

CIVIL AIR PATROL

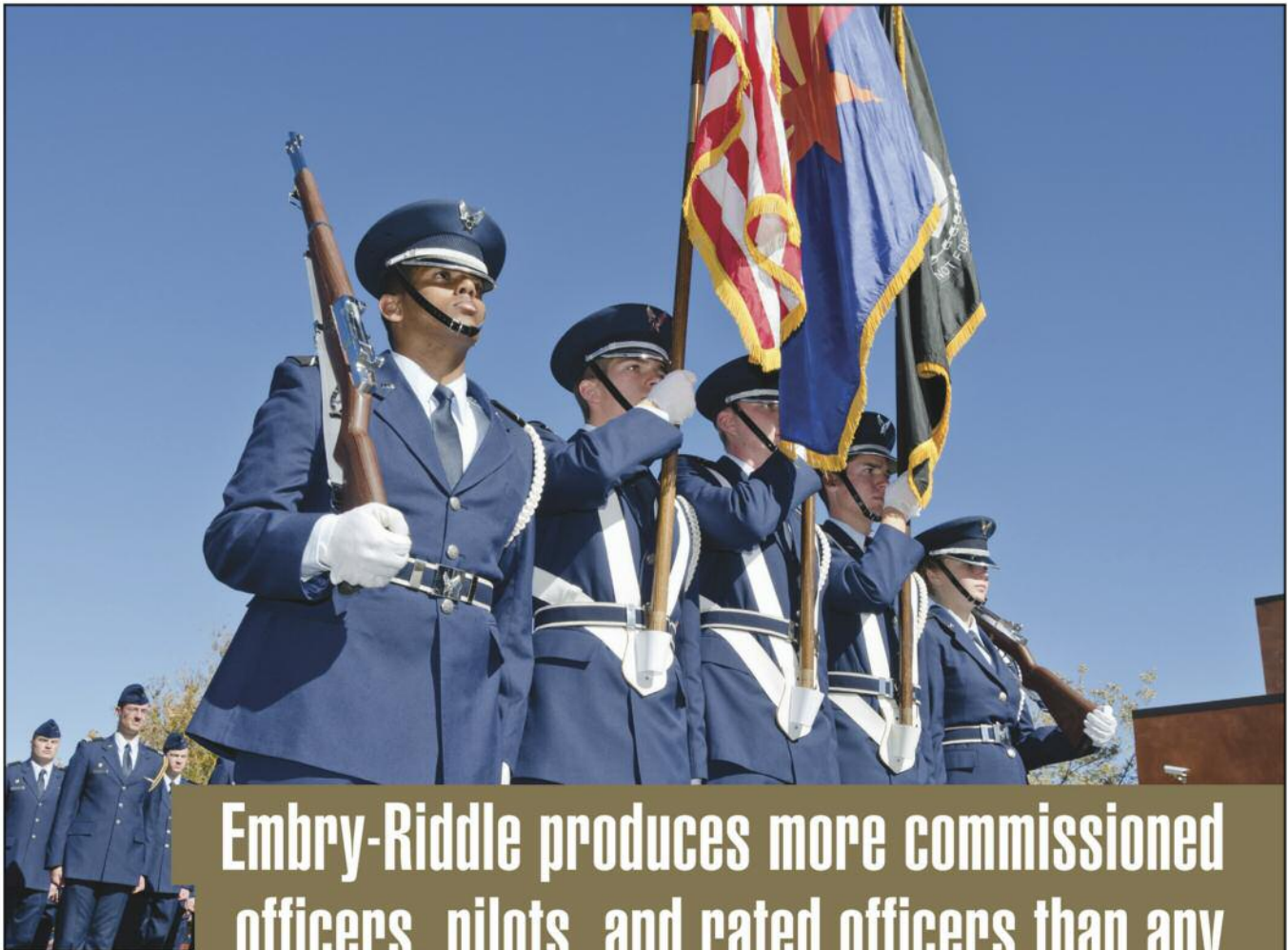
VOLUNTEER

SPRING 2021



KEEP 'EM FLYING!

- ▲ To the Bottom of the World
- ▲ NLD21 Campaign
- ▲ Drone-Zone



Embry-Riddle produces more commissioned officers, pilots, and rated officers than any other AFROTC detachment in the country.

► TOP RANKED AEROSPACE ENGINEERING PROGRAM

100%

CLASSES TAUGHT BY FACULTY

25

AVERAGE CLASS SIZE

1ST

COLLEGE OF SECURITY AND INTELLIGENCE IN THE NATION

97%

JOB PLACEMENT RATE

The world's most comprehensive collection of academic programs focused in aviation, aerospace, intelligence, and cyber security.

EMBRY-RIDDLE
Aeronautical University[™]
PRESCOTT, ARIZONA

prescott.erau.edu/cap



inside

14

FEATURES

14 Keep 'Em Flying!

As a Total Force partner, one area of expertise the Air Force relies on Civil Air Patrol for is training. Discover some of the diverse exercises CAP supports that help keep our warfighters mission-ready.

24 NLD21 Campaign

The annual opportunity to visit with legislators became a three-week-long virtual experience in 2021. The online environment enabled Civil Air Patrol to pivot and explore innovative solutions that helped turn lemons into lemonade.



24

26 Drone-Zone

With a fleet exceeding 2,000 small Unmanned Aerial Systems, CAP is the nation's largest operator of service drones. To help improve remote pilots' proficiency, CAP is implementing new standardized training methods.



26

NEWS

50 General News

Ray Foundation awards initial \$330,000 grant for education; three new STEM Kits now available; COVID-19 mission update by the numbers; 80th-anniversary activities; and more.



50

56 Wing Sweep

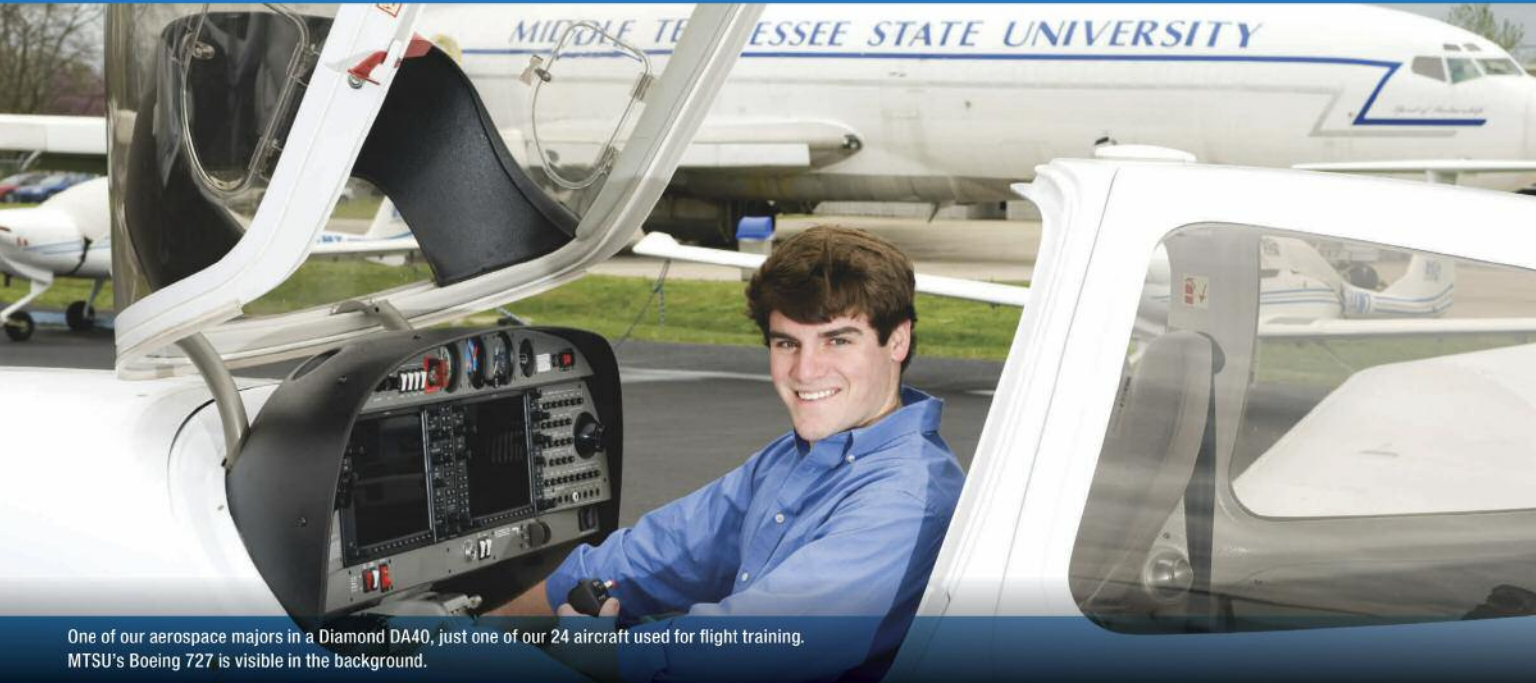
Every wing has much to be proud of and celebrate. In this issue, *CAP Volunteer* highlights just a few of the noteworthy happenings since last issue.



56

MAKE THE SKY YOUR DESTINATION

**MIDDLE
TENNESSEE**
STATE UNIVERSITY



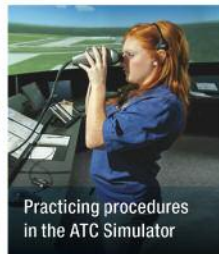
One of our aerospace majors in a Diamond DA40, just one of our 24 aircraft used for flight training. MTSU's Boeing 727 is visible in the background.



Students working in the 360 degree Air Traffic Control simulator at MTSU



MTSU aerospace majors working in the flight operations maintenance hangar.



Practicing procedures in the ATC Simulator



MTSU has proudly hosted the 2017 National Civil Air Patrol Cadet Engineering Technologies Academy as well as the 2016 and 2017 Tennessee Wing Encampments.

Let MTSU Aerospace help you get your career off the ground. With specialized programs in Flight Dispatch, Maintenance Management, Professional Pilot, Administration, Technology, and Unmanned Aircraft Systems Operations, we have something that fits your interests.

Fourteen full-time faculty members, 35 flight instructors, and over 750 majors places us among the largest of the nation's collegiate aviation programs.

We also offer an online Master of Science degree with concentrations in Aviation Education, Aviation Management, and Aviation Safety and Security Management.

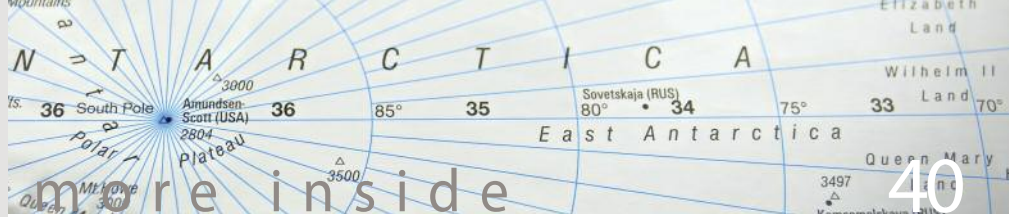


I AM *true* **BLUE**.

Aerospace Department

For more information, visit
mtsu.edu/aerospace

0817-4596 / Middle Tennessee State University does not discriminate on the basis of race, color, national origin, sex, or disability. See our full policy at www.mtsu.edu/titleix.



EDITORIAL STAFF

Maj. Gen. Mark E. Smith

NATIONAL COMMANDER/CEO

Brig. Gen. Edward D. Phelka

NATIONAL VICE COMMANDER

John A. Salvador | CHIEF OPERATING OFFICER

Paul Gloyd | DEPUTY CHIEF OPERATING OFFICER

Randy S. Bolinger | EDITOR-IN-CHIEF/CMO

Steve Cox | MANAGING EDITOR

Dan Bailey | CONTRIBUTING EDITOR

CONTRIBUTING WRITERS

Col. Regena Aye, Col. Frank Blazich, Jr.,

Kimberly Carole, Debbie Dahl,

Lt. Col. Alan Frazier, Loretta Fulton,

Curt LaFond, Susan Mallett, Sheila

Pursglove, Lt. Col. Steven Solomon

PHOTOGRAPHY & GRAPHICS

Lt. Col. Robert Bowden, General

Atomics, Maj. Erik Koglin, John Swain,

Col. Louisa S. Morse Center for Civil Air

Patrol History, U.S. Air Force

Stephanie Burton | DIGITAL EDITOR

EDITORIAL BOARD

Lt. Col. Steven Solomon

NATIONAL PUBLIC AFFAIRS OFFICER

Lt. Col. Paul Cianciolo

NATIONAL MARKETING MANAGER

DIGITAL EDITIONS

Visit **CAP.news** for an interactive version of *Civil Air Patrol Volunteer* and to read the latest national and wing news. Subscribe to PROPS, a weekly digital digest of CAP news, by sending a request to mac@capnhq.gov.

DEPARTMENTS

4 From the National Commander
As Civil Air Patrol celebrates 80 years of service to our nation and neighbors, the Proud Past — Envisioning the Future theme captures the essence of this milestone year. Our national commander reflects back on our amazing accomplishments amid many challenges and looks ahead to continued success.

6 Mindset | Aerospace Education
Building on the success of the K-6 grade Aerospace Connections in Educations (ACE) program, Adopt-a-Classroom connects squadrons with local educators to promote STEM education while also sharing the benefits of the CAP cadet program.

10 In Step | Cadet Programs
The annual Youth Development Conference explored the youth development field to discover what peer organizations are doing to overcome common challenges in the pursuit of equity, equality, and justice for all cadets.

12 Inspiring Minds | Education & Training
Volunteer University is exceeding expectations by any measure. Members are learning, progressing, and advancing quickly while also honing skills beneficial outside CAP.

HUMAN INTEREST

32 Senior Profile
Capt. Karin Hollerbach is the first female pilot to participate in Green Flag exercises in a CAP aircraft simulating Reaper and Predator drones.

34 Alumni Profile
U.S. Air Force Master Sgt. Thomas Culpepper participated in cadet activities that set him on a path for a military career where he put others before self and was awarded the Distinguished Flying Cross.

36 Legacy Profile
Cadet Maj. Robert Barger III was the first person to celebrate an 18th birthday in Antarctica and the first Catholic youth to serve as an altar boy at the South Pole.

42 Donor Profile
Maj. Gen. Mark Smith leads by example by launching the Semper Vigilans Society to recognize those who include CAP in their estate planning to help support those who follow in our footsteps.

46 Gone West
A final salute to some of our revered members who have gone west. Read about the extraordinary lives and service of just a few members.

ON OUR COVER

A Civil Air Patrol Cessna 182T from the Congressional Squadron participates in a Fertile Keynote exercise with F-16 fighters from the 113th Wing (D.C. Air National Guard). Flying the CAP aircraft were then-U.S. Rep. Ralph Abraham, Maj. Lou Cantilena, and Senior Member Rick Micker. The mission was conducted in restricted airspace near Patuxent Naval Air Station, Maryland, on Oct. 31, 2017. The cover story features this and other training missions CAP supports nationwide. Photo by Col. John Swain.

Civil Air Patrol Volunteer is published biannually by Civil Air Patrol, a private, charitable, benevolent corporation and auxiliary of the U.S. Air Force. Opinions expressed herein do not necessarily represent those of Civil Air Patrol or the U.S. Air Force. Please direct all correspondence to volunteer@capnhq.gov.

Proud Past — Envisioning the Future



■ **Civil Air Patrol is filled with adventuresome people young and old. The realm of flight is one fascination that binds many members.** The idea of breaking free of Earth’s gravity to view the landscape from an aerial perspective is alluring. For some, that fascination goes to another level, not just where the effects of gravity are held at bay by the delicate balance of the four forces of flight but beyond gravity, into space.

Greetings, and welcome to the Spring 2021 issue of *Civil Air Patrol Volunteer*. I am confident that you will be excited to read this issue’s articles about the many amazing things being accomplished by your Air Force’s volunteer auxiliary and member of the Total Force. Our volunteer airmen, and the professional staff who support them, continue to make a difference in their respective communities, states, and nation. We are proud to represent Air Force Blue in over 1,400 communities as we save lives and shape lives.

On Dec. 1 Civil Air Patrol will celebrate our 80th anniversary. With that in mind, we are using the tagline

“Proud Past — Envisioning the Future” to help celebrate this significant milestone. I find it deeply satisfying to see how the same qualities of volunteerism reign as true today as on the first day of Civil Air Patrol’s existence. Today’s volunteers have a deep desire to serve and make a difference, just as our World War II-era volunteers did. Today’s volunteers have the drive to get out and turn desire into action, making extraordinary contributions along the way, just as our predecessors did. Today’s volunteers have the knack for innovation and developing new and better ways of doing things, just as our predecessors did. And today’s volunteers have the same grit and determination to persevere despite tough times, just as our predecessors did. I am inspired by Civil Air Patrol’s volunteers; I’ll bet you are, too!

If you will allow me to get personal, I will also achieve a milestone this year. In August my tenure as Civil Air Patrol’s national commander and CEO will

conclude. Normally it’s a three-year term, but in 2019 the Board of Governors asked me to serve an additional year. If only I had known about the coronavirus before I said “yes!”

Kidding aside, I have been deeply honored and appreciative of this opportunity to serve the people and organization called Civil Air Patrol. I have had the privilege to work with amazing people, both volunteers and employees. Let me share with you some of the wonderful accomplishments by these exceptional people.

We started with the underlying principles of professionalism and excellence. From that, we crafted a credo that summarized our quest over the next few years: “One Civil Air Patrol, excelling in service to our nation and our members.” From that, we developed a phased, multiyear plan to introduce transformational change across the organization. Not change for change’s sake but change in order to prepare and position Civil Air Patrol for future success.

In pursuit of this goal, these professionals

created 12 working groups, 10 cross-functional teams, and six initiatives — all designed to put the pieces together to prepare and position Civil Air Patrol for future success. The work this team did fell into three basic categories — financial, volunteer experience, and process improvement. Let me share a few success stories with you.

Any organization needs to be properly funded in order to fully achieve its potential, and Civil Air Patrol has historically been resource-limited. We conducted what we called a Mission-Based Budget Review to determine appropriate funding levels to provide the resources needed to support mission needs for the Air Force and other customers. We are now steadily growing our budget to achieve the desired funding levels. Another financial source is philanthropy, given that Civil Air Patrol is a nonprofit corporation. Historically, our philanthropy program underperformed. We made a conscious decision to professionalize our philanthropy program, and the results have been fantastic! Thanks to generous donors, money is available to help underserved, underprivileged Civil Air Patrol cadets pursue their dreams.

Our volunteer and paid professionals have worked hard to enhance the volunteer experience for those who serve in Civil Air Patrol. An exciting example of how we have achieved this is the launch of our Volunteer University and Education and Training program, a complete remake of our 1970s-era professional development program. Modularized,

employing modern educational methods, and tailored for easy access online or in person, the new Volunteer University is exciting our members and more effectively equipping them for success.

Improving the processes by which an organization gets work done is an important part of ensuring its future success. Our volunteers and employees have worked hard in this area, with considerable success. The example I will share with you is in the area of consolidated maintenance of our fleet of 560 aircraft. As you can imagine, maintaining such a large fleet, spread across a broad geographic area, is very challenging. We believed we could improve how we performed in this area, and a cross-functional team of employees and volunteers achieved notable improvements. Anchored by a web-based tool called Aircraft Maintenance Repair and Documentation to facilitate management of our fleet's maintenance, we have made great strides with these key processes.

Of course, the coronavirus pandemic has changed everything for everyone, worldwide. In a manner that would make Civil Air Patrol's original members proud, our volunteers and employees alike have risen to the challenge to make a difference through selfless service. In our largest campaign since World War II, we have provided continuous support in communities across the United States for over a year. Our volunteers and employees have innovated to overcome the barriers of the pandemic to succeed in executing our missions and safeguarding our people. Our

volunteers and employees inspire me with their acts of selfless service, their perseverance, and their drive to be a beacon of hope during dark and turbulent times.

I have been richly blessed, honored, and humbled to have the opportunity to serve as Civil Air Patrol's national commander and CEO. I am proud to have partnered with so many superb volunteers and employees to help shape and position this most amazing organization for future success. Our work is ongoing — whoever is selected to serve in this position next will have the challenges of continuing the vector toward excellence and regenerating Civil Air Patrol as the pandemic subsides. What I am confident of is that this person will be fully up to the challenge and will lead this fine organization to even greater heights.

It has been my honor and privilege to serve. Thank you. ▲



Semper Vigilans!

A handwritten signature in black ink that reads "Mark E. Smith".

Maj. Gen. Mark E. Smith
CAP National Commander/CEO

Adopt-a-Classroom, a Collaborative Affair

■ Since 2008, Civil Air Patrol has been conducting the free K-6 Aerospace Connections in Education (ACE) program for teachers nationwide. The program has already impacted more than 350,000 young people by increasing awareness and generating interest in aerospace-related science, technology, engineering, and math (STEM) subjects and careers. One of the goals of the ACE program is to also introduce young people to CAP's cadet program, which anyone can join beginning at age 12.



Cadet 1st Lt. Aeryn Anderson (left) and her brother, then-Cadet Maj. Aidan Anderson of the Alabama Wing's Redstone Composite Squadron discusses CAP's sUAS program with Sparkman Middle School teacher Kala Grice-Dobbins and her students.

All eight Civil Air Patrol regions have wings actively participating in the Adopt-a-Classroom Program.

To build on the success of ACE goals, CAP's Aerospace Education division formalized a new Adopt-a-Classroom campaign designed to connect squadrons with local educators to help promote STEM to their students while also sharing the benefits and growth opportunities of the cadet program.

Squadrons throughout the United States have accepted the challenge to adopt a public or private classroom teacher to provide aerospace/STEM support, student mentorship, and cadet program introduction. Ideally, the program targets Title I schools (located in areas where low-income families make up at least 40% of enrollment) to help bring awareness of STEM and career opportunities to a diverse and underrepresented group of students.

Adopted teachers participate in the ACE program — the foundational curriculum for the new squadron outreach program. All materials are provided to the teachers for in-class use or as send-home packets for hands-on activities during virtual presentations. Having CAP adult and cadet members conduct virtual and/or in-person instruction adds a new and exciting layer of aviation-related expertise that intrigues the students.

Adopt-a-Classroom Ambassadors

Civil Air Patrol recently selected Adopt-a-Classroom ambassadors who have already succeeded in conducting such a collaborative community outreach program — the Indiana Wing’s chief of staff for missions, then-Lt. Col. Brian Schmuck, and Cadet 2nd Lt. Rylee Schmuck, cadet commander of the wing’s River City Cadet Squadron.

Lt. Col. Schmuck and the River City Cadet Squadron expanded their reach this year. The squadron has adopted three Mount Vernon, Indiana, schools with a total of seven fifth-grade classrooms. In-person classes have begun in accordance with local COVID-19 safety guidelines, and both the teachers and the students are quite excited about CAP’s involvement in their schools.

Teachers Request Adoption

The first Civil Air Patrol educator member to request adoption was Kala Grice-Dobbins at Sparkman Middle School in Toney, Alabama. Introduced to CAP by the AFA’s Tennessee Valley Chapter 335 in Huntsville as their Chapter Teacher of the Year, Grice-Dobbins has embraced CAP’s free aerospace products and programs to enhance science classes for her Title I school students.

The Redstone Composite Squadron has adopted Grice-Dobbins and her classroom. Squadron commander Lt. Col. Kim Miller said, “Squadron cadets will join aerospace education officers Lts. Dan and Julie Anderson

in fulfilling the program requirements and providing the students stimulating lessons about aviation as well as the benefits of the cadet program. We look forward to hosting interested students in the near future.”

Unique Opportunities

Grice-Dobbins shared her perspective of the program: “This program will allow my students to get hands-on STEM learning opportunities from people in their local community. They will also be introduced to cadets and learn about what it means to be a Civil Air Patrol cadet. I am excited for my students to see people in uniform who are here to teach them and be kind to them, as, unfortunately, uniforms sometimes give off a negative connotation for these students.

CAP Cadets at School program involvement

Two CAP Cadets at School squadrons are taking advantage of the adopt program to mentor students either in their own school or in community schools.

The Colorado Military Academy Cadet Squadron cadets in Colorado Springs have adopted their school’s sixth-graders. Led by the squadron aerospace education officer, Senior Member Charles Davis, cadets are coordinating and conducting the lessons and mentoring younger students.

At the John Adams High School Cadet Squadron in South Bend, Indiana, commander Maj. Dan Walsh received a Great Lakes Region aerospace grant to adopt an entire school, the Madison

“AS A CADET INVOLVED IN THE ADOPT PROGRAM, I CAN SPEAK TO THE POSITIVE BENEFITS THAT IT HAS ON CADETS WHO CHOOSE TO PARTICIPATE.”

— CADET 2ND LT, RYLEE SCHMUCK,
ADOPT-A-CLASSROOM AMBASSADOR

“My Title I students do not have a lot of exposure to engineers, pilots, STEM experiences, or much outside of their local small areas. This program will expose them to many new and exciting lessons that I could not bring them on my own. I want my students to realize their potential and capabilities by gaining new perspectives from the CAP cadets.”

STEAM Academy. Although only the fifth-graders are officially in the adopt program, the squadron cadets are teaching the ACE program to all 600-plus K-5 students.

CAP Aerospace Education has long been a vehicle to increase organizational diversity. This program will allow greater outreach opportunities for our

MINDSET |



squadrons to help put underrepresented students on a pathway toward preparing for a career about which they may not have been aware before connecting with CAP.

We also hope the program will help CAP's educator members understand and request the support and mentorship local squadrons can provide in conducting any of the many free aerospace/STEM programs offered to teachers nationwide. Senior members and cadets can serve as positive role models to students in the aerospace-themed academic,

character education, and physical fitness aspects of the ACE program.

Civil Air Patrol continues to be a beacon of hope in a time of uncertainty and lack of in-person engagement during this pandemic.

For more information about the program, email adopt@capnhq.gov. ▲



Cadet 2nd Lt. Rylee Schmuck of the Indiana Wing's River City Cadet Squadron teaches the principles of flight to students at Mars Elementary.

DONATE YOUR WINGS OR WHEELS

We make it easy to turn your plane or car into a donation for Civil Air Patrol.

Fast Paperwork & Tax Deductible
888-299-8150
GoCivilAirPatrol.org/donatewheels

Civil Air Patrol
U.S. Air Force Auxiliary

POWERED BY  

Aero Services

SOUTHEAST ALASKA



JNU ph: 907.789.0055
fx: 907.789.5103
unicom: 122.95
Juneau International (JNU/PAJN)

SIT ph: 907.747.7222
fx: 907.747.7212
unicom: 122.95
Sitka Airport (SIT/PASI)

KTN ph: 907.247.5701
fx: 907.247.5705
unicom: 122.95
Ketchikan International (KTN/PAKT)

Committed to providing you exemplary customer service

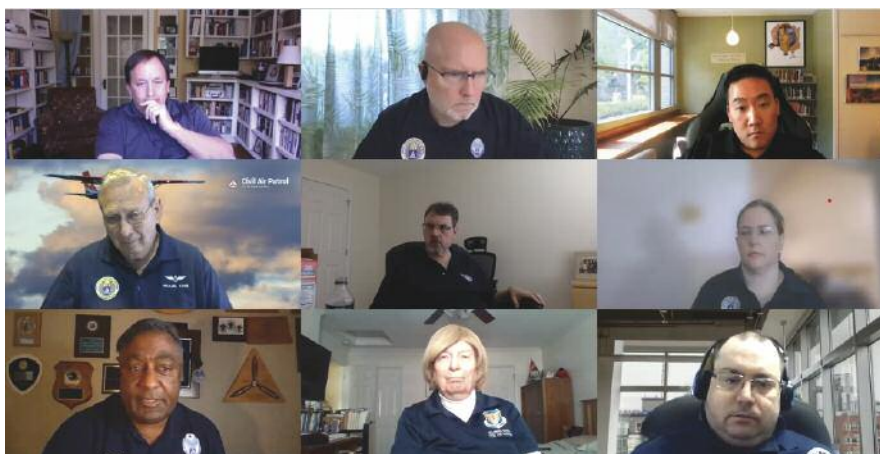
*Amenities
and
Services*

Complimentary Wi-Fi
Crew Cars
Deicing
Industry-leading Line Service Training
Strict Safety Standards

Aero Services is proud to support the Civil Air Patrol

aeroservicesalaska.com

Youth Development Conference 2021



■ The cadet program operates within a unique space. Cadet life is not quite school, or military training, or an internship, or summer camp, and yet each of those learning environments is present in Civil Air Patrol in some way. Indeed, we celebrate our unique recipe for turning youth into aerospace leaders.

The feeling that “CAP is different” is true in lots of great ways, but it has the potential to hold us back. Civil Air Patrol is just one of many out-of-school learning (OSL) or development opportunities available to youth, so we need to be attractive, competitive, engaging, and welcoming.

Locating the cadet program within the OSL ecosystem is good news because it means CAP can draw from peer organizations and a growing body of academic literature to learn how to be more effective with our youth in our unique space. We are not special in *what* we’re trying to do — transform young people into responsible citizens — but we are unique in *how* we do it, via youth-scaled

challenges centered around Air Force traditions and aviation themes.

Before the first Youth Development Conference (YDC) in 2019, Civil Air Patrol’s adult leader training focused on how to implement Cadet Programs successfully at the local and state level. Volunteer leaders would learn CAP standards, compare best practices, and brainstorm for solutions to perennial challenges affecting cadet squadrons. That’s important work, but it was too self-contained and reinforced the status

quo. Groupthink is a danger to every organization, so we needed to find a way to look outward.

What’s new is that YDC is a special forum for looking at the whole OSL or youth development field, seeing what our peer organizations are doing and what the researchers have learned, and trying to find new opportunities that might fit CAP. YDC gives us a venue for imagining totally new opportunities in ways that internally focused training would not.

This year, the annual Youth Development Conference, themed Equity and Justice in Cadet Life, was held in cyberspace because of the COVID pandemic. Nearly 100 members from all over the country gathered virtually to learn from subject matter experts, share best practices, and celebrate the success of the cadet program.

While the online format lacks some of the charms of in-person conferences, the ease of participation and extended accessibility meant that many were able to take part who might not have been able to otherwise. And we’re already looking forward to 2022. ▲

“WE ARE NOT SPECIAL IN *what* WE’RE TRYING TO DO — TRANSFORM YOUNG PEOPLE INTO RESPONSIBLE CITIZENS — BUT WE ARE UNIQUE IN *how* WE DO IT.”

Civil Air Patrol

U.S. Air Force Auxillary

CIVIL AIR
PATROL

FLY WITH US

Civil Air Patrol volunteers operate the largest fleet of single engine aircraft in the world—560 powered aircraft—plus gliders, hot air balloons, and UAS. This year we added 17 more Garmin G1000-equipped Cessna aircraft.

You don't need to be a pilot or have any military experience to serve our nation and neighbors—we have opportunities to match every interest and skill set in the air and on the ground. Fly with us and be a force for good.

Visit CAPvolunteer.com to find a unit near you.



Dedicated Members Raise the Bar



■ **Civil Air Patrol members are dedicated and resilient. In August, during the pandemic, CAP launched a new senior member Education and Training Program under the auspices of Volunteer University.** In January, we launched a new Mentoring Program. In both cases, the robust education and training and mentoring programs offered by CAP are examples of member benefits that help people advance in their careers, possibly earn more money, and definitely help make them better, more productive volunteers. After all, what better place could you imagine to

train the ultimate volunteers than Volunteer University?

Volunteer University has been discussed quite a bit in these pages over the last three issues. And now we can share that the initial results have exceeded expectations. CAP's first complete overhaul of professional development since the 1970s has been wholeheartedly embraced by our lifelong learners, who have collectively impressed us with their success. We have seen improvement in completions for all levels.

Volunteer University by the Numbers:

- Level 1 August-to-January year-to-year comparison: up 28%
- Level 2 Year-to-year comparison: up 55%
- Level 3 Year-to-year comparison: up 77%
- Level 4 Year-to-year comparison: up 191%
- Level 5 Year-to-year comparison: up 97%

Why do we see an uptick in completions? More flexible options have replaced barriers in the legacy program. Members appreciate the flexibility of completing modules online, on-site, or on-demand via technology such as Zoom or Teams that has become a staple of our professional, social, and educational lives during this global pandemic.

Capt. Nikolay Zhrebnekov of the California Wing said, "I would like to send out my heartfelt thank you to all of the staff of CAP Volunteer University who made this program possible. I am really enjoying the pace and the assignments. Under the old [Professional Development] program, I would not have finished the final level until after I would have retired, since districts are not willing to let people go do these kinds of courses during the school year."

Members also realize that improving their skills in Civil Air Patrol may help them in their work outside of CAP. Maj. Kathy Nicholas, the North Carolina Wing's director of professional development, said, "Members are not only increasing their professional knowledge of CAP, they are seeing personal growth through leadership and other courses. We will begin to see that our members who are completing the education and training modules will be more efficient and effective. This not only benefits the member inside and outside of CAP, but it also develops leadership in the

squadron and higher up while increasing retention.”

Col. Joe Winter, Volunteer University provost, praised the team implementing the new program. “I remain inspired by the incredible gifts and talents that our administrative and instructor teammates bring to the success of Volunteer University. Their hard work contributes to the success of our members as they progress within our shared education and training program.”

Online education and training have grown faster than on-site because of the pandemic. Members complete an average of 366 online training modules each day in AXIS, CAP’s Learning Management System. That’s a lot of training. Col. John O’Neill, the North Central Region commander, said, “The virtual format has allowed our members better access to higher-level training than ever before.” As wing operations begin to normalize as we emerge from the pandemic, we expect on-site training will ramp up also.

Truly, the new program and the content have been well-received and have proven impactful and effective. Lt. Col. Michael Willis, emergency services training officer for the Georgia Wing, said, “Being both a Level V instructor and a student in Volunteer University, there is so much knowledge packed into these modules, I can’t wait to discuss and learn from my fellow members.” Willis also serves on

the Mentoring Program staff.

In January, the Mentoring Steering Committee launched the new Mentoring Program just in time for National Mentoring Month. Col. Rose Hunt, former commander of the Wisconsin Wing, led the effort to develop the innovative new mentoring program that pays dividends in so many ways. Men-

more than similar organizations, gives back to our members in the form of tangible self-improvement opportunities that help hone skills, uncover new aptitudes, achieve certification, and more that can translate into career satisfaction and advancement.

Volunteer University, and now the Mentoring Program, are two examples

“CIVIL AIR PATROL REALIZES THAT THE SUCCESS OF OUR ORGANIZATION, OUR ABILITY TO EFFECTIVELY AND EFFICIENTLY EXECUTE OUR MISSION TO MEET THE NEEDS OF OUR NEIGHBORS AND NATION, IS CONTINGENT ON THE SUCCESS OF OUR VOLUNTEER MEMBERS.”

toring makes a difference in the lives of those who participate — both mentor and mentee. Studies show those who mentor others are more likely to advance professionally and consequently are more likely to receive pay increases. Mentees are equally likely to be successful.

Civil Air Patrol realizes that the success of our organization, our ability to effectively and efficiently execute our mission to meet the needs of our neighbors and nation, is contingent on the success of our volunteer members. Volunteers are wired to serve, and most gain a sense of satisfaction and enjoyment from their altruistic service. And CAP, perhaps

of how serving in CAP benefits our members as much as our constituents.

For those interested in teaching as a way to have a positive impact on your fellow volunteers, visit gocivilairpatrol.com/members/ed-training/volu-main and complete an application to teach. We’re planning to recruit another 1,000 instructors for Volunteer University in order to have an instructor in almost every unit. If more personal interaction suits you better, visit and apply at gocivilairpatrol.com/members/ed-training/mentoring to serve as a mentor. Or if you’d like to be mentored, you can request one on the same page. Please help us continue inspiring minds. ▲

KEEP



EM

FLYING!



By Lt. Col. Steven Solomon

For 80 years, Civil Air Patrol has been a capable, flexible, and professional partner for the armed forces. One key function in our capacity as a Total Force partner with the Air Force is to assist with training — some of which is very specific, but none of it is routine.

Civil Air
Patrol
members

know that the 80-year-old organization conducts aerospace education, cadet programs, and emergency services. But even the longest-serving CAP members may not know about the dozens of special programs — an array of ongoing missions with names like Cadet Wings, Falcon Virgo, Felix Hawk, Fertile Keynote, Green Flag, JSTARS, Operation Noble Eagle, Operation Bird Dog, and RPP. For the newest senior members and cadets to our most senior colonels, we'll shine a light on some of CAP's lesser-known missions.



Surrogate Remotely Piloted Aircraft (SRPA)

Arguably the best-known and longest-running military training support mission is the Surrogate Remotely Piloted Aircraft (SRPA) program, more commonly known as Green Flag. For the last 12 years, Civil Air Patrol has been providing vital training support to the Air Force, Army, Navy, Marines, and coalition air and ground forces as part of their predeployment preparation. CAP aircrews in specially equipped CAP aircraft simulate the work of the MQ-1 Predator and MQ-9 Reaper in air, land, and integration combat exercises.

“Infantry and air support troops from all branches of the military, predominantly the Army, are involved with these training exercises,” said Joe Piccotti, CAP’s senior national program manager for special missions. “The U.S. and visiting allied forces use the training in preparation for RPA combat ops involving reconnaissance, airborne assaults, and ground-directed airstrikes. The training also provides the currency requirements that support the development of tactics the airmen or ground forces require.”

To date, Green Flag East, CAP’s Surrogate Reaper program in Louisiana, has assisted in training 242,000 U.S. and coalition troops. For Green Flag West, its counterpart in Nevada, the numbers exceed 392,000 U.S. and coalition troops. Training includes past lessons learned, development of better radio communications, use of new equipment, and overall battle management.

The Nevada team supports Green Flag West operations using a CAP aircraft in the nearby Fort Irwin range in California. The Louisiana team supports Green Flag East operations using two CAP aircraft in the Fort Polk, Louisiana, range. The CAP aircraft and crews act as surrogates for Predator and Reaper RPAs either with an MX-15 turret containing an MX-15HDi sensor camera or a wing-mounted MX-15 sensor camera. The CAP aircraft are the same relative size and speed as Predator and Reaper RPAs.

“Ground troops can direct the CAP airplanes to fly where they need them during their training scenarios,” said Lt. Col. Steve Wood of Green Flag East. “The sensor pod is operated by the CAP sensor operator in the aircraft. When ground troops ask

Aircraft	Manufacturer	Wingspan	Length	Speed	Aircrew
MQ-9 Reaper	General Atomics	66	36	200 ktas*	0
MQ-1 Predator	General Atomics	55	27	117 ktas	0
206 Stationair	Textron Aviation	36	28	161 ktas	3
182 Skylane	Textron Aviation	36	29	145 ktas	3

*knots true airspeed



MQ-1 PREDATOR



182 SKYLANE



to see certain areas or images, the CAP sensor operator moves the sensor pod to provide the video downlink as requested.”

The original active aircrew roster numbered only 16 when CAP started the SRPA program. Now over 100 members serve in three-person crews — a mission pilot, a mission coordinator, and a sensor operator. Each crew participates in several of the more than 22 Green Flag exercises held yearly. Each exercise usually involves eight hours of flying a day for 11 days at altitudes of up to 16,000-18,000 feet, which requires supplemental oxygen for the aircrews.

Leveraging the efficiency and low operating cost of CAP aircraft helps keep training expense down and further validates the strength of Civil Air Patrol as an important training partner by eliminating the need to hire contractors to perform the role.

“Estimates provided by the Air Force in the past have stated that the cost of using CAP averages 25-30% of what would be paid to outside resources. Therefore, there is potentially a savings of 75% utilizing CAP,” Wood said.



MX-15 turret containing an MX-15HDi sensor camera, once located under the left wing, is mounted in the fuselage on newer aircraft.



Cadet Wings

Like many entities that rely on a steady stream of qualified pilots to sustain operations, the Air Force is taking steps to mitigate the pilot shortage forecast in the decade. To that end, Civil Air Patrol and the Air Force have again leveraged the Total Force partnership for a solution — Cadet Wings.

In 2019, Civil Air Patrol launched Cadet Wings as one solution to help the Air Force feed a pilot pipeline. The training is free to the qualified cadet/student pilot, yet there is no obligation or expectation to join any branch of the military after pilots earn their wings through CAP.

“The Air Force has allocated funds for CAP cadet flight training with the goal of fulfilling its mission of developing tomorrow’s aerospace leaders,” said Margarita Mesones, CAP’s cadet aviation career activities manager. “The goal is to assist cadets in obtaining their private pilot certificate, recognized by the industry as the first milestone for those who have a serious desire to pursue a flying career.”



Cadet Wings saves would-be pilots tens of thousands of dollars in training expenses by funding the fuel, aircraft rental, maintenance costs, Federal Aviation Administration Private Pilot Practical Test cost, and instructor expenses up to the private pilot certificate or 60 flight hours from enrollment. Cadets have six months to earn their certificate.

The program provides ample training to prepare them to pass the FAA Practical Test (more commonly known as the check ride) to earn their private pilot certificate in a single-engine aircraft, a glider, or a hot-air balloon. More than 70 cadets have earned their wings through the program.

Because a training slot in the program is so coveted, it is also extremely competitive. Thus the ideal applicant for the merit-based program already has a student pilot certificate with a solo endorsement and an appropriate FAA medical certificate, has passed the FAA Airman Knowledge Test, and exhibits the potential for continued CAP service as a cadet leader.

“We counsel our cadets to think of learning to fly as though they’re learning to play a new sport or learning to drive a car, that consistent practice reduces the number of hours needed to master a new skill,” Mesones said. “If a cadet flies five hours a week, then in perfect conditions using the 60-hour maximum allotted, a cadet can complete the program in just three months.”

Cadet Wings’ goals are for:

- participants to earn their private pilot certificate at a greater rate and in fewer hours than the general aviation community
- the mean cost per private pilot certificate to be less than the general aviation community average
- the percentage of program funds devoted to overhead to remain below 12%
- the program critiques from all stakeholders — cadets, instructors, mentors, and vendors — to indicate a positive experience
- participant diversity equal to or above demographic benchmarks.

While Cadet Wings is a relatively new program funded by the Air Force, Civil Air Patrol has been helping cadet earn their wings for decades in other ways. In-residence National Flight Academies are also offered throughout the year in various locations. These weeklong academies should soon be available once COVID-19 limitations are a thing of the past.

CAP’s fleet of 560 aircraft and volunteer flight instructors guiding cadets through flight training, both via Cadet Wings and National Flight Academies, is clearly something that differentiates Civil Air Patrol from other youth initiatives.

NASA astronaut Eric Boe, who piloted the space shuttle on missions in 2008 and 2011, earned his wings as a Georgia Wing cadet. Now a colonel in CAP’s Texas Wing, he credits the start of his successful career to learning to fly as a CAP cadet in the late 1970s and early 1980s.



“That was my first real opportunity to fly an airplane by myself,” he said in 2009. “CAP gave me that opportunity, and it made a difference in the long term.”

Rated Preparatory Program (RPP)

Now entering its third year, RPP is another joint training initiative that relies on Civil Air Patrol aircraft and flight instructors to assist its Total Force partner.

In this case, the Air Force-funded program provides training for active-duty nonflying Air Force officers who aspire to become pilots with the goal of improving their Airman’s Pilot Candidate Selection Method score.

“CAP provides approximately 7.5 hours of flight instruction with associated ground instruction,” said Lt. Col. Eric Templeton, CAP’s senior program manager for operations training. “Each student is mentored on-site and remotely by Air Force-rated officers as well as CAP pilots who are also current or former Air Force-rated officers. The program also includes the use of flight simulators that use artificial intelligence to assist with training and test preparation.”

In 2019, 52 Air Force officers completed the program, and 42 were selected for a rated position. In 2020, 41 completed the program, with results not yet announced.

More than 400 applications were submitted for the 2021 program, which will be offered to 60 Air Force officers and enlisted airmen at Denton Enterprise Airport in Texas and 60 others at Columbus Municipal Airport in Indiana. Plans are

already in progress for 180 airmen to participate in the program at three locations in 2022 and for 240 to attend at four locations in 2023.

“This is not a primary flight school,” Templeton said, “nor is it like CAP’s flight academies where the focus is on initial flight training. This program is focused on providing the education and flight instruction needed to improve scores.”

A CAP-certified flight instructor is paired with two Air Force students for five intense days of immersion in aviation. The



“Each student is mentored on-site and remotely by Air Force-rated officers as well as CAP pilots who are also current or former Air Force-rated officers.”
— Lt. Col. Eric Templeton, CAP’s senior program manager for operations training

crews remain a unit for all activities, providing more than 40 hours of aviation contact, discussion, and ground training. The students are required to complete an online ground school before attending — the same as a private pilot candidate.

A national volunteer team with 17 CAP-certified flight instructors, eight CAP operations staff, and two CAP maintenance officers is required for each week for the school, along with two staff members supporting operations from CAP



National Headquarters. About 18 aircraft and 20 ground vehicles are used.

The students and instructors also have access to FAA-approved Redbird flight simulators, feature-rich advanced aviation training devices designed with wraparound visuals, a fully enclosed cockpit, scenario-based training compatibility, and an electric motion platform to better simulate flight.

“It’s a demanding program that challenges the students,” Templeton said. “The success rate is overwhelmingly positive, so we know that the academic and physical challenges are well worth the effort.”

Joint Surveillance and Attack Radar System (JSTARS)

One of the lesser-known missions is also a Total Force collaboration. JSTARS missions are designed to help train air battle managers (ABM) aboard E-8C Joint Surveillance Target

Attack Radar System aircraft. The E-8Cs are a command, control, intelligence, surveillance, and reconnaissance weapon system built on a highly modified Boeing 707-300 platform.

Civil Air Patrol flew its first JSTARS mission, formally named Operation Peach Shield, in 2019 to verify VHF communication interoperability and airspace scheduling.

CAP marshals aircraft from units based across Georgia in locations including Macon, Peachtree City, Savannah, and Brunswick. Most are equipped with the latest G1000 all-glass avionics, which is tremendously beneficial for CAP aircrew who must plot courses and fly missions based on coded messages from the JSTARS aircraft orbiting high overhead.

CAP’s aircrews assist the student warfighters in the E-8C who are learning to apply the F2T2EA kill chain: find, fix, track, target, engage, and assess — information that must be coded and transmitted by the ABM, then received and decoded by the CAP aircrew who fly the assigned mission and report back to the ABM with a coded message.

“In essence, the ABMs use the JSTARS sensor to alert CAP aircraft to ‘suspicious’ ground movement. JSTARS directs CAP aircraft to fly to the simulated target and await instructions. It is then up to the direction of the ABM to have the CAP aircraft perform a simulated bomb drop on the target or shift to a follow-on tasking. This process is repeated over the 90-minute span by multiple controllers,” said Air Force Maj. Clay Gibbs, a 129th Combat Training Squadron instructor air battle manager.

“Working with CAP affords us an opportunity to practice our communication skills, ensuring that we work and talk at a pace that is efficient and effective for both our timeline and that of the pilots,” added Air Force 2nd Lt. Rebecca Brott, a 16th Airborne Command and Control Squadron air battle manager.

“Civil Air Patrol affords our ABM cadre an opportunity to train



“Civil Air Patrol affords our ABM cadre an opportunity to train with live pilots and aircraft when other military assets are unavailable.”
— Air Force Col. Amy Holbeck, commander of the 116th Air Control Wing



with live pilots and aircraft when other military assets are unavailable,” said Air Force Col. Amy Holbeck, commander of the 116th Air Control Wing. “The partnership between JSTARS and CAP is one we see value in continuing for a long time.”

“The training events are held weekly in approved airspace over central and southeast Georgia during VFR/daylight conditions during routine training missions,” Gibbs said. “CAP has an invaluable role in shaping how future air battle managers are trained in a safe and realistic environment.”



Operation Bird Dog

Other branches of the military also benefit from Civil Air Patrol’s capabilities and assets. Those who have studied CAP history have likely marveled at the bravery shown by its charter members — civilian volunteers — who flew anti-submarine patrols not long after the nation’s entry into World War II.

CAP’s Operation Bird Dog harkens back to those days, monitoring submarine movements but in a much more benign manner.

Conducted in 2020 by the Connecticut Wing for the U.S. Navy, the six-hour Bird Dog mission exercise involved three Los Angeles-class submarines that included the U.S.S. Hartford, which was deploying on a three-week training mission and departing Groton Harbor through the Long Island Sound out to the Atlantic.

The escort operation demonstrated the capabilities of CAP aircraft overflying submarines heading out to sea in a joint force protection exercise.

“The Navy doesn’t have any aircraft in the vicinity for this type

CAP’s Operation Bird Dog harkens back to those days, monitoring submarine movements but in a much more benign manner.

of mission,” said Col. James Ridley, incident commander for the exercise as well as commander of the Connecticut Wing. “They have small riverboats that escort the subs in and out of the harbor, but they can’t go too far.”

Five CAP aircraft were flown for the mission — two from Hartford-Brainard Airport and once each from Waterbury-Oxford Airport and Groton-New London Airport, with a historically significant aircraft from Robertson Airport in Plainville chosen especially for the lead.

“CAP members might recognize the tail number of the lead aircraft, N9344L, because it was the CAP aircraft that flew the only authorized overflight of New York City on Sept. 12, 2001, out of Long Island, New York, after 9/11 and was immortalized in the painting that hangs at National Headquarters and in the Pentagon,” Ridley said. “I chose this aircraft for that very reason.”



A Navy observer flew as a passenger in each of the CAP airplanes during the one-day exercise, which the Navy considered an experiment to see if such a mission could work. A Navy public affairs officer flying in one of the CAP aircraft took photos as the pilots flew either a serpentine or oval flight path as directed in advance of the submarines.

“As the boats and your team grow more familiar with each other, we may find common interest in increasing the duty cycle of escort services,” Navy Capt. Todd Moore, submarine base commander, wrote after the mission. “Periodic familiarization runs should provide both sides with the skills needed to respond to an emergency.”

In addition to support from the base commander and other Navy personnel, the lead training officer of new skippers was also enthusiastic.

“This was a huge success for the Connecticut Wing and CAP,” Ridley said. “While we have not as of yet secured a long-term escort mission, the exercise opened up some eyes and doors to other missions with the submarine base and has created a new partnership with one of our military branches.”

Operation Noble Eagle

No Civil Air Patrol missions receive more media coverage and attention from the public than the use of CAP aircraft by the Air Force and other agencies to practice stray or unidentified aircraft intercepts. These missions have intriguing names like Falcon Virgo, Felix Hawk, and Fertile Keynote.

“These missions are flown to support the ongoing training and proficiency of the alert fighter units and other supporting organizations,” said John Desmarais, CAP’s operations director. “We typically support about 250-plus of these missions a year.”

Falcon Virgo is a series of recurring exercises in support of Operation Noble Eagle, which started as the military response to the 9/11 terrorist attacks to place a greater emphasis on surveillance and control of the airspace over the U.S. and Canada. The exercises are designed to test airspace security,

especially around major American cities like New York and Washington, D.C.

As an example of a Falcon Virgo mission, last year Civil Air Patrol pilots flew into a restricted U.S. Army range in Texas that simulated restricted airspace over the nation’s capital. For five days CAP aircraft flew about 18 times 24 hours a day — six per eight-hour shift — along routes exercise evaluators designated to meet training objectives.

Felix Hawk exercises are carefully planned and closely coordinated with the FAA and the Continental U.S. North American Aerospace Defense Command Region to help ensure the Western Air Defense Sector’s (WADS) rapid response capability. Fighter aircraft intercept a military or CAP aircraft that isn’t responding properly to authorities, with the aim of preventing any airspace restriction violations and terrorist attacks.

Fertile Keynote exercises are designed to provide low-altitude intercept, visual identification, and drone intercept training to test pilots on their responses to emergency situations involving other aircraft.

As an example of a Fertile Keynote mission, last year F-15E Strike Eagle fighter jets from the Air Force’s 336th Fighter Squadron at Seymour Johnson Air Force Base, North Carolina, practiced intercepting a North Carolina Wing plane simulating a slow-moving aerial threat into restricted airspace.

Last year, CAP supported 220 of these intercept training missions, flying almost 1,100 sorties totaling over 1,800 hours.

Also, for the last 20 years, Civil Air Patrol has participated in an Air Force program that invites media to a briefing and intercept demonstration near the football stadium where the Super Bowl is played. It’s held about a week before the game at the nearest Air Force or Air National Guard base.

Before Super Bowl LV this year in Tampa, representatives from the Air Force, Air National Guard, FBI, Customs and Border Protection, FAA, and Tampa Police Department highlighted how they would partner with NORAD to protect restricted



OPERATION NOBLE EAGLE



airspace around Raymond James Stadium in Tampa on game day. A 125th Fighter Wing F-15C aircraft, 6th Air Refueling Wing KC-135 Stratotanker, Customs and Border Protection UH-60 Black Hawk helicopter, Tampa police helicopter, and CAP Cessna 182 were on display for the media.

Partnerships thrive when all parties contribute their strengths to achieve something that wouldn't be possible alone — they're stronger together. As a Total Force partner, Civil Air Patrol is often asked to perform missions that match the unique assets and skills of our team. CAP is especially proud of its role as a noncombatant that helps U.S. warfighters remain sharp to perform their mission when called. *Semper Vigilans.* ▲

No Civil Air Patrol missions receive more media coverage and attention from the public than the use of CAP aircraft by the Air Force and other agencies to practice stray or unidentified aircraft intercepts.

PANDEMIC & POLITICS

By Kimberly Carole

What do the pandemic and politics have in common?

Potential.

What has become the new (but temporary, one hopes) normal as the result of COVID-19 has allowed Civil Air Patrol to pivot to a new way of facilitating Legislative Day — toward greater innovation and expanded capabilities in the face of a national shutdown.

Civil Air Patrol is more than flexible; it is resilient.

As the pandemic continued, CAP's Government Relations team and members from every wing quickly adapted to virtual operations with an unprecedented response to requests for assistance from federal, state, and local officials. And when it came to squeezing lemons into lemonade by capitalizing on virtual outreach to state legislators and Capitol Hill, nobody set up a lemonade stand better.

Because of restrictions and health concerns, Legislative Day was converted from an in-person event where members from every wing visited Capitol Hill to an online experience that has become very familiar — and even fun and comfortable for most.

Despite differing levels of remobilization, each CAP unit, wing, and directorate was impacted by the national shutdown. Armed with knowledge of and plenty of lead time for the shutdown at the U.S. Capitol, volunteers and corporate staff rapidly adjusted to create the digital assets and virtual platforms needed to stay connected and carry out this year's campaign. The event itself was transformed from a one-day event into a three-week National Legislative Day Campaign (#NLD21CAP).

What once was an occasion to meet with 540 legislators and their staff in a single day became an opportunity to conduct business at a more relaxed pace. The unintended results of NLD21 became a communication tool for continued operations and outreach. Likewise, using digital as well as printed versions of the Report to

Congress, Wing Reports, CAP Fact Sheet, and more made it even easier to share the information with the click of a mouse.

What's more, the Report to Congress was converted into a digital flipbook that legislators could page through like a magazine and discover bonus content such as short videos to help tell the CAP story — an option unavailable in person.

To serve the fresh lemonade, Civil Air Patrol leadership asked members to conduct a full-court press in organizing their legislative efforts. Larger wings could now meet online with every congressional office in their state. This added exposure should pay dividends long after COVID-19 is in the rearview mirror.

While the pandemic shut down in-person Legislative Day meetings, it produced even more potential in the form of future hybrid outreach with online meetings as the norm, not out of necessity but rather desire based on convenience and effectiveness. Virtual meetings like NLD21 provide the

opportunity for members to participate without the expense of travel to Washington, D.C. And the ease of follow-up video calls allows CAP Government Relations unprecedented face time — well, screen time — with congressional staffers. Furthermore, CAP members can reach their local officials and state legislators much more easily.

Hosting NLD21 in cyberspace certainly wasn't a choice. We lost the opportunity to meet and greet our elected officials and CAP family — some of whom we get to see only once a year. But we did get to meet some gregarious cats on-screen and saw some happy kids Zoom-rush a call or two for shared moments of joy and laughter.

Like all missions Civil Air Patrol accepts, we always deliver regardless of the obstacles. Our specialty, after all, is making lemonade out of lemons. And if you'll pardon the pun, this just proves we can do virtually anything when we work together as a team — One CAP. ▲

Civil Air Patrol is more than flexible; it is resilient.

EMERGENCY SERVICES Technology Ushers in New Capabilities

EMERGENCY SERVICES By the Numbers

70K+
70,919 HOURS WERE FLOWN
IN CAP'S FLEET OF 560
AIRCRAFT

91%
CAP-DEVELOPED RADAR/
CELLPHONE FORENSICS
SOFTWARE HELPED SAVE 119
[91%] OF THE 130 LIVES SAVED

\$193M+
2020 VALUE OF CAP MEMBERS'
SERVICE TO AMERICA —
\$193,721,863



Civil Air Patrol's search and rescue capabilities were elevated in 2020 through the use of cellphone forensic software and radar analysis tools developed and updated by CAP members. Using this technology, CAP finished the fiscal year with 130 lives saved, making it one of the most productive years ever for the organization's search and rescue efforts.

In its role as the U.S. Air Force auxiliary and as a Total Force partner, CAP also conducts disaster relief, air defense training and other critical missions for America. Aircrews flew more than 70,000 hours in 2020 in CAP's large and capable fleet of single-engine planes. More than 75% of these flying hours came on Air Force-assigned missions.

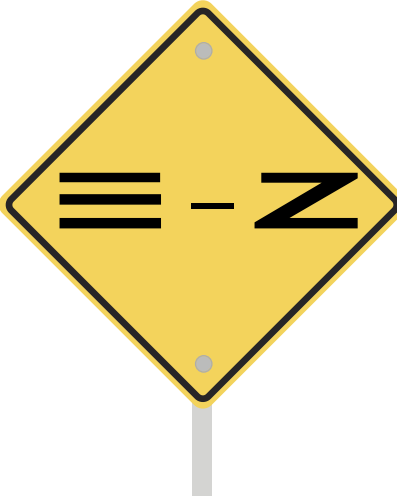
Technology, both old and new, helped in the performance of these missions. CAP also conducts disaster relief, air defense training and other critical missions mentioned earlier in this report. Recent advances in aerial photography greatly enhanced CAP's disaster relief responses in 2020, helping aircrews provide valuable 3D imagery to the Federal Emergency Management Agency-WalloAir camera pods were used early in the fiscal year as part of the Puerto Rico Wing's earthquake response and continued into a busier-than-usual hurricane season along the Gulf of Mexico before ending with wildfires in California, Oregon and Washington state.

CAP also purchased and fielded new small Unmanned Aerial Systems, boasting nearly 2,000 sUAS toward year's end — all meeting Department of Defense standards that allow for expanded mission support in the future. CAP operates the largest fleet of service sUAS in the nation and is a leader in the growing remotely piloted aircraft world. ▲

This Imagery taken with a WalloAir camera pod provides a multi-spectral view of the ground, resulting in 360-degree, 3D images of a neighborhood affected by Hurricane Laura in Louisiana in August. Specialists can review the imagery from all angles in assessing damage and generating estimates for debris collection.

An interactive version of the 2020 Report to Congress was created as a digital flipbook. This tool allowed readers to page through the report like a magazine and discover embedded videos to help share the Civil Air Patrol story in a more dynamic manner.

DRONE-ZONE



By Lt. Col. Alan Frazier

This past year has shown that many things can be done remotely as efficiently as in-person. In this case, the role of the remote pilot isn't a new remote task, but some changes will help raise the bar for remote pilot proficiency.

■ Over the last two years, Civil Air Patrol has acquired more small unmanned aerial systems (sUAS) — more commonly, drones — than any other civilian organization in America. With 2,036 sUAS distributed among 52 wings, CAP is well positioned to leverage drone technology and capabilities to advance its primary missions of emergency services, aerospace education, and cadet programs.

The utilization of drones by U.S. commercial operators and public safety agencies has grown exponentially over the last six years. For example: In 2014 fewer than 12 public safety agencies had acquired sUAS. Today, an estimated 566 fire departments and 1,134 law enforcement agencies and search and rescue teams are using them. Civil Air Patrol used drones extensively in Puerto Rico in the aftermath of the earthquakes that rocked the island in 2020.

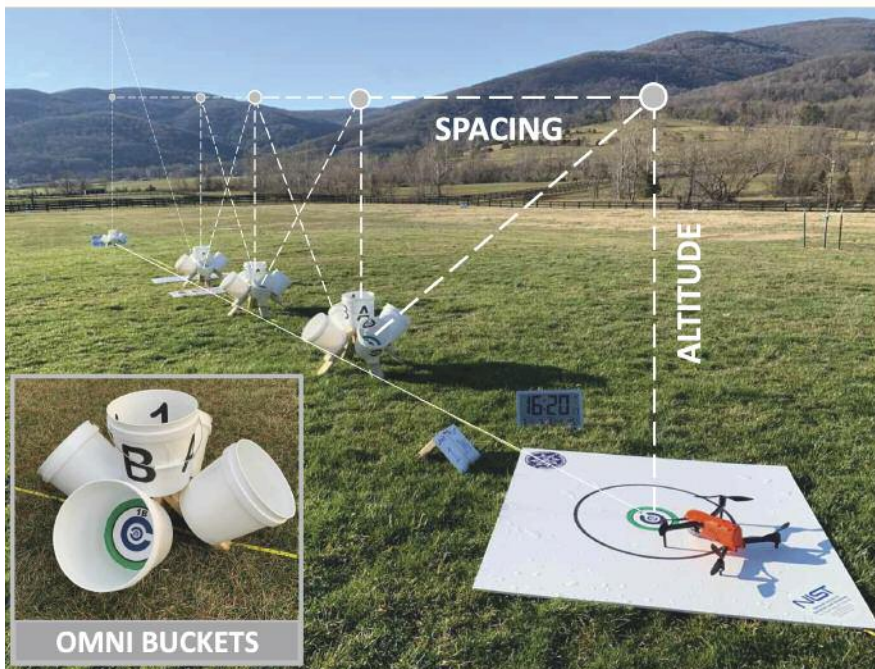
A variety of factors influenced this increase — cost-effectiveness compared to traditional manned aircraft; general realization that drone use is not inherently an invasion of privacy; and the Federal Aviation Administration's enactment



North Dakota Wing Commander Col. Ken Schuler serves as a CAP sUAS remote pilot check pilot examiner.



SCALABLE TEST LANES (ALTITUDE = SPACING)



in August 2016 of 14 CFR Part 107, “The Small UAS Rule.” Part 107 created a new FAA certificate: remote pilot.

Applicants for a remote pilot certificate must pass a 60-question FAA Remote Pilot Examination exam covering 12 aeronautical subject matter areas including airspace, aeronautical charts, meteorology, aeronautical decision-making

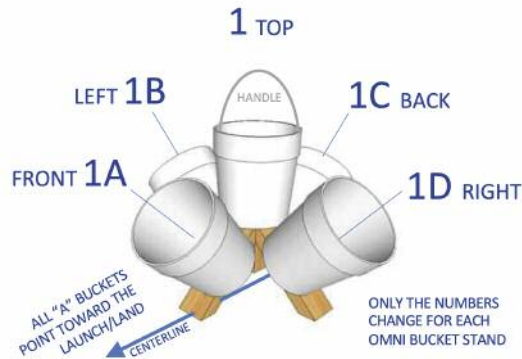
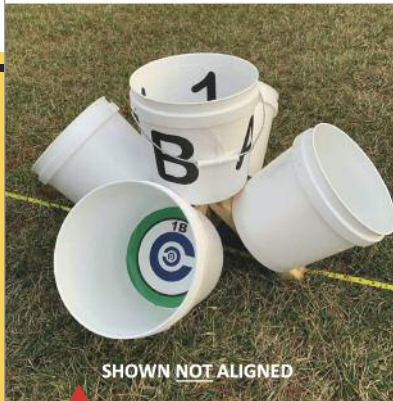
and the specifics of Part 107 regulations, and then apply to the FAA for the certificate.

Unlike piloted aircraft certification, however, an individual can obtain an FAA remote pilot certificate without ever having flown an unmanned aircraft.

Nonetheless, flying safely requires

knowledge and skill. While the exam is a good evaluation of remote pilot knowledge, the lack of a practical examination evaluating skill (like a check ride) potentially increases liability exposure for individuals and agencies using sUAS. An accompanying skills evaluation is needed to ensure the safety of the remote pilot, bystanders, property, and manned aircraft in the area.

WHITE BUCKETS & GREEN RINGS IN STANDARD TEST LANES



BLACK BUCKETS & COLOR RINGS EMBEDDED INTO SCENARIOS



Omni bucket apparatus is the heart of the NIST test lanes.

Adam Jacoff, a project manager at the National Institute of Standards and Technology (NIST), said, “The first step toward credentialing remote pilot skills is to get everybody onto the same measuring stick. That’s where standard test methods can play a key role. Especially across public safety, industrial, commercial, and even recreational pilots. All need to demonstrate essential maneuvers to maintain positive aircraft control while performing whatever payload functionality is necessary to successfully perform the intended tasks.”

Jacoff is leading an international effort to develop standard test methods for sUAS. The initial suites for Maneuvering and Payload Functionality can be used to evaluate various system capabilities and remote pilot proficiency.

The NIST sUAS Standard Test Methods were developed with significant support from the Department of

Homeland Security’s science and technology directorate. This bodes well for potential universal adoption of the test methods, which would be a good fit for Federal Emergency Management Agency resource typing.

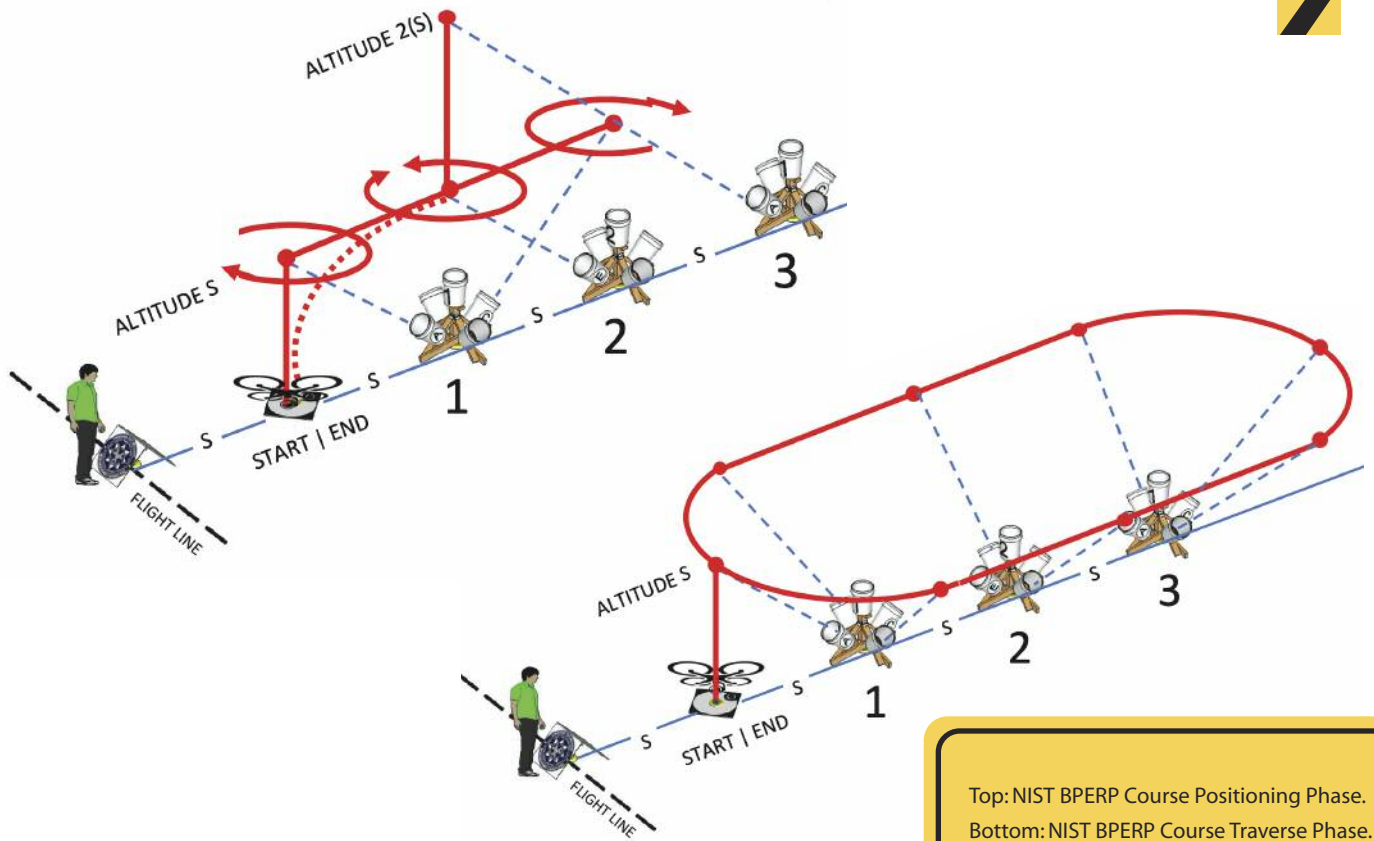
The NIST test methods are already being used as the basis for statewide emergency responder credentialing in Colorado and Texas. Civil Air Patrol recently decided to integrate the standards into its credentialing process.

Other state and local emergency response organizations are also adopting the test methods. Canada is moving quickly to make the tests the basis for credentialing its emergency responders nationwide. The Airborne Public Safety Accreditation Commission is strongly considering adoption. Others will certainly follow.

Ben Miller, director of the Colorado Center of Excellence for Advanced Tech-

nology Aerial Firefighting, has followed the NIST project from the inception. “NIST was one of the very first evaluation groups to show interest during the early days of UAS in public safety,” he said. “The rigor that today’s standard test methods show is a direct result of their years of work into the project. The applicability of the method supports acquisition decisions as well as employment considerations. The NIST sUAS Standard Test Methods produce data that can be used to answer the questions of ‘What system do I buy and what system do I use for which mission?’”

The NIST sUAS Test Methods include four test methods: Basic Proficiency Evaluation for Remote Pilots (Part 107 qualification), Open Test Lane, Obstructed Test Lane, and Confined Test Lane. These methods can be used to evaluate sUAS capabilities and sensor systems or remote pilot proficiency for credentialing. The tests are easy to conduct alone or in groups, inexpensive to



Top: NIST BPERP Course Positioning Phase.
Bottom: NIST BPERP Course Traverse Phase.

set up, and quickly performed, typically requiring under 30 minutes to conduct all the tests in a given lane.

NIST has done an excellent job of creating a comprehensive user guide, scoring forms, and apparatus targets that can be printed and placed in the buckets. The evaluation can be administered in 10 minutes using three omni bucket stands, a 50-foot tape measure, a stopwatch, and a compact test area of 50-by-20 feet, so it can easily be administered indoors or outdoors

The Basic Proficiency Evaluation for Remote Pilots (BPERP) is the entry-level test method. It is designed to complement the Part 107 Remote Pilot

Certificate by providing an inexpensive, easily duplicated mechanism for assessing remote pilot flying skills. The BPERP requires the remote pilot to conduct three takeoffs and landings from a 12-inch radius circle, climb to specified altitudes of 10 feet and 20 feet, conduct yawing turns, and conduct forward, reverse, and transverse flight maneuvers. The goal is to capture still images of 36 targets placed within 2-gallon buckets fastened to three omni bucket test stands constructed from 2-by-4-inch and 4-by-4-inch lumber. The bucket stands are easy to assemble and can be transported in a couple of nylon golf club bags or simply stacked and placed in a vehicle. The test consists of one maneuvering phase and two traverse flight phases.

NIST standard sUAS test methods represent an excellent way for Civil Air Patrol to raise the bar on its remote pilot credentialing with more rigorous and comparable evaluations. CAP can also use them to gain more information about what different sUAS equipment can reliably do.

The combination of pilot skills and equipment capabilities, with tracked scores over time, provides an essential measure of readiness for any given mission. Each set of tests, either conducted in a standard test lane or embedded into an operational training scenario, makes it possible to evaluate readiness more rigorously while practicing procedures and collecting and properly logging data.

Quantitative scores captured with standard test methods can provide the rationale for necessary changes. By establishing minimum thresholds of remote pilot proficiency, Civil Air Patrol will further insulate itself from potential civil liability by demonstrating enhanced due diligence in vetting its sUAS pilots. The NIST test methods will provide an easily implemented measuring stick for sys-

tems and pilots, adding a higher level of standardization to CAPF 70-5U pilot certification.

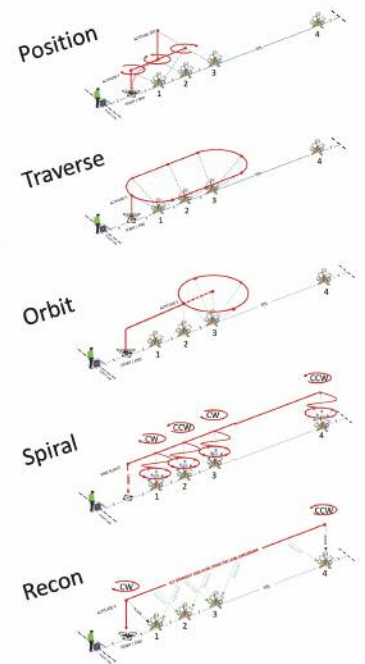
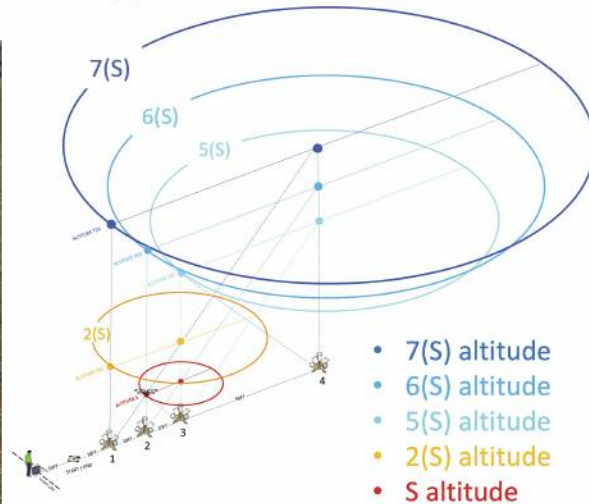
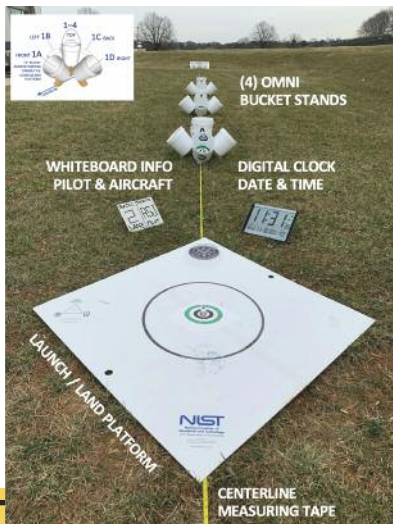
Over the next two years, CAP will be working with the National Institute of Standards and Technology and the Airborne Public Safety Association to host NIST sUAS standard test methods “train-the-trainer” workshops around

the country. Once sufficient personnel have been trained, CAP will incorporate the NIST standard test methods into the CAPF 70-5U process. ▲

Evaluate Various Flight Paths and Sensors

Open Test Lane

5 Different Orbits in Every Lane Spacing
(S) = 10ft, 20ft, 30ft, or other



NIST Open, Confined and Obstructed Test Lanes provide opportunities for expansion of pilot skill sets.



EXPLORE CAREER OPPORTUNITIES WITH THE
LARIMER COUNTY SHERIFF'S OFFICE

SHERIFF JUSTIN SMITH AND STAFF
THANK CIVIL AIR PATROL
FOR YOUR SERVICE TO THE
CITIZENS OF LARIMER COUNTY



Scan here - larimer.org/sheriff/recruiting



Maria Hall
WAI 84839

Ashlynn Galm
WAI 92412

CHRISTOPHER MILLER

We are pilots, mechanics, astronauts,
air traffic controllers, airport managers,
aerospace engineers, flight attendants,
educators, enthusiasts,
and members of the military.

We are Women in Aviation International.



JOIN US! WAI.ORG

Trailblazer

California Wing member is the first female pilot in the Green Flag program

By Sheila Pursglove

■ A member of Civil Air Patrol's California Wing Amelia Earhart Senior Squadron 188, Capt. Karin Hollerbach has emulated that famous aviator in blazing a trail. Last year, she became the first woman pilot in CAP's Green Flag program (see "Keep 'Em Flying" page 14), which provides realistic Predator/Reaper remotely piloted aircraft (RPA) integration into air and ground force battlefield combat training.

"It is special to me, but let's not forget others have paved the way," Hollerbach said. "There are several other women who are or who have been sensor operators and mission coordinators. I've flown with several — they're amazing. Some are also pilots, just not Green Flag pilots. If none of these women had come to the program before me, it would have been a lot harder for me.

"Just as importantly, several men played a role — encouraging me to apply, helping me learn the lingo, training me in the airplanes, and so on," she said. "So being the first woman to become one of our pilots is important not just for me and for other women who might aspire to that, but also is something everyone who helped along the way can feel proud of.

"I feel pretty strongly that things are



Capt. Karin Hollerbach, shown during weekend CAP flight training, is the first woman pilot in the Green Flag program.

never about just one person's achievements."

Hollerbach hopes to see more CAP women in the Green Flag program. "If my being there can help inspire other women members, fantastic," she said. "If I can do something to encourage or help them along the way, even better.

"It's an honor to be the first — but I sure don't want to remain the only one."

Hollerbach thoroughly enjoyed her intensive week at Green Flag University and particularly relished being out on the range. "It's often significantly more challenging than our training flights are," she said.

And is it easy being the sole female pilot? "Sometimes easy, sometimes ...

not so much," Hollerbach said. "What's made it certainly a lot easier is that I'm used to being in all-male environments, because of my professional and other hobby interests, and that I've met some of my best CAP friends via Green Flag.

"I don't try to 'fit in' as in being like the men — I basically show up as me. When I feel like I need to speak up about something that arises because I'm a woman, I do, but I also try to focus primarily on doing the job, respecting my colleagues, and enjoying the camaraderie."

Preparing others for combat missions has provided an emotional challenge. "It was very difficult for me initially to get my head around that, especially because I have no background in military matters," Hollerbach said. "But they just needed me to do this job at a professional level, so they could train and develop their own skills and hopefully become a little safer once they did arrive at their war destination.

“I can provide what they need from us. To live up to what I feel is a lot of responsibility, I remind myself to always do the best I can and not lose sight of the context in which we’re operating.”

Occasional opportunities to speak with U.S. Air Force and U.S. Army members help make the activity very real for Hollerbach and provide insights. “Even just from the tiny sliver of what I can observe from my vantage point, I’m in awe of people who have served in areas of conflict or outright war and who hopefully have been able to grow from that as compassionate human beings, partly because of and partly in spite of everything they’ve experienced,” she said.

“In some strange way, my experience with Green Flag — and other parts of CAP that touch more directly on our military experience — has given me a greater appreciation for the multifaceted role our military plays, not only in war.”

Unfortunately, the COVID-19 pandemic canceled numerous missions last year. “It’s been frustrating for everyone — and no doubt there will be a lot of retraining happening for everyone,” she said. “Still, I’ve had enough of a taste of flying in the actual missions to know I love it.”

Born and raised in Alaska, Hollerbach holds a doctorate in biomedical engineering, control theory, and robotics. She took flying lessons for the freedom

to explore and also for the complex and varied skills — “part knowledge of various subjects like aerodynamics, weather, and ATC (air traffic control), part motor skills, part decision-making and judgment,” she said.

“And it’s just fun; there’s no other way to describe it — this metal box with things sticking out the sides of it actually flies! How amazing is that — physics in action. Every time I take off, I still have this feeling of awe that it all works.”

cated drone pilots. I want to see more women in drones — senior members and cadets.”

A CAP member since 2013, Hollerbach said she didn’t quite know what she was getting into. “But I’ve made some incredible friends,” she said. “Besides enjoying the working relationships, I feel I’ve also grown tremendously as a pilot and more generally as an aircrew member. I hadn’t previously realized how much flying could be teamwork

“I DON’T TRY TO FIT IN AS BEING LIKE THE MEN
— I BASICALLY SHOW UP AS ME.”

Hollerbach, who works professionally with a drone company in Europe and with a large global drones-as-a-service company, leads small Unmanned Aerial Systems training and operations for the California Wing.

“There are some great mission opportunities, and I’m thrilled to be part of our MOU (memorandum of understanding) with NASA/USRA (Universities Space Research Association),” she said. “It’s been incredibly rewarding to see how many people in our wing want to train and become sUAS technicians and mission pilots and go on real missions.

“We have well over 100 FAA-certifi-

and how much I enjoy that aspect.”

She also has learned a lot on the ground. “I didn’t really know that much about emergency services, search and rescue, disaster relief, so it’s been inspiring to apply skills in ways that benefit the community. It sounds trite, but it is a powerful combination that adds meaning to all these hours we all spend volunteering.” ▲

Up for the Challenge

Distinguished Flying Cross Recipient Encourages a Career in Pararescue

By Jennifer Gerhardt



■ It was business as usual for the 13-year-old growing up in Orlando, Florida. He was involved in the Boy Scouts, and life was good. Then one day, his mom found out about Civil Air Patrol. From that point on, Tom Culpepper's life was going to change.



“I shifted from Boy Scouts to Civil Air Patrol,” said Culpepper, now a master sergeant in the U.S. Air Force. “It had to do with the squadron at the time. We did a lot of squadron training events, and my particular squadron was focused on search and rescue training.”

“THE DECISIONS WE MAKE
IN OUR LIVES FORM
WHO WE ARE.”

As Culpepper continued with the Florida Wing's Seminole Composite Squadron, he participated in two encampments. Then at age 16, he attended the pararescue orientation course.

“It was the first time I had ever heard of pararescue,” he chuckled. “It clearly had an impact on me.”

In 2004, Culpepper joined the U.S. Air Force and knew he wanted to be in pararescue.

“CAP definitely gives you an advantage,” Culpepper said. “Going to the pararescue course is something no one else gets to do. It gives you a glimpse of what the job is, what it entails, and what it will be like. I would definitely recommend it.”

During the Air Force's pararescue orientation course, Culpepper's dream almost ended. Halfway through, he failed a few tests. The instructors gave him a chance to try a second time, and he said yes.

Culpepper was 16 weeks into the course when he fell and injured his head. Normally, that would spell the end of participation in the course. His medical tests were normal, however, and he insisted on continuing. And he finished the course.

Culpepper went on to earn the Distinguished Flying Cross in 2014 for an Afghanistan mission in 2010. He was in an HH-60 Pave Hawk helicopter helping hoist wounded soldiers to safety. When the helicopter began losing its lift, the pilot wanted to cut the cable and drop the soldiers back to the ground. If that happened, though, improvised explosive devices could detonate. The flight engineer completed the hoist, and the rest of the soldiers were saved.

After that deployment, Culpepper went on to be an instructor at Air Force Combat Dive School, one of the Department of Defense's three special forces dive schools. From there, he moved to Special Operations Command Headquarters to run the pararescue medical program.

"It was a departure from doing missions, to teaching people to do missions, to managing people," Culpepper said. "Now I'm back on a team in Special Operations Command. I'm managing training and getting everyone ready to go out and do the job."

As he reflects on his 17-year military career, he still uses lessons learned from CAP leadership courses. Because he learned them when young, they're second nature.

"The skills you learn really do stay with you," Culpepper said. "The lessons stay with you. You might not realize it, but you are learning to lead, interact with people, and skills in self-discipline will pay off. It absolutely will."

One of the essential skills he learned is how to be a follower before becoming a leader.

"It pops up in various situations even now," he said. "It translates into knowing when to sit back and listen and understand what people need, as if you were them. Sometimes you need to guide them to what they need."

“BE STUBBORN AND STICK WITH WHAT YOU’RE TRYING TO DO. DON’T LET OTHER PEOPLE DRIVE THAT BUS FOR YOU.”

Culpepper encourages young cadets to broaden their horizons and explore everything available within CAP. Go do it, explore, figure it out, and let it form what you want to do with your life.

"Whatever it is that you choose to do, the best advice I can give is to not be afraid of the challenge," he said. "Don't be afraid of those things. Put yourself out there and try."

For the CAP pararescue course, he believes girls should absolutely go. Especially since the Air Force opened up special operations to females in 2015.

"The skills you learn are universal," Culpepper said. "Spending the day hiking, rappelling, navigating, and learning rescue skills ... there is absolutely no reason they shouldn't go."

Even if a cadet fails the challenge, Culpepper reminds them it's not the end of the world, and lessons can be learned there, too.

"The worst thing that is going to happen to you is that you might fail," he said. "That's actually a really good lesson, too. Learning to deal with failure when it happens is a life lesson. It really defines who we are when we react to failure. Get your mind right, learn from it, and move forward." ▲



PARAGON
AIRCRAFT SERVICE, INC.

Cessna, Cirrus,
Diamond, Rotax
Authorized Service
Center

19 Wright Way, Fairfield, NJ 07004
Office: 973-575-0364 Fax: 973-244-1884
Email: paragonaircraft@gmail.com
www.paragonaircraft.net



SKYPARK
WADSWORTH • OHIO

Learn to Fly! Flight Instruction
330-334-9921 Basic & Advanced
www.flyskypark.com

3071 Greenwich Rd.
Wadsworth, OH 44281

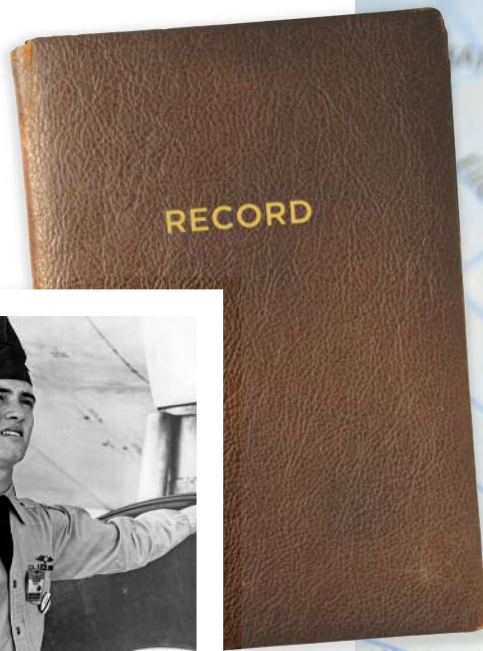
Antarctic Adventure and Operation Deep Freeze II

By Col. Frank A. Blazich Jr.

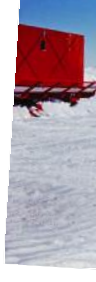
On Sept. 4, 1956, the U.S. Air Force announced the selection of 17-year-old Cadet Maj. Robert N. Barger III of Peoria, Illinois, as the official Civil Air Patrol participant in Operation Deep Freeze II.

The yearlong U.S. Navy-led operation in Antarctica and the South Pole would prepare a series of bases for the International Geophysical Year. Barger, having just returned from Denmark as part of the International Air Cadet Exchange, would serve as a working member of the 80-person team from the 18th Air Force operating Douglas C-124 Globemaster II transport aircraft to supply the polar operations in conjunction with the Navy and the scientific community.

Beginning in October 1956, Barger's journey to the bottom of the world took him from Peoria to Donaldson Air Force Base, South Carolina; Travis AFB, California; Hickam AFB, Hawaii; Canton Island, Fiji; Melbourne, Australia; Christchurch, New Zealand; and finally to McMurdo Sound in Antarctica. During his time on the ice, Barger would be a crewmember of the first Air Force aircraft to fly over the South Pole, the first teenager to do so; the first person to celebrate an 18th birthday in Antarctica; and the first Catholic to serve as an altar boy in Antarctica.

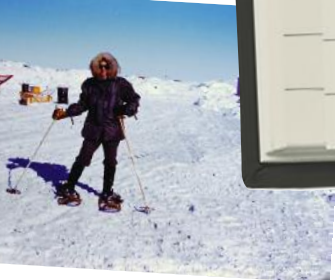


Until his return to the U.S. in February 1957, Barger kept a daily journal of his activities and brought along his camera. Earlier this year — after a long academic career in which he earned a Ph.D. in the history of education and taught for almost 40 years in such fields as computer ethics and applications, moral theology, and education before retiring from the University of Notre Dame — Barger donated his journal, photographs, and several artifacts from his amazing cadet adventure to the Col. Louisa S. Morse Center for CAP History. The following are edited excerpts of his journal paired with some of his photographs:



Donaldson Air Force Base, South Carolina, Wednesday, October 3, 1956 — Everyone was anxious to get started but still there was a tinge of regret at leaving home for six months, however this is routine for the Globe-girdling flyers of the 18th Air Force. Colonel Horace A. Crosswell, the South Pole mission commander, arrived on the line and soon after we boarded the aircraft and took off with a layover for sunny California. During the smooth 10-hour flight across America I explored the different sections of the aircraft. I found, through conversation with the crew, that the C-124 is the largest operational transport in the Air Force, it has three decks, including a "basement," plus a large flight deck. It can carry 25 tons of cargo, 200 fully equipped troops, or 127 litter patients. It is called Globemaster since it can fly to Europe, North Africa, India, South America, the Far East, the Arctic and Antarctica with equal ease. We arrived at Travis AFB and checked into the Bachelors Officer Quarters.

Harewood Aerodrome,
Christchurch, New Zealand,
Wednesday, October 17, 1956 —
I checked out my Antarctic gear which included a parka, snow pants, mukluks, goloshes, bunny boots, shoe packs, a hat, shirt, pants, sunglasses, socks, flying boots, and a bag to carry it all in.



McMurdo Sound, Antarctica,
Friday, October 26, 1956 — The
flight from Harewood Aerodrome,
Christchurch, New Zealand took
13:00 hours and it was 08:00
o'clock when we landed at Williams
Field, McMurdo Sound, Antarctica.



I went over to Scott's* hut and took
a look at the construction and glass
windows. It is filled with snow and no
one is allowed to enter since it is
considered a shrine. Outside I found
two boxes of crackers preserved by the
cold weather since Scott left them
there in 1900 or thereabouts.



*The British Antarctic Expedition of 1910-1914, led by Captain Robert Falcon Scott, Royal Navy, erected a small building in 1911 on Ross Island serve as a living space and storage facility. The building would later be used by members of Sir Ernest Shackleton's Imperial Trans-Antarctic Expedition from 1914-1917 before being abandoned and buried by the snow. Rediscovered by U.S. Navy personnel of Operation Deep Freeze I in 1956, the hut and its contents were preserved by the sub-freezing temperatures and ice. Today, Scott's Hut is an Antarctic Heritage Site.

McMurdo Sound, Antarctica, Tuesday, October 30, 1956 — As we waited for takeoff the aerial port operations (APO) section rigged the cargo with chutes and secured all loose ends. An unexpected development came up and we had to also load 20 rubber barrels of fuel. We took off and headed for the Beardmore Glacier. On the way we observed the high mountains of the coast line outlined against the everlasting white of the Antarctic. We made a pass over the Beardmore sight and the APO worked feverishly pushing the cargo out. There is much more to a drop than just pushing a button to release the load, there is much rigging and moving, etc. We made about five drops and then headed for the South Pole.



McMurdo Sound, Antarctica, Friday, November 2, 1956 — Not much doing today. I wrote a report on my third flight over the Pole and life here at McMurdo. The storm that started yesterday has gotten worse and is blowing snow right thru the cracks in our hut door, leaving a pile of snow 3 inches deep. I got myself a brilliant scarf from APO and got the ends sewed up.



McMurdo Sound, Antarctica, Sunday, November 4, 1956 — In the evening I had supper with the officers and then went out and took some pictures of emperor penguins and seals.



McMurdo and South Pole, Monday, November 19, 1956 — After serving Mass I rushed down to eat since they thought the flight tonight might really go. Sure enough, at 19:45 it was wheels up for the South Pole drop. The first part of the flight was uneventful. When we arrived at the Pole the two R4Ds landed and unloaded personnel. An R5D was cruising in the area to take pictures of the drops. The drops consisted of a weasel and some sleds. A large black X was set up to mark the drop zone.



McMurdo Sound, Antarctica, Friday, December 14, 1956 — Got up at noon and helped Navy Chaplain Father John C. Condit set up 4 Christmas trees in front of the Chapel of the Snows. We also decorated the front of the chapel with fir boughs and ornaments.



McMurdo Sound, Antarctica, Saturday, December 22, 1956 — Scaled Observation hill with Bob Dean and took pictures (from the peak) of Mt. Erebus and Mt. Discovery. Got a picture of the chapel with all the decorations and lights.



McMurdo Sound, Antarctica, Wednesday, December 26, 1956 — Took pictures today of camp scenes typical of summer. Weather equipment, buildings, and dog team.



Postscript — White House, Washington, DC, Monday, June 24, 1957 — In connection with Operation Deep Freeze, I later flew to Washington and presented President Eisenhower with a plaque commemorating my trip on which was fastened the horseshoe from Shackleton's expedition (it was inscribed on the plaque as being from the Scott expedition, however, so for practical purposes the horseshoe was from the Scott expedition). The President asked me about the trip and my exchange to Denmark the year before; altogether our conversation lasted about 20 minutes. Major General Walter R. Agee, Commanding General of CAP, was also present at the presentation. Afterwards the press people were admitted and took pictures of the actual presentation.

Leading by Example

National Commander Helps Launch Semper Vigilans Society

By Loretta Fulton

■ An expression that Maj. Gen. Mark Smith uses to describe a golden opportunity that shouldn't be missed is "ticket to the game."

By including Civil Air Patrol in his planned giving, Smith is providing a fistful of tickets to hand out to young people who might not otherwise have the opportunity to benefit from CAP's leadership and enrichment programs. He's pleased to be in a position to help financially.

"It makes a difference in the life of a young person," Smith said. "That's the beauty and the power of philanthropy."

Smith, who retired in 2000 after a 26-year U.S. Air Force career, will conclude his extended four-year term as national commander and CEO of Civil Air Patrol in August. Numerous advancements and improvements have occurred under his leadership, including the launch of the Semper Vigilans Society in 2020. The society was established to recognize those who include CAP in their estate planning.

Kristina Jones, CAP's chief of philanthropy, credited Smith with developing a philanthropic culture during his tenure. When he decided to make a lasting impact on CAP through planned



U.S. Air Force Academy Cadet 1st Class Ben Hook (left) of the U.S. Air Force Academy's class of 2019 and Civil Air Patrol National Commander Maj. Gen. Mark Smith point out Hook's newly added name on the plaque showing top-performing current and former CAP cadets in each academy graduating class since 1984.

giving, Jones wasn't surprised.

"It is exactly the kind of heart he has always had for our cadets and our amazing organization," she said. "We knew he wanted to lead by example."

In turn, Smith gives much of the credit to Jones and her development team for strengthening the CAP Foundation. Through new ideas from the team, such as the Semper Vigilans Society, the foundation is approaching the \$2 million mark.

"Without their hard work," Smith said, "none of this would be happening."

Semper Vigilans, Civil Air Patrol's motto, is Latin for "always vigilant" or "always ready." Planned giving to the foundation ensures CAP is always ready for the future. CAP's mission can be summarized as "saving lives and shaping lives," Smith said. Including CAP in estate planning will help ensure that continues.

Developing young people into competent,

confident leaders is especially important to Smith, who benefited as a youngster when he was aided in his dream of becoming a fighter pilot. The Air Force Academy liaison for the area where Smith grew up saw potential in the young man and assisted him in reaching his goal.

Smith was accepted into the academy and graduated with a bachelor's degree in international affairs. That experience made him realize the importance of good role models in the lives of young people.

"The power of mentorship is something that is really important to me," Smith said.

Today, he's in a position to help provide those mentors. He joined Civil Air Patrol in 2005, but after active-duty service that included Operation Desert Storm and commanding the Air Force's 27th Fighter Squadron, Smith wasn't sure he would be a good fit for a civilian organization.

But he fell in love with the people he met, and he saw a way to continue his passion for developing leaders.

"That was the hook that kept me in," Smith said.

Others who share his passion and have included Civil Air Patrol in their estate plan or are considering it should contact Jones at kjones@gocivilairpatrol.org.

"We want to collect these exciting stories about why people choose CAP with their generous planning," she said. "For those exploring options, we do have resources available to assist." ▲

An explanation of the Semper Vigilans Society and a step-by-step guide to becoming a member can be found at civilairpatrol.planmylegacy.org/semper-vigilans-society.



Civil Air Patrol

U.S. Air Force Auxiliary

FREEWILL

Civil Air Patrol has recently partnered with FreeWill to give you three new ways to plan ahead and give smart gifts this year:

IF THERE'S A WILL, THERE'S A WAY: FreeWill offers an intuitive, online tool to write your legally valid will in less than 25 minutes. It's also an incredible way to begin your legacy with CAP. **Visit FreeWill.com/CAP to get started**

ARE YOU 70% OR OLDER? If you are, and you have a traditional IRA, you're eligible to make a tax-free gift to CAP directly from your IRA. **Make your smartest donation to CAP at FreeWill.com/qcd/cap**

HAVE APPRECIATED STOCKS? Using our new tool, you can transfer your stocks directly to CAP and avoid paying capital gains tax. **Transfer yours today at FreeWill.com/stocks/cap**

GoCivilAirPatrol.com/giving

If you have any questions about FreeWill and our new financial planning tools, contact legacy@gocivilairpatrol.org or call 833-IAM-4CAP (833) 426-4227 today!



MEMORIAL GIFTS & GIFTS OF HONOR

GIFTS MADE FROM SEPTEMBER 1, 2020–MARCH 15, 2021

IN HONOR OF:

Cadet 2nd Lt. Clayton Conn
by 2nd Lt. Carroll Conn

Ms. Katie Einsohn
by Ms. Amy Helsel

The Bell Family
by Mr. and Mrs. Charles
Averett

Mr. Paul Goodrich
by Maj. and Mrs. Steven Bozek

Ms. Betty Hostler
by Mr. Robert Fretz

Maj. William Kalich
by Ms. Mary Civiletta-Kalich

Col. Gordon Larson
by Dr. Meredith Larson

Mr. Michael Meyers
by Master Sgt. Joseph
Schaecher

Mr. George Vogt
by Anonymous Donor
by Col. Regena Aye
by Mr. Randy Bolinger
by Lt. Col. Harold Damron
by Maj. Charles Graham
by Mrs. Stacy Jackson
by Mrs. Kristina Jones
by Lt. Col. Robert Moore
by Lt. Col. and Mrs. Sean Neal
by Ms. Susie Parker
by Lt. Col. Yvonne Rodriguez
by Mr. and Mrs. John and
Debbie Salvador
by Col. John Swain
by Lt. Col. Elizabeth Sydow

Mr. Anthony Wright
by Ms. Julia Moline

IN MEMORY OF:

Capt. Thomas Bradley
by Mr. and Mrs. Kevin
McHenry
by Mr. and Mrs. Howard and
Liz Lipman
by Mrs. Karen Scola
by Mr. and Mrs. Paul and
Jean Wienecke
by Mrs. Kathleen Zimmerman

Maj. James Capozzi
by Ms. Linda Clark
by Ms. Ceresa DiTalia
by Ms. Kristin Hiensch
by Ms. Maryanne Hood
by Ms. Lynn Jacobsen
by Mr. Harium Martin-Morris
by Mr. and Mrs. David and
Jill Melchior
by Mr. and Mrs. Paul Packer
by Mr. and Mrs. Bruce and
Florence Pavalow
by Mr. Henry Rosen

Lt. Col. Bob Carastro
by Anonymous Donor
by Dr. Agnes and Sam Cartner
by Mr. Jerry Fossum
by Capt. Susan Guice
by Mr. and Mrs. Stanley and
Barbara Lowder
by Mr. Nathan Tansil

Lt. Col. Gregory Chase
by Mrs. Donna Bass Maraman
by Mr. and Mrs. Jack and
Marilyn Talbot

Capt. Robert Cowley
by Mr. and Mrs. Doug
Anderson
by Maj. John Cray
by Mrs. Angela Dalsis

**Mr. Rene Charles "Chuck"
Fix, Jr.**
by Mr. and Mrs. Hugh and
Lesa Campbell

Lt. Col. Harold Frankel
by Mr. Robert Volkay

Lt. Col. Jerry Gibson
by Mrs. Joan Gibson

Col. Carolyn Guertin
by Anonymous Donor

Mr. George Hancy
by Capt. M.L. Hejra

Lt. Col. Marge Hannah
by Lt. Col. Patricia Mitcham

Lt. Col. William Herlihy
by Anonymous Donor

Maj. Corwin Henderson
by Lt. Col. Larry Henderson
and Mrs. Jill Henderson

Mrs. Carmen Hipplewitz
by Maj. Russell Hipplewitz

SM Rasheem Inniss
by Mr. Akeem Inniss

Capt. Zach Johnson
by Mr. Loering Johnson

1st Lt. Bruce Kemp
by Mr. Eddit Sheffield
by Mr. and Mrs. Lawrence
Whitlock

Mr. Andrew Liput, Sr.
by Ms. Nancy Freeman
by Mrs. Kristina Jones
by Lt. Col. Andrew Liput
by Metrology Laboratories

Lt. Col. James Mallett
by Ms. Susan B. Mallett

Capt. Mark Ross
by Mr. Ron Kastner

Mr. Steve Merritt
by Mr. and Mrs. William and
Sarah Ryan
by Lt. Col. James Mitchell

Lt. Col. Richard Moeller
by Maj. Patricia Moeller

1st Lt. Ervin Nowak
by Ms. Ivy Adams
by Capt. Jeremy David Hooper

Mrs. Sharadben Pandya
by Mrs. Kaumudi Pandya

Maj. Frank Panek
by Mr. John Zaleski

Maj. Doug Plummer
by Mr. and Mrs. Prentis and
Kay Suggs

Mr. Charles Polen
by Mr. and Mrs. Richard
Ramskugler
by Mr. David Solar

Lt. Col. Richard Radvanyi
by Mr. Joseph Rivas

Col. David A. "Hank" Rogers
by Mr. and Mrs. John and
Debbie Salvador
by Col. Brett Dolnick

Lt. Col. Alan Sandner
by Ms. Monique Mendel

Mr. Kenneth Septaric
by Capt. ML Hejra

Lt. Col. Marc Stella
by Mrs. Valerie Stella

Col. Ward Shires
by Maj. and Mrs. Dave Coover

Ms. Greta Shore
by Mr. Tom Macdonald

**Cadet Senior Airman
Adriaen Thibeault**
by Mr. and Mrs. Frank Blake
by Mr. Andrew Metcalfe

Lt. Col. John Vardiman
by Anonymous Donor
by Mrs. Lucy Brandon
by Dr. Tarah Castleberry
by Mr. and Mrs. Jay and
Tricia Cutcher

Mr. Gordon Watkins
by 218 ISRG TN Air National
Guard

Maj. Kenneth Whiles
by Mrs. Carolyn Whiles

To dedicate an online gift in honor or
memory of someone special, visit
www.gocivilairpatrol.com/tributes

Civil Air Patrol — Tributes

PO Box 9251, Montgomery, AL 36108-2342

tributes@gocivilairpatrol.org 833-426-4227

DON'T LET YOUR MEMBER BENEFITS GATHER DUST

Made to help you get the most for whatever's next.

When you're a USAA member, you have a full range of benefits at your fingertips. From home and online shopping discounts to access to RV and boat insurance all the way to health insurance options, we want you to get the most out of your membership. So take advantage of these benefits and more today.

Visit [USAA.COM/CAP](https://www.usaa.com/cap) to learn more or call **800-435-4995**



**WHAT YOU'RE MADE OF
WE'RE MADE FOR™**



USAA Insurance Agency means USAA Insurance Agency, Inc., or USAA of Texas Insurance Agency. CA Lic. #0D78305, TX Lic. #7096. 9800 Fredericksburg Road, San Antonio, TX 78288. The agency represents third-party insurers that are not affiliated with USAA and provides services to you on their behalf. Third-party products are not underwritten by USAA or its affiliates. The agency receives a commission on the sale or renewal of third-party insurance products and may receive other performance-based compensation from them. Product availability may vary in some locations. Use of the term "member" or "membership" refers to membership in USAA Membership Services and does not convey any legal or ownership rights in USAA. Restrictions apply and are subject to change. To join USAA, separated military personnel must have received a discharge type of "Honorable." Eligible former dependents of USAA members may join USAA. Alliance services provided through USAA Alliance Services, LLC, which contracts with third parties that are not affiliated with USAA to provide products and services to USAA members and receives compensation on the sale of third-party products and services. Third-party providers have sole financial responsibility for their products and services. Civil Air Patrol receives financial support from USAA for this sponsorship.

© 2020 USAA. 269283-0820-CAP

Final Salute

As the nation’s premier aviation nonprofit, we thrive on the collective strength of our volunteers. Losing even a single member leaves a hole in the fabric of our organization. Civil Air Patrol honors the service of all members and offers a final salute to those who have recently passed. *Gone West* allows us a brief opportunity to share the stories of a few members who have passed since our previous issue.

Brig. Gen. Hallock S. du Pont Jr.

*Youngest Man Ever to Lead CAP
Inspired Many*

■ Brig. Gen. Hallock “Hal” S. du Pont Jr., the youngest man ever to hold Civil Air Patrol’s top position, has flown west. Du Pont died Feb. 23 at his home in Vero Beach, Florida. He was 84.



As chairman of the Civil Air Patrol National Board — the seventh man to fill that post — he served as the equivalent of national commander from October 1970–October 1972. Gen. du Pont was 35 when he became chairman, the next to last to serve in that position.

In 1974 he was the 14th inductee to the Civil Air Patrol Hall of Honor, established during his tenure two years



Then-Col. Hallock S. du Pont Jr., Florida Wing commander at the time, shares a light moment in the 1960s with Col. Louisa Spruance Morse, his Delaware Wing counterpart.

earlier. The post of National Commander was created in September 1975.

A fellow CAP brigadier general and Hall of Honor member, former national commander Richard Anderson, fondly recalled his interactions with his predecessor. Anderson served in CAP’s top position from August 1993–1996.

“I well remember the first time I laid eyes on Hal, passing him in a hallway at the CAP National Board Meeting and Conference in Las

Vegas in October 1973. He was young, vibrant, and inspiring to so many,” said Anderson, an 18-year-old Virginia Wing cadet at that time.

“As an adult, Hal and I came to be the closest of friends and confidants, and I depended on him for wise counsel and wisdom during my service as national commander. As chair of the National

Advisory Council, which consists of all living former national commanders, he led that group with distinction.

“He coalesced them into a valued-added body that was indispensable to me and many of my successors. I am privileged to again follow Hal and sit in his seat as chair of the NAC. During my induction ceremony into the CAP Hall of Honor in August 2015, Hal was my escort during the event.

“He sat with me at the banquet and had already begun his long decline,” Anderson recalled. “It was the last time we were together, and I will forever treasure that evening and the lifetime of friendship and affection that we shared.”

Maj. Gen. Eugene E. Harwell

His Full Life of Service Spanned All Levels of CAP

■ Maj. Gen. Eugene E. Harwell, whose tenure as Civil Air Patrol national commander from 1986-1990 capped a career of service that included command of the Middle East Region — now the Mid-Atlantic Region — and North Carolina Wing, passed away Nov. 16 at his home in Mint Hill, North Carolina. He was 90.



Harwell joined Civil Air Patrol in February 1958 as a member of the North Carolina Wing's Charlotte Senior Squadron and became the unit's commander in August 1963. He became the wing's assistant operations officer in August 1965, subsequently serving as operations officer, chief of staff, and deputy wing commander. He assumed command of the wing in August 1975.

Harwell helped develop the wing's aircraft modernization program, later adopted by National Headquarters for implementation throughout CAP. Afterward he served as Middle East Region assistant operations officer and deputy commander. He was appointed national vice commander in October 1985, then became national commander in March 1986.

His wife, Col. Joyce (Brookshire) Harwell, who survives him, commanded the North Carolina Wing from 1984-1986.

Harwell was the sixth man to serve as national commander. The eighth, Brig. Gen. Richard Anderson, first met him as a cadet in the Virginia Wing, part of the Middle East Region. "As the years passed, we developed a friendship that was born of mutual trust and a love for Civil Air Patrol," Anderson said.

The two worked together on the CAP National Board — now the Command Council — after Anderson became Nebraska Wing commander in July 1985. When Harwell appointed him to command the North Central Region, "I developed an even closer working relationship with him through our mutual membership on the National Executive Committee (now the CAP Special Advisory Group)," he said.

After Anderson became national commander himself, "I felt a need to harness the energy and experience of my predecessors and reconstituted the long-existing but dormant CAP National Advisory

Council (NAC), which consists of all living former CAP national commanders.

"During those years, Gen. Harwell served with distinction as an active and engaged member of the NAC, and I came to depend on his wise counsel as I confronted the leadership challenges that inevitably come to every CAP national commander."

Anderson is the council's chair, and "until the last two years as his health declined, I was honored to confer on a regular basis with Gen. Harwell. I will always treasure my friendship with him, which extended from my years as a cadet all the way to CAP national commander."



Maj. Gen. Eugene E. Harwell presents Cadet Joelyn E. Taylor of the Nevada Wing with the Civil Air Patrol Cadet of the Year Award in 1988.

Col. Joseph “Rock” Palermo III

He Helped Lead CAP's Response to Hurricane Katrina

■ Col. Joseph S. “Rock” Palermo III, who distinguished himself as a leader in the Louisiana Wing during the response to Hurricane Katrina in 2005, and served as CAP national legal officer from August 2003-August 2006, flew west Feb. 2. He was 55.

Palermo perished when the aircraft he was flying in crashed on a small island in Cameron, Louisiana. Secretary of the board of the Lake Charles Regional Airport Authority, he also flew for the Calcasieu Parish Sheriff’s Department as captain of its aviation unit and served as the department’s attorney.

Palermo joined Civil Air Patrol in 1997. In September 2005 he led operations for some of the first flights CAP conducted after Katrina devastated much of southern Louisiana and Mississippi. From a CAP aircraft right front seat he prioritized target areas to be photographed and relayed information to the state Emergency Operations Center in Baton Rouge using alternative means of communication — standard radio networks were down.

“Our unique position in southwest Louisiana, on the opposite side of the state from Katrina’s landfall in New Orleans, enabled our aircraft to come in



behind the storm and be one of the first fixed-wing aircraft in the operations area,” Palermo recalled afterward.

“Our first task was to identify locations where large numbers of people were stranded so that the Army National

Guard helicopters could land and effectuate rescues. This task then developed into photographing these locations,” he said.

Palermo most recently represented Civil Air Patrol at an October 2015 ceremony at the CITGO refinery in Lake Charles, held to commemorate the close relationship, forged through World War II subchaser missions conducted in the Atlantic to protect U.S. oil tankers from German U-boats, between the organization and the petroleum giant.

After the fatal accident, Calcasieu Sheriff Tony Mancuso called Palermo “the best at what he did.”

“Rock touched many, many people,” the sheriff said. “He’s one of those people you can’t replace. He was amazing.”



Col. Joseph “Rock” Palermo III answers a television interviewer’s question during the Hurricane Katrina mission in 2005.

Col. David A. "Hank" Rogers

Wing Commander Remembered As 'Exceptional Friend'

■ The Mississippi Wing bid farewell to its commander, Col. David A. "Hank" Rogers, when he flew west Jan. 4 in Ocean Springs, Mississippi. He was 68.

"The world has lost a great commander, an incredible person, and an exceptional friend," Col. Andrea Van Buren, Southeast Region commander, wrote in announcing his death. "He was so very proud of Mississippi Wing."



Rogers joined Civil Air Patrol in November 2002. He became commander of the Commander Berta L. Edge Composite Squadron in February 2005 and held that position for six years. At the wing level he served as director of operations and counterdrug officer as well as assistant chief of staff and as assistant director of administration, of logistics, of emergency services, of safety, and of transportation.

The wing's vice commander from November 2015–May 2017, he first filled in as wing commander from July–October 2016, then was appointed to a full term in May 2017.

He also helped create the Mississippi Civil Air Patrol Gallery at the Mississippi Aviation Heritage Museum in Gulfport, and he coordinated the Mississippi Wing flyover for the museum's opening Oct. 3.

"He loved flying, hanging around people that loved flying, playing guitar and serving in the Civil Air Patrol," wrote Maj. Phil Norris, former Mississippi Wing public affairs officer and now a member of the

South Carolina Wing. "I remember playing guitar with Hank at an annual CAP meeting. He was passionate about life and maintaining friendships."

Col. Alvin Bedgood, former Southeast Region commander, recalled Rogers as "one of the best people I have ever known."

"Hank was a man of great humility, wisdom, and humor; possessed of a fierce desire to serve his family, community, and our nation," Bedgood said. ▲



Col. Hank Rogers holds the national 2017 Col. Lester E. Hopper Wing Historian of the Year Award plaque before presenting it to then-Capt. Ron Ogan.

Ray Foundation Awards \$330,000 Grant



■ An additional 30 cadet training slots will be available in Civil Air Patrol's Cadet Wings program, thanks to a generous donation by the Florida-based Ray Foundation. Cadets may qualify for

up to \$10,000 through the James C. Ray Flight Training Scholarships to achieve their private pilot certificate.

Charles Ahearn, Ray Foundation president, said, "The skills students develop during flight training are truly life skills, which will help them find success in all aspects of their lives. We are confident

that CAP's well-established scholarship administration procedures and inspirational mentoring and support of the students by local squadron members will result in a very successful program."

The Ray Foundation was founded in 1963 by former U.S. Army Air Corps and private pilot James C. Ray and his wife, Joan, after suc-

cess in development of the TRI-VIB cattle vaccine, oil and gas exploration, real estate development, and technology investment. For more about Ray and the history of the Foundation, visit www.RayFoundation.us

Squadrons and interested cadets will find applications and details late this summer or early fall. ▲

Three New STEM Kits Added for Instructors, Youth

■ Three new hands-on kits encouraging youth to directly explore science, technology, engineering, and math (STEM) subjects are now available from CAP Aerospace Education. The Bridge Building, NewBeeDrone AcroBee Lite RTF (Ready to Fly) FPV Drone and VTOL kits' additions mean 20 STEM Kits are available free to classroom teachers and squadron aerospace education officers.

The Bridge Building kit enables up to 24 cadets or students 9 and older to build and test their very own bridges. They work to design structurally sound bridges while using problem-solving skills to change their design as needed. The young participants study the properties of physics and their role in structural engineering.

The NewBeeDrone AcroBee kit provides students 12 and up with hands-on experience using small Unmanned Aerial Systems technology. The kit includes everything needed to build and fly a NewBeeDrone AcroBee Lite.

The VTOL (vertical takeoff and landing) kit's aircraft

features a helicopter's vertical capabilities paired with an airplane's high-speed function flight performance. Available so far only to CAP squadrons, the kit automatically transitions between rotor-blade and fixed-wing flight while aloft. ▲



VTOL STEM Kit

Operation Pulse Lift Collects 3,000th Blood Unit ... and Counting

■ Civil Air Patrol's Operation Pulse Lift blood collection mission recorded its 3,000th donated unit for the American Red Cross on April 3, 12 days ahead of the one-year target date for the milestone. By day's end, the overall total had reached 3,012.

Retired U.S. Air Force Master Sgt. Robert Cairns donated the 3,000th unit at the Arizona Wing's Falcon Composite Squadron 305 building at Falcon Field Airport in Mesa. The collection campaign

began April 15, 2020, with the wing opening its squadron facilities to serve as emergency Red Cross blood donation centers after the COVID-19 pandemic forced numerous donation centers



across the country to close.

The mission expanded in the fall to include collection centers in other wings and blood donations by Civil Air Patrol members throughout the organization. The Arizona Wing accounted for 1,702 of the 3,012 units collected as of April 3. ▲

Retired Air Force Master Sgt. Robert Cairns donates the 3,000th unit of blood as (from left) Chaplain (Maj.) Tom Tostenson, Maj. Dave Roden, Capt. John Bryant – all members of the Arizona Wing's Falcon Field Composite Squadron 305 – and Red Cross clinician Jennifer Cardinale stand by.

CELEBRATING
100 YEARS IN SERVICE

Vanguard®



Whether it's time to rank up or just show your CAP pride, Vanguard is standing by to meet your Civil Air Patrol needs as we have through the decades.

Visit us on the web at vanguardmil.com or call us today at 800-433-1334

PROMO CODE: **CAPMAG**

California Wing Cadets Place Third Nationally in CyberPatriot XIII



(From left) Cadet 1st Lt. Austin Ahn, Cadet Maj. Jesse James, Cadet Chief Master Sgt. Ryan Kim, Cadet Maj. Kayla Kim (team captain) and Cadet Senior Master Sgts. Chaeun Kim and Esther Kwon made up the Fullerton Composite Squadron 56 CyberPatriot team. Capt. Brian Vu was team coach, while Cadet Master Sgt. Thomas Hoang served as technical mentor.

■ The third time in the CyberPatriot All Service Division national finals was the charm for the California Wing's Fullerton Composite Squadron 56 cadet team, which finished third overall March 21 in the Air Force Association's National Youth Cyber Defense Competition and also won the division's Cisco NetAcad Challenge.

The CyberPatriot finish and Cisco NetAcad Challenge triumph mean the cadets will receive a combined \$3,000 in scholarships from Cisco and the Northrop Grumman Foundation.

Two other Civil Air Patrol teams also reached the 13-team final round — the Colorado Wing's Air Academy Cadet Squadron and the North Carolina Wing's Union County Composite Squadron.

Junior ROTC teams from each of the military services as well as the Naval Sea Cadet Corps rounded out the field.

The annual competition hosted by the Air Force Association challenges teams of high school and middle school students to find and fix cybersecurity vulnerabilities in virtual operating systems.

A total of 407 CAP teams competed in the All Service Division. Another 114 teams registered in the Middle School Division. CAP once more provided the largest contingent among the 1,414 All Services Division teams. In the Middle School Division, CAP accounted for nearly 15% of the 754 teams registered from middle schools across the country. ▲



We salute
the C.A.P.!



AIR-PARTS of Lock Haven

Serving Aircraft Owners &
Shops Around the World

P.O. Box 418
Lock Haven, PA 17745

(570) 748-0823

www.airpartsoflockhaven.com

(206) 780-3099



500 Hour Inspection,
Propstrike, Overspeed,
Repair, Overhaul, and Sales
Serving Over 1,000 Magnetos
Per Year Nationwide

8171 Mullan Road • Missoula, Montana 59808

aircraftmagnetoservice.net



Phone: **(864) 252-4289**
john@pffly.com
pffly.com

**PROVIDING ALL YOUR
AVIONIC NEEDS**

Located @ Greenville
downtown Airport (GMU)
12 Ramseur Ct.
Greenville, SC 29607

AVAILABLE PRODUCTS:

Garmin, Avidyne, Genesys, Trig, PS Engineering, Appareo, L3

SERVICES:

Silver Award Winning Garmin Dealer, Cirrus CAPS Certified,
Cirrus Service Center, Oxygen, Air conditioning, FIKI Fluid

NEW LOCATION & PRODUCTS!



The Indianapolis
Airport Authority
is proud to support
Civil Air Patrol



Indianapolis Airport Authority

ONE OF A **KIND**

COVID-19 Mission Passes One-Year Mark



■ Civil Air Patrol's participation in the response to the COVID-19 pandemic — the organization's largest sustained mission since World War II — has now lasted more than a year. After 365 days of uninterrupted missions, the Situation Report mission numbers speak for themselves.

SITREP Mission Data as of March 24

1,713 flights
2,695 flight hours
4,396 ground missions
41,795 total volunteer days
2,646 blood units
7,493 vaccine vials
116,792 test samples
177,407 test kits
1,154,861 pounds of food
8,209,955 meals

CID IS THE NO. 1 CHOICE FOR AIR TRANSPORTATION
in Eastern Iowa and the border regions of Wisconsin and Illinois.

- ▶ Most nonstop destinations
- ▶ 126 based general aviation aircraft
- ▶ Self-Serve Facility Available

EASTERN IOWA AIRPORT
FLYCID
FLYCID.COM

IMPLS Launch Systems LLC
Thomas & Gloria Kindig

<https://IMPLSlaunch.com>
54321@implslaunch.com
575-223-8945

Sandpiper Air, Inc.

Full Service FBO - New Bedford Regional Airport
Multi Comm: 122.85

Phone: 508-991-7660
Fax: 508-999-7557
operations@sandpiperair.com

www.sandpiperair.com
1513-1529 Airport Road, New Bedford, MA 02746

SIU Southern Illinois University

CARBONDALE



ASSOCIATE OF APPLIED SCIENCE DEGREE:
Aviation Flight

CERTIFICATE:
FAA Approved Airframe and Powerplant

MASTERS IN PUBLIC ADMINISTRATION:
Aviation Administration

BACHELOR DEGREES:

Aviation Management

- Professional Pilot Specialization
- Minors in Air Traffic Control
 - Aircraft Product Support
 - Airport Management and Planning

Student Organizations

Flying Salukis

9 Time National Champions

Aviation
Ambassadors



Detail Dawgs

Maintenance Competition Team

Rotor and Wing
Ambassadors



Aviation Technologies

- Aircraft Maintenance Specialization
- Aviation Maintenance Management Specialization
- Aviation Electronics Specialization
- Helicopter Specialization

We offer two degree-completion programs:
Aviation Management at six off-campus sites; Online Aviation Maintenance Management

**For more information regarding our degrees visit:
aviation.siu.edu or call us at 618-453-8898**



North Carolina Wing Member Honored for Quick Fire Response



A North Carolina Wing member's quick response to a fire near a service station's fuel pumps has been recognized with Civil Air Patrol's Silver Medal of Valor for distinguished and conspicuous heroic action at the risk of life, above and beyond the call of normal duty.

Second Lt. Johnny Click of the Gastonia Composite Squadron is a truck driver for FedEx. In June he was refueling his truck at a service station in Richmond Hill, Georgia, while the driver of a pickup pulling a small travel trailer did the same nearby.

The trailer suddenly caught fire, with flames visible near the compartment containing the trailer's two propane tanks. Click immediately ran over and shut off, disconnected and removed the tanks. He then helped use an extinguisher to



Second Lt. Johnny Click

douse the growing fire and told the station manager to call 911. After that he assisted the vehicle's owner in detaching the trailer so it could be moved away to safety.

Nick Hisoire, station manager, said the fire "posed a danger to the facility and everyone present," and without Click's quick action "they would have ignited, causing catastrophic

and life-threatening damage."

Richmond Hill Fire Department Sgt. Paul Carter said Click's "selfless act eliminated the chance of any further damage to the camper or the surrounding area, which could have been catastrophic due to the proximity of large amounts of fuel and other combustibles."

After leaving the scene in capable hands, Click resumed his return trip to Charlotte.

Ohio Wing Cadet Saluted for Lake Erie Rescue



An Ohio Wing cadet received the Certificate of Recognition for Lifesaving for her actions in rescuing two children after a mishap on Lake Erie.

Cadet Chief Master Sgt. Nicole Dimos was boating with her father May 30. According to the instrument panel, the water temperature was 54 degrees. The wind had picked up, and waves were starting swell to 4-5 feet.

As they were heading to the dock, Dimos noticed a personal watercraft had flipped over. Two children were in the water, and adults were trying to right the craft.

"Nicole said we should we go over and help them, and I agreed," said Jason Dimos, Nicole's father. Once the kids were on the Dimos boat, they were wrapped in blankets. "They were shivering and shaking," Dimos said. "They had probably been in the water for 30-45 minutes."

The cadet and her father turned back to their dock with the kids and reunited them with their grandparents on shore.

The Medina County Skyhawks Composite Squadron member credited her quick response to her training in 2019 at Hawk Mountain in Pennsylvania. CAP's Hawk Mountain Ranger School provides specialized training for cadets, teaching them



Cadet Chief Master Sgt.
Nicole Dimos

to build and lead ground operations and then return to their home units to teach emergency services skills.

“I had learned first aid training, for hot and cold temperatures,” among other safety and rescue techniques, Nicole Dimos said. “It was the most challenging accomplishment I have ever done, but in the end it definitely was worth it.

off my belt and applied a tourniquet, which got her bleeding under control,” Hammit said.

At that point his wife, Lt. Hammit, arrived from their apartment. A registered nurse, she started giving first aid to the wounded male for a chest wound. She applied direct pressure until two police officers arrived, then worked with them to keep him alive until paramedics were allowed inside the police perimeter. The Hammits belong to the Arizona Wing’s 388th Composite Squadron.



(From left) Glendale Mayor Jerry Weiers, Maj. Randy Hammit and 1st Lt. Kelli Hammit of the 388th Composite Squadron, Glendale Police Officer Destiny-Rene Ebersohl, and Police Chief Chris Briggs took part in a ceremony recognizing the Hammits’ lifesaving efforts.

Arizona Wing Pair Hailed for Assisting Gunshot Victims



Maj. Randy Hammit and 1st Lt. Kelli Hammit have been recognized with Civil Air Patrol’s Silver Medal of Valor for their lifesaving efforts assisting two gunfire victims in May at Westgate Entertainment District in Glendale, Arizona

Maj. Hammit and a friend were walking from the Hammits’ nearby apartment to the venue when shots broke out. “I heard a loud bang followed by a few more in rapid succession,” Hammit said. “I saw the shooter and saw bullets ricocheting off the pavement and off the building.”

As the two men hurried away, Hammit called 911 and “turned to look back and saw the shooter ... in the east parking lot.”

He and his friend then spotted the two wounded teenagers, one on his back in the street and the other at the corner under a tree. The two adults went to the downed pair “even though we could hear the shooter firing in the background,” Hammit recalled.

A 16-year-old girl had been shot below her right knee, shattering her shinbone, and was bleeding profusely. “I took



‘We did what we could with what we had’: Civil air patrol members help save Westgate shooting victims



The NBC affiliate in Phoenix interviewed the Hammits about their heroism.

Michigan Wing Assists Search for Downed F-16 Pilot



More than 40 Michigan Wing members participated in the multiagency search for a missing pilot from the U.S. Air Force’s 115th Fighter Wing whose F-16 crashed in the Hiawatha National Forest during a training mission Dec. 6.

A day before the pilot’s body was discovered in the fighter’s wreckage Dec. 10, the Air Force Rescue Coordination Center tasked the wing with assisting with the search. Initially, a CAP Cessna 172 aircraft from the Dickinson County Composite Squadron launched at Ford Airport in Kingsford, followed 45 minutes later by a Cessna 182 aircraft from the Copper County Composite Squadron that took off at Houghton County Memorial Airport in Calumet.



MAP showing the Hiawatha National Forest and probable search area on the Upper Peninsula of Michigan.

Both planes proceeded directly to the crash site and began flying search. Three more CAP Cessna 182 aircraft from Grand Rapids, Battle Creek, and Ann Arbor were repositioned to a staging area at the Traverse City Airport, where they remained on standby for the day.

In addition, three ground search and rescue teams made up of 13 cadets and senior members were deployed — two from Livonia and Howell and the third from Grayling.

A mobile command and communications post based in the Upper Peninsula was moved into the search area, using HF and VHF to establish a statewide communications link to ensure effective command and control over the search and rescue elements. A full virtual incident command post was established with staff members coordinating across the state to manage the wing’s search efforts.

Florida Wing Again Joins Super Bowl Security Training Exercise



The Florida Wing participated in January for the second straight year in exercises conducted to help ensure the safety and security of airspace surrounding the Super Bowl.

This year’s Super Bowl was played at Raymond James Stadium in Tampa. Super Bowl LIV, a year earlier, was played at Hard Rock Stadium in Miami Gardens.

To help train U.S. Air Force fighter aircrews and maintain their proficiency, Civil Air Patrol flies its airplanes into simulated restricted airspace in the role of a trespassing aircraft as the Air Force crews practice intercept techniques. The Air



Force pilots fly alongside the CAP airplane, make radio contact, and guide it out of the restricted airspace.

The Federal Aviation Administration routinely implements Temporary Flight Restrictions around major events like the Super Bowl, VIP flights, and major disasters. Airspace around the TFR areas is restricted from all general aviation traffic for a specific radius to ensure no aircraft enter. The TFR is enforced by the Air Force, which has fighter aircraft patrolling the area during the time of the restriction.

The mission marked CAP's 20th year as a participant in North American Aerospace Defense Command air-defense exercises designed to protect Super Bowl airspace

The exercises, known as Falcon Virgo, are carried out as part of Operation Noble Eagle, launched by First Air Force/Continental U.S. NORAD Region (CONR) after the 2001 terror attacks. Along with CONR's Western Air Defense Sector and CAP, the exercises are conducted in coordination with the FAA and Customs and Border Protection. ▲

Capt. Greg Becker, new commander of the Florida Wing's Pinellas Senior Squadron and one of the pilots attending Super Bowl media day Jan. 29 at MacDill Air Force Base, took this photo of a CAP 172 Cessna alongside an Air Force F-16.



Great Lakes Region Pilots Deliver Vaccine Despite Weather Challenges



A Great Lakes Region aircrew carried out a winter weather-plagued delivery of COVID-19 vaccine to several locations in Michigan for Federal Emergency Management Agency Region V on the Indian Health Service's behalf the first week of the year.



Lt. Col. Robert Bowden of the Michigan Wing captured this bird's-eye vista of northern Minnesota during the vaccine delivery flight.

Before they could launch an Indiana Wing-provided Gippsland GA8 airplane out of Indianapolis Executive Airport, the two pilots, Lt. Col. Robert Bowden of the Michigan Wing and Maj. Rod Rakic of the Illinois Wing, had to wait out winter conditions — including low, freezing fog — blanketing the Midwest. Along with flying 100 pounds of cargo, including the vaccine, they also were due to take on a pair of passengers from the Indian Health Service.

They took off once the fog dissipated, expecting one stop in Mankato, Minnesota, en route to Bemidji, Minnesota, 600 miles and about eight hours away. Northwest of Dubuque, Iowa, however, they encountered a wall of clouds and temperatures below freezing, creating icing conditions.



▲ Capt. Melissa Wentz Opsahl and Lt. John Naegeli of the Indian Health Service, who hold doctorates in pharmacy and are U.S. Public Health Service commissioned officers, kept a careful eye on the vaccine in the CAP Gippisland-GA8.

After an overnight stay at the Bemidji hotel where they met their two passengers before heading to Wisconsin and Michigan, though, the weather deteriorated Jan. 5. The scheduled flight was delayed a day, with the mission's planned Wisconsin phase called off altogether.

The ensuing four-hour flight to Sault Ste. Marie, Michigan, proceeded successfully, followed by a second leg to Traverse City, Michigan. The final flight took the pilots and health officers to Ann Arbor, Michigan. In the end, the mission saved hours of time and quickly delivered hundreds of doses of vaccine benefiting thousands of people. ▲



CIRRUS PERCEPTION®

INTELLIGENCE - SURVEILLANCE - RECONNAISSANCE

Introducing Cirrus Perception™, an all-new cost-effective, multi-mission platform.
Now FAA certified, learn more about Cirrus Perception at cirrusaircraft.com/fleet.



© 2016 CIRRUS DESIGN CORPORATION. ALL RIGHTS RESERVED.

“SIRIUSXM GIVES ME CONFIDENCE”

Terry Carbonell, Pilot and Aviation Educator



“My confidence to fly solo across the country came from SiriusXM’s coverage, availability at any altitude or on the ground, and the products and info that comes with the service. I flew with ADS-B weather only for one flight and felt like I was flying unprotected. Never again. Only SiriusXM.”

Terry Carbonell

2010 Air Race Classic Winner
3,300 hours and 15 years of flying experience
International Director, Ninety-Nines International
Organization Of Women Pilots

Pilot receives complimentary subscription.

**Get 2 FREE months
of SiriusXM Weather
and Entertainment.**

Call **1-844-287-9226** or visit
aopa.org/siriusxm to learn more.

See **Offer Details**. Credit card required.

(((SiriusXM®)))
AVIATION

OFFER DETAILS: Activate a new monthly subscription to one or both of our (1) SiriusXM Aviation mid-tier weather packages (SiriusXM Pilot Preferred or XM Aviator), or (2) All Access audio package, receive your first 2 months free (a minimum of \$59.99/mo and \$21.99/mo savings, respectively), and get free activation (an additional \$25 savings for SiriusXM packages (Pilot Preferred) or \$37.50 for XM packages (Aviator)), for a minimum combined savings of \$188.96 (for SiriusXM packages) or \$201.46 (for XM packages). Fees and taxes apply. A credit card is required on this offer. **Service will automatically renew every month thereafter and, at the beginning of your 3rd month, you will be charged at then-current rates. To cancel you must call us at 1-800-985-9200.** See our Customer Agreement for complete terms at www.siriusxm.com. All fees and programming subject to change. SiriusXM reserves the right to modify or terminate this offer at any time. Offer is not valid for current SiriusXM Aviation subscribers.

© 2020 Sirius XM Radio Inc. SiriusXM, Pandora and all related logos are trademarks of Sirius XM Radio Inc. and its respective subsidiaries. All rights reserved.

FLINT

A E R O I N C

*FAA-PMA approved auxiliary fuel tanks
for Cessna airplanes since 1967.*

*We salute and support the
Civil Air Patrol!
Thanks for everything
you do!*

(619) 448-1551

Gillespie Field (SEE)

1942 Joe Crosson Dr.

El Cajon, CA 92020

www.flintaero.com

