Special Warfare

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From the Commandant

Special Warfare

Looking at the state-of-the-art equipment and the superb flying skills of today's 160th Special Operations Aviation Regiment, it is difficult to believe that 21 years ago there was no permanent special-operations aviation organization.

But in 1980, the tragedy of Desert One made clear that the U.S. required a sophisticated rotary-wing capability for special-operations aviation. Unfortunate as it was, Desert One was the catalyst that led to the creation of the capability that has become today's 160th SOAR. The current commander of the U.S. Army Special Operations Command, Lieutenant General Bryan Brown, brought the first six UH-60 helicopters to Fort Bragg in May 1980 to begin training for a second attempt to rescue the U.S. hostages in Iran. None of us realized that that mission would result in the creation of the world's finest aviation unit.

In the 20 years since the 160th Aviation Battalion was founded on Oct. 16, 1981, the soldiers of Army special-operations aviation have worked tirelessly to improve their aircraft and their skills. In a relatively short time, the aviators of the 160th have perfected the tactics and the procedures needed in special-operations aviation. They have pioneered the use of night-vision goggles; they have led in the development of new equipment; and they have established new techniques for night-flying.

The 160th has also led in the development of the training that soldiers must have in order to use sophisticated aviation equipment. For it is not enough simply to upgrade the technology: Every technological improvement requires that aviators and ground crews receive additional training. The complexity of the equipment and the nature of special-operations-aviation missions demand that the 160th have highly skilled personnel as well as the finest equipment. In fact, the 160th has developed its own assessment-and-selection process to

ensure that only those soldiers who are equal to and suited for the mission are selected for service in the 160th.

From the 160th's first combat operations in 1983, the regiment's history has been one of valor, sacrifice and honor. In Grenada, in Desert Storm and in Somalia, the men of the 160th have demonstrated their courage, their unwavering commitment to perform the mission, and their unwillingness to let any of their fellow special-operations soldiers down.

Despite the short history of their organization, the soldiers of the 160th can be proud of their accomplishments. Faced with daunting challenges — having to acquire and modernize the equipment necessary to perform their missions; having to deal with manpower shortages; and having to accomplish demanding, real-world missions in unforgiving environments — they have not only persevered, they have succeeded, and they have earned a reputation for excellence and valor that is second to none. Truly, Night Stalkers don't quit.

Major General William G. Boykin

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The 160th SOAR: The Quiet Aviation Professionals

by Lieutenant General Bryan D. Brown

What began as an emergency deployment from Fort Campbell, Ky., in 1980 has become what is now the finest aviation capability in existence — the 160th Special Operations Aviation Regiment.

In June 1980, I was commander of Company C, 158th Aviation Battalion, 101st Airborne Division, when a knock on the door of my home one weekend summoned me back to work. My instructions were simple: We were to deploy two of our new UH-60 aircraft for a secret link-up at Fort Bragg, N.C. Warrant officers Dave Rosengrant and Ken Webb and their crews headed out.

Ted Carlson/Fotodynamics ©2001

Aircraft of the 160th SOAR, such as this MH-60L, can be configured with a range of capabilities to support SOF missions.

That day was followed by an incredible series of events. Soon after, a task force composed of the 101st's 158th Aviation Battalion (which had just begun fielding the new Blackhawks); the 229th Attack Battalion and the 159th Chinook Battalion was formed in the desert of the American Southwest. There, pilots and crews of the task force pioneered the use of night-vision goggles and special-operations tactics, techniques and procedures, or TTPs.

Why helicopters? Why Army?

At the time, the nation had just suffered a tremendous embarrassment as a result of the failure of the helicopter assault force at Desert One. The United States had no nighttime special-operations, deep-penetration capability. Although the Air Force was building its force of Pave Low helicopters, those aircraft were few in number, and they were actually being acquired to meet a shortfall in the Air Force's capability for combat search and rescue, or CSAR.

The capability that was required then is similar to SOF's requirement today: A force that can fly long distances in the dark and land precisely on the target. A small number of capable SOF fixed-wing aircraft were available and would be included in just about any mission, but for the mission to succeed, the aircraft had to be able to

Ted Carlson/Fotodynamics ©2001

The 160th SOAR's AH-6J helicopters are equipped with 2.75-inch rocket pods and can be equipped with a variety of other weapons.

land directly on or near the target with speed and surprise. It was a requirement that only rotary-wing aircraft could meet.

The Army's 101st Airborne Division had the right pilots, the right training and the right aircraft. The Army pilots were a unique mix of Vietnam veterans and aggressive young warrant officers. The assault missions that the 101st was flying every day fit very well with the special-operations mission requirements. Finally, the Army was fielding its new, highly capable UH-60 helicopters, which would serve as the centerpiece for any assault mission. For DoD, the decision to assign the mission to the Army was an easy one.

Temporary becomes permanent

After the task force had spent some long, difficult months in the desert, a capability was born — one that would fill an important special-operations shortfall. We always assumed that the task force would be a temporary arrangement (based on the requirement for a single mission), and that when there was no longer a need for the task force, the 101st would reclaim the capability.

With the number and the types of SOF missions increasing, the requirement for the task force's capability began to grow immediately. It became clear that the task-force units were never going back to the 101st. That was great news for special operations, but not so great for the 101st, which had put its heart and soul into developing its helicopter capability. A sizable piece of the 101st's assault aviation and a great number of people and aircraft from its attack aviation were now working for SOF.

An air-assault division lives by the helicopter, and while SOF may have built a great capability, that capability offered no advantages to the 101st commander, then-Major General Jack Mackmull. Eventually the 101st reorganized its assault aviation, so that, on paper, it appeared that each of the two assault battalions had lost one company, not that the 158th Aviation Battalion had lost two. The 101st was eventually "paid back" for the helicopters and personnel that it had lost. Without the complete support of the 101st Airborne Division, the special-operations aviation capability would never have been built, and the 160th certainly would not have the high standards and the high level of experience that it has enjoyed since day one.

The quiet aviation professionals

In the years that followed, the 160th grew in more than just the number of its SOF aviation TTPs: It internalized the SOF ethos. It built the "never quit" attitude.

But possibly one of the most important values that the 160th has internalized is that of the "quiet professional." With very few excep-

tions, the 160th has been involved in every armed conflict this nation has taken on since the unit was established. Its first important mission was Urgent Fury, and the records show that the unit's bravery under fire was extraordinary: On the initial assault, one member of the 160th was killed in action and

Ted Carlson/Fotodynamics ©2001

The 160th SOAR's MH-47D helicopters are equipped with the Fast Rope Insertion/Extraction System for the infiltration and the extraction of SOF personnel.

12 were wounded. The 160th didn't quit. Since then, the 160th has participated in an amazing variety of missions: covering the launch of the Space Shuttle, performing intelligence-and-surveillance missions, capturing and recovering sensitive equipment, guarding U.S. oil tankers in the Persian Gulf, and conducting a wide array of classified missions.

Perhaps the 160th's greatest achievement came during Desert Storm. The actions of the 160th — undertaken not only in concert with the ground force but also unilaterally in the attack mode — were key to the success of SOF. Yet seldom have we read articles heralding the 160th's successes. The regiment is a group of hard-working, dedicated soldiers, civilians and contractors who define success as consistently providing the maximum support to SOF operations around the world every day. They are happy just to be in the "arena."

The 160th has rapidly built and flown new equipment that is now considered the norm within the Army (the credit for much of DoD's current night-flying capability is due to the members of the 160th). The 160th built the only assessment-and-selection program for aviation in special operations, and it reaps the benefits of that program by ensuring that the right pilot and the right crew chief operate its aircraft. Today, the 160th has the most capable aircraft in DoD, flown by hand-selected pilots and maintained by incredibly dedicated and highly capable support personnel. Despite being undermanned for the type and the number of missions that it performs, the 160th continues to excel. The 160th has ultimately brought Army SOF much more capability and credibility than they have ever had before. ARSOF aviation is an expensive but important capability. Those who understand resourcing know that Army SOF have and will continue to have *more* funding, not less, because of their aviation component.

As the Night Stalkers celebrate their 20th anniversary, I hope that you will enjoy this edition of *Special Warfare*. It is intended to provide some insight into this one-of-a-kind special-operations unit. The Night Stalkers continue to prepare for another 20 years of success. Night Stalkers don't quit!

Lieutenant General Bryan D. Brown is commander of the U.S. Army Special Operations Command. His previous assignments include commanding general, Joint Special Operations Command; commander, 160th Special Operations Aviation Regiment; commander, 1st Battalion, 160th SOAR during Desert Storm; S3, 160th Special Operations Aviation Group; and service as a rotary-wing aviator with the 129th Assault Helicopter Company in Vietnam.

In Memory

The following is the roll of the members of Army Special Operations Aviation who have given their lives in the line of duty:

July 17, 1980
Chief Warrant Officer 2 Bobby M. Crumley

November 4, 1980
Specialist 4 Timothy Hensley

September 21, 1981
Chief Warrant Officer 3 John W. Williams

October 7, 1981
Lieutenant Colonel Michael C. Grimm

March 29, 1982
Sergeant Ricky D. Zizelman

March 20, 1983
Chief Warrant Officer 4 Ralph L. Thompson
Chief Warrant Officer 2 Donald R. Alvey
Sergeant Claude J. Dunn
Private First Class Gregory D. Eichner
Specialist 4 Jerry L. Wilder

July 10, 1983
Chief Warrant Officer 4 Larry K. Jones
Chief Warrant Officer 3 Thomas B. Crossan III
Chief Warrant Officer 2 James N. Jansen
Staff Sergeant Mark J. Rielly
Staff Sergeant Luis A. Sanchez
Staff Sergeant Mark D. Cornwell

August 26, 1983
Captain Robert E. Brannum
WO1 Allen E. Jennings
Chief Warrant Officer 2 David W. Jordan

October 4, 1983
Chief Warrant Officer 3 William H. Tuttle
Specialist 4 Richard J. Thompson

October 25, 1983
Captain Keith J. Lucas

April 29, 1985
1st Sergeant Ronnie R. Orebo

April 27, 1987
Captain Frederick M. Maddock II

May 20, 1988
Chief Warrant Officer 3 Stephen A. Hansen
Chief Warrant Officer 3 Jerry H. Landgraf

December 20, 1989
1st Lieutenant John R. Hunter
Chief Warrant Officer 2 Wilson B. Owens

February 21, 1991
Captain Charles W. Cooper
Chief Warrant Officer 3 Michael F. Anderson
Staff Sergeant Mario Vega-Velazquez
Staff Sergeant Christopher J. Chapman

February 22, 1993
Major Robert P. Mallory

October 3, 1993
Chief Warrant Officer 4 Raymond A. Frank
Sergeant Thomas J. Field
Staff Sergeant William D. Cleveland Jr.

October 3, 1993
Chief Warrant Officer 4 Clifton P. Wolcott
Chief Warrant Officer 3 Donavan L. Briley

July 20, 1994
Chief Warrant Officer 3 Carlos P. Guerrero

March 7, 1995
Staff Sergeant Edwidge Pierre
Sergeant Jeffery D. Tarbox

March 7, 1996
Chief Warrant Officer 5 Walter M. Fox
Chief Warrant Officer 3 Pierre R. Desroches
Chief Warrant Officer 3 William R. Monty Jr.
Staff Sergeant Tracy A. Tidwell
Staff Sergeant Bradley C. Beem

March 4, 1997
Sergeant Edward G. Palacio

The 160th SOAR: 20 Years of Army Special-Operations Aviation

by Major Sidney J. Gray III and CW5 Charles W. Weigandt

The story of the Night Stalkers of the 160th Special Operations Aviation Regiment, or SOAR, is about the evolution of men, machines and ideas. Since its beginning as a special project in the summer of 1980, the 160th SOAR has participated in all major U.S. military operations and in several lesser-known ones. This article presents a brief overview of the unit's history, beginning with the special project that evolved into a new battalion over the course of 18 months.

The unit that we now know as the 160th SOAR first formed from elements of the 101st Airborne Division in the summer of 1980 in response to a national mission requirement for a rotary-wing aviation capability. The men and the equipment of this special project would address the shortcomings identified after the accident at Desert One in Iran.

The 101st Airborne Division was a likely starting point for the creation of a specialized aviation unit because of its large complement of helicopters and personnel. Perhaps the greatest selling point for the 101st was that its 158th Assault Helicopter Battalion had begun fielding the new UH-60 Blackhawk. This easily deployable and highly capable assault helicopter possessed many desirable features for special-operations support: large payload, high speed and generous power.

Scout helicopter pilots and crew members from two other 101st units, the 229th Attack Helicopter Battalion and the 2-17th Cavalry, gathered under the command of Company B of the 229th. With the help of the Mississippi Army National Guard, the pilots and crew members received training on the OH-6 Cayuse scout helicopter. The OH-6 proved to be extraordinarily deployable, and because of its small size, it could insert troops into the most restrictive landing zones. At the same time, a separate group of Army aviators began testing OH-58s and OH-6s that had been modified as light-attack helicopters.

Company A of the 101st's 159th Aviation Battalion provided the CH-47 Chinooks for the special project. Although the Chinooks were not as easily deployable as the other aircraft, they possessed the greatest ability for moving large numbers of personnel and heavy loads. They also provided the project with a means of establishing forward-area refueling sites for long-range operations.

The project's combination of men and machines would have been of limited use without a suitable support structure. Parent battalions provided for the logistics needs of their companies, while the 158th Aviation Battalion provided most of the command and control for the upcoming exercises. After the various elements of the project had been assembled, they were known as Task Force 158. TF 158 provided the Army with a rotary-wing special-operations capability that would prove valuable in future contingencies.

U.S. Army photo

Today's 160th SOAR stands ready to provide no-notice aviation support to U.S. special-operations forces.

As the project began, elements of TF 158 were sent out on two separate training deployments. The Blackhawk and Chinook units moved to Norton Air Force Base, Calif., for intense training. There, the Blackhawks and Chinooks received modifications that extended their range and improved their long-range navigation capabilities. The scout pilots moved to the Aviation Support Facility at Gulfport, Miss., where they received training on the OH-6A helicopter. Following their separate deployments, the Blackhawk, Chinook and OH-6A crews and their aircraft were reunited at Fort Huachuca, Ariz., for mission training.

As of mid-summer 1980, most members of the fledgling special-operations unit were not volunteers. They were members of conventional aviation companies and battalions who had been called upon to conduct intensive training in preparation for an unspecified mission. The aircrews received limited information on the purpose of their training, but it was apparent to them that the mission would require desert-environmental skills and long-range, precision navigation.

The men of TF 158 continued to train over the summer, traveling to multiple training sites across the United States. Aircrews and support personnel would load their helicopters aboard strategic and tactical transports and move to forward staging bases from which they would move additional distances (up to 1,000 nautical miles) to reach simulated objectives. While this kind of training sounds routine in 2001, it was not so in 1980.

Most of the early training was performed without the benefit of night-vision goggles. The now infamous "full face" AN/PVS-5 goggles were introduced during the summer of 1980. While a few units around the Army were using the goggles, the concept of using them was new to most aviators. The PVS-5s presented many challenges, but they ultimately provided a great increase in night-vision capability for the unit. Amazingly, there were no significant night-related accidents during the early exercises.

In the late fall of 1980, the members of TF 158 were told the purpose of their specialized training. At that point, the men were given the opportunity to continue with the project or to move on. Most of them volunteered to stay.

On Jan. 20, 1981, the Iranian hostage crisis ended, and the pressing need for the special-operations aviation capability faded. The men of TF 158 fully expected that the task force would be disbanded and that they would be returned to their conventional aviation missions. However, the Army leadership saw the potential of the new unit and took steps to retain it.

In recognition of the fact that the 101st had given up the forces used to create the new organization, the Army formalized the new special-operations unit as the 160th Aviation Battalion. The choice of the unit's name has been the source of some speculation. Despite suggestions such as the 202nd Aviation Battalion, the proposed designation of 160th was accepted by the Institute of Heraldry as a logical progression of the 101st's 158th and 159th Battalions. The battalion conducted its formal activation ceremony on Fort Campbell's Division parade field Oct. 16, 1981.

The men of TF 158 fully expected that the task force would be disbanded and that they would be returned to their conventional aviation missions. However, the Army leadership saw the potential of the new unit and took steps to retain it.

The new battalion, with an authorized strength of 191 personnel, consisted of a headquarters and service company, a light assault company, a light attack company, and a maintenance platoon. Task Force 160 was formed when the two Blackhawk companies of the 158th (C and D), and the Chinooks of Company A, 159th, merged with the battalion.

The helicopters continued to operate from various locations on Fort Campbell, Ky., in an attempt to minimize their appearance as a nonstandard unit. Perhaps the most interesting basing plan was that of the Little Birds, which were operated from garage-like buildings in the old Clarksville Naval Base at Fort Campbell. The OH-6 unit's informal name, the Special Helicopter Operations Company, became the basis for the "SHOC Pad" training area near the garages.

Task Force 160 continued an aggressive training program, expanding its capabilities to include over-water and ship operations and specialized environmental training with supported units. Personnel also continued to improve their desert skills and night-vision tactics that they had developed for the original mission.

The training was not without risk, and several aircrew members were lost as a result of training accidents between July 1980 and October 1983. The high accident rate brought the unit a great deal of scrutiny, and a panel was convened find ways of improving the safety of training. Following the panel's advice, the 160th implemented training improvements that significantly reduced the accident rate and ensured the future of the special-operations aviation unit.

Task Force 160's first combat action came in October 1983, when a coup on the island of Grenada presented a threat to American citizens. Night Stalkers completed the planning for their part of Operation Urgent Fury and moved their UH-60s to the island of Barbados to prepare for operations. Meanwhile, AH-6 and MH-6 Little Birds and their crews loaded aboard C-130s for the trip to Grenada.

Despite a plan to begin the invasion under the cover of darkness, operations were delayed until after first light. The task force suffered its first combat fatality when the UH-60s assaulting an objective encountered heavy antiaircraft fire. Several aircraft in the flight were hit, and the intense ground fire wounded a number of the aircrew and passengers. Later, as Urgent Fury evolved, personnel of the 160th performed numerous missions in support of units in the invasion force.

During the next four years, increasing demands on the impressive capabilities of the 160th compelled the unit to expand in size and to acquire more capable equipment. The Night Stalkers received improved night-vision devices; created better techniques for inserting troops onto objectives; and acquired superior aircraft and weapons. During this period, the 160th planned for numerous contingencies and

U.S. Army photo

Operating from Navy ships, Night Stalkers performed reconnaissance, security and search-and-rescue missions during Operation Prime Chance.

remained ready to respond to the nation's worldwide needs.

On Oct. 16, 1986, the 160th Aviation Battalion became the 160th Special Operations Aviation Group. At that time, the 160th was also relieved from assignment to the 101st Airborne Division and was assigned to the 1st Special Operations Command.

In 1987, the 160th's over-water and shipboard-operations capabilities proved useful when the unit was assigned to protect U.S. re-flagged Kuwaiti oil tankers from rogue elements that had mined the waters of the Persian Gulf. As part of Operation Prime Chance, the Night Stalkers operated from various U.S. Navy ships and provided reconnaissance, security and search-and-rescue coverage around the Gulf.

The presence of the 160th quickly proved to be beneficial. On Sept. 21, 1987, a flight of Little Birds responded to a suspicious surface contact. As the flight was approaching the intercept point, the target ship extinguished its running lights, and the Little Bird aviators, using forward-looking infrared devices, observed personnel on the target ship uncovering cylindrical objects and rolling them into the water. After receiving permission to engage the vessel, the aviators terminated the mine-laying activity with fire from their miniguns and rockets. This incident was the first combat engagement carried out by an Army aircrew using night-vision devices. A boarding party that searched the target ship later confirmed that the cylindrical objects aboard the ship were marine mines similar to those that had already damaged ships in the Gulf.

Approximately 10 days later, several Iranian small boats engaged a flight of aircraft with small-arms fire. Once again, Little Birds engaged the boats, this time sinking them. Support for Operation Prime Chance by the 160th's Little Birds continued for a year, until an aviation unit from Fort Bragg, flying armed Kiowa OH-58Ds, relieved the 160th. The 160th supported the training of the first Kiowa Warrior unit by passing along tactics, techniques and procedures; and by conducting over-water training for the new unit. The MH-60 Blackhawks of the 160th continued to work in the Gulf area for another year, providing support for a number of missions, including combat search and rescue. The presence of the Night Stalkers deterred numer-

ous attacks on international shipping and slowed the mine-laying process.

In June 1988, the 160th received a short-notice directive to recover an Mi-24 Hind helicopter from a remote location in northern Chad. Operation Mount Hope III required that aircrews fly 490 nautical miles at night without outside navigational aids, extract the Hind, and return with it sling-loaded. Company E of the 160th prepared for the mission and deployed via C-5 transport to N'djamena, Chad. Two aircraft and crews moved forward, and the crews began preparing the Hind for sling-loading by removing its rotor blades and securing loose items. Because of the distance involved, the helicopters would have to perform a mid-desert refueling from a C-130 while returning with the Mi-24. Also during the return flight, the pilots had to fly through a sandstorm that greatly reduced their visibility. The recovery mission demonstrated the long-range, adverse-environment capability of the 160th.

Threats to American interests continued throughout the world, and in late 1989, the 160th once again entered combat. Following extensive preparation, the 160th performed special operations during Operation Just Cause, the U.S. operation to remove Panamanian dictator Manuel Noriega from power. Just Cause required the Night Stalkers to deploy from the harsh winter conditions at Fort Campbell to the tropical heat of Panama. The deployment to Panama included an over-water, self-deployment of MH-47 Chinooks from the U.S.

During the operation, 160th aircrews provided aviation support for operations against the headquarters of the Panamanian Defense Forces, Modelo Prison and numerous other areas throughout the country. The unit employed airborne-capable forward arming and refueling point, or FARP, teams in combat. In order to establish FARPs for the aircraft of the 160th near Rio Hato and Torrijos-Tocumen, the teams parachuted in with the Rangers who conducted airfield seizures.

Less than one year later, elements from all three battalions of the 160th deployed to various locations in Saudi Arabia in support of Operations Desert Shield and Desert Storm. Their missions included inserting and extracting Special Forces teams; resup-

Night Stalkers from Company E of the 160th SOAR fly the sling-loaded Mi-24 Hind helicopter out of northern Chad during Operation Mount Hope III.

U.S. Army photo

plying SOF units; performing armed reconnaissance; and attacking selected targets.

Night Stalkers from the 3rd Battalion proved their skill and heroism during the emergency extraction of an SF reconnaissance from deep in Iraq. The aircrew of a single Blackhawk responded to the call and recovered the team, which was under fire, without injury.

In the summer of 1993, selected elements of the regiment began making plans to support an operation to restore order to the war-torn country of Somalia. After several false starts, Night Stalkers deployed in support of Operation Gothic Serpent. Once in Somalia, the task force conducted several relatively uneventful but productive missions. From lessons learned during those missions, the unit refined its tactics until they were suitable for urbanized terrain.

On Oct. 3, 1993, in Mogadishu, Task Force Ranger began a mid-afternoon operation that rapidly evolved into an 18-hour firefight. Shortly after the landing of the assault force, two Blackhawks were shot down, and their crews were wounded, killed or captured. Air and ground rescue forces responded by fighting their way through the crowded city in some of the most intense combat since Vietnam. Although Task Force Ranger continued operations to stabilize the region, it was withdrawn later in the fall.

Aircraft from the 160th had operated from U.S Navy ships for many years, but Army helicopters were given exclusive use of an aircraft carrier for the first time during Operation Uphold Democracy. Night Stalkers embarked aboard the *U.S.S. America* and prepared to support the uncertain situation on the island of Haiti. Fortunately, diplomacy was effective, and the planned invasion of Haiti was cancelled. Once Uphold Democracy transitioned to a peacekeeping mission, the 160th aircrews and support personnel moved to Guantanamo Bay, Cuba, and stood by as a contingency force.

Chinook aircrews from the 3rd Battalion, 160th SOAR, conducted the next major regimental milestone when they participated in a large noncombatant evacuation operation in Liberia in April 1996. Operation Assured Response was led by the Air Force Special Operations Command. This complex operation involved multiple fixed- and rotary-wing aircraft from the U.S. and from Europe. It resulted in the safe evacuation of 2,115 noncombatants. Most recently, the regiment has supported two operations designed to protect U.S. interests in the Middle East, Desert Thunder and Southern Watch.

Since its founding, the structure of the 160th has evolved in response to the requirements of many supported units, and the organization continues to adjust for the demands of the future. Today, the 160th Special Operations Aviation Regiment continues to plan and to prepare for many contingencies. Night Stalkers stand ready to provide no-notice, worldwide aviation support, anytime, anywhere, time-on-target plus or minus 30 seconds. Night Stalkers don't quit!

Major Sidney J. Gray III is assigned to Special Operations Command – Korea. Prior to his current assignment, he was commander of the 160th Special Operations Aviation Training Company, Fort Campbell, Ky.

CW5 Charles W. Weigandt is the operations officer and the A/MH-6 standardization officer for the 160th Special Operations Aviation Training Company, Fort Campbell, Ky. A founding member of Task Force 160, he was one of TF 160's original Little Bird pilots.

‘Green Platoon’: The 160th SOAR’s Training Program

by MW4 Carl R. Brown, U.S. Army (ret.)

Since 1985, the 160th Special Operations Aviation Regiment’s “Green Platoon,” the nickname for the Special Operations Aviation Training Company, or SOATC, has been training personnel who are newly assigned to, or who are being reassigned to, the regiment.

Contrary to what its name might imply, the aviation training company provides more than just aviator training. SOATC administers 16 training programs that are necessary to ensure standardization and safety within the regiment. The training programs include initial orientation, flight instruction, and maintenance of the regiment’s unique equipment.

U.S. Army photo

Soldiers in the Green Platoon crawl through the mud pit during their orientation to the 160th SOAR.

When the 160th Aviation Battalion was formed in the early 1980s, there were no tactics, techniques and procedures, or TTPs, for Army special-operations aviation. No “how to” manuals were available to clarify the specialized operations that the 160th performed, to explain the use of night-vision goggles, or to catalog the range of environmental conditions that the aviators might face. Nevertheless, the 160th’s aviators and support personnel, armed only with conventional Army doctrine, the combined knowledge of its members, and a determination to succeed, joined together and learned on the job.

Unfortunately, the learn-as-you-go approach led to a number of accidents. When the unit’s accident rate spiked in 1983, a panel was formed to examine the unit’s training strategy and operational tempo. When the examination was finished, the panel recommended that a separate, dedicated special-operations aviation-training unit be created.

By 1985, the 160th had established its first training unit, which was known as the Green Platoon because of the newness of its students. The Green Platoon’s aviation-training program was based on the Army’s readiness-level training program and on aircrew training manuals. Administered by the 160th’s operations officer and by instructor pilots, the new program provid-

U.S. Army photo

The Green Platoon now administers 16 training programs to the officers and the enlisted members of the 160th SOAR.

ed a controlled environment (i.e., it was isolated from the demands of real-world missions) in which students could learn the 160th's techniques and procedures. Because the 160th received no additional personnel with which to staff the training program, the fledgling program had to be created "out of hide." That meant that whenever operations or exercises placed heavy demands on the task force's personnel assets, the Green Platoon's training was limited.

The next milestone came in July 1988, when the Selection and Training Detachment, or S&T, was created from assets of the 160th Special Operations Aviation Group. Although it was still an out-of-hide organization, the S&T was dedicated to training and recruiting, and its formation allowed the other companies in the 160th to focus on mission support, knowing that their new aviators would be trained to a common high standard. In November 1988, the S&T expanded its scope to include training for the enlisted members of the 160th.

While the 160th's training programs were quickly proving their value, the shortage of instructors remained a problem. To solve the problem, the 160th decided to hire civilian mission instructors, or CMIs, who possessed the right mix of skills and experience to train the members of the unit.

The initial CMI concept involved hiring retired instructor pilots to serve for one year. If the CMI program proved to be successful at the end of the first year, the 160th would formalize the program. The CMI test program began in August 1990 with the hiring of six CMIs, two for each of the three basic aircraft designs. The CMIs, all of whom were former flight-leader-qualified 160th aviators, brought with them a vast amount of experience to share with new members of the unit. In 1991, the Army Research Institute evaluated and approved the CMI program, and it soon expanded to become the primary training program for newly assigned personnel.

On Sept. 11, 1992, the S&T was provisionally redesignated the Special Operations Aviation Training Company. While the company has grown in size and in responsibility over the years, its original name of Green Platoon has stuck with it.

MW4 Carl R. Brown, U.S. Army (ret.), is one of the original members of the 160th. He served as the operations officer for the Selection and Training Detachment when the Combat Mission Instructor program began. He currently serves with the 160th as an MH-60K Blackhawk instructor and aircraft-survival-equipment instructor.

Evolution of the 3-160th SOAR Through Desert Storm

by Lieutenant Colonel Andy Milani

On October 3, 1986, on a small field adjacent to the garrison headquarters building at Hunter Army Airfield, Ga., Major General Leroy Suddath, commanding general of the U.S. Army's 1st Special Operations Command, or 1st SOCOM, presided over an activation ceremony for the 129th Special Operations Aviation Company, or SOAC. The ceremony marked the culmination of eight months of intensive preparation by a small team of officers and NCOs led by Major Gene Edwards.

Acting only on General Suddath's intent, Edwards and his team, working hand-in-hand with Lieutenant Colonel Johnny Shepherd of the Army Staff and Lieutenant Colonel Joe Calhoun of 1st SOCOM's G3 Air, designed a modified table of organization, or MTOE, that was loosely based on the MTOE of an aviation company that had 15 UH-60 helicopters. The new MTOE reflected the experience of special operators who knew that the organization would need to be rapidly deployable, adaptable and capable of sustaining itself for short durations of time. At the time, the only models for a special-operations aviation company were Companies C and D of the 160th Special Operations Aviation Group, or SOAG.

Companies C and D received support from their parent unit, the SOAG. The 129th, however, was intended to function as a stand-alone organization. Its sections would operate much like those of a battalion staff. The 129th's day-to-day installation support would be provided via an interservice support agreement, or ISSA, that 1st SOCOM had negotiated with the 24th Infantry Division at Fort Stewart, Ga. The ISSA applied to the 1st Ranger Battalion, also based at Hunter Army Airfield.

The genesis of the 129th SOAC was the 17th of a series of initiatives undertaken by the chiefs of staff of the Army and the Air Force. Initiative 17 was prompted by a desire to align all rotary-wing support for special-operations forces, or SOF, under the Army and to align all fixed-wing support under the Air Force. The initiative attempted to address the Army's lack of tactical helicopter support for the four Special Forces groups and for the Ranger Regiment. At the time, those five organizations, colloquially known as "white SOF," were not supported by the 160th SOAG, which was dedicated to supporting national special-mission ("black SOF") units.

The 129th recruited and trained aggressively, quickly earning the respect of the SOF community. The unit's 15 Blackhawk helicopters were equipped with the latest modifications, including long-range fuel tanks; satellite-communication radios; forward-looking, infrared radar, or FLIR; and fast-rope insertion/extraction systems.

In early 1987, as part of the implementation of Initiative 17, the Air Force began a drawdown of its five UH-1N Hueys based

U.S. Army photo

After years of training, operations, and equipment modifications, today's 3-160 stands ready to provide worldwide aviation support to U.S. SOF.

at Howard Air Force Base, Panama. To fill that void, the 129th began rotating a platoon of aircraft to Howard AFB in October 1987. That rotation was the genesis of the 617th Special Operations Aviation Detachment, or SOAD. For 18 months, the 129th provided the personnel, equipment and training needed to stand up the 617th. In March 1989, after having officially accepted the transfer of five aircraft from the 129th, the 617th stood on its own, but its activation lowered the 129th's strength to 10 MH-60s and approximately 125 personnel. The 617th SOAD later became what is today's Company D, 160th, which is based in Roosevelt Roads, Puerto Rico.

Third Battalion activation

In late 1988, in anticipation of activating the 160th Aviation Regiment, the Army redesignated the 129th SOAC as Company A, 3rd Battalion, 160th Special Operations Aviation Regiment.

In early 1989, the Army began assembling a cadre to activate the 160th SOAR's 3rd Battalion. Then-Lieutenant Colonel Dell Dailey was chosen to be the battalion's first commander. Just as Edwards and his team had done three years earlier, Dailey began the process of creating a SOF-peculiar MTOE, although on a larger scale. The 3rd Battalion, which was to be a composite battalion flying Chinooks and Blackhawks, would provide exclusive support to white SOF. Company A was to be the nucleus of the new battalion. Headquartered at Hunter Army Airfield, the new unit began renegotiating earlier ISSA agreements with the 24th Infantry Division.

On June 2, 1989, on a physical-training field at Hunter Army Airfield, Dailey posted the commander, first sergeant and guidon bearer of each company of the new battalion. In a scene reminiscent of a "Chinese fire drill," the soldiers of Company A, standing in a swollen formation of more than 200, were ordered to break ranks and to fall in on their respective companies. The 3rd Battalion thus became an official entity.

The support sections within Company A became Headquarters and Headquarters Company, or HHC, commanded by Captain Rich Sheppard and 1st Sergeant Manny Acosta. The HHC sections included mess; motor pool; supply; an airborne service platoon; and the battalion staff. With the loss of everything but its pilots and crew chiefs, Company A became a J-series organization, commanded by Major Mark Ochsen-

bein and 1st Sergeant Dave Rogers. The new Chinook company, Company B, which was just beginning to field its personnel and equipment, was commanded briefly by 1st Lieutenant Eric Peterson, but later came under the command of Major Bruce Bridges and 1st Sergeant Bufkin. Company A's maintenance platoon became Company C, commanded by Major Conway Ellers and 1st Sergeant Bill Matthews. Company C added 67U-series technicians to give a Chinook-maintenance capability.

While Company A was a mature and combat-ready entity, Company B had some growing to do. Bridges began an intensive personnel recruiting-and-training campaign. The Army directed that eight CH-47D aircraft from Fort Campbell and Fort Bragg be transferred to Company B. The aircraft, however, required SOF-peculiar modifications. In fact, most of them had not had their cockpit lighting modified to be compatible with night-vision goggles, or NVGs. The road was long, but there was a plan. The estimated combat-ready date for Company B was the 3rd quarter of 1991 — two years away.

Soon after the activation of the 3rd Battalion, 1st SOCOM directed that the flight platoons of the four SF groups (1st, 5th, 7th and 10th) be organized under the 3rd Battalion. This directive was based on 1st SOCOM's goals of achieving standardization among the fleet and of consolidating all white-SOF aircraft under one organization. The original charter for the flight platoons called for them to provide administrative and logistics support to the SF groups. Each platoon had four MH-60 helicopters. Over time, and with the help of some action officers who had access to financial resources, the aircraft were modified with tactical, SOF-peculiar equipment. The platoons developed their own NVG programs and began to provide a combination of administrative and tactical support.

The 3rd Battalion created a fifth company, Company D, to bring the widely diversified platoons under one umbrella. Company D was commanded by Major Rob Bruns and 1st Sergeant Brown. These two were possibly the most traveled company-command team in Army aviation. They lived on the road, routinely visiting their flight platoons at Fort Lewis, Wash.; Fort Campbell, Ky.; Fort Bragg, N.C.; and Fort Devens, Mass. Early in 1990, the platoons were disbanded to provide resources for the activation of the 160th's 2nd Battalion at Fort Campbell.

Just before Christmas 1989, Operation Just Cause began in Panama. Although the 3rd Battalion was not tasked to participate in the operation, it deployed about 20 personnel to assist the 160th SOAG, predominantly in a support role. The 617th SOAD, under the command of Major Rick Compton, provided critical support to SOF during Just Cause's combat operations.

Regimental activation

In June 1990, a ceremony was held at Fort Campbell to formally redesignate the 160th SOAG as the 160th Special Operations Aviation Regiment (Airborne). The SOAG commander, Colonel Billy Miller, became the first colonel of the regiment. During the ceremony, members of the 3rd Battalion stood alongside the members of the 2nd Battalion, which had recently been formed under the command of Lieutenant Colonel Gordon Hearnsberger. The 2nd Battalion, a Chinook-only battalion, shared the 3rd Battalion's duties of supporting white SOF. However, because of national mission-support requirements, only Company B of the 2nd Battalion would be available for white-SOF support. (That fact would later play a role in the selection of 3/160 for deployment to Desert Storm.) The SOAG's remaining companies — A, B, C, D and F — were reorganized as the 160th's 1st Battalion, commanded by Lieutenant Colonel Doug Brown.

Desert Shield

When Iraq invaded Kuwait in August 1990, the 2nd and 3rd battalions of the 160th were alerted for deployment to the U.S. Central Command's area of responsibility, or AOR. After some discussion, the CENTCOM staff narrowed the SOF aviation requirement to eight MH-60s and four MH-47s. The numbers caused some con-

Ted Carlson/Fotodynamics ©2001

The complexity of SOF modifications to ARSOA aircraft, such as this MH-47D, requires that pilots and maintenance personnel receive specialized training.

sternation within the regiment: The 2nd Battalion was unable to meet the requirement for Chinooks and still meet its national-mission requirements, and the 3rd Battalion's Company B, still in its infancy, was not yet ready to field more than two combat-ready crews. Colonel Miller decided to form Task Force 3-160, under the command of Lieutenant Colonel Dell Dailey, which would deploy with augmentation from the 2nd Battalion's Company B — two Chinooks with aircrews, as well as support personnel, equipment, repair parts and tools. Major Russ Carmody, commander of Company B, 2nd Battalion, deployed with the task force.

By the beginning of September 1990, Task Force 3-160 had arrived at the King Fahd International Airport, or KFIA, in Saudi Arabia. CENTCOM positioned combat units throughout the AOR, essentially placing them wherever their minimum base-support needs could be met. The conditions at KFIA were Spartan, to say the least. Although KFIA had plenty of ramp space for the aircraft, room for soldiers to bed down was another matter altogether. The "parking garage from hell" became the task force's dormitory.

Recognizing that the conditions at KFIA did not lend themselves to prolonged occupation — either from the point of view of aircraft safety *or* of strategy — Dailey directed Bruns, now the battalion S3, to find an alternate basing location. The location had to provide better strategic coverage of the AOR, better aircraft-support facilities, and, if possible, better living conditions.

The 5th SF Group, under the command of Colonel Jim Kraus, also wanted to move, in order to be closer to the Iraqi border. Kraus wanted a location from which his liaison teams could better support the coalition battalions arrayed along the border.

Bruns, hopping around the country with his counterpart from the 5th SF Group, settled upon King Kahlid Military City, or KKMC, which is about 250 miles from KFIA and less than 70 miles south of the Iraqi border. From there, 160th aircraft could fly well into Iraq, and return, on one load of fuel.

The Saudis had just built two aircraft

hangars at the KKMC airfield, but they had yet to field the helicopters that were to occupy the hangars. The barracks complex on the main base could house thousands of soldiers. The base also had numerous state-of-the-art motor-pool facilities. All of the base's facilities had been built to Western standards, under the watchful eye of the U.S. Army Corps of Engineers. Best of all, no other unit had expressed an interest in KKMC — yet. Task Force 3-160 and the 5th SF Group quickly convinced Colonel Jesse Johnson, the commander of CENTCOM's Special Operations, that relocating Task Force 3-160 and the 2nd and 3rd battalions of the 5th SF Group from KFIA to KKMC was operationally the right move.

Priorities

Once Task Force 3-160 was occupying the facilities at KKMC, it established the following priorities in order to prepare the unit for potential combat operations: safety and force protection; integration with the headquarters of Special Operations Command-Central, or SOCCENT; aviation mission training; aircraft and equipment maintenance; development of the logistics support structure; and morale support.

Safety and force protection. Although the unit did not have the resources for providing its own security, it had to do its best. In conjunction with the 5th SF Group, the task force constructed a defensive network and established a guard force. The Saudis provided perimeter security for KKMC, so TF 3-160 focused on aircraft, hangar and barracks security. The task force constructed a bunker complex around the hangar, manning it only at critical times. Eventually, the Army component of CENTCOM assigned a platoon of military police to provide security, and TF 3-160 gladly handed over the security mission.

Integration with SOCCENT headquarters. Task Force 3-160 quickly established liaison with SOCCENT headquarters and its air component, the Air Force Special Operations Component Coordinator, or AFSOCC. AFSOCC, whose commander was also commander of the 16th Special Operations Wing, served as the single air manager for all SOF aviation in theater. The AFSOCC staff worked with the conventional Joint Forces Air Component Commander to coordinate use of the airspace. TF 3-160 provided liaison officers to both SOCCENT and AFSOCC for the duration of Desert Shield and Desert Storm.

Communications support provided by the Joint Communications Support Element from MacDill AFB, Fla., coupled with TF 3-160's organic communications section, ensured that TF 3-160 never lacked connectivity to either SOCCENT or AFSOCC.

Aviation mission training. Night flying in the Saudi desert proved to be especially challenging. During the first few months of Desert Shield, there was a spike in the overall accident rate for Army aviators. TF 3-160 adopted a crawl-walk-run approach to aviator training in order to achieve combat readiness in the shortest possible time. First, instructor pilots and aviators who were rated fully-mission-qualified practiced desert landings with NVGs until they felt comfortable with their performance. Next, aviators who were rated basic-mission-qualified took the training. Within a few weeks, all combat crews were practiced and confident in their desert-flying abilities.

Mission training included flying long-range infil/exfil navigation routes throughout the AOR, practicing desert-flying techniques and getting used to the limited satellite coverage for the global positioning system, or GPS.

TF 3-160 also practiced what it considered to be a collateral mission: combat search and rescue, or CSAR. The unit ran numerous CSAR exercises, placing "downed crews" in remote locations to make the scenarios realistic. Sometimes fighter pilots from deployed air wings played the role of downed pilots. The rescue missions also provided medical personnel the opportunity to administer aid to their "patients" while airborne and under blackout conditions. Although some of the patients didn't appreciate the IV needles, the training was excellent.

The airborne service platoon, or ASP, rehearsed operations as the forward arming and refueling point, and it expended

significant amounts of ammunition for crew-served weapons at local ranges. In anticipation of the CSAR mission, the ASP also prepared equipment for dispersal to a multitude of operating locations.

Aircraft and equipment maintenance. The helicopter-maintenance facilities of TF 3-160 were the best available to any Army aviation unit deployed during Desert Shield and Desert Storm. The maintenance shop kept the fleet consistently above a 95-percent fully-mission-capable rate. TF 3-160 established an aggressive program for placing erosion-prevention strips on the leading edges of all helicopter rotor blades, and maintenance personnel continually monitored engine compressor blades for any degrading effects of sand. The engine shop became adept at replacing worn compressor blades, and the operation significantly extended the life of helicopter engines. Maintenance efforts were aided by the TF 3-160's practices of storing its aircraft on concrete runways and taxiways, and of limiting the number of desert landings to the minimum necessary for pilot proficiency.

The TF 3-160 aircraft that deployed to Desert Shield lacked many of the modifications needed on special-ops aircraft. To rectify the shortcoming, Dailey requested and received a team of civilian contractors to install M-134 miniguns, GPS and personnel-locating systems on the aircraft. The contractors worked around the clock, living and eating in the hangar, and completed the job in record time. Later, during combat operations, the modifications to the aircraft proved to be invaluable.

Development of the logistics support structure. Although TF 3-160 was considered to be an echelon-above-corps, or EAC, organization, unit members knew that they were breaking new doctrinal ground with regard to logistics support. Army SOF aviation had never operated in a similar theater of operations, and improvisation and liaison would be key tenets of TF 3-160's logistics efforts.

CENTCOM's Army Special Operations Support Command, or SOSC, was not as mature as other theater SOSCs. It had yet to establish a responsive supply pipeline for SOF-peculiar aircraft parts, and

U.S. Army photo

During the latter stages of Desert Storm, TF 3-160's focus shifted to performing infiltrations of SF teams.

U.S. Army photo

Night Stalkers of TF 3-160 fly over burning oil fields in Kuwait during Operation Desert Storm.

through EAC channels, even Army-common repair parts were slow to reach TF 3-160's forward location. The unit had to find a better way.

To expedite the supply process, TF 3-160 placed a liaison officer, CW3 Milt Weber, with the 8th Battalion, 101st Airborne Division, at KFIA. The 8th Battalion was the aviation-support battalion for the 101st's Aviation Brigade. Weber had recently been transferred from 8-101 to 3-160, and he still maintained a good personal relationship with the 8th Battalion's tech-supply people. The tech-supply NCO at KKMC called in orders to Weber, who filled out the parts requests, took delivery of the parts, and put the parts on the daily intra-theater C-130 to KKMC.

Acquiring SOF-peculiar parts was another story. The supply pipeline for those parts extended back to Fort Campbell and to Hunter Army Airfield. Parts from both locations were shipped sporadically, as strategic airlift could be found. The "Desert Express," a daily flight from Charleston, S.C., was supposed to provide the solution, but the Desert Express never seemed to be reliable. TF 3-160 learned to live with the situation, because there was no other solution.

Morale support. Recognizing that the deployment was an open-ended one, TF 3-160 sought to improve the day-to-day lives of its soldiers in order to reduce their boredom and to keep them focused. In reality, the excellent living conditions at KKMC were the best morale boost the commander could provide. Compared to other units, TF 3-160 was fortunate: The morale-support facilities included a weight room, satellite TV, VCRs on each floor of the dorms, ping-pong and pool tables, a fast-food snack bar, R&R trips to Riyadh, and a free commercial telephone (five-minute limit/week).

At least half of the 3rd Battalion remained at Hunter Army Airfield, supporting TF 3-160 and responding to stateside mission taskings. Company B continued to train aggressively in the U.S. In January 1991, Company B's commander, Major

Bridges, deployed to KKMC with two additional Chinooks. Once at KKMC, he assumed of the Chinooks in TF 3-160 from Major Carmody.

Desert Storm

As the likelihood of combat operations increased, the coalition forces shifted their focus from defense to offense, and so did TF 3-160.

The S2, Lieutenant Kelly Thomas, compiled one of the best tactical-intelligence maps in the country. The map became legendary: Aircrews from all over the theater stopped in to update their maps. They were never turned away.

TF 3-160th's aviators plotted "spider routes" that would allow them to circumnavigate known enemy locations in Iraq. These routes also provided an overview of expected routing for CSAR aircraft that was useful both to controllers of the airborne warning and control system and to airspace-deconfliction planners. The spider routes were also used for the infiltration of SF teams, and each SF mission had an entry on the theater air-tasking order. Always cautious about entering and exiting friendly lines, TF 3-160 double- and triple-checked its airspace deconfliction measures and, at one point, even sent a liaison officer to the VII Corps' Army aviation command-and-control cell.

Although SOCCENT had promised to alert units 72 hours prior to the commencement of coalition-initiated hostilities, TF 3-160 was notified only 12 hours in advance. At the beginning of the air war, the unit's primary mission was CSAR. TF 3-160 was to operate from a small commercial airfield at Rafha, just south of the Iraqi border in north-central Saudi Arabia. From that location, its helicopters, without refueling, could cover a radius that included most of southern Iraq, as far as Baghdad.

To ensure that his "left hook" flanking movement wasn't telegraphed to the Iraqis, General Norman Schwartzkopf forbade coalition units from occupying any terrain west of the wadi running through Hafr-al Batin, just north of KKMC. However, to accommodate the CSAR mission, General Schwartzkopf approved TF 3-160's pre-positioning to Rafha just prior to the commencement of hostilities. The unit had been ready to go for months, and despite short notice, the entire CSAR package moved out quickly and arrived in Rafha by 2 a.m. Jan. 17, 1991, just before coalition jets penetrated Iraqi airspace.

The movement to Rafha was not uneventful. One of TF 3-160's Chinooks reported the launching of a surface-to-air missile. And while executing an evasive maneuver, the helicopter struck the ground, shearing off its left-front and right-rear landing gear. When the Chinook arrived at Rafha, maintenance crews worked feverishly to place mattresses and tires under the fuselage in an attempt to keep the aircraft upright during shutdown. That proved to be the night's only excitement.

When it became evident that the Iraqi air defenses were not going to produce the "silk skies" that Sadaam Hussein had predicted, TF 3-160 pulled its CSAR assets back to KKMC and positioned small CSAR detachments in several forward operating locations. Each detachment consisted of two aircraft and their aircrews, communications personnel, an intel analyst, operations and maintenance personnel, and a fuel truck. The detachments' operational intelligence picture was continually updated from KKMC.

During the air war, TF 3-160 won the distinction of having performed the first-ever NVG-aided rescue of a downed pilot. Two of TF 3-160's MH-60s, flown by CW3 Tom Montgomery and CW2 Todd Thelin, recovered a pilot who had ejected from a damaged F-16.

As the war continued, TF 3-160's focus shifted toward the infiltration of SF teams. The teams' intelligence reporting on the main lines of communication and on the road networks in southern Iraq was critical to coalition efforts. Planning for the infil missions was intense, as the aircrews and the SF teams "what if-ed" every contingency.

TF 3-160 successfully accomplished every infil mission. A few of the SF teams found the rock-solid terrain too hard for digging hide-sites, and they were forced to

call for immediate exfil. Other teams were compromised by local bedouins and called for emergency extraction. On each occasion, TF 3-160 was poised and ready. In one of the more renowned missions, CW3 Randy Stephens and CW4 Jim Crissafulli executed a daring, single-ship, daylight rescue of a team that was about to be overrun by the enemy. Dashing in with its miniguns buzzing, the Blackhawk climbed over a set of power lines and landed directly on top of the team, snatching them away to safety.

Throughout the six-week war, TF 3-160 conducted 57 combat missions. The unit took pride in its record of responding to every mission request. It is a tribute to the professionalism and to the good fortune of TF 3-160 that not a single SF soldier or member of TF 3-160 was captured or killed by the enemy. Bringing everyone home was the unit's proudest accomplishment.

Looking back

The successes of the 3rd Battalion, 160th SOAR, during the 21 months from its activation in June 1989 through its return from Desert Storm in April 1991 were nothing short of monumental. The battalion's many accomplishments were the culmination of extraordinary efforts not only by the members of the 3rd Battalion, but also by those who played critical roles in the fielding of the battalion. Included among those were the NCOs and the officers throughout the Army who provided expertise in personnel management, aviation training and logistics, and force structure. They worked in obscure offices and in places such as Department of the Army headquarters, Total Army Personnel Command, U.S. Army Special Operations Command, U.S. Special Operations Command, XVIII Airborne Corps, and 24th Infantry Division. Without their diligence and assistance, the void in aviation support for white SOF would not have been filled, certainly not before Desert Storm.

The author is proud to have been a member of the 3rd Battalion and to have served alongside the great Americans of the SF community. Today, the 3rd Battalion continues to build upon its earlier successes, providing worldwide aviation support to Army Special Forces, Army Rangers and Navy SEALs.

Lieutenant Colonel Andy Milani was the operations officer in the 129th SOAC and served as both the executive officer and HHC commander for TF 3-160 during Desert Shield and Desert Storm. He has served in various command and staff positions in the 160th, including commander of 2-160.

The Impact of Forward-Based Special-Operations Aviation

by Major Walter Rugen

Army special-operations aviation, or ARSOA, can provide regional commanders in chief, or CINCs, with a capability that is responsive, flexible and critical to the success of the CINC's theater-engagement strategies.

But because of the distances involved, it has been difficult or impossible for ARSOA to support the CINCs from bases within the continental United States. Seven years ago, in an effort to overcome that difficulty, the Army began testing the concept of forward-basing.

In July 1994, Company D of the 160th Special Operations Aviation Regiment was created at Howard Air Force Base, Panama, from the 617th Special Operations Aviation Detachment. Company D's mission was to provide our nation's most elite ground and maritime special-operations forces with a capability to perform direct action, special reconnaissance, foreign internal defense, and collateral missions.

Although Company D moved to Naval Station Roosevelt Roads in Puerto Rico in 1999, its mission did not change. As the ARSOA component for the CINC of U.S. Southern Command, or SOUTHCOM, D/160 must be prepared to deploy anywhere within SOUTHCOM's area of responsibility, or AOR, on a no-notice basis. Once deployed, the unit is placed under the operational control of the commanding general of Special Operations Command South, who is also based at Roosevelt Roads.

Composed of five MH-60L Blackhawks, 64 soldiers and 25 civilians, D/160 is task-organized as though it were a small battalion. The company has four platoons: headquarters platoon, airborne platoon, aviation-maintenance platoon, and flight platoon.

The headquarters platoon consists of the commander and first sergeant, the flight-operations section, the communications section and the personnel who staff the S1, S2 and S4 sections. The airborne platoon provides an aerial-delivery capability and motor pool services.

The aviation-maintenance platoon provides unit-level maintenance for the company and manages a civilian contract team that provides intermediate and limited depot-level maintenance. This platoon also provides training on aviation life-support equipment and maintains that equipment. It is also responsible for the re-supply of helicopter repair parts throughout Central and South America. The headquarters, airborne and aviation-maintenance platoons support the flight platoon, which provides the five MH-60L Blackhawks and the trained crews that D/160 must have to conduct its mission.

Forward-basing of D/160 offers several advantages. First, D/160 is based with the units that it is designed to support. Second, whether training at Roosevelt Roads or deploying during joint and combined

exchange training, counterdrug operations or other missions directed by SOCSOUTH, the aviation and ground SOF units form a joint combined-arms team that offers the CINC a capability that is second to none. Third, aggressive training and rehearsals with other SOF units have firmly established D/160's joint tactics, techniques and procedures.

But one of the most important advantages of forward-basing D/160 is that its members have become better able to communicate with the populations of the countries in which the company is operating. D/160's aggressive language-training program requires all soldiers to attend some level of instruction in Spanish. Spanish instruction may range from courses at the Defense Language Institute at Monterey, Calif., to immersion in countries such as Costa Rica and Ecuador. Knowing the language, customs and cultures of allied forces in the AOR enables D/160th personnel to better integrate with the populace during training scenarios and during real-world missions.

Another advantage to forward-basing is that the commander of SOCSOUTH can deploy the company, with the CINC's approval, on humanitarian-relief operations and on search-and-rescue, or SAR, missions within the AOR. During the past seven years, D/160 has demonstrated this benefit of forward-basing in a number of missions.

During 1997 and 1998, D/160 conducted two SAR missions involving Costa Rican citizens — one lost in the jungle and one lost at sea. In both instances, D/160 helicopters lifted off within three hours after notification and assisted with the successful recoveries of the victims.

During humanitarian-relief operations for Hurricane Jorges, D/160 personnel deployed from Panama to the Dominican Republic within three hours after notification, and they were conducting on-site relief operations within 36 hours after notification. During Hurricane Mitch, two MH-60Ls deployed within three hours after notification and conducted relief coordination in Honduras the same day. Days later, the helicopters were still flying relief missions in El Salvador and Guatemala.

In July 1999, D/160 received notification to deploy from its base in Puerto Rico with ground troops to recover a U.S. Army airborne-reconnaissance-low aircraft that had

U.S. Army photo

As the ARSOA component of USSOUTHCOM, Company D of the 160th SOAR is part of a joint combined-arms team.

U.S. Army photo

An MH-60L helicopter from D/160 lands with a load of bottled water that will be distributed to victims of floods in Venezuela.

crashed into a mountainside in southern Colombia while on a counternarcotics mission. Even though the crash site was in extremely rugged terrain, the mission was critical. Alerted during the night, D/160 aircrews crossed the Caribbean in darkness and flew through the Andes mountains the following day. The company successfully recovered and evacuated the bodies of their fellow Army aviators.

Later in 1999, the company deployed as part of Operation Fundamental Response to help victims of Venezuelan mudslides. Within 18 hours after notification, personnel of D/160 landed in Maiquetia, Venezuela, where they were met by the Venezuelan president, whose first question was, "Do you speak Spanish?" Once the mission's flight leader had conversed with the president in Spanish, D/160 personnel went on to conduct both SAR and humanitarian-relief operations.

The Venezuelan mission speaks volumes about the impact of forward-basing: D/160 personnel proved responsive; they possessed the equipment and training necessary for success; they integrated seamlessly with the supported ground forces; and they communicated and operated with the people of the host nation.

The concept of forward-basing ARSOA assets appears to have proven its value. Recently, Company E, 160th Special Operations Aviation Regiment, was established in the Republic of Korea. With the emergence of E/160, there are now two ARSOA units forward-based in theater, and as ARSOA soldiers and their aircraft continue to spread throughout the globe, the forward-basing concept will continue to have a major impact in the regional-engagement strategies of the theater CINCs.

Major Walter Rugen is commander of Company D, 160th Special Operations Aviation Regiment, which is located at Naval Station Roosevelt Roads, Puerto Rico. Since his assignment to the 160th SOAR in December 1999, Major Rugen has served in a variety of assignments within the regiment.

Company E: The 160th SOAR's Newest Forward-Based Unit

by Captain Holly Turner

At any given time, Night Stalkers of the 160th Special Operations Aviation Regiment, or SOAR, can be found all over the world, and now they can be found permanently stationed in the Republic of Korea, or ROK. Company E of the 160th SOAR moved to Taegu, Korea, during the summer of 2001, marking the beginning of Army special-operations aviation, or ARSOA, support in the ROK.

In June 2000, Company E, 160th Aviation Battalion, 101st Airborne Division, which had originally been constituted in April 1982, was officially reactivated as Company E, 160th SOAR. Company E then spent a year preparing to move its approximately 100 soldiers, 50 civilians and a company of MH-47E Chinook helicopters to Taegu.

U.S. Army photo

The MH-47Es of Company E, 160th SOAR, will increase the airlift capabilities of SOF units in the Pacific theater.

Any unit move is an intricate process, but when a unit is moving overseas, the complexity increases tenfold. Necessary activities for Company E's move ranged from constructing aircraft hangars to establishing computer-network connectivity to renovating barracks to issuing permanent-change-of-station orders. The regiment and Company E spent months planning and coordinating the move to ensure that when the soldiers of E/160 arrived in Korea, they would be prepared for success.

"What impresses me most is how hard the Echo Company soldiers have worked to accomplish this mission," said Major Curt Feistner, Company E commander. "When something needs to be done, they take care of it before I can even ask. They have really become a team, and we're looking forward to seeing all the results of their hard work." Sergeant First Class Lance Peeler, E/160's maintenance platoon sergeant, agrees, "If it wasn't for the persistence and the experience of the guys in Echo Company, we wouldn't be where we are right now. They have done an excellent job."

Company E replaced the Air Force's 31st Special Operations Squadron as the unit responsible for providing special-operations airlift throughout the Pacific theater. The replacement of the Air Force's MH-53J helicopters with the Army's MH-47E helicopters will improve operational-readiness rates by increasing the airlift capabilities of SOF units in theater. With a limited expenditure of resources, the change will make theater SOF more efficient, more ready and more capable. The forward-basing of Company E also has other benefits: The company will have the opportunity to work closely with other SOF elements, and the increased U.S. presence will help strengthen the ROK-U.S. military alliance.

"Special-operations aviation units overseas benefit both the theater in which they are located and the regiment. The company will be able to establish a very strong habitual relationship with the units they support. The more they work together, the better prepared they will be to accomplish their mission if called upon," said Colonel Richard Bowman, the 160th SOAR commander. "From an operational perspective, having Echo Company in the Pacific theater is a huge benefit to the regiment. If the regiment is needed in Korea, Echo Company will not have to deploy to Korea; rather it will already be there, trained and ready to support the commander in chief," Bowman continued. "From a training perspective, the Pacific theater is very far from the regiment's continental United States locations. Hence, it is difficult and expensive for the supported units and [the 160th] to train together. Now that Echo Company is in Korea, many of the units that did not receive all the support we would have liked to give them in the past will now receive it."

One of Company E's soldiers, Staff Sergeant William Lott, stated that the soldiers are proud of what they have accomplished thus far. "At first, there was a lot of anxiety, with our trying to get all of the equipment together to load and ship on time, but now there's just a lot of anticipation. The soldiers are proud and can't wait to start the mission."

With Company D, 160th SOAR, forward-based in Puerto Rico and with Company E forward-based in the ROK, there are ARSOA assets in many of the theaters where the regiment recruits. Recruiting highly motivated, extremely competent soldiers continues to be a cornerstone of the regiment. Having Night Stalkers and their state-of-the-art equipment in locations such as Korea provides walking advertisements as to why conventional soldiers might wish to become Night Stalkers.

Forward-based companies also help the regiment retain highly-skilled soldiers. "This [company] will also allow us to rotate our enlisted soldiers between CONUS and OCONUS ARSOA units. Our enlisted soldiers can be assigned to one of our CONUS units for only four to six years before they become eligible for reassignment. Now our enlisted soldiers who receive specialized training can use that training in our OCONUS units upon reassignment," said Bowman.

U.S. Army photo

Crews of E Company, 160th SOAR, offload an MH-47E helicopter at their new home in Taegu, Korea.

The future of forward-basing ARSOA units is still undetermined. The regiment is currently working with the U.S. Army Special Operations Command to refine the ARSOA vision. The only constant in ARSOA is change; however, one thing that will never change is the regiment's mission to support war-fighting CINCs and joint task force commanders worldwide at a moment's notice.

Captain Holly Turner serves as the S5 and as the public affairs officer for the 160th Special Operations Aviation Regiment.

20 Years of Army Special-Operations Aviation Modernization

by Lieutenant Colonel Greg Stewart and Thorwald Eide

During the past 20 years, as the 160th Special Operations Aviation Regiment has evolved from a task force to a regiment, its aircraft and equipment have evolved as well.

The fleet of sophisticated aircraft that the 160th employs today in support of special-operations forces, or SOF, worldwide is a far cry from the aircraft and equipment that were used 20 years ago. The unit's early equipment was received on loan from the 101st Airborne Division, the Pennsylvania National Guard and the Mississippi National Guard. It consisted of standard Army aircraft that lacked any modifications unique to Army special-operations aviation, or ARSOA.

Ted Carlson/Fotodynamics ©2001

The AH-6 helicopters of the 160th SOAR reflect ARSOA's continuous efforts to improve its helicopters over the past 20 years.

Little Bird modernization

In 1980, 22 Vietnam-vintage OH-6A aircraft served as the light-assault platform for ARSOA. The aircraft received modifications, including infrared landing lights, digital heading indicators, radar altimeters, secure communications and upgraded avionics. As the 160th's mission needs changed, the OH-6A served as a light attack platform, as well. The addition of weapons, such as M-134 miniguns and 12-shot rocket pods, earned the OH-6A a new designation: AH-6C.

In 1981, Task Force 160 received 17 Hughes 500 commercial helicopters that had been rapidly militarized with modified for SOF missions with Robertson auxiliary fuel tanks, Omega navigation systems, radar altimeters and military avionics. After the upgrades, the aircraft were designated MH-6E. In 1985, the 160th received 12 more Hughes 500 commercial helicopters. These were militarized and outfitted with a lightweight navigational suite that provided Little Bird aircrews with a flight-management system and a highly accurate navigation system, and they were designated AH-6F. The AH-6F replaced the

AH-6C in the attack mission.

The 160th continued to modify its MH-6E and AH-6F helicopters and to increase the helicopters' capabilities by adding mission-equipment packages. The A/MH-6J used in the 160th SOAR today has significantly improved navigation and communication equipment; forward-looking infrared radar, or FLIR; the fast-rope insertion/extraction system, or FRIES; M-134 miniguns; GAU-19 .50-caliber machine guns; Hellfire missiles; and 2.75-inch rockets.

The A/MH-6M program, commonly referred to as the mission-enhanced Little Bird, or MELB, program, provides ongoing improvements to the Little Bird fleet. MELB, which will begin fielding helicopters in 2002, will replace the engine, the landing gear, the main rotor system and the tail rotor system. It will also add an integrated cockpit. MELB will increase the Little Bird's maximum gross weight from 3,950 pounds to 4,700 pounds.

Blackhawk modernization

In 1980, the UH-60A Blackhawk helicopter served as the assault platform for the newly formed TF 160. Unlike the OH-6A, the UH-60A Blackhawk, fielded in 1979, was a new aircraft, not only to TF 160 but also to the Army. TF 160 received 30 UH-60As from the 101st Airborne Division and promptly modified them by adding long-range navigation equipment, over-the-horizon communication systems, and a crude extended-range fuel system. The fuel system, consisting of six 140-gallon UH-1H auxiliary fuel bladders that were supported by three-quarter-inch marine-grade plywood, enabled the UH-60A to fly more than 800 nautical miles without refueling. Covering the aircraft's cockpit lights with tape solved the night-vision-goggle lighting problems, and installing FRIES in 1981 gave the aircraft even more capabilities.

In 1984, FLIR was installed on an Army Blackhawk for the first time. Installing FLIR required numerous avionics modifications that heightened the complexity of the aircraft and increased the pilot's workload. In 1985, to reduce the complexity, the Rockwell Collins Corporation initiated an integration effort, the Cockpit Management System, or CMS 80, that integrated the helicopter's communications and navigation systems. CMS 80 allows the pilot to manage the cockpit through a control-display unit. It greatly reduces the aircrew's workload and allows them to focus on what is taking place outside the cockpit. The 16 aircraft that received the integrated cockpit modification were designated MH-60A.

Ted Carlson/Fotodynamics ©2001

The addition of M-134 miniguns and other improvements make the MH-60K the first helicopter designed specifically for special-operations aviation.

Just prior to Operation Prime Chance in 1987, the 160th replaced the M-60D machine guns on the MH-60As with M-134 minigun systems and added two 185-gallon internal Robertson auxiliary fuel tanks. Two years later, the unit received UH-60L

helicopters that were then modified with the CMS 80 cockpit, global positioning system, color weather radar, FRIES, and an external rescue hoist. These helicopters were designated MH-60L.

That same year, the MH-60A helicopter, armed with .50-caliber machine guns, fixed-forward M-134 miniguns, and 2.75-inch rockets, became known as the defensive armed penetrator, or DAP. As a result of lessons learned in numerous combat operations during the past several years, the DAP has been significantly improved through the addition of other weapons, including a M-230 30 mm chain gun, Hellfire missiles, and air-to-air Stinger missiles.

Since 1991, the MH-60L has continued to evolve. The CMS 80 cockpit has been upgraded with new multifunction displays, an embedded global-positioning system and an inertial-navigation unit, advanced aircraft survivability equipment, a weapons-management system, and an aerial-refueling probe.

In 1994 the 160th began receiving the first aircraft designed specifically for special-operations aviation: the MH-60K Blackhawk. The MH-60K has a fully integrated glass cockpit with advanced sensors, aircraft survivability equipment, M-134 miniguns, FRIES, and two 185-gallon internal Robertson auxiliary fuel tanks. It is also equipped with an aerial refueling probe and a terrain-following/terrain-avoidance radar system that provides aircrews with a long-range infil/exfil capability during adverse weather conditions. Since 1995, the MH-60K's aircraft-survivability equipment and mission-equipment packages have received further modifications. The MH-60K is now considered to be the most survivable helicopter in a high-threat, air-defense environment.

Chinook modernization

During the past 20 years, the mission of the 160th's Chinooks has evolved from refueling operations to heavy combat-assault. In 1980, the 160th's forerunner, Task Force 158, received 12 CH-47C Chinook helicopters from the 101st Airborne Division. The primary mission of the Chinooks was to provide forward-area refueling operations in austere environments. Upon assignment to TF 158, the 12 aircraft received modifications that included radar altimeters (specifically added for safety during night-vision-goggle flights); long-range navigation and communication equipment; and four metal internal auxiliary fuel tanks (taken from M-49C two-and-one-half-ton fuel trucks).

In 1983, the 160th received 16 CH-47D aircraft, which had improved engines and on-board navigation equipment, to replace

During the past several years, the MH-47E has undergone a series of modifications that have made it the most capable heavy-assault helicopter in the world today.

Ted Carlson/Fotodynamics ©2001

the CH-47Cs. Immediately, the 160th modified one of the CH-47Ds, adding the CMS 80 cockpit, a fully coupled flight-control system, a weather radar system and a digital intercom system similar to that used on the B-1B bomber. The aircraft was redesignated the MH-47D.

Between 1984 and 1987, 11 more of the CH-47Ds became MH-47Ds, receiving modifications such as FLIR, M-134 miniguns, and an aerial refueling probe. The in-flight-refueling capability gives the MH-47D unlimited range.

In 1988, the 160th began efforts to develop a common cockpit-software architecture for the MH-47D and the MH-60L. In 1989 the architecture was achieved, and it was added to the MH-47Ds, along with an integrated global positioning system and three 800-gallon internal Robertson auxiliary fuel tanks. In the 12 years since 1989, the MH-47Ds have received numerous modifications, including CMS 80 cockpit upgrades, embedded global positioning system/inertial navigation units, advanced aircraft-survivability equipment, new engines, and rescue hoists.

In 1994, the 160th SOAR began receiving 26 highly modified MH-47E helicopters. These were CH-47C helicopters that had been re-manufactured and modified with a mission-equipment package and cockpit similar to those of the MH-60K. The MH-47Es were fielded with two full-motion, high-fidelity flight simulators. The following year, the MH-47Es were modified with the addition of M-134 miniguns, FRIES, and two 800-gallon Robertson auxiliary fuel tanks. During the past six years, the MH-47E has undergone modifications identical to those of the MH-60K, making the MH-47E the most capable heavy-assault helicopter in the world today.

The future

The goal of SOA modernization is twofold: to continue to build on the success of ongoing SOA programs; and to leverage all DoD modernization programs and emerging technologies. The SOA modernization master plan is to merge cockpit technologies, conduct sensor development and integration, and improve aircrew situational awareness. Our objective is to achieve an open-system, common-avionics architecture design that can be incorporated throughout the 160th SOAR aircraft fleet. Such a design would ensure the cost-effective and efficient inclusion of new technology, life-cycle upgradability, and hardware/software commonality. Evolution and change are natural processes, and they are essential if Army aviation and ARSOA are to remain relevant in providing support to the ground-force commander and to the war-fighting CINC. Night Stalkers don't quit!

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Helicopters in Combat: World War II

by Dr. C.H. Briscoe

Few Americans are aware that the world's helicopter industry was spawned during World War II. But in fewer than five years (December 1940-September 1945), Russian-émigré Igor Sikorsky designed and built three different models of helicopters — the R4 series, the R6-A and the R5-A. After the models had been built, they were tested, redesigned, tested for production, produced and retested. More than 300 of the three models were produced and delivered to United States and British forces for military operations.[1] The R4-B, R6-A and R5-A helicopters would perform combat medical evacuation, downed aircrew rescue, and ship-to-shore aircraft-parts delivery in Burma, the Philippine Islands, Saipan, Iwo Jima and Okinawa. The well-known Korean War helicopter, the Bell H-13, was also tested during World War II.[2]

Beginnings

Development of the helicopter actually began during the intense war preparations that flourished in the atmosphere of heated nationalism prevalent during the 1930s. Germany developed the first successful helicopter, the Focke-Wulf FW-61, in 1936. The FW-61 was a true helicopter with cyclic and collective pitch control, and it was capable of autorotation. In 1937, aviatrix Hanna Reitsch demonstrated the FW-61 inside Berlin's Deutschland-Halle sports arena.

In 1938, the U.S. Congress, attempting to fill the Field Artillery's need for a light observation aircraft, authorized $2 million for research and development of a rotary-wing aircraft. The Platt-LePage Aircraft Company won the bid with a modified FW-61 design. In 1939, when Congress authorized $300,000 for the development of an "Army two-seater service observation-trainer helicopter," Sikorsky, of Curtis-Vought, met the challenge. He and his team had tested, engineered, redesigned and produced the X-R4-model helicopter by mid-April 1942.[3]

On April 20, 1942, representatives of the U.S. Army, Coast Guard, Navy, and the British Royal Navy watched the X-R4 demonstration. With a passenger aboard, Sikorsky flew the X-R4 to 5,000 feet, demonstrated its helicopter attributes, and concluded the demonstration by rappelling from the hovering craft. His project engineer, Ralph P. Alex, using a rope ladder, then climbed aboard the X-R4.

On May 14, 1942, the X-R4 flew 761 miles to Wright Field, Ohio, making 16 stops for refueling en route. Because of strong headwinds, the longest leg of the trip (92 miles) took one hour and 50 minutes, but the U.S. Army had its first operational helicopter. A short time later, two prototype autogiros, the XR3 and the YO60, designed by Kellet aircraft, were quietly shelved.[4] Delivery of the first 15 Sikorsky R4-A helicopters to the Army began on July 3, 1943; 14 more R4-Bs

Courtesy USAJFKSWCS Archives and Fred M. Duncan collection

An R4-B lifts off from a floating aircraft repair ship in the Pacific in 1945.

followed for the Army, Navy, Coast Guard, and the Royal Navy and Royal Air Force. The number of R-4 series deliveries totaled 131.[5]

During a sleet storm on Jan. 3, 1944, a Coast Guard R4-A delivered blood plasma to Sandy Hook Hospital, N.J. The plasma would be used to treat 100 badly burned sailors from the destroyer *USS Turner*. In June 1944, the Coast Guard was operating R-4s off the deck of the *USCGC Cobb*.

In February 1944, six pilots and six mechanics from the U.S. Army Air Force, or USAAF, reported to the Sikorsky aircraft factory in Bridgeport, Conn., for a classified assignment. By then, more than 20 R4 helicopters had already been delivered to the Army. The 12 airmen were to form the cadre for the USAAF Helicopter Training School at Freeman Field, Seymour, Ill. By mid-summer, 30 helicopter pilots had graduated from the first two classes. The veil of secrecy shrouding the school would not be lifted until September 1944, when the 100th R4-B was delivered.[6] By then, six R4-B helicopters were operating in the China-Burma-India, or CBI, theater, and 24 others had been assigned to floating depot aircraft repair and maintenance ships slated for the Pacific.

CBI theater

Six R4-B helicopters (three USAAF and three USN) were assigned to the China-Burma-India theater to rescue downed aircrews flying the "Hump" (the Himalayan range between Burma and China), and to support Operation Thursday, the invasion of Burma by Major General Orde Wingate's Chindit brigades. However, only four of the R4-B helicopters survived the trip to India. In January 1944, those four joined Colonel Philip Cochran's 1st Air Commando in the Assam Hill region, which was 100 miles west of the India-Burma border.

In late April 1944, Lieutenant Carter Harmon flew the first combat helicopter medevac and rescue mission into Burma. An L-1 observation plane carrying three wounded Chindits had made a forced landing in Japanese-held territory. During the rescue attempt, Harmon had to surmount a 5,000-foot mountain range, and because

the helicopter's engine would overheat, it took Harmon three days to clear the mountains and to locate the stranded pilot and the Chindits. Then, because the Japanese had found the downed airplane in the meantime, Harmon was forced to change pick-up zones as he evacuated each person, one by one, to safer areas.

All told, helicopter pilots of the 1st Air Commando rescued 18 wounded Chindits in 23 combat sorties.[7] After the R6-A helicopters arrived in the CBI theater in June 1945, the pilots were credited with rescuing several downed pilots from elevations as high as 8,000 feet.[8]

Wartime helicopter developments

Using the feedback acquired from the pilots of the operational R4s, Sikorsky created an improved version, the R6-A, at the same time that he was designing the next generation model, the R5-A.[9] On March 1, 1943, he demonstrated the XR6-A to both the Army and the Navy at Washington National Airport. Seeing the helicopter with evacuation litters attached, the Surgeon General and his staff insisted on riding in them. Fortunately, there was a strong ground wind, and the substantially overloaded two-place helicopter was able to make a running takeoff.

General Henry H. "Hap" Arnold directed the procurement of 900 R6-A helicopters, provided that their production would not interfere with the priority production of the Vought F-4U Corsair for the U.S. Navy. Curtis-Vought's solution was to license production of the helicopters to Nash-Kelvinator, with Sikorsky engineers providing oversight.[10]

The first Nash-Kelvinator R6-A was delivered to the Army in October 1943. With production following the experimental program so closely, very little debugging had been done, especially on the few production models, and the military pilots nicknamed them "kelvicopters" and "refrigerotors." However, by September 1944, more than 200 R6-As had been delivered. Several went to the CBI theater, and more than 30 went to the Pacific for naval air-sea rescue and for the six floating aircraft repair and maintenance ships that were supporting the USAAF.[11]

Development experience

According to Sikorsky's Ralph Alex, the best research-and-development axioms

Lieutenant Robert W. Cowgill seated in an R4-B helicopter in the Philippines in 1945.

Courtesy USAJFKSWCS Archives and Fred M. Duncan collection

came from the development of the R6-A: design the experimental model for production; plan on simple tooling; build in 30-40 percent growth in rotors, transmission, drive system, and power plant; apply "zero margin" in design areas only when they can be modified readily — never in any critical components and structures; micro-supervise the redesign for production to ensure that lessons learned from experience are not ignored.

The opinion of the users was different: Rapid fielding of the R-4s incorporated the newest developments; and the R6-A proved to be a maintenance nightmare. Sikorsky engineers produced their second-generation helicopter, the R5-A, in less than three years, in time to field 65 (including prototypes) to the U.S. and British military before V-J Day on Sept. 2, 1945.[12]

The R4-B, R6-A, and the R5-A helicopters test-dropped bombs on ground targets and on ships, and they dropped depth charges in the ocean. All three helicopters could operate on land, from aboard ship, and (with floats installed) off water. Sikorsky demonstrated helicopter rappelling (deplaning via rope ladder). But attempts to extend the range of the R-6A and R5-A helicopters by towing them with cargo aircraft proved to be dangerous, inefficient and aerodynamically unsound. The helicopter's maximum speed in autorotation was just above the stall speed of the towing aircraft.[13]

Floaters

By 1945, the R4-B and R6-A helicopters were integral to the USAAF floating repair depots, specially-converted *Liberty* ships that were operating in the Pacific under the code-name Project Ivory Soap.[14] The offensive campaign in the Pacific, linked to "island hopping," was designed to strategically project America's land-based heavy-bomber power from captured enemy airfields. These airfields provided more flexibility to naval carrier-based medium and attack aircraft and allowed them to extend their air-threat ranges.

The key to ensuring that adequate maintenance and repair facilities would be readily available to support USAAF aircraft (ranging from B-29 bombers to P-51 fighter planes) was mobility. The Air Technical Service Command, or ATSC, had used modified U.S. Navy landing ship, tanks, or LSTs, as offshore aircraft-repair facilities in the Mediterranean, but in the Pacific, where LSTs were more in demand, ATSC sought lower-priority *Liberty* ships that could be converted for the same purpose.

The ATSC modified six *Liberty* ships in six months in Mobile, Ala.; procured repair machinery and tools; installed the shops needed for aircraft repair — welding, electro-plating, instrument repair, electrical, and paint-dope-and-fabric. These floating depot aircraft repair and maintenance ships were dubbed "floaters" by the Navy.

Rough seas often hampered delivery boats and barges that operated between the repair ships and the island airstrips. But each floater carried aircraft-repair units, or ARUs, consisting of four R4-B helicopters that could ferry vital airplane parts and personnel to the air bases ashore.[15]

The standard 72- by 40-foot helicopter flight deck on the floaters could accommodate four helicopters. According to Lieutenant Louis A. Carle, "It was close quarters sometimes, especially when the helicopters' rotors were running, but that made it interesting."[16] A wartime article said the floater concept exemplified "American ingenuity speeding victory over Japan."[17]

The most demanding mission for the floater helicopter pilots came on June 16, 1945, when Carle, assigned to the 5th ARU aboard the U.S. Army vessel *Clinton W. Russell* in Manila Harbor, was called to evacuate two serious "brain cases" from the 38th Infantry Division combat zone to a field hospital. The pickup point, marked by an "X" on the map, was about 35 miles east of Manila, south of Mount Domire, and in rough terrain. Reaching the "X"-marked spot, Carle saw rough, jungle-covered, steep mountains below, and then he discovered that he was in the midst of a dive-bombing attack by P-47 fighters. Escaping in the nick of time, Carle spotted several U.S. soldiers on the knob of a burned-off hill, and having no better ideas, he landed to ask for directions.

Directed two miles southward to a small beach in a river bend, Carle located a patrol surrounding a man on a stretcher. Unable to carry a stretcher in the helicopter, Carle removed a seat so that he could place the man on the floor. Fortunately, the wounded Lieutenant De la Cruz was short and thin. Carle rested the lieutenant's bullet-shattered hips on the seat cushions, fit his feet between the rudder pedals, and braced his shoulders against the firewall. Then Carle used two belts to tie De la Cruz down. All that remained was clearing the 85-foot trees in the jungle that surrounded the site on three sides. In Carle's words:

With no ground wind to assist, I revved the engine to full throttle using 7 1/2 degrees of rotor pitch. This gave me 2,600 engine rpm and brought the wheels light on the ground. A sharp advance to 12 degrees of pitch "jumped" me into the air. As the wheels left the ground, I pushed forward on the azimuth control and started forward. I held the ship close to the ground until we were less than 100 feet from the trees ahead and had gained nearly 30 mph. Then I pulled back on the azimuth stick and used the airspeed to zoom almost vertically over the trees. The airspeed dropped to near zero, but enough altitude had been gained to allow me to drop slightly and gain back flight speed.[18]

Thirty minutes later, De la Cruz was delivered to the 311th General Hospital, and a sweat-soaked Carle flew back to his floater.[19]

The next day, Lieutenants Robert W. "Binney" Cowgill and Harold Greene, flying the only R6-A in theater, joined Carle to air-evacuate wounded soldiers from the combat zone. Cowgill evacuated three "walking wounded" from the 112th Cavalry. The Army helicopter mechanics built a stretcher carrier onto Carle's R4-B. "I ended up being the first guy to haul [a patient] on the outside," Carle said. "It scared the poor guy to death. I'd have been scared to death, too, if I had been out there!" In five days Carle would evacuate 17 wounded soldiers and would fly for 25 hours. On his longest day, Carle performed six medevacs that required seven hours to complete. Carle later claimed that he learned more about helicopter flying during those 25 hours than he had ever learned before.[20]

Carle and Cowgill evacuated nearly 30 of the 70 wounded personnel who were helicoptered from Philippine combat zones to field hospitals in June 1945.[21] Both men crashed their helicopters. Because Carle's R4-B was beyond repair, soldiers fired four rockets into the engine and set it afire. Carle then walked out of the jungle with an infantry patrol. While walking at the head of the patrol, Carle had to jerk his .45 automatic out and "fire like a cowboy" to kill a Japanese infantryman who had suddenly appeared.

Two days after his return, the injured Carle left the hospital to fly a new battery to Cowgill, who was stranded on a knife-edged ridge. Several pilots who had flown over the ridge warned that it was an impossible site for a landing. Carle replied, "If Binney says that it can be landed on, he knows it can be. If he can't fly that thing out of there, I'll at least pick him up and bring him back." Upon landing at the site and seeing that Cowgill's tail rotor was broken off, Carle doubted whether Cowgill's helicopter was flyable. Yet "Binney flew that helicopter back to the ship without a tail rotor! Now, that was mechanically and physically impossible, but Cowgill did it!" said Carle. When Cowgill and Carle relocated with the 5th ARU to Okinawa, the 6th ARU assumed the medevac mission, with litters attached to its R6-A helicopters. Considering the limitations of the aircraft and the high altitudes involved, it is remarkable that these rescues were performed at all. The skill and the bravery of the pilots were the key ingredients in the successful operations.[22]

Army helicopter training

One of the most noteworthy accomplishments of the Army's helicopter school was its relocation from Chanute Field, in Champaign, Ill., to Sheppard Field, in Wichita Falls, Texas, in May 1945. With no provisions to rail-load 14 R4-B and three R6-A helicopters, school maintenance crews prepared the air squadron for a record-breaking, cross-country flight of 800

Courtesy USAJFKSWCS Archives and Fred M. Duncan collection

An R6-A helicopter with a medevac litter attached lands in the Philippines in 1945.

miles. Of the 17 helicopters, 16 arrived safely at Sheppard Field. One of the R6-A refrigerotors was forced down because of a bad (factory-installed) fuel line. Quite amazingly, there were no serious flight-training accidents or flight-connected injuries at the helicopter training school. Despite its lack of power and the need for its pilots to "combine brute strength and finesse" in flying it, the R4-B proved to be a reliable aircraft.[23] The heavy rotors held their inertia well and allowed for easy autorotations. Considering that the R4-B and the R6-A were America's first and second production helicopters, the school's safety record was not only remarkable, it was a tribute to the dedicated mechanics who played helicopter maintenance by ear.[24]

With the war winding down, no replacement helicopter pilots or replacement mechanics were being sent to the six ARUs aboard ship in the Pacific. The pilot training program in the overseas theater followed the standards of the USAAF helicopter school with one notable exception — from the first hour of instruction, the overseas schools emphasized maximum helicopter performance. The axiom for all overseas student pilots was, "Learn exactly what your helicopter can do and how to make it do what you want it to do. Do not try to perform miracles or try to make your aircraft perform miracles. If birds can't do it, don't try to make your helicopter do it."[25]

Conclusions

Although the helicopter had proven its capability in combat, that aspect garnered little attention during the waning days of World War II. The helicopter's value in providing combat medical evacuation and access to restricted areas were sufficient to promote improvements in rotary-wing aircraft during the postwar years, but not until the Korean War did the helicopter come of age. The Korean War reinforced and validated the soundness of using helicopters to conduct military operations that extended beyond observation, medical evacuation and aircrew rescue.

Interestingly, the USAAF floating-shipboard, aircraft-repair-depot concept, developed for the Italian campaign and improved by using helicopters in the Pacific theater, would prove practical once again during the Vietnam War, when the *Corpus Christi* was anchored in Cam Ranh Bay. And in the mid-1980s, Army helicopters, flying from seagoing U.S. Navy barges, escorted American-flagged oil tankers through the Straits of Hormuz.

Orville Wright was reticent to acknowledge the great possibilities offered by the helicopter in 1942, based on Wilbur's position published in the Jan. 15, 1909 *Dayton Tribune*:

Like all novices, we began with the helicopter (in childhood) but soon saw that it had no future and dropped it. The helicopter does with great labor only what the balloon does without labor, but is no more fitted than the balloon for rapid horizontal flight. If its engine stops, it must fall with deadly violence, for it can neither float like the balloon nor glide like the aeroplane. The helicopter is much easier to design than the aeroplane, but it is worthless when done.[26]

But the daring exploits of the World War II helicopter pilots demonstrated that Igor Sikorsky did truly launch a new era in aviation, the Helicopter Age.

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Notes:

[1] The U.S. Army Air Force stopped taking delivery of R-5s and R-6s after V-J Day. Aircraft record cards courtesy of Roger D. Connor, National Air and Space Museum; Ralph P. Alex, "How Are You Fixed for Blades? The Saga of the Helicopter, Circa 1940-60," in Walter J. Boyne and Donald S. Lopez, eds. *Vertical Flight: The Age of the Helicopter* (Washington, D.C.: Smithsonian Institution Press, 1984), 29.

[2] Giorgio Apostolo. *The Illustrated Encyclopedia of Helicopters* (New York: Bonanza Books, 1984), 65, 67, 68, 78.

[3] Alex, 18-20; William J. Crawford III, "The Power to Lift Straight Up," in *Vertical Flight*, 118; Apostolo, 79; Edgar F. Raines Jr., *Eyes of the Artillery: The Origins of Modern U.S. Army Aviation in World War II, Army Historical Series* (Washington, D.C.: Center of Military History, 2000), 22, 42, 116, 120; and Master Sergeant Thomas M. Lang, "The Army Aviation Story, Part IV," *United States Army Aviation Digest* 8:9 (September 1962): 30-31.

[4] According to Roger D. Connor of the NASM, Platt-LePage did manufacture the XR-1, a true helicopter, but Sikorsky's success relegated the XR-1 to the also-ran category. Alex, 21-22.

[5] Alex, 22; and aircraft record cards courtesy of Roger D. Connor, NASM.

[6] Dot Fuller, "Forming the AAF Helicopter School 1944-1945," *WW II U.S. Army Helicopter Pioneers* (undated).

[7] Harmon was later killed in an R5-A flight test in which a C-47 was towing his helicopter to determine if the range could be extended. Accidentally released by the C-47, the tow cable snapped into the helicopter's main rotor, causing the R5-A to crash. Alex, 26, 30; Herbert A. Mason Jr., Staff Sergeant Randy G. Bergeron, and Technical Sergeant James A. Renfrow Jr., *Operation Thursday: Birth of the Air Commandos, The U.S. Army Air Forces in World War II Series* (Maxwell AFB, Ala.: Air Force History and Museums Program, 1994), 15, 17.

[8] Alex, 26, 30.

[9] Alex, 22.

[10] Alex, 24-26.

[11] Alex,26.

[12] Alex, 30-31, 42; William Hunt, " 'Heelicopter': Pioneering with Igor Sikorsky"; pilot interviews and records of HQ, USAAF; Roger D. Connor, NASM.

[13] Alex, 30-31; Roger D. Connor, NASM.

[14] This lifesaving mission was performed by Lieutenant Commander Frank Erickson, one of the U.S. Coast Guard's first helicopter pilots and that service's leading proponent of the aircraft. Alan W. Dowd, "Unsung Heroes {Korean War}," *Retired Officer*, LVII:6 (August 2001), 65.

[15] Alex, 30-31; *Operation Thursday*, 15, 37; unknown author and source, "Repairing Planes at Sea"; and Fred M. Duncan interview with Dr. C.H. Briscoe, 30 May 2001.

[16] Fred M. Duncan interview with Louis A. Carle, 29 November 2000.

[17] "Repairing Planes at Sea."

[18] Lieutenant Louis A. Carle, "I Flew Them in Combat," *American Helicopter* (January 1947): 10.

[19] Carle, "I Flew Them in Combat," 42.

[20] Carle, "I Flew Them in Combat," 42; and Fred M. Duncan interview with Louis A. Carle, 29 November 2000.

[21] Dr. C.H. Briscoe interview with Fred M. Duncan, 13 June 2001.

[22] Fred M. Duncan interview with Roger D. Connor, NASM, 16 August 2001.

[23] Fuller.

[24] Fuller; and Roger D. Connor, NASM.

[25] Carle, "I Flew Them in Combat," 43.

[26] Alex, 22.

Helicopters in Combat: Korea

by Dr. Kenn Finlayson

Initially introduced during the Second World War, helicopters reappeared in significant numbers during the Korean War. Used predominantly in a support role, helicopters provided logistics resupply to ground units and made a major contribution in an air-ambulance role, evacuating wounded soldiers from the battlefield. Whether performing reconnaissance, transporting troops or rescuing downed pilots, helicopters proved to be a flexible and efficient asset to ground commanders.

The nature of the Korean War led to the increasing use of helicopters to move personnel and supplies. The primitive state of the Korean road network caused significant transportation difficulties. The scarcity of hard-surface roads, the lack of lateral links between the few main highways, and the harsh climate often made it extremely difficult to transport supplies to forward units.

United States Army helicopters (specifically the Bell H-13D model) were first used in Korea during the winter of 1950/51, at Ascom City.[1] The 2nd Helicopter Detachment, a medical-evacuation asset under the operational control of the Eighth Army Surgeon, arrived at Kimpo Airfield in January 1951.[2] The 2nd Helicopter Detachment, organized from assets of the 82nd Airborne Division, had been activated at Fort Bragg in October 1950 and had trained there prior to its deployment to Korea.

The 2nd Detachment shipped its H-13C models from San Francisco to Korea but never saw them again. To remedy the loss, the Army airlifted eight H-13Ds to Korea directly from the Bell factory in Niagara Falls, N.Y. However, mishandling of the helicopters at the airfield in Korea damaged those helicopters, and the 2nd Detachment was able to salvage only four airworthy craft from the shipment.[3]

Army Center of Military History

A U.S. Marine helicopter conducts aerial resupply during the Korean War.

Originally assigned to the 8055th Mobile Army Surgical Hospital, or MASH, the 2nd began flying missions in Korea on Jan. 10, 1951, during the evacuation of Seoul. The unit was later reassigned to the 8076th MASH and subsequently found a permanent home with the 8063rd MASH, which supported the IX Corps.[4] Eventually, the 3rd and 4th helicopter detachments came on line and provided air-evacuation support to United Nations' forces throughout the war.

Rapid evacuation of seriously wounded soldiers directly from the front lines to the appropriate level of the medical-evacuation chain significantly enhanced the sur-

During the Korean War, Paul T. Berg stands in front of an H-13 helicopter belonging to the 54th Air Ambulance. Note the covered stretcher on the helicopter skid.

Photo courtesy of Paul T. Berg

vivability of soldiers. The fatality rate for seriously wounded soldiers, which had stood at 4.5 percent during World War II, fell to 2.5 percent during the Korean War.[5] Medevac pilots evacuated more than 20,000 casualties of all nationalities during the Korean War.[6] 1st Lieutenant Joseph Bowler of the 2nd Helicopter Detachment evacuated 824 casualties between Jan. 10 and Nov. 2, 1951.[7]

For medical-evacuation missions, the helicopter detachments flew the H-13D and the Hiller H-23B, both of which were fitted with external pods. Casualties were originally placed in open litters for evacuation. Detachment personnel modified the litters into pods to provide casualties a closed, protected environment. Eventually, the pods were outfitted to allow casualties to receive transfusions while in flight.[8]

The use of helicopters fundamentally changed the Army's medical-evacuation doctrine. The initial success of the air-evacuation system in Korea led to further refinements in medical and aviation doctrine during the Vietnam War and on into the present day.

In addition to the role they played in medical evacuations, helicopters also played a role in logistics support. The Army formed two cargo helicopter companies to assist in the transport of supplies. Arriving in theater during the latter stages of the war, the 6th Transportation Company and later the 13th Transportation Company used their helicopters to ferry supplies to fighting battalions.

The 6th Transportation Company, having trained at Fort Bragg in November 1952, deployed with 20 Sikorsky H-19 helicopters from Japan to Korea between Feb. 11 and March 24, 1953. The 6th's first mission was to resupply units of the 3rd Infantry Division that had been cut off by a flood on the Imjin River. The 6th delivered the supplies and evacuated more than 200 troops.[9] The 13th Transportation Company, the only other helicopter transportation unit deployed during the war, soon followed the 6th to Korea. Together, the two transportation companies combined with the division and corps aviation sections to perform a wide variety of support missions.

Helicopters proved particularly useful in resupplying ammunition to combat units in the mountainous terrain. The helicopter pilots of the 3rd Infantry Division's aviation section flew numerous missions in support of the Marines trapped at the Chosin Reservoir. The helicopters were used for carrying ammunition, plasma and spare parts, and for evacuating the wounded.[10] H-19 helicopters were used for pulling cables across rivers so that engineers could begin the construction of bridges.[11] In one instance, the finance officer for the 24th Infantry Division

used an available helicopter to deliver the division's payroll.[12]

During the last major offensive of the war, General Maxwell Taylor, commander of the Eighth Army, stated that he could not have maintained the right flank of the advance without the support of the aviation elements under his control.[13]

Although the principal missions for helicopters during the Korean War were medical-evacuation and logistics support, helicopters performed other jobs. Reconnaissance proved to a mission ideally suited for helicopters, and they ranged widely over the battlefield gathering intelligence. They proved so efficient, in fact, that General Matthew B. Ridgway wrote a letter to Army Chief of Staff J. Lawton Collins requesting additional helicopters to be used for reconnaissance.[14]

Unit commanders also found that helicopters were ideal for observation and that they were more effective than light aircraft for delivering commanders to critical points on the battlefield. During the Battle of the Changjin Reservoir, Major General Edward M. Almond used a helicopter to reach the battle positions of the 3-31st Infantry in order to assess the situation firsthand and to distribute medals to members of the hard-pressed unit.[15] Presaging the use of helicopters in Vietnam, Lieutenant General Ruben E. Jenkins, the IX Corps commander, maintained an aerial command post from which he could observe the 9th ROK Division in action.[16]

The Army was not the only service to use helicopters during the Korean War: Both the Marine Corps and the Air Force employed helicopters extensively in their operations. The Marines moved troops in company- and battalion-sized airlifts and resupplied their units using the Sikorsky H-24.[17] The Air Force's concern with the rescue of downed pilots led Colonel Dick Kight to employ helicopters in the Air Rescue Service, which was the predecessor of modern-day pararescue jumpers.[18]

Helicopters proved to be a viable asset in virtually every facet of the Korean War, except pure combat. Despite the limited capabilities of their equipment, the helicopter pilots of the Korean War established procedures and doctrines that laid the foundation of the modern Army aviation community.

Dr. Kenn Finlayson is the historian for the JFK Special Warfare Center and School.

Notes:

[1] Thomas L. Lang, "The Army Aviation Story, Part IV: Rotary Wing Aircraft." *U.S. Army Aviation Digest* 8, no. 9 (1962):29.

[2] Joseph W. Hely, personal materials provided to the author, 22 June 2001.

[3] *Ibid*.

[4] *Ibid*.

[5] Billy C. Mossman, *Ebb and Flow: November 1950 – July 1951, The United States Army in the Korean War* (Washington, D.C.: The Center of Military History, 1990), 33.

[6] William E. Vance, "History of Army Aviation," *U.S. Army Aviation Digest* 3, no. 6 (1957):18.

[7] Hely, material supplied to the author, 22 June 2001.

[8] Hely, material supplied to the author, 22 June 2001.

[9] Richard K. Tierney, "The Army Aviation Story, Part VII, Europe-Pacific-Korea," *U.S. Army Aviation Digest* 8 no. 12 (1962):37

[10] *Ibid*., 38.

[11] *Ibid*.

[12] John G. Westover, *Combat Support in Korea* (Washington, D.C.: The Center of Military History, 1987), 243.

[13] Tierney, "The Army Aviation Story, Part VII," 38.

[14] Mossman, 209.

[15] *Ibid*., 97.

[16] Tierney, "The Army Aviation Story, Part VII," 38.

[17] John Miller Jr., Owen J. Carroll and Margaret E. Tackley, *Korea: 1951-1953* (Washington, D.C.: The Center of Military History, 1982), 193.

[18] "General Dick Kight was the Father of Air Rescue," *Albuquerque Journal*, 24 June 2001, B5.

Enlisted Career Notes

Special Warfare

Soldiers in CMF 37 may request clearance waiver

Soldiers in CMF 37, psychological operations specialist, who do not meet the minimum requirements prescribed in DA PAM 611-21, *Military Occupational Classification and Structure*, para. 10-122, cannot be awarded the PSYOP military occupational specialty, or MOS, and are therefore ineligible for promotion or re-enlistment in the MOS. One of the requirements for holding the MOS is that the soldier must have been granted a secret security clearance. Typically, soldiers who do not already hold a secret security clearance can be placed into training provided that they have undergone a local records check and have been granted an interim clearance. However, orders awarding them the MOS cannot be issued until they have been granted a valid clearance. Given the significant backlog of background investigations, adjudication of security-clearance packets takes, on the average, 417 days. Because of the backlog, some CMF 37 soldiers are being held back professionally through no fault of their own. To request a waiver of the requirement for the secret clearance, soldiers should submit a DA Form 4187 through their chain of command. The commanding general of the JFK Special Warfare Center and School will be the adjudicating authority for all requests.

Administrative actions have career ramifications

Administrative personnel actions, whether they are voluntary or mandatory, have serious professional ramifications of which soldiers and their chain of command should be aware. Administrative actions include reclassification of a soldier's military occupational specialty, or MOS, and submission of a declination of continued service statement, or DCSS.

MOS reclassifications may be voluntary or mandatory. Voluntary reclassification includes a request to terminate Special Forces duty, and a request to terminate SF duty and airborne status. SF soldiers have, at any time, the option of declining service in an SF unit or in an airborne assignment. Soldiers elect to terminate SF duty (with or without airborne status) for a number of personal reasons. Once an SF soldier has notified his chain of command that he intends to terminate, the chain of command can give him a 72-hour cooling-down period before counseling him on the effect of such an action. If the soldier still wishes to terminate, he submits his termination request on DA Form 4187. Although DA Form 4187 must be forwarded to PERSCOM along with chain-of-command endorsements, the termination becomes effective as soon as the soldier signs the form. After termination of SF duty, the soldier returns to his previous MOS or to a logical equivalent of his former CMF 18 MOS. Selection of a soldier's new MOS and subsequent assignment are based on the needs of both the Army and the soldier's new branch. Once a soldier has terminated SF duty, he can be considered for return to SF only after he has served at least one year in a non-CMF 18 assignment, and then only if his request for termination clearly documented that family problems were the reason for his termination. The decision to allow a soldier to return to SF duty will be made by the SF/PYSOP Enlisted Branch.

Mandatory reclassification may be necessary because of the loss of a soldier's security clearance, the findings of a medical-review board, or misconduct on the part of the soldier. The first two reasons, security-clearance loss and medical-review-board findings, are self-explanatory. The third, soldier misconduct, must be processed by the soldier's chain of command. In cases of criminal, ethical or moral misconduct in which revocation of the soldier's SF Tab may be appropriate, the chain of command must first initiate action for the soldier's administrative elimination from the Army, in accordance with AR 635-200, chapter 14-12c. The Army scrutinizes all misconduct reclassifications to ascertain the nature of the misconduct. If the misconduct is not a basis for the soldier's elimination from the service, but the MOS reclassification is approved, the soldier may be reclassified into his former MOS or into a logical equivalent of his former CMF 18 MOS. In that case, revocation of the soldier's SF Tab can be processed after the soldier has been reclassified into a new MOS. If the soldier's MOS reclassification is not approved, the SF Tab may still be revoked, but the soldier will remain in CMF 18 without an SF Tab, and he will remain assigned to the processing SF unit until he has completed his normal tour of duty.

The last of the administrative actions is the DCSS. Only those soldiers who have not accepted voluntary indefinite status and who have fewer than 24 months of remaining service may decline continued service. The Declination of Continued Service Statement, DA Form 4991-R, is processed by a career counselor, in accordance with AR 601-280, chapters 4-12 c(1)-(4). DCSS action must be initiated within 30 days after the Enlisted Distribution and Assignments System transmittal date. The date the soldier receives notification, whether by PERSGRAM or by any other manner of notification, is not the start date for the 30-day window. The career counselor establishes a suspense date for action on DA Form 4991-R not later than 15 days after the soldier's PCS levy briefing. Submission of the DCSS places a soldier in an administrative nonfavorable status, which means that the soldier cannot re-enlist or extend and cannot be granted awards, schools, promotions or separation pay.

Because of continued personnel shortages, the SF/PYSOP Enlisted Branch has been granted authority to place selected soldiers who have not accepted indefinite status and who have less than 24 months remaining prior to ETS, on orders for critical assignments. SF tours with the Special Warfare Center and School and with the 96th Civil Affairs Battalion, as well as recruiter and drill-instructor duty, are considered critical assignments. Soldiers who consider declining continued service in order to avoid duty assignments should carefully weigh the consequences of their action prior to notifying a career counselor of their intent.

Foreign SOF

North Korean infiltration: A Japanese assessment

A recent article written by a Japanese military commentator addressed issues associated with possible war on the Korean peninsula. One issue of the commentary concerned the role of North Korean naval special-operations forces — under the Reconnaissance Bureau, or Chongch'al Kuk — and their potential for making covert landings in rear areas using North Korea's complement of surface and submarine vessels that are designated for that purpose. According to the commentator's estimate, vessels under the control of the Reconnaissance Bureau include a number of Sango submarines (the type found washed ashore in South Korea some years ago), mini-submarines, other submersibles and high-speed boats. Because of the presence of South Korean and U.S. naval forces, any conventional North Korean naval operation would be an extraordinarily dangerous undertaking. According to commentator, the multiple landings of sabotage groups on the Korean peninsula may well be the most effective maritime activity available to the North Koreans. Among the likely targets postulated were the large South Korean port of Pusan, the port of Inchon near Seoul, other areas of Korea tied to the ground-combat situation, Japanese ports that are used by U.S. forces (e.g., Sasebo and Kure), and other Japanese coastal facilities. The Japanese Maritime Self Defense Forces, in the view of the commentator, need to be upgraded to deal with these and other threats from seaborne foreign special-operations forces.

Russians commemorate airborne, special-ops forces

Despite continuing force reductions, funding shortfalls and varying levels of disarray in their organizations, Russia's airborne and special-operations forces retain some measure of their former identity and status. On Aug. 19, for example, the Federal Security Service's Vympel special-operations unit (created for counterterrorist actions) celebrated its 20th anniversary. The occasion generated great praise for the unit's past "combat" performance and for its current state of readiness. A much larger commemoration had been observed on Aug. 2, when the Russian Airborne Forces celebrated their 71st anniversary. During an interview, Airborne Forces commander Georgiy Shpak addressed the history and the current status of the airborne units. He noted that during the post-World War II years, Soviet airborne strength had been around 80,000. Shpak insisted that while that number has declined sharply during the post-Soviet period, the Airborne Forces remains combat-ready. He noted their past role in Hungary, Czechoslovakia and Afghanistan, indicating that the units had visited 32 "hot spots" during the last 10 years. Shpak's son, Oleg, was killed in Chechnya in 1995. Shpak also indicated that despite rumors to the contrary, the Airborne Forces would remain an independent arm and would not be subsumed by the ground forces. Shpak compared Russia's Airborne Forces to Western airborne forces this way: "Naturally we observe our counterparts and compare them to our own officers and men. In Bosnia, for instance, we compare them to the Americans; in Kosovo we compare them to the Germans and the French. And I can say, without bragging, that our assault troops are better-trained and better-adapted to

combat — they are unpretentious, hardy, better-educated and physically stronger. In terms of certain parameters, individual weaponry, for instance, we do lag behind, but our men are an order of magnitude better than NATO soldiers in terms of their fighting qualities."

Mexico arrests members of militant group

Following the Aug. 8, 2001, detonation of three bombs in front of Banamex bank branches in Mexico City, Mexican authorities arrested five members of the People's Armed Revolutionary Forces, or FARP, in connection with the terrorist acts. They also confiscated tens of thousands of dollars, weaponry, uniforms, computer equipment and other items. Banamex had recently been purchased by U.S. Citigroup. Statements pertaining to the arrests were issued by General Javier del Real. He is the deputy operations chief of the General Staff of the Defense Secretariat, which evidently played a role in the capture of the FARP militants. A congressional study that was published just after the bombings occurred indicated that there are more than 15 armed groups operating in Mexico. They are characterized as armed groups with militant support, with an organized structure, and with military training in the center, northern and southern regions of the country. The FARP, which split from the larger Popular Liberation Army, was not included among the groups mentioned in the study.

Chinese conduct maritime special forces exercise

The Chinese People's Liberation Army has reported that it conducted a maritime special-forces exercise in early August 2001. During the nighttime tactical exercise, landing-assault boats unloaded assault swimmers (said to number in company strength) 1,000 meters from the coastal target. The assault force, equipped with individual weapons, a global-positioning system, night-vision devices, small missiles, and a new rope-throwing device, seized a beach landing area, evidently in preparation for the arrival of a larger force. PLA reports compared the exercise to the Normandy invasion and noted how useful special-operations forces can be in knocking out enemy gun positions and otherwise preparing beaches for landings. The report was likely part of the PLA's continuing efforts to impress Taiwan with the invasion capabilities of the People's Republic of China.

Greece establishes special security force

Greece has established a new special-security force called the Social Insurance Foundation Guards, or IKA Guards, to provide physical security for Greek facilities and infrastructure. The force consists of about 2,500 members, many of whom are former members of the Greek army's special-forces component. The IKA Guards are well-armed, and they are capable of serving as riot-control units. While the IKA Guards are not police officers in the full sense of the term, they do receive four months of training, and many aspire to become fully integrated into the police establishment. The force is currently guarding important government agencies, such as the National Intelligence Service and the Ministry of Public Order. Members of the IKA Guards have been assigned to various police units, and they are located around the country and on Crete. The number of IKA Guards is expected to double by the time of the 2004 Olympics.

Update

4th PSYOP Group receives new commander

Colonel James A. Treadwell replaced Colonel Christopher St. John as commander of the 4th Psychological Operations Group during a ceremony on Fort Bragg's Dick Meadows Field Aug. 3.

Treadwell's previous assignments include commander of the Combined Joint Psychological Operations Task Force in Bosnia; operations officer, U.S. Army Civil Affairs and Psychological Operations Command; chief of the Psychological Operations Division, Directorate of Training and Doctrine, JFK Special Warfare Center and School; commander of the 6th PSYOP Battalion, 4th PSYOP Group; and action officer in the J-33 Special Operations Division, Office of the Chairman of the Joint Chiefs of Staff, in the Pentagon.

St. John, who commanded the 4th PSYOP Group for nearly two years, will retire from the Army after having completed 27 years of service.

Rangers switch to tan berets

More than 2,400 soldiers from the 1st, 2nd and 3rd battalions of the 75th Ranger Regiment pocketed their black berets and donned tan berets during a ceremony at Fort Benning, Ga., July 26.

"The black beret has been the most visible symbol of Rangers in the 20th century. … (Now) the tan beret will become the most visible symbol of the Rangers who will serve our nation in the 21st century," said Lieutenant Colonel Marcus DeOliveira, the outgoing regimental adjutant.

"Tan is the universal color that transcends all Ranger operations," DeOliveira said. "It's the color of the buckskin uniform of Roger's Rangers, the genesis of the Ranger lineage. It's reminiscent of the sandy beaches of the European theater. It represents the khaki worn during the Korean and Vietnam eras, and the color of the sands of Grenada, Panama, Iraq and Mogadishu."

Colonel Ken Keen, outgoing commander of the 75th Ranger Regiment, presented tan berets to a party of eight Rangers, including the regiment's youngest member, Private Jeff Rea of the 2nd Battalion, who celebrated his 18th birthday with the donning of the tan beret.

"It's a good birthday present. This'll be a birthday I'll never forget," Rea said. "This regiment will be great no matter what they wear." — *Army News Service*

SWCS to release draft CA TTP manual

A new manual in production at the JFK Special Warfare Center and School will provide written tactics, techniques and procedures for Civil Affairs operations.

The initial draft of FM 3-05.401 (formerly FM 41-10-1), *Civil Affairs Tactics, Techniques, and Procedures*, is being written by the Civil Affairs/Civil Military Operations Division of the SWCS Directorate of Training and Doctrine. It is scheduled to be reviewed by field units in early 2002.

The manual has seen many revisions in its structure and content since work began on it in 1988. Originally a compilation of the special texts that covered the then-20 CA functional specialties, the manual has evolved to incorporate lessons learned from the many CA operational deployments that have taken place over the past decade.

Chapter 1 of the new manual contains an overview of the ways CA supports the commander during pre-mission planning, full-spectrum operations, and post-hostilities operations. Major themes include incorporating CA planners and nonmilitary participants in the planning process; using the civil-military operations center, or CMOC, at all levels of the operation; continuous monitoring of conditions in the operational area to facilitate recovery from the effects of military operations and disasters; and the transition of operations from military control to civilian control.

Chapter 1 also introduces a new methodology that provides structure to all CA operations and civil-military operations. The methodology consists of six phases: assess, decide, develop and detect, deliver, evaluate, and transition. Embedded within these phases are the steps of the various problem-solving and decision-making processes employed by commanders at the strategic, operational and tactical levels of operation.

Chapter 2 addresses the integration of CA with supported organizations. It also discusses the actions and the responsibilities of CA soldiers upon: (1) Notification of a mission tasking; (2) Arrival at the supported unit; and (3) Establishment of operations.

Chapters 3-8 focus on each of the six phases of the new methodology. Readers will find information on conducting preliminary and deliberate assessments; analyzing the civilian

component of mission, enemy, terrain and weather, troops, time available and civilians; establishing, maintaining, expanding, and contracting the CMOC; CA responsibilities in joint special-operations operational procedures, the military decision-making process, the joint operational planning and execution system, and troop-leading procedures; techniques for scheduling meetings, for reaching agreements, and for interviewing civilians; managing and classifying CA and CMO information; evaluating measures of effectiveness; and successful mission continuity and battle handoff.

The CA/CMO Division requires input from the field to ensure that the new manual will meet the needs of the CA community. During the staffing and review period, individuals who wish to submit comments to the draft should obtain the proper format from their unit G3/S3. Individuals who do not have a G3/S3 may contact the primary author, Major Dennis Cahill, by telephoning DSN 239-8253 or commercial (910) 432-8253; or by sending e-mail to cahilld@soc.mil.

Reserve positions available with JSOU

The Joint Special Operations University, or JSOU, located at Hurlburt Field, Fla., will have the following six positions for Army Reservists during FY 2002:

- Director, reserve-component programs — O6 (38A0O).
- Director, medical programs — O6 (61N0O).
- Senior instructor (PSYOP) — O5 (39B0O).
- Instructor/curriculum developer — O4 (65D0O).
- Senior enlisted adviser — E9 (18Z5P).
- Administrative NCO — E7 (71L4P).

Although the vacancies will be troop-program-unit positions, Reservists will not be required to work during standard drill periods, according to Major Brad Hawkins, reserve-component coordinator at JSOU. The school intends to establish schedules that will allow Reservists to provide support to JSOU on weekdays using their individual-drill-for-training allotments and their annual training.

Applicants for the positions should submit their Officer Record Brief or military biography; copies of their three most recent OERs; and a copy of their latest Army Physical Fitness Test. For additional information, telephone Major Brad Hawkins at DSN 579-6861 or commercial (850) 884-6861; or send e-mail to hawkinsb@hurlburt.af.mil.

JSOU educates SOF executive, senior and intermediate leaders and selected national and international decision-makers in the science and art of joint special operations.

New CD-ROM to contain PSYOP references, links

The Psychological Operations Division of the JFK Special Warfare Center and School's Directorate of Training and Doctrine has developed a unique reference tool for PSYOP commanders, staffs and planners.

The reference tool, an interactive CD-ROM, is intended to serve as an informative guide to the contents of FM 3-05.30, *Doctrine for Army Psychological Operations*, and as a convenient PSYOP reference. The CD contains the full text of FM 3-05.30, published in June 2000. Hyperlinks located throughout the text will allow readers to access audio and video files that supplement or reinforce information contained in the manual.

The CD also contains links to pertinent joint publications, relevant Army field manuals and documents relating to Army PSYOP. The reference guide also contains links to a number of official and unofficial PSYOP Web sites.

The CD will be mailed to selected organizations within the next few months. For additional information, telephone Debra A. Weltz, deputy chief of the PSYOP Training and Doctrine Division, at DSN 239-5000 or commercial (910) 432-5000; or send e-mail to weltzd@soc.mil.

SF manual covers spectrum of resistance, escape

The JFK Special Warfare Center and School has published a field manual that covers the spectrum of wartime resistance and escape.

FM 3-05.71 (C), *Resistance and Escape* (U), published by the Special Forces Division of the SWCS Directorate of Training and Doctrine, is a revision of FM 21-78, *Resistance and Escape*. FM 3-05.71 has been updated and renumbered to conform to the numbering convention for joint publications.

The revised manual provides information on how to resist all forms of exploitation, including propaganda, indoctrination and interrogation. It also provides guidance on actions to take during terrorist or hostage situations, and it includes a new chapter on surviving hostage captivity.

The manual will serve as a consolidated reference for joint training in resistance and escape. An expanded chapter on the Code of Conduct includes new information that will assist trainers in instructing the Code of Conduct.

FM 3-05.71 was delivered to the Army Training Support Center in August 2001 and will be accessible on the Reimer Digital Library during the first quarter of fiscal year 2002. To protect technical and operational information, the manual is classified "confidential" and is restricted to U.S. special-operations forces. For additional information, telephone Dr. Allen McLauchlin at DSN 239-5952/9018 or commercial (910) 432-5952/9018; or send e-mail to mclaucha@soc.mil.

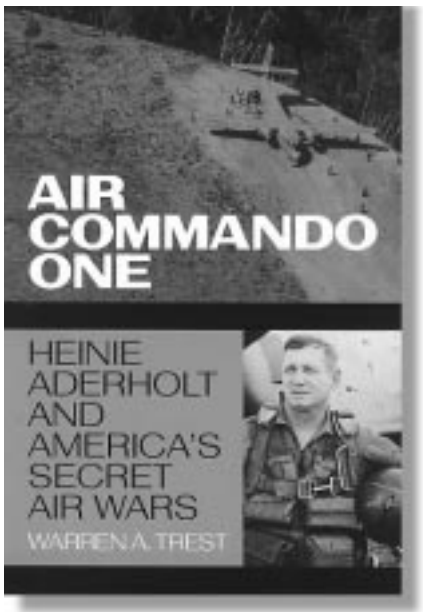
Book Reviews

Air Commando One: Heinie Aderholt and America's Secret Air Wars. *By Warren A. Trest. Washington, D.C.: Smithsonian Institute Press, 2000. ISBN 1-56098-807-X. 322 pages. $27.95.*

Only in the mid-1990s, long after books (good and bad) about Special Forces and SEALs had appeared in the bookstores, was the story of the Air Force special-operations forces told. Now that long-delayed story has been supplemented with a biography of Heinie Aderholt, one of the founders of the modern U.S. Air Force SOF, a frequent participant in its operations, and one of its most colorful, courageous, inspiring and contentious members.

Heinie Aderholt and his four brothers joined the Army soon after Pearl Harbor. Through the World War II aviation-cadet program, Aderholt obtained a commission, his pilot wings, and a career. After wartime service in North Africa and in Italy, Aderholt stayed in the Army Air Force because "The pay was good, and I loved to fly." By fortuitous circumstances, he acquired a regular commission before the Army Air Force transitioned into the newly established Air Force.

When the Korean War erupted, Aderholt volunteered to fly fighters, but his World War II experience with multi-engine aircraft, C-47s and B-17s, was more desperately needed. He was assigned to fly C-47s, dropping



Korean agents in enemy rear areas — an activity that is now called special operations. The assignment was Aderholt's first experience with the heady brew of special operations to which he would repeatedly return throughout his career. It could be said that Aderholt and special air operations were made for each other. He valued and blossomed in SO's intense mission-accomplishment orientation and in its individual freedom in execution. The SO discipline prospered on his dedication, unfettered thinking, impatience with bureaucratic rules, and flying skills.

Following the Korean War, Aderholt served his first tour with the Central Intelligence Agency. From time to time, usually when he was unenthusiastic about a routine peacetime Air Force assignment, he would return to the CIA. Those tours provided Aderholt with broad experience and lifelong contacts, and they confirmed his inclinations toward special operations. They also sometimes created a distrust of him in the Air Force's more conventional ranks.

Most Special Forces operators know of the long years of struggle before SF and its members were grudgingly accepted by the Army as a valid part of the art and science of war, and of the officers who hazarded their careers for this little-understood field. Probably fewer know that a similar, roughly parallel, struggle was waged inside the Air Force. This struggle also had its paladins, with Heinie Aderholt premier among them.

In some respects, the Air Force special-operations champions had an even more difficult job than their Army cousins had. They were not only trying to introduce a clearly heretical new philosophy, they were trying to introduce one that was anathema to many seniors because, by its very nature, it was essentially tied to ground activities and to close air support.

During much of the SO development period, the Strategic Air Command and its nuclear-war role dominated the Air Force. The Tactical Air Command, under which the Air Commandos served, was a poor cousin in terms of priority, resources and even promotions. The war in Southeast Asia gave the Air Commandos an opportunity to demonstrate that their varied

skills, then lumped under the term "counterinsurgency," deserved a place in the Air Force. The opportunity was short-lived, however. As the Air Force took over the air war, it discounted the need for the Air Commandos' skills and the airmen who exercised them. Because the Air Force wanted to be "the world's first all-jet air force," even the Air Commandos' aircraft, piston-driven B-26s, T-28s and A-1s, were resented.

Had this milieu not been forbidding enough, in Southeast Asia, where Aderholt was to serve a series of tours, it had yet greater complexities. Air Force doctrine had long advocated centralized control of all air operations. Under continuous protest, the senior air headquarters in Southeast Asia, the 7th Air Force, had to accept the nonsubordination of other services' operations and aircraft. The 7th Air Force commander, General Momyer, gagged on the role of the Thailand-based 56th Air Commando Wing, which although it was clearly and indisputably part of the Air Force, had a semi-independent role supporting operations in Laos.

The general's irritation was exacerbated by an articulate, urbane, patronizing American ambassador in Vientiane who was a major customer of the Air Commando Wing and who regularly voiced his own opinions on the employment of air power. For two of the most active years of the war, the commander of the 56th AC Wing was Colonel Heinie Aderholt. It was a situation that could not help but develop contention: a senior commander who was intent on pursuing Air Force goals; and a subordinate, dynamic, hands-on, inspirational leader whose focus was on fighting the enemy wherever found and with whatever was available. Admirers of Anton Meyer's novel, *Once an Eagle*, may find some character look-alikes.

This wartime command period, and the contention and the hostility it raised among general officers at every level in the Air Force, is a central element of *Air Commando One*, but it is only one part of a full, well-developed biography. Everyone who had the privilege of serving with him could regale an audience with Heinie Aderholt stories, generally of the "Damn the torpedoes: Full speed ahead" genre. Typical was Aderholt's turning out the entire population of a Southeast Asia air base to walk the runways and pick up the stones that were denting the propellers of his aircraft — and having the police line followed with a truck full of iced beer. One regrets that space limitations probably precluded *Air Commando One* from including more of these colorful events.

The organization of *Air Commando One* is slightly unusual in that it has a prologue that tersely outlines the contents of the remainder of the book. One might suspect that the author's previous career as an Air Force historian had impelled him to write the civil equivalent of the military reports' ubiquitous executive summary. If the reader is in haste to get to the meat of the story, this item can be safely skipped.

While a biography does not require maps as strongly as an account of a ground campaign, this one could well have used two or three more than its one small map of Southeast Asia. The book has 31 pages of detailed notes that buttress almost every statement of fact, a good bibliography, and an extensive glossary (strangely labeled "acronyms"). This book should be read by all who have an interest in the history of special operations or in the Second Indochina War. It should be enjoyed by all, airmen or not, who enjoy reading about a tough, honest, tenacious and uncompromising warrior.

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Special Warfare

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