

Retired A-10 Pilot Awarded Silver Star

A retired A-10 pilot on June 30 received the Silver Star more than 14 years after helping save a US Army task force under fire from Iraqi armor. Then-Capt. Gregory D. Thornton was flying his Warthog supporting Advance 33, a ground forward air controller attached to Task Force 2-69, 2nd Battalion, 69th Armored Regiment, near Baghdad on April 6, 2003.

The group's lead element came under fire from enemy tanks and armored vehicles, and Thornton, "with complete disregard for his personal safety," provided support to the ground forces despite lowered visibility caused by a sandstorm. Thornton "braved the ever increasing hailstorm of anti-aircraft fire" for 33 minutes and killed and demobilized three T72 tanks, six armored personnel carriers, and multiple utility vehicles.

His actions allowed the task force to cross the river and accomplish their objective: linking up with coalition forces to fully encircle Baghdad.

"The sound of her gun makes our enemy run and hide, but the distinct sound of her engines makes our friendly forces give a little bit more. They get a little bit stronger, and it can turn the momentum of a close air support fight," said Thornton during a ceremony at Wright-Patterson AFB, Ohio. "We've had many people come and tell us that, man, when they heard the



Gen. Mike Holmes, commander of Air Combat Command, presents retired Lt. Col. Gregory Thornton with the Silver Star in a ceremony at the National Museum of the US Air Force in Dayton, Ohio.

sound of the A-10 engine, I felt like I was OK now, and it turns the tide of the entire battle."

Air Combat Command chief Gen. James M. "Mike" Holmes presented Thornton with the award.

US, Allies Respond to North Korea's ICBM Tests

North Korea launched its first two intercontinental ballistic missile tests during the month of July.

The missiles tested were of a type unseen before by the Pentagon and traveled farther than in any previous test, in a dramatic escalation of that country's nuclear ambitions.

The first missile, the Hwasong-14 ICBM, was launched on July 4 and prompted a "snap" exercise by the US and South Korean armies to demonstrate missile defense and surface-to-surface missile capabilities. The US Army fired the Army Tactical Missile System once, and South Korea fired its Hyunmoo Missile II into territorial waters on its east coast.

The second North Korean missile test launched on July 28. The missile flew about 45 minutes and 621 miles before landing in the Sea of Japan.



A USAF B-1B (top), deployed from Dyess AFB, Texas, is joined by South Korean F-15s on a mission over the Korean Peninsula in July.

The US and South Korea again responded with snap exercises. Two B-1B bombers, deployed to Andersen AFB, Guam, from Dyess AFB, Texas, were escorted by Japanese and South Korean fighters during a 10-hour flight in "direct response" to North Korea's test.

The Missile Defense Agency on July

30 also conducted a successful test of the Terminal High Altitude Area Defense system in the Pacific.

An Air Force C-17 air-launched a medium-range target ballistic missile, which was intercepted by a THAAD system at the Pacific Spaceport Complex Alaska, located in Kodiak.

USAF Completes New START ICBM Reductions

The Air Force announced it has fulfilled its requirements for ICBM reduction under New START well ahead of the February 2018 deadline. New START was signed by the US and Russia in 2010 and requires the US to reduce its stockpile of deployed nuclear delivery vehicles to a total of 700 bombers, ICBMs, and submarine-launched ballistic missiles (SLBMs).

To meet the requirements, the Department of Defense directed the services to draw down to 400 ICBMs, 60 bombers,



and 240 SLBMs. The Air Force began removing ICBMs from its three missile bases in Wyoming, Montana, and North Dakota in 2012.

The 50th and final ICBM for New START was decommissioned at F. E. Warren AFB, Wyo., at the beginning of June. The cost of removing the ICBMs, including storage and shipping, was \$24 million.

A transporter erector is raised at the 90th Missile Wing complex in June, preparing for removal of a missile from its silo.



Squadron Officer School Gets Redesign

Air University's Squadron Officer School reopened at the end of July with a revamped curriculum designed to integrate Chief of Staff Gen. David L. Goldfein's top priorities. SOS had closed during the month of June, canceling an entire class, to make the changes.

The new course will focus on four areas of study: leadership, team building, logical and ethical decision-making, and multidomain joint warfare. These are intended to coordinate with Goldfein's focus on revitalizing squadrons, developing joint leaders, and improving multidomain command and control across the Air Force.

The new course will take six-and-a-half weeks to complete instead of five, and the first class began on July 31. With a longer course, USAF will only be able to hold six versions of the course per year, instead of seven, but the size of each class will be increased from 600 to 700 students.



President Trump announces re-establishment of the National Space Council at the White House. Flanking him, l-r, are: former astronaut and retired USAF Col. Benjamin Drew, Vice President Mike Pence, and former astronaut Buzz Aldrin.

National Space Council Established

President Donald J. Trump signed an executive order re-establishing the National Space Council on June 30. The order names Vice President Mike Pence as chair of the council that also includes the secretaries of Defense, State, and Homeland Security, as well as the Director of National Intelligence, the NASA administrator, and the Chairman of the Joint Chiefs of Staff.

At a White House signing ceremony attended by retired Air Force colonel and astronaut Buzz Aldrin, Trump said the council would serve as "a central hub guiding space policy within the administration." The order instructs the council, within its first year, to prepare a report for the President, including long-term planning and recommendations for US space activities.

Trump said that, in the past, the US had been a "nation of pioneers" when it came to space. "We started," he said, "but we never completed. We stopped." Now Trump sees the council as a way of returning the US to a place of leadership in space activities.

"Today's announcement sends a clear signal to the world that we are restoring America's proud legacy of leadership in space," he said.

By the Numbers

1,300 The number of official Air Force Instructions.

Air Force Secretary Heather A. Wilson on Aug. 4 announced a dramatic push to cut Air Force red tape over the next two years, saying USAF has too many AFIs and shouldn't "tell airmen how to do everything." Instead, she said,

"Let's tell them what to do and let them surprise us with their ingenuity."

40% Percent of the current AFIs Wilson says are outdated.

Source: Heather A. Wilson, National Defense University speech

■ Pawlikowski: Faster Software Development Needed

The Air Force is working to change the way it develops new software through several pathfinder programs that are focused on business and logistics systems, Gen. Ellen M. Pawlikowski, commander of Air Force Materiel Command, said July 14.



Pawlikowski

Pawlikowski told the audience at an Air Force Association Mitchell Institute for Aerospace Studies event in Washington, D.C.

The problem is a serious one because while "software is at the heart of most of what we do," Pawlikowski said the Air Force continues to prioritize hardware development on major weapons systems—leaving software development as

an afterthought. But in the multidomain command and control warfare of the future, speed of networking and decision-making will be decisive, she said, and a responsive, agile software development process will be indispensable.

The traditional Pentagon systems engineering process is not set up to produce new and updated software with speed. A typical milestone, like the preliminary design review, "doesn't make very much sense" in the software development process, Pawlikowski said. Also the Pentagon testing regime puts barriers between coders and operators that prevent quick adjustment of software capabilities to on-the-ground needs.

Pawlikowski said organizationally, the Air Force is working to develop "software teams" that can integrate into squadrons and bring coders and operators closer together. In some cases, the Air Force might even need to develop "software squadrons."

The pathfinders in business and logistics systems will precede more complicated work on software problems like an "operational flight profile," Pawlikowski said, where the risk is greater and mistakes could lead to "losing an airplane."

■ AMC Partially Lifts Dover C-5 Grounding

Air Mobility Command on Aug. 2 returned five of 18 C-5M Super Galaxies to flight following the July 17 standdown at Dover AFB, Del., due to issues with the airlifter's landing gear. At the same time, AMC Commander Gen. Carlton D. Everhart II ordered a fleetwide replacement of all C-5 ball screw assembly parts to prevent further problems.

On June 18, Everhart ordered all Dover-based C-5s to stop flying after two separate incidents where C-5s experienced failure of their landing gear at Naval Station Rota, Spain. During the standdown, AMC officials inspected the aircraft's landing gear to ensure proper extension and retraction.

"Our airmen are working deliberately and methodically at Dover and across the command to identify and resolve any issues impacting the C-5 fleet," Everhart said in a news release. "We have put measures in place to ensure aircrew safety and reduce wear and tear on the aircraft."

While the aircraft at Dover are returning to flight, Travis AFB, Calif., is replacing parts on its aircraft. The C-5's nose landing gear has two ball screws, with both working together to retract and extend the landing gear. If one screw assembly is broken, the gear cannot operate, according to AMC. Everhart also ordered the C-5 fleet to limit kneel operations.

"With an aging fleet, it is important to take all potential measures to reduce stress on the aircraft," he said.

The grounding came as Air Mobility Command began Mobility



A C-5M gets a nose landing gear check July 28 at Dover AFB, Del., after a standdown, following two incidents of nose gear failure.

Guardian—its largest-ever exercise. The C-5 grounding did not impact flying operations for the exercise, but more C-17s were tasked to help carry equipment to make up for the missing C-5s, exercise officials said.

■ Raymond Adds Role as STRATCOM Space Commander

Gen. John W. "Jay" Raymond, commander of Air Force Space Command (AFSPC), will also become the joint space component commander for US Strategic Command, STRATCOM boss Gen. John E. Hyten told reporters.

The move comes as Hyten works to restructure his entire command, consolidating 18 component commands under four components for air, space, sea, and missile defense, each with its own four-star commander, except for missile defense, which will continue to be led by a three-star general.

Hyten said he "directed the consolidation" of STRATCOM on June 16, but "it will take a number of months to work out all the joint relationships." Hyten said he did not know exactly when the transition would be complete, but that it could be "into early next year before we reach the point where we can fully make that change."

The US military already benefits from having "a four-star who is focused on space all the time" at AFSPC, Hyten said. But to improve operational control of space forces and assets across



An unarmored Minuteman III ICBM launches during an operational test in August at Vandenberg AFB, Calif.

the services, "I want to elevate that responsibility to be the joint force space commander under STRATCOM" as well, he said.

Vice Chairman of the Joint Chiefs of Staff USAF Gen. Paul J. Selva told Congress the move would give Raymond unified control over the US military's satellite constellations and would result in new efficiencies.

■ Drone Defense Becoming Critical

Air Combat Command needs the authority to better defend against small drones, because they're an increasingly dangerous threat even in peacetime operations, ACC Commander Gen. James M. "Mike" Holmes said in mid-July. The Pentagon is taking first steps toward a solution.

He said an F-22 on short final at JB Langley-Eustis, Va., nearly collided with a large hobby drone. The pilot "felt strongly enough to make a report on it." The same day, Holmes noted, an airman observed a drone "fly over the gate shack, [he] tracked it while it flew over the flight line a while, then ... [the drone] left."

Holmes said the only defense he has is a sign identifying the area as "a no-drone zone" and the authority to pull the license of an operator of one that overflies the base. That assumes he can track the drone's place of origin and catch the operator, "but they're hard to get at." The



An attack drone demonstrates part of a counter-unmanned aerial system: a net.

problem, he said, is "the rules are basically the same as if it [were] a small civil aircraft," and he can't simply shoot one down. Civilian agencies like the FAA need to hurry up and help with the issue, he said.

"We're working to get authorities for the

nuclear sites first," Holmes stated. In the meantime, "we're looking at things that can jam the communications" of a drone, to force it to land, as well as "looking at things that let you take control of them, so you can fly them where you want them to go." Ultimately, "we're looking at opportunities to shoot them down, too."

About one month later, the Pentagon announced it had issued "specific but classified" guidance detailing how service members can counter threats from small unmanned aircraft. "The Department of Defense is committed to the safety and security of our personnel, installations, and equipment, as well as communities near our DOD installations," according to the statement. "We support civilian law enforcement investigations and the prosecution of unauthorized [drone] operations over military installations. Although we will not discuss our specific force protection measures, DOD personnel retain the right of self-defense."

■ The War on Terrorism

As of Aug. 9, a total of 44 Americans had died in Operation Freedom's Sentinel in Afghanistan, and 43 Americans had died in Operation Inherent Resolve in Iraq and Syria.

The total includes 84 troops and three Department of Defense civilians. Of these deaths, 41 were killed in action with the enemy, while 46 died in noncombat incidents. There have been 208 troops wounded in action during OFS and 44 troops in OIR.

