since Oct. 1, 2008. The United States has committed a vast amount of personnel, equipment, and materiel resources and has created a positive buzz throughout the continent.

In order to help facilitate efficient materiel support across the Horn of Africa, the CJTF–HOA Logistics Directorate (CJ–4) has established distribution networks to monitor and control logistics execution. In support of the CJTF–HOA commander's mission, the CJ–4 validates, prioritizes, deconflicts, and synchronizes logistics requirements before and during execution by fusing support capabilities in the combined joint operations area (CJOA) and in areas of interest.

In short, the CJ–4 serves as the lead staff element for logistics planning in support of at least nine forward operating locations (FOLs) and for implementing processes to streamline the sustainment pipeline. Joint logistics is the coordinated use, synchronization, and sharing of two or more military departments' logistics resources to support the joint force.

The CJ–4 integrates and synchronizes multifunctional sustainment operations for the CJOA, including supply, field services, transportation, maintenance, general engineering, human resources, financial management, legal support, religious support, health service support, resettlement, internment, and detainee operations. The CJ–4 develops interoperable logistics concepts and doctrine and clearly identifies and integrates the appropriate logistics processes, organizations, and command and control options to meet the commander's intent in the joint environment.

Tyranny of Distance

To gain an understanding of the logistics challenges present in East Africa, it is imperative to focus the lens on the unique challenges faced in meeting the logistics requirements in the CJOA. Perhaps the most pressing challenge is the "tyranny of distance" caused by the vast, highly diversified terrain spanning more than 1,500 miles across East Africa.

The term was coined based on the challenges faced while operating in a theater that is far greater in land mass than any other that U.S. forces have operated in thus far. The continent spans 11.7 million square miles—at least three times greater than the size of the United States—which presents many distribution challenges.

African countries in general lack infrastructure and have degraded road conditions that often make traveling very difficult. Some countries are more developed than others; however, logisticians cannot blindly apply logistics concepts and methods to all countries because they each have unique planning considerations.

As previously stated, Africa is a vast continent comprising individual sovereign nations. It is imperative to follow current customs and border procedures for each country in the assigned area of operations. Not having this knowledge could cause essential gear and equipment to be frustrated at an airport, seaport, or country border.

Overcoming Challenges

Implementing joint efforts and working with coalition and partner nations have allowed the CJ–4 to hone its skills and formulate methods to overcome logistics obstacles. In East Africa, logistics distribution commences at CLDJ, where the CJ–4 plans and coordinates in conjunction with the installation transportation office to provide finished products to the customers, which are the supported units at the FOLs.

Although the contingency contracting office and CJ–4 collectively work procurement from the point of

origin, CJTF-HOA stages the main logistics hub at CLDJ, which serves as the shipping and receiving hub for downrange FOLs.

Buying from local vendors can be difficult. Requesters are required to go through the available military supply systems before purchasing from a local vendor. If the supply system does not have the desired product and they do purchase from a local vendor, that vendor might not have the same quality of products that requesters are accustomed to.

Another challenge is the shipping time for the delivery of requested goods ordered through the supply system. Customers often wait 60, 90, and even 120 days for goods procured from the United States. At FOLs, this is counterproductive to mission accomplishment because it delays progress.

However, U.S. forces have avenues for receiving logistics products by land, sea, and air. The key global providers in the joint logistics environment are the military services, the Defense Logistics Agency, U.S. Joint Forces Command, and the U.S. Transportation Command. The U.S. Transportation Command controls distribution assets from the Air Mobility Command, Military Sealift Command, and Military Surface Deployment and Distribution Command.

CJTF-HOA is strategically located adjacent to the Port of Djibouti, allowing access for commercial sealift, and near the Djibouti International Airport for airlift. With the approval of the joint task force commander, the CJ-4 finalized its own theater distribution plan in 2013, which defined transportation and distribution methods specific to East Africa.

AFRICOM and the CJ-4 established the African Surface Distribution Network, which controls the movement of cargo to outlying locations via surface transportation using prenegotiated contracts. This method was instrumental in significantly reducing the overall materiel delivery time from CLDJ to the FOLs.

Another method to maximize effi-

ciency and cost effectiveness, which also happens to be the fastest method, is to use air assets to move personnel and cargo to FOLs. CJTF-HOA is supported by airlift capabilities from various service components, and the Joint Movement Center (JMC) coordinates, prioritizes, and validates all air movements.

To identify cargo lift requirements, JMC created a "single voice" cargo report that consolidates individual customer cargo backlogs to supported locations. For example, if CJTF-HOA has a mission to support the

of companies that can be accessed online to help avoid redundancy.

For instance, because of a high turnover rate of personnel in the joint environment and having supported units in remote locations, incoming units can access the ALN portal and identify promising options for African companies to conduct business within a specific locale. This saves time and effort that would be wasted by searching for vendors.

East Africa is indeed an extremely challenging operating environment

The United States has come to realize that Africa holds significant strategic, political, and economic importance to its national interests.

movement of distinguished visitors to Manda Bay, Kenya, and a 200-pound shipment of cargo has already been approved for airlift to Manda Bay, JMC would combine the movements as long as the planning requirements are met for the scheduled airframe.

Adaptive Logistics Network

The 10 East African countries located within the CJTF-HOA area of responsibility share the common characteristics of being emerging-market economies and containing largely undeveloped physical infrastructures and immeasurable untapped natural resources.

In an effort to help its African partners cultivate their resources and further develop an organic African business infrastructure, AFRICOM is developing the Adaptive Logistics Network (ALN) initiative.

ALN is a central database that documents credible African businesses and their capabilities with the intent of linking them with customers that include the U.S. military, nongovernmental organizations, contractors, and multinational corporations. In essence, it is a repository of resident knowledge about the core capabilities

with an abundance of unique logistics challenges to overcome. Despite the challenges experienced over the past decade throughout the Horn of Africa, the CJ-4 logisticians at CJTF-HOA press on smartly and take comfort in the saying, "If you can survive logistics here, you can survive logistics anywhere."

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Soldiers assemble a Chinook helicopter that was disassembled in Hawaii and transported to Botswana in support of Exercise Southern Accord 2012. (Photo by Sgt. James D. Sims)



A large military helicopter, marked with "UNITED STATES ARMY", is being hoisted by a crane. Two soldiers in camouflage uniforms are managing the ropes. The scene is set at an airfield with a large hangar in the background. The sky is clear and blue.

Adaptive Logistics in Africa: Southern Accord 12

A flexible logistics support model and adaptive deployment methods enabled an exercise focused on humanitarian assistance, disaster relief, peace-keeping, and aeromedical evacuation operations.

■ By Lt. Col. Brad A. Bane

Military deployments to Africa are similar to deployments to Afghanistan. In both cases, movements and secondary sustainment are challenging because of geography, immature transportation corridors, limited transportation hubs, and reliance on host-nation transportation capabilities.

U.S. Army Africa (USARAF) habitually conducts deployments to Africa in support of various training exercises. These deployments are often complex and difficult to support. Compounding the problems are frequent exercise location changes and short deployment windows for the exercises. Supporting these exercises requires flexibility in following deployment timelines and in selecting ports of debarkation. It also requires the use of local logistics resources and a variety of contracts.

Exercise Southern Accord 2012 (SA12) held at Thebephatshwa Airbase, Botswana, was a prime example of why the U.S. military should

consider more adaptive and flexible models of logistics support when deploying to Africa and other areas with similar operational environments. SA12 was a combined exercise with the Botswana Defense Force focusing on humanitarian assistance and disaster relief operations, peacekeeping operations, and aeromedical evacuation.

The exercise included more than 700 U.S. forces and roughly the same number of Botswana Defense Force personnel. The U.S. Army National Guard sent the most participants; National Guard Soldiers deployed to Botswana from 19 different locations in the continental United States (CONUS) and six different locations in Europe.

SA12 required airlift and sealift cargo from CONUS and Europe. In order to complete the total movement of forces and sustainment by the required delivery date, it was necessary to plan ahead and be adaptive in the methods and means of the deployment.

SPOD and APOD Selection

Selecting a sea port of debarkation (SPOD) and aerial port of debarkation (APOD) was paramount to the success of SA12. USARAF planners requested Durban, South Africa, as the SPOD for the exercise, and the government of South Africa approved the selection. Planners chose Durban over other options because of its established customs clearance procedures and simple inland transport routing.

Challenges associated with using Durban as the SPOD included moving and clearing customs through two different countries (South Africa and Botswana). In order to facilitate the movement, local companies with expertise in this area were required.

Planners were challenged when selecting the APOD for the exercise. The largest airport in the vicinity of Thebephatshwa Airbase (the exercise area) was Gaborone International Airport. However, Gaborone International was unavailable because of



Soldiers of the Hawaii National Guard's B Company, 1-171st Aviation Regiment, place the aft transmission on one of four Chinooks that they had disassembled and transported to Botswana in support of Southern Accord 2012. (Photo by Sgt. James D. Sims)

diplomatic concerns. This presented challenges for a variety of reasons. The foremost concern was the capabilities of the airfield at Thebephatshwa.

Gaborone International Airport was the APOD of choice for all of the Air Mobility Command's (AMC's) commercial charter passenger carriers. The deployment plan entailed the use of these carriers because of the wide dispersion of deploying forces. It also entailed the use of consolidation points for passenger movements from CONUS.

The APOD at Thebephatshwa did not seem suitable for civilian-type passenger aircraft and also had a questionable runway length for the C-5 Galaxy aircraft (or equivalent), which was needed for deploying four CH-47 Chinook helicopters from Hawaii to Thebephatshwa. In order to make this APOD a viable option, detailed coordination was required among USARAF, AMC, and other organizations for air movement requirements.

Sealift Operations

Planning for sealift and inland transportation into Botswana was laborious. Two contracting options were available for moving cargo from Durban to Thebephatshwa.

The first option was the Military Surface Deployment and Distribution Command's (SDDC's) Universal Service Contract (USC). This contract allows for inland movement of cargo and customs facilitation for a surface movement that requires a portion of the trip to be by sea.

In order to use USC for this purpose, established inland rates must exist from the SPOD to the final destination. In this instance, rates did not exist under USC and would need to be established for door-to-door movement to Thebephatshwa.

The second option available was the U.S. Africa Command (AFRICOM) Surface Distribution Network (ASDN) contract. This contract is an "indefinite delivery, indefinite quantity" contract established for inland distribution throughout Africa. The contract includes ground movement,

materials-handling equipment, small distribution point activities, and customs facilitation.

As the planning cycle matured, it became evident that rates were not going to be established for the inland movement and customs facilitation under the USC. Therefore, the USARAF G-4 decided to use SDDC's USC contract for sealift only and the ASDN contract for customs facilitation, inland movement, and materials-handling equipment at the exercise site. Having both contracts available ensured flexibility in the deployment plan and also negated the use of a one-time-only contract for inland movement. This decreased contractual processing time and ensured a more adaptive plan.

Sealift cargo originated from five different locations in Europe, the Middle East, and CONUS. The cargo for the exercise arrived on five different vessels into Durban. This made customs clearance and onward movement more complex, but through the use of the ASDN contract and local contractors, the movement was seamless.

Before the vessels arrived, the local contractor ensured preclearance of most cargo into South Africa. This guaranteed that all cargo began onward movement to Botswana less than a week after arrival. In total, more than 75 pieces of cargo were cleared and transported through South Africa to Botswana before the required delivery date. Only one container was frustrated; the cause was inadequate veterinarian certification.

The timely delivery of the cargo was possible only through use of a local contractor familiar with over-the-border transportation of cargo through South Africa.

Air Movement Operations

Air movement of passengers and equipment for the exercise was equally complex. The air movement requirement was executed using a combination of U.S. Air Force assets, AMC contracted cargo and passenger assets, and the U.S. Transportation Command (TRANSCOM)

commercial ticket program.

Eleven sorties were used to move all air movement requirements. Included in these sorties were two commercial charters to move main-body passengers, two C-17 Globemaster aircraft missions, one C-130 Hercules aircraft sortie, three Antonov An-124 aircraft missions, and three TRANSCOM World Wide Express small commercial cargo missions. To make air movements occur by the required delivery date, detailed coordination was required by USARAF mobility planners with AMC, the supported units, and select contracted carriers.

Commercial Charter Air Movements

Passenger movement was primarily accomplished through commercial charters from centralized hubs in CONUS. Consolidation points were selected through coordination with the supported units and AMC. Charters were scheduled to comply with Joint Operational Planning and Execution System (JOPES) requirements and booked through AMC.

When AMC solicited passenger aircraft, none of the commercial charter vendors agreed to provide service into Thebephatshwa because of unclear capabilities at the airfield. Carriers had concerns about tower procedures, communications, and inbound clearance. The airfield also did not have adequate ground support equipment required for passenger download, so carriers asked to fly into Gaborone International Airport, which was unavailable because of diplomatic concerns. This problem was time-consuming, but planners developed a viable solution three weeks before execution.

USARAF mobility planners facilitated the use of Thebephatshwa by getting the carriers in contact with the airfield's command and control personnel. Through discussions between the carriers and Thebephatshwa airfield managers, inbound clearance and general airfield communication procedures were established to enable the use of Thebephatshwa for

commercial charter aircraft.

This resulted in one AMC carrier accepting the missions to move passengers from CONUS-based consolidation points to Thebephatshwa. Only after the carrier was selected and the vendor had sent support personnel to the airfield was the ground support equipment shortfall identified.

To rectify this shortfall, a contracted solution was pursued. Rather than use a one-time-only contract, equipment was contracted through AMC's standing contract with the supporting carrier. This was a much more responsive solution to the problem and ensured the carrier was comfortable with the support equipment used at the airfield.

Within two weeks of the selected carrier's reconnaissance of Thebephatshwa, the necessary support equipment was delivered from Johannesburg, South Africa, and the airfield was prepared to receive the commercial charters. Contracting these assets through normal contracting channels would have taken weeks and resulted in the Thebephatshwa airfield being deemed unusable for commercial charters.

Cargo and Equipment Air Movement

The movement of equipment from various locations in CONUS and Europe proved problematic and required innovative, flexible solutions. Foremost was the movement of four CH-47s from Hawaii to Botswana. The sourcing solution for movement of these assets was three An-124 aircraft.

The APOE was validated as Joint Base Pearl Harbor-Hickam, Hawaii, and the APOD was validated as Thebephatshwa. After validation, USARAF mobility planners and the deploying unit began coordinating with Hickam Field personnel on ramp space for breaking down the CH-47s for movement.

It became evident that Hickam Field had insufficient ramp space for this task because of a U.S. Pacific Command exercise. Even though the airfield was validated in JOPES, it was not approved by support per-

sonnel at Hickam. Other airfields in Hawaii needed to be explored. The only other two airfields on Oahu that could potentially support this size of aircraft were Kaneohe Bay, which was also unavailable, and Kalaeloa Airport.

Using Kalaeloa Airport for the movement of the Chinooks also presented challenges. This airfield was formerly used as a naval air station by the U.S. Navy and had a runway length that was less than the recommended takeoff length for an An-124. In order to use this airfield, clearance was required from airfield personnel, AMC, and the selected carrier.

The use of the An-124 aircraft was extremely beneficial for a lower priority exercise. Other AMC options considered for this movement were the C-17 and the C-5. These assets were not available. The An-124 proved to be very reliable for strategic lift during this exercise and never resulted in a delay during movement.

After a site reconnaissance by the carrier and discussion with airfield support personnel, it was determined that Kalaeloa could support the requirement. This was only approved after countless hours of dialog among the carrier, AMC, and civilian air support personnel at Kalaeloa. If Kalaeloa had not been approved, the only other viable option would have been to fly the Chinooks to the island of Hawaii and coordinate the use of Hilo Airport for their movement. This would have increased costs and potentially made the movement infeasible.

Other movement requirements included moving the 30th Heavy Brigade Combat Team headquarters through Pope Air Force Base and the USARAF Contingency Command Post (CCP) from Aviano, Italy. These missions were intended to be completed using one C-17. The C-17 flight plan moved cargo from Pope to Thebephatshwa and then to Aviano Air Force Base to pick up USARAF CCP personnel.

The initial leg of this mission was successful; however, after arriving in Botswana, the aircraft became not mission capable. This delayed the ar-

rival of the CCP in Botswana for more than a week.

Eventually, another C-17 was sourced to fly the USARAF CCP from Aviano to Thebephatshwa. Exercise command and control personnel were flexible with the exercise training plan to adjust for the new arrival date of the USARAF CCP, so the late arrival had little impact on the overall success of the exercise.

The last strategic lift mission was in support of the U.S. Marine Corps, which supported the exercise with a rifle company. AFRICOM tasked its direct support C-130 to move the equipment and additional ammunition from Stuttgart, Germany, to Thebephatshwa. Again, this aircraft experienced maintenance problems and had to land and discharge its cargo in Camp Lemonier, Djibouti, before returning to Germany for maintenance.

With no replacement aircraft available, the World Wide Express contract was used to move the cargo from Camp Lemonier to Thebephatshwa. After going through the bidding process and arduous diplomatic clearance with Djibouti, the sortie successfully delivered the required cargo to Thebephatshwa with little impact to the mission.

Two other missions were scheduled through the World Wide Express contract to move dental equipment and additional class I (subsistence) to Thebephatshwa. This contract proved to be extremely effective and responsive throughout the exercise and provided another adaptive solution that ensured cargo and necessary equipment arrived on time.

Lessons Learned

SA12 proved to be a good case study in deployment by a variety of forces into an austere, immature operational environment. Many lessons can be learned from this deployment.

First and foremost, host-nation agreements and concurrence with surrounding countries are important. These agreements are always pivotal in the success of not only the



Marines from D Company, Anti-Terrorism Battalion, 4th Marine Division, exit a Hawaii Army National Guard CH-47F Chinook helicopter with Botswana Defense Force soldiers at Thebephatshwa Air Base in Botswana on Aug. 3, 2012, during Southern Accord 2012. (Photo by Sgt. Adam Fischman)

deployment but also subsequent logistics resupply. During SA12, the support provided by South Africa, local vendors, and logisticians greatly enhanced the U.S. forces' ability to execute the exercise. If South Africa had been uncooperative or if the local contractors had been incapable, the exercise would have been in jeopardy.

Second, contracting options are essential to responsiveness and flexibility. For the movement of surface cargo, having an alternate contracting option other than USC saved an immense amount of processing time for facilitating inland transportation and customs clearance. Having options also helped ensure local companies familiar with operating in the specific area of operations could provide reliable service.

Likewise, using contract air assets from civilian charters and other cargo movement carriers ensured that sourcing for smaller scale, lower priority exercises did not affect higher priority air movements. It also

proved that commercial, contracted solutions for the movement of cargo are viable and sometimes more reliable. Using AMC's established contracts for ground support equipment at Thebephatshwa ensured the right support assets were on hand when the civilian charters landed.

The third lesson learned pertains to node selection. It is important that all options are explored and node selection is thoroughly researched before any operation or exercise. If this is done, alternatives will be available when problems with specific deployment nodes arise.

Last, it is important to consider the operational environment when planning deployment and execution timelines in austere, immature theaters. Planners must consider the countries' sociocultural norms at all times. When planning deployment timelines, it is important to plan for delays and inconsistencies in policies and procedures for each host country that supports the operation.

In the future, the need to deploy U.S. forces on small-scale missions in support of stability and support operations may increase. In order to deploy to austere, logistically immature areas, the need for logisticians to be flexible will be paramount. The days of infinite resources for U.S. military operations are over. To continue to support our national objectives, we must learn to deploy, fight, and win in these types of environments using a variety of assets. SA12 proved to be a good lesson on what it will take logistically to accomplish these objectives.

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A Cameroon armed forces member uses a compass to determine proper aircraft heading and aerial delivery drop zone marker placement prior to a Cameroon Air Force C-130 low-cost low-altitude bundle air drop during Central Accord 13. (Photo by Master Sgt. Stan Parker)



Enhancing Self-Sufficiency in Central Africa

Exercise Central Accord 13 helped Cameroon and surrounding nations bolster capabilities to support disaster response and peace by enhancing their logistics capacity and medical readiness.

■ By Col. Giselle Wilz

When heavy flooding hit northern Cameroon in September 2012, the Cameroon armed forces faced many challenges while responding to this natural disaster. The region's terrain, from coastal plains to mountains and barely navigable roadways, significantly delayed the response time, according to the Cameroon Air Force deputy chief of staff. He emphasized that he wished he and his comrades could have done more to quickly protect endangered citizens while mitigating the disaster.

The Cameroon armed forces had to return to a home base every few days to resupply before going back to conduct peacekeeping and stability operations, which resulted in the loss of valuable time. These concerns and more were addressed during Cen-

tral Accord 13, a joint, multinational exercise to promote regional cooperation and increase aerial resupply and medical treatment capacity. The 10-day exercise was sponsored by U.S. Army Africa and hosted by the Cameroon armed forces. The participating armed forces used their own equipment and manpower to increase self-sufficiency for the future.

Roughly 160 U.S. Soldiers, Airmen, and Sailors participated in the exercise with hundreds of military members from Cameroon, the Gabonese Republic, the Democratic Republic of the Congo, the Republic of the Congo, Sao Tome and Principe, and Burundi.

The annual exercise, which rotates among different Central African partner nations, demonstrates the continued U.S. commitment to

supporting African military efforts to remain equipped and capable of maintaining peace, stability, health, and well-being in their countries.

Aerial Delivery

One key area of Central Accord 13 focused on aerial deliveries by working with the Central African militar-

ies to package water, food, and medical supplies for drops from existing airframes. U.S. Army riggers surveyed existing needs and capabilities and then delivered some cardboard honeycomb material for distributing weight during the practice airdrops.

Advisers from the U.S. Air Force provided instruction, and the U.S.

and Central African teams worked together to develop feasible ways to meet existing needs. In the meantime, airborne pathfinders discussed drop zone operations with the Central African militaries to establish and mark areas for receiving aerial deliveries.

Everyone participated in a training session provided by U.S. riggers on the various methods of packaging supplies for free fall airdrops from Cameroon's small Bell 206 and larger Eurocopter Puma helicopters. They also discussed the low-cost low-altitude system (LCLA) for use with Cameroon's single fixed-wing asset, the C-130 Hercules.

The LCLA is a single-use parachute airdrop system that costs less than other approved low-drop delivery systems. The LCLA can quickly resupply small units on the battlefield and can be assembled with little-to-no rigger training. This made it ideal both for the 10-day training event and for future use by Central African military partners.

Paratroopers from Cameroon and representatives from nearby partner nations quickly recognized the benefits of LCLAs in maintaining and improving operations because paratroopers can more quickly and easily receive supplies while in an operational area. Soldiers on dismounted patrols can expediently recover the supplies without materials-handling equipment. The bundles also can be retrieved without leaving any indicators of troop activity in the drop zone.

Altogether, the LCLA enables fast, precise delivery in a package configured to meet small-unit needs without operational pauses—a great training benefit to meet the needs of the Cameroon armed forces.

Field Training Exercise

With the help of linguists from the Utah Army National Guard, whose State Partnership Program is aligned to Morocco, Central Accord 13 training quickly progressed from academics into practical exercises and a three-day field training exercise (FTX).



A Burundi National Defense Force paratrooper adjusts the straps for a low-cost low-altitude delivery system during Exercise Central Accord 13 (Photo by Sgt. Austin Berner)

During the first day of the FTX, the Cameroon armed forces made history with their first ever aerial supply delivery from a C-130 transport. Their Central African counterparts closely observed, knowing that the techniques and procedures could be replicated using their own aircraft.

The Cameroon armed forces were pleased with the exercise, commenting that when the next disaster hits, the airmen would be more ready to help by using the parachute systems to get food and water to those affected. Others commented in after-action reviews that they would be better able to manage their units' resupply operations in the air and on the ground by establishing drop zones and collecting supplies.

Medical Treatment and Evacuation

Beyond the improved ability to get supplies to natural disaster victims and military members in the field, the Cameroon armed forces collaborated with U.S. and Central African counterparts to enhance patient treatment, medical readiness, and evacuation procedures.

Working just with the Cameroon military's existing airframes, U.S. personnel taught, demonstrated, and practiced loading patients into the helicopters, first while stationary and then during quick stops with the helicopter rotors spinning. By the tenth day of the exercise, the Central African militaries were quickly and efficiently demonstrating patient lifts and litter placement in helicopters while adhering to carefully practiced safety procedures. Cameroon armed forces officers commended the U.S. medical personnel for their knowledge of the aircrafts' capabilities.

In addition to evacuation techniques, the 256th Combat Support Hospital, an Ohio-based Army Reserve unit, worked with the Central African militaries on improving patient treatment in the field and evaluating conditions more commonly seen in recent conflicts, such as traumatic brain injuries. The instruction evolved into train-the-trainer style

classes that incorporated methods of using moulage kits to simulate injuries for better training.

Just as with the aerial delivery and drop zone training, all of the medical-related tasks came together during the three-day FTX as mock patients with injuries were treated using the shared medical techniques and then evacuated to airframes using a litter carry onto a Puma or a two-person lift onto a Bell helicopter.

Real-World Benefits

Central Accord 13 participants said that they learned a wider scope of use for Cameroon's airframes—beyond their use for patient evacuation and aerial supply—such as incorporating the aircraft in peacekeeping missions or using them for search-and-rescue operations. Much of the training followed that thread: the equipment was there and the personnel were trained and ready, but both areas were primed for growth through mentorship and discussion. That growth in capacity remains a cornerstone of the annual Central Accord exercise.

The partnerships formed during the exercise are credited with advancing cooperative relationships. This was the first opportunity for several of the six participating Central African militaries to connect. These cooperative relationships are imperative to developing regional solutions to transnational security threats.

The Cameroon Army chief of staff said that with the amount of continental conflicts requiring intervention, Cameroonian service members serve as soldiers not only for their own country but also for Africa and the world. African militaries that focus on interoperability for better sustainment during operations to achieve or maintain peace and stability will benefit the region.

With many of Africa's nations identified as fragile states on Foreign Policy's Failed States Index, exercises like Central Accord 13 provide critical training for operational and relational improvements that strengthen the partners' capabilities to prepare for and

respond to crisis. The exercise did more than build relationships, however.

The need for standardized mission sets and terminology was apparent not only among the different countries but also among those hailing from the same military. For example, pilots from Cameroon are trained in schools across the globe, depending on available seats and funding. The differences in techniques and terminology posed conflicts with some operating procedures. As part of the joint effort of Central Accord 13, contradictions were worked out and best practices were established for conducting future operations safely and efficiently.

Central Accord 13 provided a mutually beneficial training opportunity for the United States and its African partners. Operating on a global scale in an austere environment furthers U.S. armed forces' capabilities as they gain the opportunity to plan and execute a multinational mission, train with international military forces, and strengthen their own mission execution skills. It also demonstrates the continuing commitment of the United States to enhance military interoperability and global security through mutually beneficial exercises.

Central Accord has been bringing U.S. and African militaries together for advancement since 1996. This commitment continues to enhance global operations and develops the operational capacity of some of the weaker nations in the global sphere to strengthen the whole.

Col. Giselle Wilz is the commander of the 141st Maneuver Enhancement Brigade, North Dakota Army National Guard. As the Task Force Central commander for Central Accord 13, she partnered with the Cameroon armed forces' counterparts to lead a multinational exercise focused on medical readiness, patient evacuation, and aerial delivery. She works full time as the deputy chief of staff for operations for the North Dakota National Guard.

Spc. Lyle Carter, with the 396th Transportation Company, 157th Combat Sustainment Support Battalion, organizes equipment while taking inventory for a palletized load system at Bagram Airfield, Afghanistan. (Photo by Sgt. V. Michelle Woods)



Accounting for Government Furnished Property

This article defines the government furnished property problem, addresses its importance, and lays out the Army's way ahead.

■ By Col. James Kennedy



Government furnished property (GFP) is arguably the most misunderstood supply and accountability function within the Army. This is not just a logistics issue but also an Army issue that must be understood by all leaders and branches.

There are two types of government property: GFP and contractor acquired property (CAP). Department of Defense (DOD) Instruction 5000.64, Accountability and Management of DOD Equipment and Other Accountable Property, defines

GFP as “any property in the possession of, or directly acquired by, the Government and subsequently furnished to the contractor (to include sub-contractors and alternate locations) for performance of a contract.”

GFP includes spares and property for repair, maintenance, overhaul, or modification furnished to an Army contractor to provide specified or functional services and support to accomplish the tasks and responsibilities outlined by a negotiated statement of work or performance work statement.

CAP is defined as “any property acquired, fabricated, or otherwise provided by the contractor for performing a contract, and to which the Government has title. CAP that is subsequently delivered and accepted by the Government for use on the same or another contract is considered GFP.” GFP can be either military standard equipment, commonly called “green equipment,” or nonstandard equipment, commonly termed “white equipment.”

GFP is an umbrella term that contains two categories: government furnished equipment (GFE) and government furnished materiel (GFM). GFE includes items that do not lose their identity, such as generators and trucks. GFM includes items that lose their identity such as parts, construction materials when consumed through use, and other low-dollar items that may not qualify for property accounting purposes but retain some limited residual identity characteristics that require control when issued to a user.

GFP Accountability

In support of auditability requirements in the National Defense Authorization Act of 2010, the Office of the Under Secretary of Defense (Comptroller) Financial Improvement and Audit Readiness Guidelines direct the Army to ensure it has all government property, to include GFP, accountable within an accountable property system of record (APSR) no later than the end of fis-

cal year (FY) 2017. Additionally, in 2011, the DOD noted GFP accountability as a material weakness in its annual statement of assurance report to Congress.

Establishing accountability in government property records is essential for several reasons. First, we are entrusted to properly account for and control government property, regardless of who has physical control. Second, as a contract ends, military standard GFP items may be needed to fill unit shortages.

Following this mandate presents the Army with a challenge. The Department of the Army (DA) G-4 estimates that approximately 31,300 open contracts contain GFP. Within the Item Unique Identification (IUID) Registry, which tracks items worth more than \$5,000, contractors have entered approximately 167,000 items with a total value of about \$8 billion.

Unfortunately, the reliability of GFP in the IUID registry is not known. In Property Book Unit Supply-Enhanced (PBUSE) and the Defense Property Accountability System (DPAS), the Army has accountability of about 39,000 items of GFP with a total value of approximately \$950 million.

In Afghanistan, U.S. Army Central (ARCENT) and the Army Materiel Command (AMC) are tracking 156 contracts with approximately 356,000 items valued at \$938 million. ARCENT and AMC determined that the Army will retain roughly 14,000 items (5 percent of the total used in Operation Enduring Freedom) valued at \$47 million, with the remainder being disposed of in Afghanistan through transfer to Afghanistan's government or Defense Logistics Agency Disposition Services.

These numbers provide some scale of the GFP accountability issue, yet they do not show the complete picture. We cannot determine the full scope of the problem; we only know it is bigger than our documented information implies.

GFP Accountability Failures

Since 2008, numerous audits and investigations have mentioned failures in properly accounting for and overseeing GFP. There are many reasons for the present accountability situation.

The 2007 rewrite of Federal Acquisition Regulation (FAR) Part 45, Government Property, changed how we do business. Before the rewrite, the contractor was responsible for maintaining the fiduciary records of all government property. Since 2007, the responsibility of maintaining these records has fallen on the government. The contractor is now only responsible for stewardship of the government property, including maintaining serviceability and records documentation.

Before 2001, GFP was issued primarily to contractors supporting depots or program management offices, so the Army did not focus on this subject. Although Army policies and procedures to properly account for military equipment in units were in place, GFP was not treated as Army property and no specific GFP doctrine or policy was published.

So, leaders and supply personnel took incorrect actions that they believed were proper. Often GFP was laterally transferred to contractors, dropped off the unit property books, and removed from government accountability. As a result of these conditions and the exponential growth of GFP in Iraq and Afghanistan, the Army now lacks accountability in an APSR for most GFP.

A great deal of GFP is in Afghanistan, but the problem also exists in the institutional Army, where contractors perform maintenance, execute large construction projects, manage dining facilities and ammunition production plants, and perform many other vital service support functions.

Management Responsibility

The management of GFP involves a change in how we think about this property once it is provided to the contractor. GFP accountability and

management is quite different from what military leaders and property managers were taught about accountability of unit equipment.

Leaders must understand that the contract establishes accountability with the contractor and defines the movement, inventory, reporting, and maintenance of the equipment while in the possession of the contractor. Contractors are not normally responsible for following Army regulations. They are governed by the FAR and Defense Federal Acquisition Regulation Supplement (DFARS) requirements that are incorporated in the contracts.

Even though contractors are not required to follow the inventory and reporting requirements set forth in Army regulation, they are not free from maintaining accountability of the equipment. Steven Tkac, Acting Deputy Director of Acquisition Resources and Analysis for Property and Equipment Policy, stated, "The bottom line is that regardless of asset classification, the government is responsible for knowing what property belongs to them, who has it, and where it is, even if it's in the possession of a contractor."

GFP management is executed through the contracting office property management section, which is made up of series 1103 (industrial property management specialist) DA civilians. These personnel are responsible for providing property accountability oversight of the contractor. They periodically perform property management systems analysis (PMSA) to ensure the contractor is maintaining property records, conducting inventories, and adhering to the contract requirements regarding acquisition, maintenance, and accountability of GFP according to contract requirements.

Property management personnel typically conduct statistical sampling inventories to identify contractor accuracy or compliance. The PMSA is similar to the Army command supply discipline program. Some larger contracts, such as the Logistics Civil Augmentation Program, may be del-

egated by the contracting officer to the Defense Contract Management Agency for oversight and execution of the PMSA.

Changing GFP Procedures

The Army is taking necessary steps to get the process moving in the right direction. The DA G-4 has taken the lead to synchronize and integrate the GFP effort with stakeholders. PBUSE was updated to include all of the required data fields and contract information from DOD Instruction 5000.64. Most organizations and units will use PBUSE while depots and program managers will use DPAS.

In May 2013, the DA G-4 added GFP supply policy into Army Regulation (AR) 735-5, Property Accountability Policies. The Army will focus on bringing GFE back to Army records in FY 2014 and FY 2015. As requiring activities are bringing the GFE to record, processes will be developed in FY 2014 to gain accountability of GFM in FY 2015 and FY 2016.

Finally, AMC will develop a materiel system that will collect and match data from the contracting database, IUID registry, Wide Area Work Flow receipts by contractors, DPAS, and PBUSE to ensure we are accurately capturing and reconciling GFP across all systems and thus achieving enterprise asset visibility.

The Army will focus on GFE for the next two years using a two-pronged method. The Office of the Deputy Assistant Secretary of the Army (Procurement), through its Heads of Contracting Activities and with the help of requiring activities, is identifying all contracts that have GFE and ensuring all contracts contain required FAR and DFARS GFP clauses and accurate GFP listings.

As GFP lists are identified, the requiring activity (the organization that required the contract and paid for the service) will identify a property book officer who will catalog all equipment and add the equipment under a unit identification code for

each contract. These procedures are outlined in AR 735-5.

In July 2013, a DA G-4 GFP “Tiger Team” workgroup consisting of sustainment, materiel, contracting, and policy subject matter experts identified 25 initial doctrine, organization, training, materiel, leadership and education, personnel, and facilities gaps to resolve. Some of the more critical ones are:

- Updating property accountability policies.
- Developing techniques and procedures for GFP accountability.
- Training leaders and supply personnel.
- Resourcing additional civilian property administrators (1103 series) to fill the positions that are currently 39-percent filled.
- Improving government oversight of property management actions.
- Including AMC in the GFP disposal process.
- Adding GFP to the Army command supply discipline program.
- Addressing GFP accountability in Global Combat Support System-Army.
- Addressing readiness reporting for GFP in maintenance policy.

Although the task of bringing all this property to record in PBUSE or DPAS seems to be straight forward, there are two choke points: first, cataloging hundreds of thousands of nonstandard line item numbers and management control numbers from the Army Enterprise Systems Integration Program and, second, the resources it takes to enter equipment into the APSR. It is critical that the property book officers put only accurate data in the APSR.

The most significant challenge in improving accountability is the need for a strategic communications plan to inform leaders and supply personnel of the requirements, procedures, and reasons that GFP accountability is critical for Army fiduciary responsibility and readiness. Next, using a legacy system, PBUSE, with little funds for improvements as the Army



Sgt. Gregory Ray, a supply sergeant assigned to the 2nd Battalion, 3rd Infantry Regiment, discusses property book issues with Theodore Holman, a member of the Property Accountability Augmentation Team (PAAT) at Joint Base Lewis-McChord, Wash. The PAAT assists units with supply personnel shortages and property book management. (Photo by Staff Sgt. Antwaun Parrish)

transitions to Global Combat Support System-Army, will also be challenging. Another challenge is that historical documentation is not available for current GFP in most cases.

Despite the challenges, if the Army can keep to its milestones and implement the changes, it should be able to obtain enterprise visibility of GFP by the second quarter of FY 2015 while continuing to bring equipment to record.

The Army has three years to “police the GFP battlefield” from over a decade of neglect to meet the FY 2017 deadline. Numerous agencies are involved, and dedicated people want to solve the problem. With the right leadership, emphasis, tracking, and resources, the Army will conquer this mountain of equipment and paperwork and obtain enterprise visibility, accountability, and auditability of GFP.

This endeavor will make the Army a better steward of taxpayer dollars and improve its fiduciary responsi-

bility and readiness. We must ensure better use of resources so that we do not have to readdress this problem in the future.

For more information on GFP, visit the DOD GFP website at http://www.acq.osd.mil/pepolicy/accountability/accountability_GFP.html or the DA G43 Contingency Operations Division website at <https://g357.army.pentagon.mil/OD/LOC/G43/Contingencyoperation/default.aspx>.

Col. James Kennedy is the chief of the Contingency Operations Division at the Headquarters, Department of the Army, G-4. He is responsible for plans, policy, priorities, and programs for Army pre-positioned equipment and operational contract support, and he leads G-4 efforts for government furnished property. He holds master's degrees in both logistics management and military history and is working on a master's degree in education.



A member of a combined special operations task force logistics team operates a 10,000-pound forklift to move a “kicker box” to be uploaded onto a 5-ton medium tactical vehicle.

Mission-Critical Support for Special Operations Forces

Soldiers, Sailors, Airmen, and contractors work together to deliver responsive logistics support to special operations forces in eastern Afghanistan.

■ By Maj. Joel B. Anderson

Mission-critical logistics support is a never-ending battle for special operations forces (SOF) deployed to Afghanistan. This is especially true for the combined special operations task force (CSOTF) that operates in seven provinces of eastern Afghanistan and mentors Afghan National Security Forces.

Special operations by their very nature place small teams in remote, austere locations without the logis-

tics structure that normally supports conventional forces—often for protracted periods of time. An organic sustainment reach-back capability was originally designed and provided for as a part of the Army SOF transformation several years ago.

However, since so many SOF units have remained deployed to Afghanistan for such a variety of missions over such a large and diverse geographic area and have been doing

so for so long, the support structure originally envisioned has had to be augmented. This has compelled many SOF units, such as the CSOTF, to create their own capabilities, internally or out of hide, especially for things like logistics.

The Logistics Cell

Personnel with a variety of backgrounds comprise the logistics roster of the CSOTF. The C-4 (logistics

officer), Sailors, Soldiers, and contractors all work together to deliver world-class logistics in eastern Afghanistan.

The task force also has a forward logistics element, or LOG cell, at Bagram Airfield (BAF) to help reduce response time to remote outstations to the east and north of Kabul and BAF. Originally, when the task force was composed almost entirely of one battalion of an Army SOF group, the task force, with help from members of its theater special operations command, developed the BAF LOG cell as a means of providing more responsive logistics support in this mature theater.

Most of the logistics support for the task force now originates from conventional forces, especially for things like class I (subsistence), class III (petroleum, oils, and lubricants), and class V (ammunition), but the LOG cell aids in the movement and distribution of these essential logistics elements.

Functional Areas

The BAF LOG cell has three functional areas: ammunition, movement, and supply. The most important function of any unit's logistics element or support structure is its ability to arm the unit so that it can engage the enemy. The BAF LOG cell does this with the help of one ammunition specialist.

The next most important—but possibly the most visible since most members of the task force arrive in Afghanistan by way of BAF—is the movement control function.

In a conventional unit, such as a brigade combat team, the S-4 shop or Army logistics operations center will have a dedicated movements cell manned by a mobility warrant officer-in-charge and at least one military occupational specialty (MOS) 88N (transportation management coordinator) noncommissioned officer (NCO).

However, in the austere SOF environment, the primary movement control responsibilities are accom-

plished by a civilian contractor.

The supply function also receives a high degree of emphasis and visibility. The staff providing the expertise and effort to keep supplies flowing from BAF to the rest of the task force includes an Air Force staff sergeant, a Navy petty officer second class, and an Army specialist who is an MOS 92Y (unit supply specialist).

cell. Using in-transit visibility and frequently checking the Strategic Management System for real-time movement changes—particularly passenger movements—are incredibly helpful for managing logistics operations.

The multitasking Soldiers, Sailors, and Airmen of the BAF LOG cell have been outstanding combat mul-

SOF logisticians must firmly adhere to proper planning, forecasting, and requisition procedures, truly understand the lessons of the not so distant past, and forge on to even greater successes in future operations.

Synchronization

Effective logistics support, especially for SOF, requires deliberate and meticulous planning in order to anticipate the needs of teams in the field and ensure mission success. This planning must be synchronized with all echelons of the task force, including the advanced operations base (AOB), which is essentially a company headquarters from the SOF battalion.

When a supply request is submitted directly to the BAF LOG cell and has not gone through the AOB, which has its own supply sergeant, the AOB has no visibility of the transaction. The BAF LOG cell has to backtrack and ensure that the AOB has visibility so that the logistics common operational picture is accurate.

Equipment

Certain pieces of equipment are essential for LOG cell operations. One of the cell's most important pieces of equipment is the 10,000-pound capacity forklift. The task force's 5-ton medium tactical vehicle with trailer and 11-ton load-handling system also help increase the task force's logistics throughput capability.

New technologies have made the never-ending logistics battle much more manageable for the BAF LOG

tipliers for the entire task force. From the upper reaches of Kapisa Province all the way down to Paktiya, they have kept the SOF units fully operational.

The task force has been able to sustain operations in a versatile, flexible, and responsive manner to ensure the units and their partners are ready and able to find, fix, and finish any threat by providing a fully integrated and synchronized SOF-unique logistics foundation.

As we prepare to transition to whatever lies ahead here in Afghanistan and elsewhere, let us not forget the hard-won logistics lessons of recent special operations. SOF logisticians must firmly adhere to proper planning, forecasting, and requisition procedures, truly understand the lessons of the not so distant past, and forge on to even greater successes in future operations.

Maj. Joel B. Anderson is a public affairs officer with an extensive background in logistics. He has a bachelor's degree in mass communications and advertising from South Dakota State University and a bachelor's degree in marketing from Southwest Minnesota State University. He is a graduate of the Combined Logistics Captains Career Course.

53rd Transportation Battalion Provides 57th Presidential Inaugural Parade Support

Months of planning and preparation go into producing the presidential inaugural parade.

■ By Lt. Col. Stephen W. Ledbetter, Maj. Clarisse T. Scott, and Richard E. Killblane

One may not think of a parade as a military operation, but when it came to the presidential inaugural parade on Jan. 21, 2013, the nation trusted no organization other than the armed forces to coordinate and supervise it. Joint Force Headquarters National Capital Region, under the command of Maj.

Gen. Michael S. Linnington with Air Force Brig. Gen. James P. Scanlan as his deputy, formed the joint task force (JTF) headquarters for the operation. The JTF, which was composed of representatives from all branches of the armed forces, began planning more than six months before the event.

For all past inaugural parades, the movement control function was performed by a joint ad hoc organization made up of individual augmentees known as the Armed Forces Inaugural Committee (AFIC). For the 2013 presidential inaugural parade, however, the JTF decided to use unit capabilities for this mission.



Soldiers in their blue Army service uniforms form the Army segment of the 2013 presidential inaugural parade cordon. Each branch of the service formed one leg of the parade cordon.

The 53rd Transportation Battalion from Fort Eustis, Va., was selected to provide all movement control for the parade. This was the first unit with a pre-existing chain of command to execute this mission and receive the label of Joint Team Parade. Joint Team Parade ultimately consisted of 247 Soldiers and Marines.

Movement Control Mission

The 53rd Transportation Battalion provided command and control for two movement control teams (MCTs) and a general purpose company. One of the two MCTs was the 271st MCT, which is organic to the 53rd Transportation Battalion. The second MCT was an ad hoc team comprising members of the 330th Transportation Battalion from Fort Bragg, N.C. The 1st Battalion, 319th Field Artillery Regiment (1-319th FAR), 3rd Brigade Combat Team, 82nd Airborne Division, from Fort Bragg served as the general support company.

This operation had all the components of a movement control mission but with greater visibility. Every detail of parade support had to be synchronized with multiple law enforcement agencies, the Secret Service, the National Park Service, the Presidential Inauguration Committee (PIC), and various District of Columbia logistics support entities. This allowed for a very small margin of error.

It was still, in concept, a point-to-point operation, and the movement controllers in the tactical operations center had to synchronize the movements of more than 9,000 parade participants and multiple floats and animals from four different locations around the city to meet their parade start times at the National Mall.

PIC Oversight

Essentially this was a strategic-level operation answering directly to the civilian leaders. The PIC, made up of campaign staffers, was in charge of the parade but relied heavily on military expertise to put



Cadets from the United States Military Academy march in the 2013 presidential inaugural parade while Georgia police officers provide part of the security detail.

it together. This is partly because the PIC was not established until about the third week of November, after the presidential election was held. The PIC did not have enough time to plan and synchronize a parade of this magnitude within a 60-day time frame.

The PIC's primary role was to select organizations that would represent each state in the parade and approve the military plan. The National Capital Region J-3 (operations) plans section served as the lead planner for this event, led by Mike Wagner.

Planning Team Organization

The planning began in August 2012 when the 53rd Transportation Battalion sent seven Soldiers on temporary duty to the National Capital Region to work and integrate at Fort McNair with the JTF headquarters staff for the planning process. The battalion S-3 served as the officer-in-charge of parade planning at Fort McNair; the operations noncommissioned officer-in-charge was a Marine master sergeant.

Joint Team Parade was divided into six elements:

- Band control, led by two noncommissioned officers (NCOs) from the U.S. Army Band.
- Staging area, run by an officer and NCO from the 271st MCT.
- Assembly area, run by an officer and NCO from the 53rd Transportation Battalion.
- Float assembly, run by a military intelligence officer from Fort Belvoir, Va., with personnel from the 330th Movement Control Battalion.
- Horse control, run by an officer and NCO of the Old Guard Caisson Platoon.
- Route control, run by an officer and NCO from the 53rd Transportation Battalion.
- Dispersal area, run by an officer and NCO from the 53rd Transportation Battalion.

Assembly and Staging Areas

Although the JTF had already selected the Mall for the assembly area, over the next month the planners read through the boxes of loose-leaf binders that served as continuity books from the previous parades to determine what was needed at each

site. During this phase, Joint Team Parade noted the challenges faced by the horse control team in the last inauguration. That was one area that the JTF had not worked on before it arrived.

The horse control team began working diligently to find a location that would prevent horse trailers from being moved twice once they arrived in the city. The JTF inaugural planning staff and the Washington, D.C., government developed several courses of action. Eventually, the horse control team had L'Enfant Plaza approved as the horse assembly and dispersal area. This plan kept horse trailers in place and eliminated the need to have police escorts between locations; this had been one of the biggest complaints from horse handlers at the previous inauguration.

The horse staging and float assembly areas also were changed. The last inauguration had the horse and float assembly in one area near the Switzer building. The notes from the last inauguration stated the area was very congested. The new plan developed by Joint Team Parade eliminated this problem. The new plan separated the float assembly area and the horse

staging area. They were both located on C Street but on opposite ends. This plan took into consideration the safety of the horses and of the parade participants who rode on the floats.

Staging and Security Screening

The big difference between this operation and movement control in Iraq or Afghanistan was security. The Secret Service supervised the screening of participants and X-rayed the floats. Since the inauguration would take place on Jan. 21, the planning had to account for cold early morning weather. The assembly area on the National Mall consisted of a large fest tent with a capacity to provide more than 6,000 people with heat, water, and food since participants would begin their screening early and the parade would not begin until afternoon.

The marching participants would stage in the Pentagon parking lot on Monday morning. Security screening was conducted by a military police officer, the battalion S-3 circulation control officer, and Soldiers of the 271st MCT who would control the movement of all marchers during this process.

The participants were divided into five march divisions, each of which would be led by a branch of the armed forces and its band, and lined up in the services order of existence: Army, Marine Corps, Navy, Air Force, and a composite of Coast Guard and Merchant Marines. Each division required approximately 55 coach buses to transport parade participants to the assembly area on the National Mall.

To ensure timely movement of parade participants, each division was staffed with a division control team of about 15 personnel to escort them through the parade route. The division control teams mainly comprised Soldiers from the 1-319th FAR and remained with the each state's marchers from the beginning of the day (starting at the Pentagon) to the end of the parade (at the dispersal area). Wearing dress blues and a maroon beret, a division control team member walked alongside each group.

The horse riders remained at the Prince George's Equestrian Center until they were escorted to L'Enfant Plaza. All horses and riders were screened and assembled at L'Enfant Plaza adjacent the National Mall.

The merge point adjacent to the assembly area on the National Mall was where all the marchers, floats with riders, and horse units would fall into their assigned places in parade order before moving to the ready zone to await entering the parade route.

Command Facilities

The JTF provided 12 command and control trailers to Joint Team Parade to establish and provide mission command at the seven nodes in and around the National Capital Region where parade marshaling, staging, and execution activities would take place. The 53rd Transportation Battalion set up its battalion tactical operations center in a command trailer near the start point of the parade at the corner of 4th Street and Pennsylvania Avenue.

The JTF established its joint operations center at Fort McNair, and the 53rd Transportation Battalion



The 53rd Transportation Battalion conducts a rehearsal of concept drill at Fort McNair, Washington, D.C., as part of the 2013 inaugural parade planning process.



A paratrooper from the 1st Battalion, 319th Field Artillery Regiment, remains with the parade marchers from their arrival at the assembly area until the end of the 2013 presidential inaugural parade.

placed a liaison officer in the joint operations center. The 53rd Transportation Battalion's commander considered the National Mall the center of gravity for the operation, so he stayed there with the battle captain and operations officer to oversee all aspects of the parade. The most important tasks were to ensure the parade started on time once the president and vice president were seated in the presidential reviewing stand and ensure that there were no large gaps between groups.

Each of the four route-control check points along the 1.7-mile parade route on Pennsylvania Avenue was manned by an NCO and an enlisted Soldier, who managed the flow of traffic and police stragglers from

command trailers. The operation would be executed off of an execution checklist instead of automated computer programs.

At the end of the parade route, the 53rd Transportation Battalion ran the dispersal area where the divisions would board their buses to return home. It was critically important not to allow anyone to linger and cause congestion at the dispersal area. The 53rd Transportation Battalion, with personnel from the 1-319th FAR would expedite getting the marchers to their buses.

Joint Team Parade

By mid-September, Joint Team Parade planners had gone through all the binders and footlockers from the

2005 and 2009 inaugurations. They found that several documents and permit packages had to be prepared for land use in and around metro D.C. before the PIC came on board.

The staging area team conducted several meetings with the Pentagon facilities manager to ensure all resources required for operations at the Pentagon were requested. It took approximately three months to gather all the details for this document; the permit packet from the previous inauguration helped.

Joint Team Parade became the conduit of information from the Pentagon to the JTF staff. The Pentagon permit not only covered the requirements for parade participants but also covered the resources needed

by the U.S. Secret Service and White House social aides. Since the PIC was the lead entity in the entire process, it submitted all parade request permits to the city.

In October, the 53rd Transportation Battalion and other JTF staff sections formed planning working groups to begin synchronizing the moving parts of the parade. These working groups included the J-4 contracting and transportation sections, the provost marshal and police department, capital medical personnel, the public affairs officer, and the Joint Team Parade street cordon. Others joined as their plans developed and they saw a need to coordinate with Joint Team Parade.

Once the JTF had the parade planned out, they developed a consequence management plan that would go into action in the event of a ter-

rorist attack. The 53rd Transportation Battalion would be responsible for accountability of all military personnel in such a contingency.

Rehearsal of Concept Drills

On Nov. 16, 2012, the Joint Task Force held its first rehearsal of concept drill and map exercise at Fort McNair to rehearse and synchronize all aspects of the inauguration. It was during this and subsequent drills and map exercises that movement times or “triggers” were refined and identified to be either time or event driven. Clear lines of reporting were also established during these sessions in order to ensure that a common operational picture was maintained by all parties during the execution of the inaugural parade events that would last from 2 a.m. until 8 p.m. on Inauguration Day.

Full Dress Rehearsal

The JTF held the Department of Defense full dress rehearsal on Sunday, Jan. 13, 2013, to identify any potential problems or friction points and get an estimate of how long it would take to execute key events on Inauguration Day. The biggest lesson learned by Joint Team Parade was at the parade staging area at the Pentagon.

The full dress rehearsal illuminated the requirement for the staging team to adjust its arrival and operational times for Inaugural Day and revealed that the original staging and parking plan needed adjusting to prevent congestion. The necessary adjustments were made to the staging area plan, and the operations on Inauguration Day went off without a hitch.

The D.C. Metropolitan Police blocked off Pennsylvania Avenue for the morning so the military, police,



Soldiers of the Caisson Platoon of the Old Guard ride their horses in the 2013 presidential inaugural parade.

and even media could rehearse the synchronization of their participation. The military cordon lined the street with Soldiers, Marines, Sailors, Airmen, and Coast Guardsmen to find their proper alignment and intervals and to rehearse saluting the president's limousine as it passed. These service members lined the entire length of Pennsylvania Avenue from the start of the parade to the finish.

This rehearsal involved a large number of military participants; however, civilian parade participants were unable to participate. Division control teams and other JTF staff members walked as fillers while carrying signs identifying which state and group they represented.

A few glitches occurred, but the plan was sound, and the JTF used the after-action review to work out areas that needed refinement. Because of the confusion and congestion at the initial staging area, Soldiers needed to be there as early as midnight the morning of the parade and the entry control personnel who directed the arrivals needed to have handheld radios.

During the rehearsal, more people arrived at the battalion tactical operations center than expected, so a larger command trailer was needed. The same was true with the route control trailer. With one week left to refine the operation, the 53rd Transportation Battalion conducted mini-rehearsals at the staging area and conducted a communications rehearsal with the route control teams. So by the day of the parade, everyone felt comfortable.

Inauguration Day

On Inauguration Day, even with all the rehearsal and preparation, a few glitches beyond Joint Team Parade's control still tested how sound the plan really was. This began with the public swearing-in ceremony lasting longer than normal, which delayed the start of the parade. The late start created a backlog in the tent at the assembly area on the National Mall.

The backlog required the battle captain and staging personnel to think quickly on their feet. They delayed Divisions 4 and 5 at the Pentagon. Once the presidential escort exited the Capitol building, they released Divisions 4 and 5 from the Pentagon and Division 1 formed up for movement onto the parade route. This verified how well the route control team had trained.

Joint Team Parade developed phase lines not just to track the movement of the participants along the parade route but also to track the movement of the president so that the battle captain would know when to give the signal to start the parade.

The Joint Team Parade was directed to begin the parade almost immediately after the President passed the start point, at 4th Street and Pennsylvania Avenue. However, Division 1 started marching so soon after the President passed that it nearly caught up with his motorcade, which would not have allowed the president and first lady enough time to reach the reviewing stand to observe the parade.

To remedy this situation, the battle captain had to call ahead to one of the check points along the route to halt the parade, which was a monumental task since all of Division 1 had entered the parade route. The halt created a huge gap. Joint Team Parade then put Division 2 on the parade route to close the gap and reduce further delays along the parade route when the parade resumed. The parade was halted for 15 or more minutes.

Because of the skill with which the movement controllers of the 53rd Transportation Battalion and Joint Team Parade performed, the JTF wants to use the 53rd Transportation Battalion or a like unit for all future inaugural parades.

The Army Transportation Corps has long ties with the Office of the President of the United States. The Transportation Corps has provided the White House sedan since President William Howard Taft in

1909; the Corps was responsible for presidential helicopter flights from the late 1950s until 1976. Now, the Transportation Corps will provide movement control for future presidential inaugural parades.

This operation provided an excellent movement control training opportunity for the 53rd Transportation Battalion as it prepared for its upcoming deployment. The presidential inauguration parade operation has all the components of a normal movement control operation but with much greater visibility and smaller room for error. This was an excellent training experience for movement controllers.

Lt. Col. Stephen W. Ledbetter is the commander of the 53rd Transportation Battalion. He holds a bachelor's degree from the University of Tennessee at Martin and is a graduate of the Transportation Officer Basic Course, the Combined Logistics Captains Career Course, Intermediate Level Education, the Joint Planners Course, and the Air Assault, Airborne, and Jumpmaster Schools.

Maj. Clarisse T. Scott is the S-3 officer-in-charge for the 53rd Transportation Battalion. She holds a bachelor's degree from South Carolina State University and a master's degree in logistics management from the Florida Institute of Technology. She is a graduate of the Quartermaster Officer Basic Course, the Combined Logistics Captains Career Course, the Petroleum Officer Course, the Mortuary Affairs Course, the Joint Logistics Course, and the Theater Logistics Course.

Richard E. Killblane is the command historian for the Transportation Corps. He holds a bachelor's degree from the United States Military Academy and a master's degree in history from the University of San Diego. He has published numerous articles and books, including *The Filthy Thirteen*, *War Paint: The Filthy Thirteen Jump Into Normandy*, *Mentoring and Leading: The Career of Lieutenant General Edward Honor*, and *Circle the Wagons*.



Quartermaster second lieutenants unload a mock casualty from a UH-60 Black Hawk helicopter as part of the Basic Officer Leader Department field training exercise. (Photo by Julianne Cochran)

A Decisive Action Training Environment for Lieutenants

Bringing quartermaster, transportation, and ordnance lieutenants together in one exercise is resulting in a rich training opportunity for Basic Officer Leader Course students at the Army Logistics University.

■ By Rory P. O'Brien and Maj. Michael H. Liscano



The Army has executed counterinsurgency operations for 12 years in Operation Enduring Freedom and for almost 9 years during Operations Iraqi Freedom and New Dawn. During this time, our sustainment operations have primarily been based on providing support from a fixed position such as a forward operating base or combat outpost.

Although we have become adept at supporting operations within this environment, we have lost proficiency in conducting logistics operations in high-intensity conflict. In this type of conflict, logisticians support

the offensive and defensive operations of large mechanized maneuver formations using lines of communication that may span more than 50 kilometers from the brigade support area (BSA) to the customer and require the BSA to move repeatedly.

To teach junior logistics officers how to support in this decisive action environment, the tactics team of the Basic Officer Leader Department (BOLD) at the Army Logistics University at Fort Lee, Va., created a field training exercise (FTX) that incorporates the decisive action training environment (DATE). The training also adapts the outcomes-based training and education model used at the National Training Center (NTC) at Fort Irwin, Calif.

The DATE involves a hybrid threat and the complexities our nation faces while fighting potential adversaries in the 21st century. It combines intricacies of threats woven into one dynamic environment. U.S. forces conduct combined arms maneuver with near-peer conventional forces and wide-area security in an environment that includes guerrillas, insurgents, criminals, and humanitarian crises.

The FTX's road to war, enemy situation, and cultural considerations all correspond to the NTC operational environment (OE). In addition to using the DATE, the scenario incorporates the NTC operations group's decisive action scenario design and applicable doctrine.

The BOLD FTX

The BOLD FTX started as a limited pilot program in January 2013. It stemmed from a concept to immerse young quartermaster, transportation, and ordnance officers in a contemporary, dynamic, and fluid operating environment that fosters creative and adaptive leadership. As of October 2013, all junior logistics officers are required to participate in the BOLD FTX.

The exercise's structure, content, and evaluation process are designed to meet the desired outcomes of each branch's Basic Officer Leader Course (BOLC) with respect to tactical and technical

training. The result is an FTX focusing on the officer's ability to communicate effectively, work as part of a team, and lead in an austere and rapidly changing tactical environment.

In order to build creative and adaptive leaders, the exercise embraces the concept of mission command. All students are trained in or introduced to FTX tasks before executing them. Information pertaining to the overall situation and OE is either briefed or readily available. Mission sets given to the students contain the essential elements of information and little more.

Tactics Training

All students learn the skills required for the BOLD FTX in the second and third weeks of BOLC during the tactics block of instruction. During tactics, students receive reference materials, read-ahead sheets, and access to short videos familiarizing them with concepts and equipment (for example, how to use a sand table and the gunner restraint system). By combining this training with the mentorship of their training, advising, and counseling officer during preparation, the students arrive at the FTX fully prepared to execute the mission.

The DATE

Students execute a series of logistics-focused missions in a fluid environment during the BOLD FTX. Cadre tailor the mission sets to the classes participating. For example, more quartermaster missions take place during quartermaster-heavy BOLC classes, while more transportation missions are done for transportation-heavy classes.

The students receive their missions through various methods, such as mission orders, video messages, simulated news broadcasts, radio communication, and commander's guidance. By changing the method of delivery for the mission, students build awareness of the complexity of the modern battlefield and the manner in which the mission may reach a unit.

Regardless of delivery method, the



Bucky Roughton, a tactics instructor, goes over a mission route with 2nd Lt. Thomas Ivey during the tactical operations center cycle of the Basic Officer Leader Department field training exercise. (Photo by Julianne Cochran)

information contained in the mission is limited to the task, purpose, location, and time of execution. The sparse amount of information forces students to think creatively in order to fill in the blanks without assistance from higher headquarters.

Students from various combinations of logistics branch classes are organized into three platoons under a forward support company (FSC) supporting an infantry battalion. During the FTX, each platoon is in one of the three rotational cycles: the tactical operations center (TOC) cycle, the planning cycle, or the mission cycle.

TOC Cycle

During the TOC cycle, a platoon executes mission command and controls operations from the FSC com-

mand post (CP). When available, a captain from the Combined Logistics Captains Career Course plays the FSC commander and facilitates mission command by giving directions, advice, and orders to platoons. Cadre select student leaders based on student needs and the goal of giving each student several leader assessments.

Roles in the TOC cycle include the company executive officer, company intelligence support team, future operations section, current operations section, supply (classes I [subsistence], V [ammunition], and VIII [medical materiel]), and radio telephone operator. The CP conducts battle tracking, battle update briefs, current and future operations planning, intelligence analysis, mission

debriefings, and coordination with adjacent unit CPs of other organizations that are conducting FTXs in the same training areas.

CP personnel also develop battalion logistics estimates, conduct logistics status updates, plan force protection, and control support operations. Students have access to a variety of analog and digital communications and command system platforms to exercise mission command and battle tracking operations.

Throughout the TOC cycle, students learn the importance of clear, concise communication. Their only link with the battlefield and the platoon executing the mission is a tactical radio and handset. Students must ensure they capture the details of the mission as they occur and relay them to the commander or higher headquarters when necessary.

The outcomes-based training and education concept plays an important role during the TOC cycle. The actions of the platoon in the mission cycle largely affect the civilian populace, enemy forces, and the OE, and the TOC receives changes to the OE through a series of injects. The injects contain intelligence updates from higher headquarters and videos with simulated or scripted role players that show enemy forces and local nationals on the battlefield. The changes force the students to react to the fluid OE and disseminate the new intelligence to the other platoons.

Many times students learn during a rotation debriefing that the TOC's vision of how the mission was conducted and the actual events that occurred vastly differed—illustrating the ambiguity of the OE and the importance of effective communication. At the conclusion of each cycle, the TOC develops and provides a briefing to the commander. This briefing allows the evaluators to assess the TOC leaders' overall ability to track, manage, and relay information about the operation.

Students who are not in a leadership role during the TOC cycle participate as opposing forces (OP-

FOR) and local nationals along with the cadre. Students equip, dress, and execute roles as enemy conventional forces, insurgents, guerrillas, criminals, or local nationals. By allowing the students to switch roles and play as OPFOR or role players, students see the enemy's or local national's point of view when engaging with U.S. forces. Students learn a great deal as they watch their peers move tactically in the OE and identify weaknesses that they try to exploit. Once students complete a cycle as OPFOR, they have a newfound appreciation for the enemy and fully understand the adage "think like the enemy."

Planning Cycle

A platoon in the planning cycle conducts troop leading procedures for an upcoming mission from higher headquarters. Student leaders conduct the full cycle of troop leading procedures, including precombat checks and inspections, rehearsals, and operation order (OPORD) production.

The OPORD includes a terrain model for a tactical mission to prepare for operations on a realistic operational timeline. Students have access to digital and analog products, operation maps, terrain model kits, rehearsal areas, and other planning tools to give them a brief view of an operational planning environment.

The planning cycle is an extremely valuable experience because it shows all the students within the platoon that an OPORD is not produced by one officer sitting at a desk but instead through a collaborative effort of the staff. The platoon leaders end the rotation by providing an OPORD briefing and supervising mission rehearsals, but every student is involved in the overall planning of the mission. Students prepare sand tables, sign for platoon equipment, practice crew drills, and develop individual pieces of the overall order.

The quality of the final product and the students' ability to translate

the order into an executable plan are tested when they move to the mission cycle. Every mission the platoon plans during the planning cycle is executed in the mission cycle with a different chain of command. Students are not informed of the upcoming chain of command until immediately before the next cycle begins, so students are incentivized to stay informed.

Empowering subordinates to carry out a task or a portion of an operation is encouraged during the planning cycle. Student leaders quickly learn that a complex mission must be broken down and that having subordinate leaders take initiative is essential to mission success.

While the exercise is a peer-based officer FTX, students also fill the roles of noncommissioned officers (NCOs) and lower enlisted personnel. Guided by an experienced NCO cadre, the students learn what their future subordinate leaders are responsible for and how an overbearing or ineffective leader can affect overall mission success.



Lieutenants prepare to hit the road during the mission cycle of the Basic Officer Leader Department field training exercise. (Photo by Julianne Cochran)

Mission Cycle

After completing the TOC and planning cycles, the platoon draws its equipment from the supply section and moves to its vehicles to execute a logistics-orientated mission cycle.

The mission platoon has 10 up-armored M1151 Humvees, each equipped with a radio and armed with either an M240B or M249 machine gun. The platoon executes various missions, such as loading and transporting supplies to and from a logistics release point, aerial delivery, and air medevac with UH-60 Black Hawk helicopters (provided by the Virginia Army National Guard).

While moving tactically within the OE, the unit conducts lethal and nonlethal operations and interacts with the hybrid OPFOR and national populace. During every mission, the staff seeks to take advantage of every opportunity to execute actual tasks and equipment moves instead of simulating these events. Having students understand the manpower and man-hours needed to accomplish

a task helps them build empathy for their future Soldiers and provides the experience needed to accomplish similar missions in the future.

The BOLD FTX is fluid. If students disrespect the village elder while delivering humanitarian aid to a local village, future missions into the village yield less intelligence and more hostility from the villager role players and opposing forces. By changing the demeanor of role play-

ers or increasing attacks on a particular route, students quickly learn that the actions they take during the course of the exercise help shape the OE and influence the outcome of future missions.

No secured forward operating base is available to operate from during the FTX. The lieutenants must secure an abandoned building in the tactical assembly area and set up and operate a company CP from there.

The CP and the mission platoon are constantly threatened by indirect fire and enemy infantry attacking the logistics lines of communications. Overall, the more the students understand the situation and prepare to execute the mission, the more positive the outcomes are.

Cultural Awareness and Ethics

In addition to branch-specific missions, the BOLD FTX allows the students to practice other lessons learned during BOLC, including ethical decision making and cultural awareness skills.

When conducting a patrol, students may be faced with an ethical dilemma. In one scenario, during movement through a local village, the platoon may witness a woman and her child in danger from other local villagers. The patrol leader must decide whether to intervene or to continue the prescribed mission.

The cultural awareness aspect of the exercise is constant throughout all four days. The instruction the students receive during pre-exercise training is based on the DATE scenario. This provides a generic culture for the students to use as a baseline for cultural awareness.

Evaluation

Evaluating students during the exercise is a continuous process. The students are evaluated against a grading rubric tailored to the position the student occupies during each stage of the exercise.

At the conclusion of each leadership cycle, the cadre provides one-on-one feedback regarding student performance, emphasizing the elements of leadership, communication, and teamwork related to the mission.

Since the exercise is a peer-to-peer event, the failures and setbacks a student experiences during a mission are not amplified through embarrassment in front of future Soldiers.

Providing the students with multiple opportunities to lead and fail throughout the exercise and multi-



*During the planning cycle, a lieutenant takes notes on an upcoming mission.
(Photo by Julianne Cochran)*



Lieutenants draw weapons and other equipment in preparation for the mission cycle of the Basic Officer Leader Department field training exercise. (Photo by Julianne Cochran)

ple feedback sessions aids them in actively developing their leadership abilities within the course of a single FTX.

Although each student's performance is evaluated and graded based on the rubric, the real value of the evaluation is the face-to-face counseling with experienced, honest cadre. The cadre observes the student throughout the rotation and then gives feedback on the student's performance. The lessons learned from experience during the mission, coupled with the cadre's observations, prepare the students to learn from their mistakes and capitalize on their successes when they lead later during the FTX.

The branch-functional training exercises that the Quartermaster, Ordnance, and Transportation BOLCs execute later in their courses use the BOLD FTX as a foundation. The skills exercised in the FTX and the knowledge of the scenario provide a solid base for the three branches to increasingly challenge their students

with complex problems that require critical thinking.

The BOLD FTX also prepares junior officers to train at the premier training centers in today's operational force by using scenarios nested within the overall scenario and base order for the NTC. By experiencing a subordinate unit of training within the NTC scenario, the students experience some of the products and situations they may face in a future training rotation while gleaning the institutional knowledge and background needed to operate confidently in an operational force.

Through collaboration with the three branches, the BOLD FTX continues to grow, build adaptive leaders, foster teamwork, and produce leaders who communicate effectively. The BOLD FTX mission sets are built on the latest doctrine and threat environment in the Army. By maintaining its roots as tactical leader outcome-based training, the exercise can maintain pace with the needs of the operational force and future battlefield requirements.

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Intelligence Support Teams' Support to Logistics Organizations

Company and battalion intelligence support teams can provide the additional intelligence support needed for brigade support and combat sustainment support battalion operations.

■ By Staff Sgt. Christopher Adair

When intelligence Soldiers arrive at the National Training Center at Fort Irwin, Calif., as part of a brigade support battalion (BSB) or combat sustainment support battalion (CSSB), they often do not have a thorough understanding of the intelligence support that logistics organizations require.

The BSB and CSSB S-2 sections are authorized only three military intelligence personnel: one captain,

one noncommissioned officer, and one junior enlisted Soldier. However, the scope of military intelligence duties in a decisive action environment includes rear area security, brigade support area (BSA) defense, route analysis across the brigade area of operations, and route analysis of the main supply route between the BSA and the corps support area.

As with the brigade's maneuver elements, sustainment elements rely on the collection and analysis of in-

telligence at the lowest echelon. As such, company-sized sustainment elements should use properly manned company intelligence support teams (COISTs) or battalion intelligence support teams (BISTs). When properly established, COISTs and BISTs are a tremendous boon to BSB and CSSB S-2 sections, providing insight into intelligence needs, intelligence requirements, and vehicle capabilities and expanding the ability of attached companies to collect information.



Soldiers of the 2nd Special Troops Battalion, 2nd Armored Brigade Combat Team, 4th Infantry Division, provide security for a meeting between military and local civilian leaders during a training rotation to the National Training Center, at Fort Irwin, Calif., on June 24, 2013. (Photo by Sgt. Marcus Fichtl)

The BIST

The BSB S-2 section is often overwhelmed because of its heavy workload and small staff. Many units have had great success employing the BIST concept to create a more capable S-2 section.

In a BIST, a company attaches its personnel to the battalion S-2 section, augmenting the section's production capabilities and increasing the amount of relevant, timely, and accurate information available to the battalion and companies. A BIST answers to the S-2, while having a liaison relationship with the company from which it came.

A BIST serves to increase the knowledge base of S-2 personnel on sustainment-specific intelligence support requirements. The additional personnel assigned to the S-2 section also gain insight into the intelligence-gathering process, allowing them to more effectively serve as an interface between the S-2 and companies. This enhanced capability allows those personnel to conduct prebriefings that are better tailored to the patrol and its mission and debriefings that are more finely focused on priority intelligence requirements (PIRs).

The COIST

A COIST is designed to provide intelligence support to a company commander by developing products such as link diagrams, threat analyses, route analyses, and pattern analyses and by tracking and answering company-level PIRs.

A COIST's information collection comes primarily through patrol prebriefings and debriefings and information collected through Handheld Interagency Identity Detection Equipment (HIIDE) or Secure Electronic Enrollment Kit (SEEK) systems.

A COIST will typically benefit a fully staffed and trained organization in which COIST personnel are equipped and uninhibited in the performance of their duties. COIST personnel should ensure that their communication with the S-2 is

scheduled, consistent, structured, and open. Failure to communicate will lead to a breakdown in the intelligence cycle.

Generally, a BIST will prove to be more useful to a BSB than a COIST when the BSB is short on personnel or when the personnel who will be performing the intelligence support duties have not received COIST training. The increase in personnel within the battalion S-2 section will benefit the whole BSB, and training shortfalls will be more easily overcome.

Proper Employment

Properly assigning personnel, whether in a BIST or a COIST, is instrumental to enabling them as force multipliers. For example, tasking transportation company intelligence support personnel with route analysis will result in information that enhances understanding of logistics vehicle capabilities.

In a decisive action environment, the BSB maintenance company typically is tasked with the responsibility of BSA defense and force protection. Accordingly, the maintenance company intelligence support personnel can best be used in intelligence preparation of the battlefield for selecting BSA sites. The S-2's intelligence estimate is best used for choosing the appropriate perimeter defense.

Ensuring all members of convoys down to the lowest ranking Soldier participate in patrol debriefings is critical to maximizing the information collection capability of the patrol. Field Manual 4-01.45, Multi-Service Tactics, Techniques, and Procedures for Tactical Convoy Operations, offers an example of what intelligence support a tactical convoy operation commander needs to consider before embarking on the convoy.

When a convoy returns, a COIST or BIST member should debrief all convoy members, focusing on route trafficability, local national reaction to the presence of U.S. forces, new construction, changes in the envi-

ronment, information pertaining to company and battalion PIRs, and recommendations for future routes. When debriefing patrols, the S-2 representative should use a standardized debriefing format and facilitate open communication. Developing a positive rapport with the patrol will aid the flow of information.

HIIDE and SEEK

Other effective information gathering methods are the HIIDE and SEEK systems. Providing and maintaining a serviceable, fully charged, and updated HIIDE or SEEK system, employed by properly trained and proficient operators, for all patrols, entry control points, and role 2 medical facilities will help ensure enrollment opportunities are not missed.

To the maximum extent possible, information about all local nationals within the battlespace should be entered into the system.

The importance of effectively establishing either a BIST or a COIST should not be underestimated. The advantages of establishing a BIST versus a COIST should be thoroughly weighed with consideration of input from company commanders, first sergeants, and the S-2 with regard to manning, training, and experience available in the companies and S-2 section. In either case, the selection of the properly trained personnel for the job should be given a high priority to ensure that any BSB or CSSB will enhance its mission capabilities, force protection, and intelligence capabilities.

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Fort Bliss Sustainment Mission Command

Fort Bliss is employing the sustainment mission command center concept to find solutions for executing rear area sustainment and operating in garrison the same way Soldiers do in theater.

■ By Col. Curtis A. Johnson and Lt. Col. Donovan Fuqua

As the Army transitions from focused readiness for long-term operations in Afghanistan and Iraq to a state of general readiness and regional alignment for future operations, it is challenged to maximize Soldier capabilities instead of relying on contracted labor and contingency funding.

One part of this transition is re-establishing sustainment oversight of rear operations by senior logistics headquarters and creating a common operational picture of logistics for tenant units requiring support.

To create this capability, in April 2012 Forces Command (FORSCOM) directed its senior commanders to create sustainment mission command centers (SMCCs). Since then, the FORSCOM G-4 has enabled synchronization and collaboration among the SMCCs to create and operationalize this concept.

Fort Bliss SMCC

Through guidance and emphasis from the Fort Bliss, Texas, senior mission commander and the 1st Armored Division commander, the 15th Sustainment Brigade took the lead at Fort Bliss in establishing, manning, and equipping the SMCC.

To do this, the brigade coordinated with the Fort Bliss logistics community, which includes the Army Field Support Battalion-Bliss, the Fort Bliss Directorate of Logistics (DOL), the Mission Support Element G-4, the 1st Armored Division G-4, Defense Logistics Agency representatives, brigade combat team

(BCT) S-4s, brigade support battalions (BSBs), and other key teammates.

The Fort Bliss SMCC is intended to serve as the one-stop shop for the sustainment of rear operations using the principles of mission command found in Army Doctrine Publication 6-0, Mission Command.

This article addresses some of the challenges and opportunities that Fort Bliss experienced while creating and operating the SMCC. Fort Bliss created an SMCC tailored to its operational environment to respond to several problems, including gaps in echelons-above-brigade (EAB) support at the sustainment brigade level, a high operating tempo in First Army's deployment training, funding shortfalls at the DOL, and friction caused by half the installation using Global Combat Support System-Army and the other half using legacy Standard Army Management Information Systems.

Although every installation's SMCC will be designed for its own challenges, the following lessons learned serve as a possible template for creating and leveraging capabilities, maximizing opportunities for leader development and training in the rear area, and communicating a logistics common operational picture (LCOP).

SMCC Purpose and Lines of Effort

Unlike most FORSCOM installations, Fort Bliss does not have EAB maintenance or supply companies in its sustainment brigade. In the past,

the Fort Bliss DOL was funded and able to provide area support maintenance and supply support activity (SSA) support to non-BCT tenants.

Because the Army has realigned to rely on organic Soldier labor as the primary means for rear operations support, Fort Bliss needed to look at ways to leverage dedicated sustainment capabilities in BSBs and forward support companies without creating a distraction from BCT training.

The SMCC also had to account for the installation's large size and the heavy deployment training requirements of the 1st Armored Division, First Army tenant units, FORSCOM separates and the Training and Doctrine Command Network Integration Exercise program run by the Brigade Modernization Command and the 2nd Brigade Combat Team, 1st Armored Division.

Before 2013, First Army and other tenants could use predeployment training equipment (PDTE) to prepare for deployments. Because of FORSCOM's divestiture of common modified table of organization and equipment (MTOE) equipment from the PDTE program, Fort Bliss has turned in equipment such as retail fuelers, cargo trucks, materials-handling equipment, and maintenance contact trucks that First Army relied on to support predeployment training. The potential risk for failing to support the First Army mission at Fort Bliss is missed deployment timelines for Army Reserve and National Guard units.

These pressures and the need to ensure that all tenants efficiently manage resources and fully use free issue, referrals, and other cost-saving measures are why the FORSCOM SMCC concept was a perfect fit for Fort Bliss. The SMCC is responsible for planning, preparing, coordinating, executing, and assessing sustainment operations at Fort Bliss and the surrounding area by providing staff supervision of sustainment operations and distribution management.

The SMCC operates in four lines of effort: having EAB and red cycle tasking authority, being the custodian for the Fort Bliss LCOP, synchronizing logistics among stakeholders, and creating opportunities for training and leader development.

Red Cycle and EAB Tasking Authority

Because of the enduring sustainment mission at Fort Bliss and the potential impacts of failing to support First Army, the 1st Armored Division G-3 granted the SMCC the tasking authority of the red cycle BCT's support battalion. The SMCC also maintains tasking authority of assigned Fort Bliss EAB units, including the 142nd Combat Sustainment Support Battalion (CSSB).

As required by 1st Armored Division mission orders, the red cycle BCT's BSB maintains a liaison officer within the SMCC to receive and analyze logistics support requests. Using the Fort Bliss SharePoint portal, the SMCC receives sustainment requests from units and tenants and leverages the capabilities of all key sustainment entities on post to resource or recommend solutions to fill those requests.

The red cycle tasking authority has succeeded thanks to the guidance and emphasis of the 1st Armored Division commanding general, buy-in from the supporting units, common understanding of the importance of the missions, and transparency of the tasking process and business rules. All logistics requests are posted on the shared Fort Bliss portal, briefed during the daily 1st Armored Division

command update, and sent to all stakeholders daily with updates. At the end of a mission, the supporting unit posts a storyboard to the portal and to the 1st Armored Division command update.

In order to assist both supporting and supported units, the SMCC created a set of business rules to create transparency and trust. First, supported units must provide a completed support request form at least four business days prior to the start of the mission. Second, the supporting unit liaison routes all requests through the portal to the BSB or CSSB support operations officer (SPO). Finally, all requests and accepted tasks are tracked through the portal until completion.

To fully execute taskings and not negatively affect BCT training, the SMCC is linked with the 1st Armored Division's division operations center (DOC) through the 15th Sustainment Brigade organic MTOE battle command systems and to subordinate units and teammates through liaisons and representatives.

The SMCC participates in 1st Armored Division daily command updates through an embedded liaison and through a Command Post of the Future bridge to the DOC. The SMCC maintains situational awareness with the DOC by displaying the 1st Armored Division dashboard through Defense Connect Online on a projector screen.

To gain additional capabilities beyond Fort Bliss, the 15th Sustainment Brigade and the SMCC works with a senior logistics mentor command, the 13th Expeditionary Sustainment Command at Fort Hood, Texas, to provide guidance and support through the Leveraging Sustainment Organizations in the Continental United States (CONUS)-West (LSOC-W) concept.

In the past year, the SMCC gained support from the LSOC-W by using a rough-terrain container handler mobile training team from Fort Lewis, Wash., and a maintenance support team from Fort Hood. Fort

Bliss supported the LSOC-W by providing a team of mechanics to Fort Wainwright, Alaska, for 30 days.

As the senior sustainment integrator for Fort Bliss, the SMCC is the main conduit for communication among units, installation logistics teammates, and representatives from national-level logistics providers. Additionally, the SMCC supports the 1st Armored Division deputy commanding general for support by leading operational planning teams to spearhead logistics initiatives.

Custodian for the Fort Bliss LCOP

The SMCC provides real-time mission command and staff supervision of sustainment operations, distribution management execution, and assessment of sustainment operations at Fort Bliss and in the surrounding area through the Command Post of the Future, Battle Command Support and Sustainment System, and Blue Force Tracker.

Liaisons and representatives serve as the critical links among the 1st Armored Division headquarters, BCTs, BSB staffs, and tenants to plan, prepare, coordinate, and assess sustainment operations in the Fort Bliss area. Through this collaborative environment, the SMCC provides mission command and staff supervision of sustainment operations and distribution management for all EAB units and direction, coordination, and oversight of all sustainment units.

Through a weekly sustainment synchronization working group, a monthly review and assessment, and a semi-annual sustainment conference, the SMCC brings all Fort Bliss logistics teammates into a continual dialog on how best and most efficiently to support rear operations.

Synchronizing Logistics

The SMCC provides materiel readiness oversight for divisional units and separates located at Fort Bliss and at White Sands Missile Range, New Mexico. The 15th Sustainment Brigade conducts many

support functions through its staff management processes and through subordinate unit capabilities.

The brigade SPO and SMCC applies capabilities according to the 1st Armored Division commanding general's guidance and the sustainment brigade commander's support priorities and also through troops-to-task management. Support is allocated to meet three main efforts: Army Force Generation, 1st Armored Division

Enhanced. The one exception to this is aircraft on ground, which is a direct call-in function to Redstone Arsenal, Ala.

The 15th Sustainment Brigade RIC-GEO provides support to authorized stockage list (ASL) review boards for installation SSAs. The RIC-GEO or the accountable officer coordinates with the expert ASL team (from the Army Sustainment Command) and installation supply

provide the repair parts is the unit's responsibility. This cost-savings measure allows the SMCC to assist the DOL and Army field support battalion with their shop workloads and to work with units that have maintenance concerns.

Training and Leader Development

A key component of the SMCC is the ability to execute mission command in rear operations the same way units do in a forward deployed theater. Because the 1st Armored Division is now regionally aligned to the U.S. Central Command region, its units and staffs need to be able to seamlessly transition between rear and forward area operations.

This coordination is accomplished through training units and leaders to execute the same business processes and systems regardless of the physical location. For example, information management (SharePoint) and knowledge management (business processes, lessons learned, procedures) are exportable to any forward area.

Through the red cycle process, the SMCC routinely engages junior leaders to analyze requirements and look for efficiencies in supporting Fort Bliss tenants. Special projects such as the PDTE relocation concurrently train logistics staffs on mission analysis and the military decisionmaking process.

Finally, the physical layout of the SMCC is the same as the 15th Sustainment Brigade's deployable brigade operations center. This layout allows the brigade staff to train using the same systems that will be used during deployment.

Lessons Learned

The following are best practices for Fort Bliss and may not be applicable at all installations. However, they have been crucial for the success of the Fort Bliss SMCC.

- ❑ Co-locate the sustainment brigade operations center with the SMCC to ensure that the sustainment bri-

Through a weekly sustainment synchronization working group, a monthly review and assessment, and a semiannual sustainment conference, the SMCC brings all Fort Bliss logistics teammates into a continual dialog on how best and most efficiently to support rear operations.

and tenant training, and Fort Bliss support activities.

A key component of SMCC and brigade SPO support to rear operations is the SMCC's role as the routing identifier code-geographic (RIC-GEO) manager. The SPO and SMCC monitor and assist subordinate SSAs and units in providing effective and timely logistics support for all units at Fort Bliss. The specific goal of the RIC-GEO section is to enforce Army performance standards and objectives at management levels without compromising operational readiness.

The manager review file process gives a manager the means to correct, approve, or reject transactions not processed by the system based on control degrees for restricted items, bad or obsolete national stock numbers, and funds based on resource management guidance for review.

The 15th Sustainment Brigade RIC-GEO and 1st Armored Division resource managers have visibility of all requisitions that are processed through automated systems such as the Standard Army Maintenance System-Enhanced, Property Book Unit Supply Enhanced, and Unit Level Logistics System-Aviation

representative to initiate the ASL review file with enhanced dollar cost banding.

The SMCC works directly with tenant transportation managers and the division transportation officer in order to assist with asset visibility, task EAB common-user land transportation systems, and provide a Soldier workforce for the Army airfield.

Requested transportation movement and logistics support requests are tracked on one of the front projected displays within the SMCC and on the Fort Bliss portal. The SMCC maintains connectivity with the U.S. Transportation Command Single Mobility System to assist units with tracking aircraft and cargo movements worldwide.

To ensure adherence to repairable equipment field maintenance procedures, the 15th Sustainment Brigade SPO and the SMCC are the approving and oversight authorities for pass-back. When a unit's field maintenance capabilities do not meet appropriate pass-back criteria (such as being able to complete scheduled services), the responsibility may be transferred to the DOL, but all funding to perform the maintenance and

gade staff is fully employed in rear operations support activities.

- Formally authorize red cycle tasking authority to the SMCC through mission orders from the tenant command's G-3.
- Fully engage with all logistics stakeholders regularly through periodic synchronization meetings, reviews and assessments, and conferences.
- Integrate the senior commander's operations center with the SMCC through battle command systems and ensure the LCOP is visible and regularly updated for the senior commander.

The SMCC has been value added for both Fort Bliss and the 15th Sustainment Brigade in three ways. First, by dedicating a team for Fort Bliss support, the sustainment brigade staff has trained and prepared for deployment while assisting the 1st Armored Division with the U.S. Central Command regional alignment.

Second, executing support missions has allowed supporting units to maintain common logistics task skills. Finally, by depending on other units to provide support, Fort Bliss has built a trusted team of logisticians who look for collaborative solutions to sustainment issues during a time of fiscal uncertainty.

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Success Vignettes:

PDTE Relocation

The 1st Armored Division commanding general tasked the sustainment mission command center (SMCC) to spearhead the effort to improve the predeployment training equipment program at Fort Bliss, Texas. Working with the Army Field Support Battalion-Bliss, Mission Support Element G-3 and G-4, and First Army Division West, the SMCC team recommended that the equipment set and contracts be moved from West Fort Bliss to Logistics Support Area (LSA) McGregor (40 miles away).

Because more than 90 percent of the Fort Bliss predeployment mission training occurs at LSA McGregor, the move saves the Army between \$2.2 and \$2.8 million per year in unscheduled maintenance. The Army also gained more than 25,000 man-hours in training.

EAB Truck Support

When the 377th and 47th Transportation Companies deployed, Fort Bliss was left without taskable echelons-above-brigade truck units. In partnership with the 142nd Combat Sustainment Support Battalion (CSSB) support operations officer, the SMCC worked with the brigade support battalions (BSBs) to provide driver training academies for M1070A1 (heavy equipment transporter [HET]) crews and to temporarily dispatch and use HET and palletized load system flatrack systems.

By instituting agreements between the 142nd CSSB and each BSB, Fort Bliss will be able to continue to support major exercises such as Playas Range Gunnery, where using HET systems instead of railway or contracted lowbeds can save a significant amount of money.

LMX

In order to increase the accessibility and visibility of sustainment data to all teammates, the SMCC adopted and implemented the Logistics Management Exchange (LMX) database, which was developed at Fort Bragg, N.C. By working with all Fort Bliss units to establish passive data-pull connectivity with the US Army Logistics Support Activity (LOGSA), all portal users can view customizable Standard Army Maintenance System (SAMS), Standard Army Retail Supply System 2 (SARRS2), and Property Book Unit Supply Enhanced reports.

For example, a portal user can look at his 026 report from SAMS and the current exchange pricing status, research fleet readiness data for a specific item, and then search for class IX (repair parts) free issues within any of the 10 supply support activities (SSAs) at Fort Bliss—all within 5 to 10 minutes and from his work computer. LMX is currently available and updated through the SMCC Portal.

SSA Operations

In the span of a year, the SMCC and 15th Sustainment Brigade support operations officer have managed a Fort Bliss-wide manager review file mission that has reviewed more than \$238 million in requests, assisted and mentored nine tactical SSAs (with one winning the Army Supply Excellence Award), and provided SARSS2 and Global Combat Support System-Army support to Fort Bliss.

As an initiative, the SMCC and routing identifier code-geographic manager wrote the referral policy and SARSS2 semantics to establish and implement a referral geographic search pattern that vastly improved readiness across Fort Bliss and saved the installation \$561,891 in the first four months of operation. Additionally, the monthly SMCC review and assessment pulls Logistics Information Warehouse data for SSAs across Fort Bliss to assist units and accountable officers in meeting Army standards.

Army Sustainment Command's Role in Replacing the Standard Army Retail Supply System With GCSS-Army

The Army Sustainment Command shares lessons learned and tools for a successful transition to the Global Combat Support System-Army.

■ By Chief Warrant Officer 3 Laureen A. Williams

Global Combat Support System-Army (GCSS-Army) is an Enterprise Resource Planning (ERP) commercial off-the-shelf application capable of managing a large volume of business transactions within a single database. In ERP, the “enterprise” is the Army organizational structure; the “resource” is the equipment, personnel, facilities, and funds; and the “planning” is the systematic scheduling, coordination, and execution of all Army sustainment business.

GCSS-Army is now being used within the Army Sustainment Command (ASC). Within the ASC, the logistics readiness centers (LRCs) are the primary users of GCSS-Army. The ASC Distribution Management Center (DMC) provides the materiel management for the LRCs. The LRCs provide substantial supply support to customers Army-wide, from supply support activities (SSAs) to central break bulk points on installations.

Getting Started

In June 2012, the ASC headquarters signed a GCSS-Army assumption of mission agreement with Project Management Office (PMO) GCSS-Army. The agreement allows the ASC DMC to assume the LRC Installation Fixed Base and Tactical Sustainment of the GCSS-Army Materiel

Management Levels I/II/III mission. ASC DMC materiel managers have been working with PMO personnel to create a seamless transition with this process.

GCSS-Army was fielded first to the LRC SSA at Fort Lee, Va., in November 2012. In February 2013, GCSS-Army was fielded to the LRC SSAs at Fort A.P. Hill and Joint Base Myer-Henderson Hall, Va. The first large installation LRCs (at Fort Bragg, N.C., and Fort Hood, Texas) were fielded GCSS-Army in the second half of 2013.

ASC DMC materiel managers work with the accountable officers at these installations and implement the daily release strategy, which identifies requisitions for further review based on specific business rules. The ASC DMC materiel managers also pull monthly performance metrics and oversee and monitor the SSAs on full solution (Waves 1 and 2) for the 11th Armored Cavalry Regiment at Fort Irwin, Calif., and the 47th Brigade Support Battalion, 2nd Brigade, 1st Armored Division, at Fort Bliss, Texas.

Keeping It Clean

To prepare for GCSS-Army, a unit must perform data cleansing. ASC has taken an active role in ensuring that each LRC understands the importance of early data cleansing before converting to GCSS-Army.

Taking a proactive role in cleansing data of supply and financial errors minimizes the impact of causative research during the GCSS-Army fielding.

The Logistics Support Activity Enterprise Data Management Office (EDMO) educates ASC sites on the importance of data cleansing by providing the tools to collect data, research errors, and correct data to ensure a smooth transition to GCSS-Army. Materiel managers monitor the errors identified according to business rules within the Logistics Information Warehouse EDMO portal to assist accountable officers and resource managers as needed.

Initiating a Requisition

In GCSS-Army, a supply request generates a purchase requisition that flows to ZPARK for an approval/release strategy. [ZPARK, which is similar to the shopping cart on a merchant's website, allows a user to validate financial status and supply requests.] Once the purchase requisition is approved, a commitment and obligation is recorded in GCSS-Army, creating a purchase order.

The financial data feeds back into the General Fund Enterprise Business System (GFEBS) Business Intelligence for Status of Funds (SOF) reports. SOF reports can also be gen-

erated in GCSS-Army, but GFEBS is the source of record for year-end financial reporting. Reconciliation should be performed periodically to ensure SOF balances in the two systems are synchronized.

Once users complete training, they are assigned financial roles by an access administrator so that they have the access and transaction codes needed for working in GCSS-Army.

GCSS-Army and GFEBS

GCSS-Army interfaces with GFEBS for the funding to process requisitions. Both the annual funding program and cash (allotments) are required to be passed to GCSS-Army unless the funding is reimbursable, in which case only an allotment is required.

GFEBS cost objects, cost centers, and work breakdown structure (WBS) elements need to be “federated” within GCSS-Army in order to process requisitions. All of the ASC cost centers were federated within GCSS-Army during ASC’s conversion to GFEBS. A WBS element is federated in GFEBS by clicking the GCSS-Army radio button on the “Customer Enhancement” tab within the WBS element.

This action triggers the WBS element to interface with GCSS-Army. Once cost objects pass to GCSS-Army, the GCSS-Army “ZACCTASSIGN” table is established with the appropriate cost object and fund code for each Department of Defense activity address code (DODAAC). The ZACCTASSIGN table replaces the “DOJOCON” table that was located in the funds control module of the legacy process.

Under the modular support structure, materiel management is broken down into execution management of Operations and Maintenance Army (OMA)/Plant 2000 and execution management of the Army Working Capital Fund (AWCF)/Plant 2001, each with three levels of materiel management.

OMA/Plant 2000 (motor pool,

shop office, and supply room) execution management is handled by the local brigade support battalion. The AWCF/Plant 2001 (execution management for tactical SSAs) starts with level I materiel management, handled by the sustainment brigade.

The expeditionary sustainment command handles level II materiel management, and the ASC or theater sustainment command handles level III materiel management. ASC DMC materiel managers handle all levels of materiel management for

ness rules check for specific materiel (such as compasses or laptops), high dollar, excessive quantity, sensitive items, reportable and restricted items, expendable, nonexpendable, or durable items. This check can only be completed after a purchase requisition goes through the ZPARK finance check and funds have been obligated.

Reducing the Productivity Dip

Just like with any new system, operators need to be proactive in the

As the Army transitions to GCSS-Army, its knowledge base continues to grow. The Army’s logistics common operational picture will become transparent, allowing commanders to view how their units are doing at the lowest levels. GCSS-Army is here and no longer a mark on the wall as the next upcoming web-based system for the Army.

the installation LRC SSAs in the continental United States.

New Rules for a New System

As the ASC DMC branches transitioned to GCSS-Army, they reduced the parameters managed and reviewed daily in legacy standard Army management information systems (STAMISs), such as the Standard Army Retail Supply System (SARSS). ASC DMC is working with the Combined Arms Support Command and PMO GCSS-Army personnel to determine which new parameters and functions materiel managers will be responsible for in the future.

Another key change from SARSS to GCSS-Army is the reduced number of referral codes that a document number could pass through for verification before a manager can process the daily manager review file (MRF). After conversion, materiel managers must verify only eight release strategy codes before processing a purchase requisition.

The new release strategy busi-

ness learning phase to lessen the effect of the “productivity dip.” Hundreds of subject matter experts exist for each legacy system in use today. As a supply systems technician subject matter expert, I am specialized in today’s legacy systems. However, after converting to GCSS-Army, I am like a Soldier going through advanced individual training.

Yesterday I knew the regulations needed to perform research and where to obtain the knowledge for a well-thought-out answer; today I research several different policies and procedures, including training slides, websites, and posting questions on milBook, to get the correct information about GCSS-Army.

The more operators are willing to learn about GCSS-Army and how it works, the less significant their productivity dip will be. Working as a team, adhering to lessons learned from previous conversions, being proactive with data cleansing, and having strong command support that emphasizes education and training can also help.

Lessons Learned and Tools for Users

ASC captured key lessons learned during the fielding of GCSS-Army to the LRCs at Fort Lee, Fort AP Hill, and Joint Base Myer-Henderson Hall. The lessons learned provide guidance and recommendations on how to prepare future fielding locations to execute a seamless, effective, and efficient transition. Critical lessons learned include early data cleansing, DODAAC scrubs, and early involvement of the resource managers. All ASC lessons learned can be found at <https://ascsp.osc.army.mil/sites/FieldSupport/ELID/ELSMID/GCSEA>.

Completing the Web-based training in the Army Learning Management System is the first step in being comfortable with and knowledgeable of GCSS-Army. Once the training is complete, users can receive additional training and education for their functional business area.

The Advanced Lead User Training program provides a GCSS-Army orientation for command designees (accountable officers or SSA managers) and resource managers and prepares them to better advise their units on the conversion.

GCSS-Army new equipment training is instructor-facilitated training performed during the brownout/blackout time frame. This training is broken down by business area and segmented again within each business area. The business areas covered during the new equipment training are finance, warehouse operations, and execution and materiel management.

With assistance from PMO GCSS-Army, the SSA validates data for finance and materiel management during the blackout. Each business area has a specific range of transaction codes that have to be verified before going live.

Over the shoulder support is being provided by PMO GCSS-Army and ASC liaison officers who provide technical expertise and reach-back capabilities as deemed necessary by the customer. The liaison officers are regionally located to support each of the Army field support brigades and

their subordinate LRCs.

The End User Manual-Plus is electronic content that provides the end user instant access to the information about the GCSS-Army application. It provides access to downloads for each business area, training bulletins that discuss changes and updates, new equipment training that can be used as refresher training, cue cards, and Web-based training that can be downloaded to users' desktops.

The GCSS-Army website, <https://www.gcsp.army.mil>, has more information. This website provides information about fielding schedules, training, keys to success, and contact information.

Information can also be found on the ASC SharePoint located at <https://ascsp.osc.army.mil/sites/FieldSupport/ELID/ELSMID/GCSEA>. The SharePoint also provides points of contact for specific agencies to help narrow a search for assistance. Specific questions about GCSS-Army can be posted at milBook, <https://www.milsuite.mil/login>, by signing in and joining the group called "GCSS-Army Lead Users."

GCSS-Army Benefits

As the Single Army Logistics Enterprise, GCSS-Army will fulfill all tactical Army logistics requirements in one place. GCSS-Army provides commanders at all levels with increased visibility of the supply pipeline and equipment availability and near-real-time data that improves reporting for planning, execution, and readiness.

The conversion of GCSS-Army from current legacy systems will significantly reduce the need for specific hardware, software, separate databases, and infrastructure support. Only one system will need to be maintained, and all personnel requiring access will need to be trained only on their specific roles within the application. The single database used by the GCSS-Army application ensures consistent catalog information and increases the ease of managing

a piece of equipment throughout its life cycle.

GCSS-Army Wave 1 fielding consists of the conversion of SARSS1 and Tactical Financials to GCSS-Army. It is scheduled to be completed in the 1st quarter of fiscal year 2016.

Wave 2 fielding, which is projected to be completed in fiscal year 2017, will fully integrate unit supply, property book, and maintenance with retail supply and tactical financial operations, bringing increased efficiency and responsiveness to commanders' requests.

ASC is currently performing a dual role in legacy STAMISs and GCSS-Army. GCSS-Army is operating for the LRCs and ASC with minimal issues, which are addressed as they are uncovered. As the Army transitions to GCSS-Army, its knowledge base continues to grow. The Army's logistics common operational picture will become transparent, allowing commanders to view how their units are doing at the lowest levels. GCSS-Army is here and no longer a mark on the wall as the next upcoming web-based system for the Army.

Chief Warrant Officer 3 Laureen A. Williams is the senior supply systems technician for the Standard Army Retail Supply System-Level 2AC/B Management Branch of the Army Sustainment Command's Distribution Management Center at Rock Island Arsenal, Ill. She is also a Global Combat Supply System-Army Materiel Manager for the Army Sustainment Command Distribution Management Center. She holds an MBA in project management from Grantham University, and she is a graduate of Warrant Officer Candidate, Basic, and Advanced Courses.

Army Sustainment Online
www.army.mil/armysustainment

Saving Money by Linking Avenger Requirements With Nonorganic Support

When changes to the 101st Sustainment Brigade's manning reduced its ability to service Avengers, it looked to a nearby aviation support battalion for help—saving the Army money in the process.

■ By Capt. Jerad Hoffmann

In today's Army, sustainment brigades face a continuous but not daunting task of providing responsive support to echelon-above-brigade units that are routinely nested with them in administrative control and general support relationships.

The 101st Sustainment Brigade supports the unique low density military occupational specialty skills and equipment requirements of air defense artillery (ADA), engineer, and military police battalions in addition to its organic combat sustainment support battalion (CSSB) and special troops battalion.

With increased pressure to reduce costs and end strength, the Army eliminated the 101st Sustainment Brigade's capabilities that were designed to support the 36 Avengers in the 2nd Battalion, 44th ADA (2-44 ADA). Although this action reduced overall Army costs, it had the potential to increase cost at the unit level and dramatically reduce Avenger fleet availability.

This article demonstrates how the 101st Sustainment Brigade mitigated the loss of a critical capability by linking 2-44 ADA's Avenger support requirements with a local, nonorganic support provider, namely the 563rd Aviation Support Battalion (ASB), 159th Combat Aviation Brigade, located at Fort Campbell, Ky.

Organic Avenger Maintenance

The 2-44 ADA's primary weapon system is the Avenger. The electronic subcomponent systems inside the Avenger, called line replaceable units (LRUs), are maintained using the integrated family of test equipment (IFTE). Until 2010, the 101st Sustainment Brigade was authorized one IFTE along with seven military occupational specialty-specific operators in the 584th Sustainment Maintenance Company (SMC), 129th CSSB. Maintaining the IFTE cost the 129th CSSB between \$50,000 and \$100,000 a year.

Over the past 10 years of combat, modular deployments of the 2-44 ADA and its support provider (the 584th SMC) generated Army Force Generation mismatches between the two units. Often when the 584th SMC was available to support the 2-44 ADA, the ADA was deployed and vice versa. Modular deployments significantly reduced the efficiency and effectiveness of the 584th SMC IFTE. In 2010, the IFTE and associated support personnel were cut from the 584th SMC modified table of organization and equipment (MTOE).

Repair Through Requisition

In place of onsite LRU repair using the IFTE, the Army determined that it was most cost-efficient to maintain Avengers at low density

sites by replacing not mission capable (NMC) LRUs through Army supply system requisitions. To mitigate the additional costs of replacing instead of repairing LRUs, the Army applied the existing exchange pricing program. (Exchange pricing is a business process that provides one-for-one credit for selected recoverable items.)

When an LRU is identified as NMC, the unit orders a replacement at a discounted price. Once the unit receives a new LRU, the NMC LRU must be returned through the supply system or the unit forfeits the reduced cost and pays full price. However, even with the discount, some Avenger LRUs cost over \$60,000.

The new method had the potential of decreasing Avenger fleet availability because of procurement timelines spanning 10 to 30 days and because it would result in the unneeded replacement of some LRUs. Under the new system, every LRU identified as faulty by the Avenger's diagnostic board, including the LRUs incorrectly identified as NMC, would be replaced at a cost of \$9,000 to \$60,000.

The Best Course of Action

When the IFTE support personnel were reassigned and not replaced, the 101st Sustainment Brigade support operations (SPO) staff and Fort Campbell Aviation and Missile

Command logistics assistance representative conducted the military decisionmaking process (MDMP) to determine the best method to support the ADA's requirements and mitigate the loss of this critical capability.

During the MDMP, three courses of action (COAs) emerged. The first COA was to execute the Army's plan of replacing all NMC LRU's through the supply system using the exchange pricing program. The second COA involved the lengthy process of adding the IFTE and its associated personnel back to 584th SMC's MTOE. The third and final COA involved the employment of nonorganic IFTE located in the 563rd ASB, 159th Combat Aviation Brigade.

The 101st Sustainment Brigade SPO conducted the analysis by tracking NMC LRU work orders over a 90-day period. During this time, 18 Avenger LRUs were job ordered to the 584th SMC IFTE section. Of the 18 LRUs, 12 were tested and quickly returned to the unit with no evidence of failure. Stated simply, the Avengers' onboard diagnostics incorrectly identified 12 out of 18 LRUs as NMC. The real source of the fault was in the wiring or other systems. By not purchasing these 12 new LRUs, the 2-44 ADA saved \$354,000 and approximately 180 days of fleet downtime.

The IFTE personnel repaired three of the 18 LRUs tested with the cost of repair parts totaling \$5,200. Had these LRUs been replaced using the supply system it would have cost \$28,800.

There was little difference in the procurement times for repair parts and a new LRU, so the total downtime was the same. The last three LRUs exceeded the maintenance expenditure limit and 2-44 ADA requisitioned new LRUs, totaling \$130,800.

The NMC time for an Avenger when a LRU was repaired by the 584th SMC IFTE varied from 14 to 30 days depending on the availability

of parts. LRU replacement through the supply system resulted in equipment NMC time of 10 to 28 days because of procurement timelines. When no evidence of failure was found by the 584th SMC's IFTE, NMC time was less than five days because of the rapid return of the falsely identified LRU.

Overall, the 584th SMC IFTE saved the unit approximately \$377,600. However, during the same quarter, the 584th SMC IFTE also required \$125,000 in internal operating costs and repairs, reducing the cost savings to approximately \$252,600. Based on this analysis, the significant number of false NMC reports from the diagnostics equipment on the Avenger had the greatest effect on cost and maintenance downtime. The estimated total NMC time to replace all 18 LRUs was 360 days.

A Nonorganic Cost-Saving Solution

Using the IFTE at the 563rd ASB would reduce NMC time to 120 days by eliminating the customer wait time for the 12 LRUs incorrectly identified as NMC. Fault verification was clearly the most cost-efficient and responsive method to support the 2-44 ADA. Unfortunately, an ASB is not organic to the 101st Sustainment Brigade, and there was no guarantee that the 563rd ASB would support this initiative.

The 101st Sustainment Brigade SPO needed to find a way to convince the ASB that accepting the additional workload associated with Avenger LRU repair would not compete with internal aviation maintenance requirements. The 563rd ASB also needed "a win" to offset the minimal risk they would assume by accepting an external support maintenance requirement.

Based on the SPO's analysis, fault verification requires one hour of work, and the ASB would process 15 to 25 such work orders quarterly. The 101st Sustainment Brigade also requested a 72-hour turnaround time on LRUs, providing the ASB time to perform workload management. This

window still allowed technicians to accomplish testing much faster than the Army supply system could ship a replacement LRU.

The 563rd ASB claims credit for significant cost avoidance for the Army. Every LRU tested and found fully mission capable saves the Army the replacement cost of an LRU.

A memorandum of agreement was signed to ensure the 563rd ASB's support in testing LRUs for the 2-44 ADA. Verifying faulty LRUs saves the 2-44 ADA and the 101st Sustainment Brigade significant amounts of money and increases Avenger fleet availability.

In the first month of this program, the 563rd ASB saved the 2-44 ADA almost \$10,000 by identifying a single LRU incorrectly identified as NMC by the diagnostics system on the Avenger. LRU fault verification at the ASB is expected to save the 2-44 ADA \$250,000 to \$500,000 per year and the CSSB up to \$300,000 in cost avoidance by not having to maintain an IFTE.

Since August 2012, the 101st Sustainment Brigade has exceeded its initial cost savings estimate, and as of November 2013, the total savings using the 563rd ASB's IFTE was approximately \$398,620.

As the Army continues to seek ways to reduce costs, logisticians must continue to seek innovative ways to use available resources more efficiently, regardless of command and support relationships, to provide the most responsive support possible.

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A Fokker Trimotor cargo aircraft, known as a flying bull cart, is loaded with supplies, ammunition, mail, and replacements for transportation to a forward operating base in Nicaragua. (Photo courtesy of the U.S. Marine Corps History Division)

The Marine Corps' Development of Aerial Delivery in Nicaragua Between 1912 and 1933

■ By Alexander F. Barnes and Sara E. Cothren

The U.S. Marine Corps sergeant paused for a moment and, wiping the sweat from his face with his free hand, strained to hear the sound of the aircraft. The point man, noticing the sergeant had stopped, also stopped and remained motionless with his weapon pointed in the direction they were headed. The rest of the squad drew to a halt behind the sergeant and immediately took up positions facing left and right with their rifles pointed outward.

Unfortunately, the thick jungle canopy muffled the sound of the airplane's

engine and made it hard to locate its origin. The sergeant knew he was on the correct compass heading, but judging the distance they had traveled through the heavy underbrush was difficult, even for an old hand like him.

Motioning silently for his squad to start moving again, he hoped they would soon reach a clearing where he could get a message from the overhead aircraft indicating how much farther it was to the crash site. One thing he did know was that somewhere up ahead

was a downed Marine aircraft and its two crewmen.

He had seen what the enemy had done to captured Marines and he wanted to reach the crew before the guerrillas did. He had to move cautiously though; the guerrillas would undoubtedly know a rescue party was on the way and set up an ambush for unwary rescuers. The sergeant had no doubt that Nicaragua in 1927 was a dangerous and tricky place and that only a cautious man would live to see 1928.

The history of American involvement in Nicaragua is a long one. In the early 1900s, the U.S. government provided political support to a group of rebels who were seeking to overthrow the Nicaraguan government. The Americans were interested at the time in constructing a canal in Nicaragua instead of the proposed Panama Canal. Although these plans did not work out, the U.S. maintained a high level of interest in Nicaragua for investment and commercial trade.

In August 1912, in response to fears of a revolution and the inability of the Nicaraguan government to protect the lives of American citizens working and living in the country, the president of Nicaragua, Adolfo Díaz, requested U.S. assistance to provide "protection to all the inhabitants of the Republic."

With that opening, the U.S. government dispatched Navy ships and a contingent of Marines. For the next 21 years, with the exception of a short period in 1925, the United States had Marines, Sailors, and even a few Soldiers in Nicaragua, who served with varying degrees of success. At times it appeared that their attempts to establish a constabulary force similar to the one they created in Haiti would be successful; at other times, their work to build Nicaragua's Guardia Nacional (national guard) collapsed into chaos and treachery.

Political Unrest

To understand some of the problems the Marines faced in Nicaragua, it is essential to have some background information on both the physical and political makeup of the country. Nicaragua is a country of extreme geographical and climatic differences. The Pacific coast is home to the largest percentage of the population and has a mild, temperate climate. The sparsely populated northern, central, and eastern parts of the country are mountainous and covered with dense jungle.

During the period of U.S. military involvement in the country, Nicaragua was divided into two major political

groups. The two sides were known as conservatives and liberals based primarily on their adherence to or refusal of the religious constructs of the Roman Catholic Church. For most of the period, the United States supported the conservative faction. However, at times the graft and corruption of some Nicaraguan leaders disturbed and angered U.S. leaders enough to cause them to consider supporting the opposition party.

By the summer of 1925, the United States had grown so weary of dealing with Nicaraguan officials that they withdrew the Marines and supporting naval forces from the country. Almost immediately, another round of fighting that was even more violent than usual broke out, with the liberal forces making great gains against the Nicaraguan army.

In desperation, the Nicaraguan government played its trump card—the threat of communist takeover—to get the Americans to return. The Nicaraguans claimed that their northern neighbor, Mexico, was providing Bolshevik cadre and weapons to the rebels and, without help from the United States, Nicaragua would turn "red."

Having withdrawn U.S. Soldiers from Russia just five years earlier after an unsuccessful campaign of fighting the "reds," the U.S. government should not have been in a hurry to engage in another anti-Bolshevik campaign. But U.S. political memories are short, and the Marines were again dispatched to Nicaragua.

President Calvin Coolidge, however, also sent former Secretary of War Henry Lewis Stimson to Nicaragua to negotiate a peaceful ending to the fighting. Stimson, who had served in World War I as an Army field artillery officer, was a wise choice. (He would eventually have a long career of solving domestic and international problems for the U.S. government.)

With the help of the Marines, and especially the newly arrived Marine aviation squadron, Stimson quickly brought both sides to the table. Under Stimson's careful guidance, the warring factions agreed to set up a coalition

government and hold general elections in 1928. In the meantime, the Marines embarked on a successful program of disarming the rebels by buying their weapons from them and then giving the weapons to the Nicaraguan Guardia Nacional. The political situation began to improve as most of the rebel leaders began working to take their places in the new government.

Local Support of Sandino

Unfortunately, one small band of rebels rejected the cease-fire and denounced those who had agreed to the peace terms as traitors to the Nicaraguan people. Leading the group was a charismatic new leader who would change the political game completely. His name was Augusto Cesar Sandino. [The Sandinistas established in the 1960s took their name from Sandino.]

For the first time, the Marines, who were much more accustomed to fighting bandits and outlaw gangs, were about to encounter something that they had not yet faced in Central America or the Caribbean—a truly nationalist movement that could call for and receive support from the local population.

Announcing that his goal was to save Nicaragua from the corrupt national government, Sandino also declared his intention of ridding the country of the U.S. Marine "dope fiends" and called his countrymen to rally to him. Not realizing the seriousness of this new movement, the Marines on the scene tended to underestimate the potential support and power a nationalist movement could generate.

At first, the Marine tactics were successful in meeting the challenge, and in July 1927, Marines fought and badly beat Sandino's forces. Sandino confronted the Marines again a short while later with similar results. In several skirmishes, Marine aviators played a major role by attacking Sandino's forces, developing rudimentary dive-bombing techniques and establishing what would soon become the tenets of Marine tactical air support to ground units.



A group of Marine Corps quartermasters, under the command of Capt. Joseph M. Swinnerton, assigned to the Western Area Command in Nicaragua, pose for a group picture outside their office in the town of Leon. (Courtesy of the U.S. Marine Corps History Division)

Sandino's forces were confused at first and seemed incapable of understanding the true threat of the Marine aircraft. After several attacks, however, they learned to take cover and return fire. In fact, all of Sandino's tactics began to evolve quickly after early failures in fighting the Marines. Employing now familiar guerrilla tactics to isolate small Marine and Nicaraguan army patrols, Sandino's soldiers also became skilled at ambushing the convoys that were trying to bring food and supplies to remote Marine and Guardia Nacional outposts. The war was on again and more dangerous than ever.

Distribution Operations

As difficult as it was for Marine infantrymen to operate in the Nicaraguan interior, their logisticians had an equally arduous mission. They not only had to cross the mountains and steamy jungles to find the forward operating Marines; they also had to do so while carrying food, ammunition, and other requested materiel.

From Las Banderas to Boaco, the bull carts used for carrying supplies moved with difficulty along the main supply route during the dry season

as they encountered river crossings, steep grades, loose rocks, and stumps along the way.

Even when passable, these roads required some repairs and servicing just to allow the carts to travel short distances. In many rural villages, the local citizens would help clear the roads by removing boulders and debris and in many places would level the road bed by cutting through solid limestone. In the wet season even those roads were impassable.

Under the best of conditions, supply operations in Nicaragua were extremely challenging. For example, it took a bull cart convoy five days to travel the 21 miles from Tierra Azul to Boaco. Adding to the logisticians' headaches was a shortage of bulls and oxen available to pull the carts for the Marines. Typically, four bulls were needed to pull a cart through the rough terrain, but on most days the Marines were lucky to muster two bulls per cart.

Soon Nicaraguan operations expanded beyond just Marine infantrymen engaging the guerrillas and Marine quartermasters leading four-hoofed convoys to support the remote garrisons and long-range pa-

trols. Marine aviators began to play an increasingly important role in finding the enemy and in delivering supplies to the ground forces fighting the enemy.

Aviation Support

Distribution operations dramatically improved in late 1927 and early 1928 when five Fokker Trimotor transport aircraft were added to the Marines' operational force. These larger, sturdier aircraft could carry more cargo than the earlier planes and had a longer flight range.

This last feature proved to be critical because maps of the area were rudimentary at best, and pilots often required significant time to search for the signals from the ground forces they were resupplying. The aircraft were jokingly referred to as "flying bull carts" by the Marine ground forces who desperately needed the supplies they delivered.

The Marines also began to experiment with some airdrop methods. By keeping the supply bundles to 30 pounds or less and packing them in burlap sacks with wood shavings, hay, or grass to cushion the impact, the Marines could drop the supplies

out of the aircraft almost directly to the patrols below.

When asked later why parachutes were not used, the answers were clear and obvious: a sufficient number of parachutes were not available, the fast moving patrols would not be able to carry the parachutes back to the origin, it was too difficult to get parachute-delivered supplies onto very small drop zones with any degree of accuracy, and the cost of purchasing the parachutes themselves was prohibitive. Therefore, the Marine quartermasters soon became very adept at bundling supplies for direct drop to the supported units.

With government garrisons scattered throughout central and eastern Nicaragua, Marine and Guardia Nacional patrols constantly on the move, and many trails impassable even to bull carts, Marine aviators began providing an increasingly larger share of supply, communication, and scouting support. However, although Marine expertise in aerial reconnaissance and delivery was improving, their scouting was often thwarted because the guerrillas became more skilled at hiding their operations from the Marine pilots.

Requesting Supplies

As challenging as delivering supplies to the Marine patrols was, at times it was equally difficult for the Marine logisticians to know what supplies were needed. With telegraph service extremely limited outside the southwestern part of the country, the Marines were forced to invent unconventional and innovative ways to transmit their supply requests.

In the captured rebel stronghold at Ocotol, a Marine detachment set up two long poles 75 feet apart in an open field with a message hung between them. Pilots would bring their planes low enough to snag the messages with a weighted line and carry the requests back to the closest resupply point.

Airfields were built wherever enough flat space could be found, sometimes on old baseball fields or



Capt. J.E. Davis and Lt. Christian F. Schilt pose for a picture in front of a Marine aircraft. Schilt received the Medal of Honor for bravery in Nicaragua. He served in both world wars and the Korean War during his 40-year career and retired as a 4-star general. (Photo courtesy of the Library of Congress)

even on the small dirt roads running through towns. When the planes could not land, they would airdrop the supplies as close to the target as possible, leaving the Marines on the ground searching through dense jungle to find their bundles.

In perhaps the greatest single episode involving Marine aircraft supporting ground forces, 1st Lt. Christian Schilt used his Vought Corsair biplane to single-handedly resupply a patrol of Marines and Guardia Nacional cut off in the town of Quilali in January 1928. Surrounded on all sides by Sandino's soldiers, the Marines had managed to build a 200-yard long airstrip in the heart of town by cutting trees and razing houses.

Flying alone in the two-seater airplane and carrying badly needed medical supplies, Schilt brought his small aircraft over the town and dropped onto the airstrip. As he neared the end of the landing area, Marines ran out to grab the wings and act as brakes. After quickly offloading the supplies and placing a badly wounded Guardia officer aboard, Schilt took off again and headed for the Marine base at Ocotol.

Shortly thereafter, he repeated the operation; this time he carried out a wounded Marine Corps officer. On his next flight in, also on the same day, he brought in a replacement Marine Corps officer to command the encircled force. Over the course of three days, Schilt made the hazardous trip many times, always under enemy fire, evacuating 16 of the most seriously wounded and delivering 1,400 pounds of supplies.

Resupplied, and with their wounded taken care of, the force at Quilali managed to fight their way out of the encirclement and two days later rejoined the main governmental force. For his bravery, Schilt was later awarded the Medal of Honor.

With this example to follow, the Marine quartermasters and aviators continued to work on improving the methods for delivering supplies and keeping the distribution pipeline open in support of the far-flung Marine forces. When the United States ended the Marine Corps mission in Nicaragua in 1933, the basic tenets of aerial delivery and fundamentals for the aerial portion of Marine air-ground task force doctrine had been established.

Lessons Learned

The Marines' experiences in Nicaragua provided them with many lessons that they were able to use to improve their operating tactics. These lessons included the advantages and disadvantages of air support, the usefulness of mules as draft animals, the need to provide the right size force for the job, the importance of mission flexibility, and the importance of logistics to mission success.

Air support and aerial resupply are force multipliers, but so are automatic weapons. At first, Sandino's forces were confused and disheartened by the Marine aircraft that seemed to appear out of nowhere and deliver supplies to long-range patrols. Marine pilots also developed successful dive-bombing techniques that caused heavy casualties among the guerrilla forces. However, after suffering several devastating at-

tacks by the Marine aircraft, the guerrillas learned to take cover from their approaching opponent.

Next, Sandino's forces tried firing their automatic weapons at the airplanes and quickly discovered that the aircraft were vulnerable to ground fire. They also learned that when Marine aircraft were shot down or crashed for mechanical reasons, Marine ground forces would be quickly dispatched to rescue the crews, thereby setting the stage for ambushes and skirmishes, which the guerrilla soldiers were better prepared to conduct.

Mules are superior to horses in some operational conditions. Moving in the humid Central American jungles of Nicaragua caused horses used by Marines to tire faster and require more forage than mules. The Marines also quickly discovered that mule-mounted patrols were more mobile and better able to pursue Sandino's forces than horse-mounted units.

If you're going to intervene, send enough troops and equipment to do it right. In deploying a 5,000-man Marine force to a country of almost 50,000 square miles, the United States once again attempted, as it had in Northern Russia in 1918, to control a large area with too few troops. Ultimately, the results were again unsuccessful.

Be ready to adjust mission and support priorities at a moment's notice. While in the midst of combat operations and attempting to supervise a fair national election, the Marines found themselves with another crisis—this time a natural disaster. On the morning of March 31, 1931, the city of Managua began to shake and shudder as a massive earthquake struck the region. In a matter of minutes, the city was devastated. Fires quickly broke out throughout the city and before they were extinguished, more than 2,000 Nicaraguans were dead and 45,000 more were homeless.

Within hours of the quake, the Marine aircraft were in the air, flying medical evacuation missions and returning with medicine and relief supplies. In the meantime, Marine

ground forces worked with the local authorities to rescue people trapped in their homes and provide food and shelter for the homeless. As soon as the situation stabilized, the Marines returned to combat operations.

Logistics is the key to victory. Inspired leadership can only do so much. Poorly fed and poorly equipped troops will struggle even in temperate or comfortable environments. In the mountains and jungles of Nicaragua, the Marines and their Guardia Nacional counterparts depended completely on logisticians to keep them in the fight. As a result, the logisticians developed the imaginative aerial delivery tactics that set the standard for supporting remote operating forces.

From 1927 until 1933, Sandino led a sustained guerrilla war, first against the conservative regime and later against the U.S. Marines, who withdrew when a new liberal government was established. When the Marines departed Nicaragua in 1933, they left behind a combined military and police force trained and equipped by the Americans and designed to support the current Nicaraguan government and protect U.S. interests.

Anastasio Somoza García, a friend of the American government, was put in charge of the Guardia Nacional. In retrospect, this proved to be a poor choice. The Somoza family manipulated their way into leadership of the country and continued to control Nicaragua until 1979, when another group of Nicaraguan rebels, calling themselves the Sandinistas in honor of Sandino, swept them out of power.

So what should we think of the two U.S. interventions in Nicaragua during the period of 1912 to 1933? The first American intervention succeeded in preventing ambitious European nations from establishing a presence in the country and provided enough governmental stability to allow an end to the fighting and the protection of American property in the country.

The second was not nearly as successful. In spite of their valiant at-

tempts, the Marines were unable to capture Sandino. Although the Marines made some progress on the local level in building infrastructure and providing some semblance of peace, ultimately they came to be viewed by many Latin Americans as interlopers and unwelcome supporters of a repressive government.

On a positive note, for the U.S. military, many of the lessons learned in jungle fighting and aerial delivery operations would prove useful against the Japanese in the Pacific theater during World War II. Many other young Marine officers honed their craft in the Central American jungles and would ultimately be successful battalion and regimental commanders.

The hard-earned lessons from Nicaragua would pay dividends in the battles of Guadalcanal, Cape Gloucester, and Saipan and in the continued development of the Marine Corps' close air support and aerial delivery doctrine. Unfortunately, these successes have to be balanced against the enduring negative impression left on Central America by the U.S. interventions in Nicaragua and other Latin American countries.

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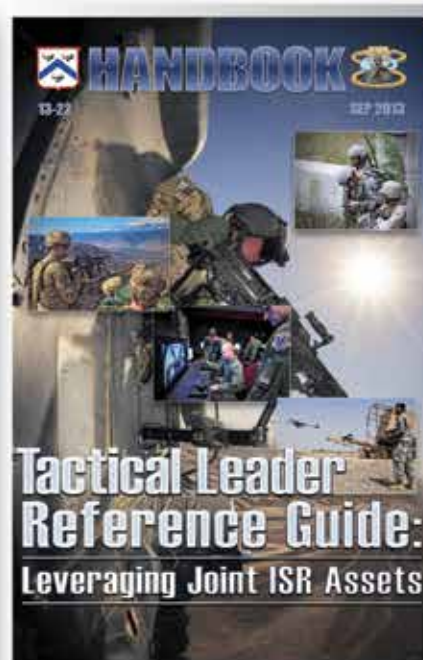
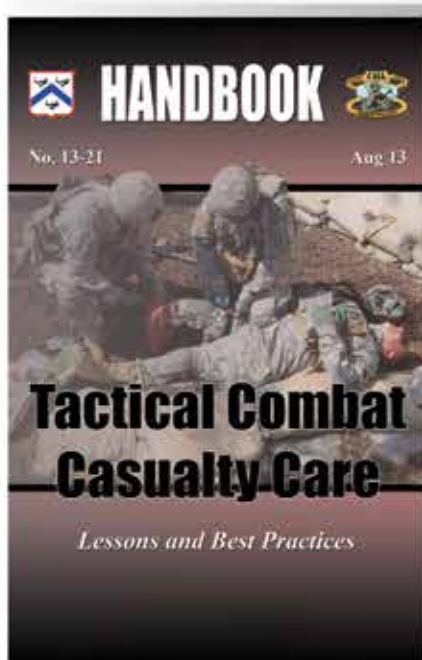
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Sustainer Spotlight

John E. Hall, Army Logistics University president, stands with the 2013 instructor award recipients Nov. 7, 2013. The top awardees were Capt. John D. Smith, officer instructor of the year; Chief Warrant Officer 4 Aura I. Sweeney, warrant officer instructor of the year; Staff Sgt. Perry G. Sarluca, enlisted instructor of the year; Thomas J. Seely, civilian instructor of the year; and Latrice J. Tollerson, educator/instructor of the year. Distinguished instructors were: Maj. Thomas J. Faichney, Capt. Cameron D. Maples, Capt. Dean R. Ray, Capt. Michael T. Quigley, Chief Warrant Officer 3 Alisha J. Johnson, Chief Warrant Officer 3 Keegan Johnson, Sgt. 1st Class Mandy J. Allen, Sgt. 1st Class Sharon N. Cameron, Sgt. 1st Class Johnnie A. Manley, Sgt. 1st Class Anthony M. Pettway, Staff Sgt. Alexis E. Pereira, Leroy D. Evans Jr. and Daniel P. Ostermann. (Photo by Amy Perry) (Not all award recipients were available for this photo.)