

# NAAA eNewsletter

## EPA Publicly Acknowledges Points NAAA Has Repeatedly Made About Aerial Drift Mitigations

Coinciding with the release of the Vulnerable Species Pilot project and Herbicide Strategy drafts (see stories below), EPA also published a **technical document** that provides scientific background and justifications for the proposed mitigation measures in the two drafts. The technical document contains several key points about aerial applications and drift mitigation that NAAA has been making to EPA for years, and their inclusion in the technical document is a major victory for aerial applicators. The first is that drift only moves downwind, hence upwind buffer zones are not necessary. While this seems obvious, it is likely that EPA, the Fish and Wildlife Service, and National Marine Fisheries Service have had reservations that aerial applicators can accurately measure wind direction throughout an application. NAAA has commented numerous times about how onboard sensors or a meteorological measurement systems can accurately measure wind direction.

EPA also acknowledged that a standing crop, over which most aerial applications are made, reduces the amount of drift from aerial application compared to bare ground alone. NAAA has repeatedly informed EPA that performing all registration risk assessments with the assumption that every aerial application is over bare ground is unrealistic. The technical paper also discusses NAAA's proposal to move away from the inaccurate Tier 1 model and its assumptions in AgDRIFT and instead utilize the Tier 3 AgDRIFT model with parameters set to reflect modern aerial applications. While the technical document still uses Tier 1, it states that EPA "*continues to consider those [NAAA's] comments and may update its input parameters and spray drift modeling prior to implementing spray drift buffers calculated using AgDRIFT® described in this document.*" NAAA is pleased with these developments and will continue to promote more accurate modeling of aerial applications.

## NAAA Mourns the Loss of Isaac Santos in Third Fatal Accident of 2023

The members and staff of NAAA offer their condolences to the family and friends of Isaac Santos, who was killed in an ag accident on July 29, 2023. Born on April 1, 1987, in Gettysburg, PA, Isaac was 36 years old at the time of his passing.

Isaac attended Biglerville High School where he was an All-Star cross country and track athlete. After high school, he graduated with a helicopter pilot license from Hillsboro Aero Academy outside of Portland, OR. His aviation career included working for Ag Air LLC and Costal Helicopters Inc. before joining Helicopter Applicators, Inc. Isaac was hard working with an upbeat personality, and always had a smile on his face.

Visitation for Isaac will be held on August 5, 2023, at Liberty Mountain Resort, 78 Country Club Trail, Fairfield, PA from 12:00 to 3:00 PM, followed by a celebration of life at 3:00 PM at the same location. He is survived by his parents, three sisters, and his significant other.

To plant a tree in Isaac's memory, visit the [Sympathy Store](#). If you wish to send flowers, please click [here](#). If you plan on attending his services, it is suggested you instead bring a stem flower or bouquet from your own garden. Please keep Isaac's family and friends in your thoughts and prayers as they mourn his loss.

## EPA Releases Proposed Vulnerable Species Pilot Project to Protect Endangered Species

In 2022, EPA launched its Endangered Species Act (ESA) Vulnerable Species Pilot to identify both at-risk species reasonably certain to be adversely affected by non-residential outdoor uses of pesticides and proposed mitigation measures to reduce these impacts on the species and their habitat. On June 22, 2023 EPA published a draft white paper listing the initially identified set of listed species and the proposed mitigation measures. The paper mentions a plan to expand the pilot to other species in the future. The initial pilot focused on 27 federally listed species, including: the American burying beetle, the Wyoming toad, the Attwater's prairie chicken, the rusty patched bumble bee, as well as other listed mussel and plant species. Proposed mitigation measures in the white paper include timing restrictions, runoff and erosion minimization, and spray drift minimization. Areas where the 27 species occur will be identified geographically on EPA's **Bulletins Live! Two (BLT)** using pesticide use limitation areas (PULAs). Pesticide applicators will be directed by the label to check BLT to determine if they will be applying within or next to a PULA, and if so to follow instructions on a Bulletin also available on BLT. Comments are being accepted for the draft white paper until August 6, 2023, and NAAA is currently drafting comments.

## EPA Releases Proposed Draft Herbicide Strategy to Protect Endangered Species

On July 24th, EPA released a proposed draft strategy outlining the Agency's plan to protect endangered species as it relates to herbicide applications. This is one of many Endangered Species Act (ESA) related follow-ups from December 2022, when EPA posted for public comment a workplan developed to address the protection of endangered species from pesticides. The proposed herbicide strategy describes early mitigations for more than 900 listed species and designated critical habitats. The proposed measures are intended to reduce pesticide movement through drift, surface water runoff, and erosion. With the strategy EPA hopes to identify and begin mitigation measures for potential effects on listed species before completing ESA consultations. According to the Agency, its traditional chemical-by-chemical, species-by-species approach to meeting ESA obligations is costly and slow. The herbicide strategy focused on agricultural crop uses in the lower 48 states. The draft framework document includes a discussion of both the proposed scope of the herbicide strategy and the proposed decision framework to determine the level of mitigation needed for a particular herbicide, according to EPA. The Agency

expects the strategy will lead to a more efficient ESA consultations on herbicides with the U.S. Fish and Wildlife Service in the future. Comments are being accepted [here](#) until September 22, 2023. NAAA is reviewing the strategy and will be commenting.

## EPA Publishes Proposed Settlement in the Endangered Species Mega Case

On July 17th, EPA published notice of a proposed settlement agreement in the Center for Biological Diversity v. United States Environmental Protection Agency, often referred to as the Mega Case. This lawsuit was filed in the U.S. District Court for the Northern District of California in 2011. It looked to invalidate and restrict EPA's registration of any pesticide product containing one of 382 active ingredients named in the complaint. It alleged EPA violated the Endangered Species Act (ESA) by registering products with the 382 active ingredients without consulting with one of the two agencies assigned ESA review responsibility. The District Court has dismissed portions of the complaint on several occasions. Subsequently the plaintiffs filed a Fourth Amended Complaint that narrowed the scope of products containing one or more of 35 active ingredients. A partial settlement in 2019 resolved many of the claims in this complaint. The most recent proposed settlement would resolve the remaining claims. It sets deadlines for EPA to develop strategies that EPA has already previously committed to in the 2022 ESA workplan. It does not create any new initiatives for EPA. This is the proposed final settlement agreement in this case and, once finalized, will result in a dismissal of the entire case with prejudice.

## NAAA's Lindsay Barber Becomes the Association's Director of Communications & Marketing; Hires Association Veteran Lauren Henretty

NAAA has named Lindsay Barber, CMP (*pictured top right*), to serve as the association's director of communications & marketing and hired Lauren Henretty, CMP, to serve as NAAA's new associate director of meetings & marketing. Lindsay will be handling oversight of the association's internal and external communications and marketing and Lauren will handle oversight of the association's board meetings, Ag Aviation Expo and assist with other marketing initiatives.

The communications department is not an unfamiliar role to Lindsay; she first worked for NAAA from 2004-2008 managing the communications department. Lindsay returned to NAAA in 2013 to manage the association's meetings and marketing initiatives for NAAA. She continued her communications activity upon her return and has been actively involved in many of the association's electronic communications mediums, such as social media and the website.

**Lauren Henretty** (*pictured bottom right*) brings 20 years of experience working for associations in education, meetings, and management. She most recently worked as associate director and education program planner for the Pediatric Pharmacy Association. Lauren will use her experience to help in the planning and execution of the Ag Aviation Expo, board meetings, other industry events and NAAA marketing initiatives. Lauren is a graduate of the University of Pittsburgh and lives with her husband and daughter in southern Maryland. For an updated roster of the NAAA staff click [here](#). Please help us in welcoming Lauren to the NAAA staff and congratulating Lindsay.

## NAAA Continues Farm Bill Advocacy on Senate Side Urging NPDES Permit Relief for Pesticide Applicators and Other Key Regulatory Relief Provisions

Late last week before the Senate's month long August recess, NAAA continued advocating its policy priorities of NPDES permit relief and state pesticide preemption to staffers of Senators serving on its Agriculture Committee. During the briefings taking place as the committee will be considering a five year reauthorization of farm programs (Farm Bill), Andrew Moore, NAAA CEO discussed the impacts of unnecessary, costly and duplicative NPDES permits on aerial and other pesticide applicators. He highlighted the impacts on both crop protection and vector control, stressing the potential public health impacts on communities. Other farm bill priorities advocated include the role of USDA's Office of Pesticide Management Policy and the Endangered Species Act Interagency Working Group to develop workable pesticide policy, federal pesticide label preemption, trade, and supporting the use of precision agriculture and adjuvants in farm conservation programs.

***NAAA CEO Andrew Moore briefs U.S. Senate staff on Farm Bill priorities of the aerial application industry.***

## NAAA Ag Aviation Expo Attendee Registration Now Open

We look forward to seeing you at the 2023 NAAA Ag Aviation Expo in Palm Springs, CA, Dec 4-7, a new convention destination for the Ag Aviation Expo. **Attendee registration is now open** for the annual convention. Exhibitors can purchase booth space [here](#).

Take a peek at the [floor plan](#) to view the companies that will be represented in Palm Springs. Many additional companies will purchase booth space between now and the start of the Ag Aviation Expo; check back often as the list of exhibitors increases.

In a city that has 350 days of sunshine and winter temperatures averaging in the 70s during the day, you can bet on great weather during the 2023 Ag Aviation Expo. In addition to attending the Ag Aviation Expo, visit the Palm Springs Air Museum, enjoy an off-road or BMW driving experience, play golf, visit museums, or try your luck at a casino close to the convention center. The area offers many hiking trails and top-notch spas.

Whether you are a veteran operator, a fledging ag pilot, or an allied supplier to the ag aviation industry, you won't find a better venue than Palm Springs and the Ag Aviation Expo to help you achieve your professional goals and business objectives.

## Details for the 2023 Ag Aviation Expo

- **Dates:** Dec. 4-7, 2023
- **Location:** Palm Springs Convention Center and Renaissance (the two facilities are attached)
- **Kickoff Breakfast Speaker:** **Burt Rutan**, Aerospace Legend
- **Schedule of Events:** See the current, tentative schedule [here](#).
- **Hotel:** [Details here](#).
- **Attendee Registration:** Open [here](#).
- **Exhibitor Booth Sales:** Booth Sales Open [here](#).
- **Sponsorship Opportunities:** View the sponsorships opportunities [here](#). We have sponsorships available for all budget sizes. Please email [Lindsay](#) if you would like to secure a sponsorship from last year or be contacted about 2023 opportunities!
- **Auction Donations:** Thank you to Pratt & Whitney Canada for donating a PT6-34AG to this year's NAAA Live Auction. Please consider [making a donation](#) for the Live and Silent Auction. The earlier you inform us of your auction donation, the more advertising you will receive on the NAAA website and in NAAA publications. Support the aerial application industry by donating an item today. Email [Lauren](#) with your donation details.

## Turbine Training Funds Available Through Charles Stokes Memorial Turbine Training Scholarship; Deadline Aug. 31

Two \$3,000 scholarships are available to eligible NAAA Operator and Pilot members for turbine transition training through the newly created Charles Stokes Memorial Turbine Training Scholarship. The new NAAA scholarship program is funded by a generous educational grant from Jim Mills of Turbines Inc., who established the scholarship in memory of Charles Stokes (*pictured at right*). It is administered by NAAA.

The new turbine transition scholarship will be awarded starting this year. Here's what you need to know about the 2023 Charles Stokes Memorial Turbine Training Scholarship.

### Key Details

**Purpose:** The Charles Stokes Memorial Turbine Training Scholarship was created to provide training funds to agricultural pilots with a minimum of 150 hours of ag time for use at a turbine transition course or program. The scholarship must be used for turbine flight training at a qualified flight school or turbine training facility.

**Amount:** The 2023 Charles Stokes Memorial Turbine Training Scholarship Program will award up to two one-year, \$3,000 scholarships to deserving, qualified ag pilots participating in a flight training program focused on turbine transition training. All funds are in U.S. dollars.

**Eligibility:** Applicants must:

- Have a minimum of 150 hours of ag time.
- Be a Pilot, Affiliated Operator or Operator member of NAAA.
- Be sponsored by an NAAA Operator member in the Operator dues category who will write a letter of recommendation on their behalf. (*Operator applicants may not sponsor themselves; another NAAA Operator member would need to sponsor them.*)

**How to Apply:** Applicants must apply using NAAA's online application process. A link to the online application is available [here](#).

**Deadline:** Aug. 31, 2023

**Restrictions:**

- Applicants may only apply for one NAAA pilot-training scholarship a year—*either* the Charles Stokes Memorial Turbine Training Scholarship *or* the NAAA "Ag Wings of Tomorrow" Scholarship, *but not both in the same year*.
- NAAA Operator members may only sponsor one Charles Stokes Memorial Turbine Training Scholarship annually. They can sponsor an NAAA "Ag Wings of Tomorrow" Scholarship applicant in the same year, but the applicants can't be the same person applying for both scholarships.

### Go Deeper

Learn more about the application process for the 2023 Charles Stokes Memorial Turbine Training Scholarship [here](#).

## Arrival of Melon Season Provides Ag Aviators with Sense of Sweet Satisfaction

Happy National Watermelon Day! National Watermelon Day is Aug. 3, the same day as the aerial application industry's (now 102nd) anniversary. In a nod to one of the joyful symbols of summer, Jessica Freeman of the Colorado Agricultural Aviation Association shared this photo of two boys chowing down on one of the world-famous watermelons grown in the Rocky Ford region of Colorado. Both boys are wearing Jet Stream Ag Aviation caps. NAAA member Sam Rogge's operation treats the watermelon and cantaloupe fields of the Rocky Ford farms that grow these delicious melons each year.

Scenes like this are one of the most satisfying aspects of ag pilots' work—proof that the fruits of their labor extend far from farmers' fields to families' tables across the country. Pretty sweet!

## Ready to Become an Operation S.A.F.E. Analyst? Attend Training – September 2023

WRK of Arkansas will be conducting an **Operation S.A.F.E.** Analyst training course Sept. 5-8. The training will take place at WRK facilities at 153 92nd W, Lonoke, Arkansas. Two packed days of classroom instruction will be followed by a student-led pattern testing clinic at the Carlisle Municipal Airport, Carlisle, Arkansas.

This training will be appropriate for anyone who wants to become an **Operation S.A.F.E. Analyst or Technician**. It will also be a good refresher for anyone wanting an update on the latest analysis equipment and ag aviation research. If you need to be recertified as an analyst or a technician, this training will also cover that. All graduates will have their names submitted to NAAREF for approval as either an analyst or a technician.

With the growth of **C-PAASS**, the demand for Operation S.A.F.E. is expected to increase dramatically. WRK's Operation S.A.F.E. Analyst training is your opportunity to learn how to operate the flight line collection setup, the analysis equipment and software, and gain knowledge on how to interpret ag aircraft application patterns and make recommendations. More information on the training will be forthcoming. If you are interested in attending, contact **Dennis Gardisser** at (501) 676-1762.

[Click here to view the 2023 Operation S.A.F.E. Analyst Training Brochure.](#)

## House Passes FAA Reauthorization with Many Low Altitude Manned Aviation Safety and Competition Provisions Advocated by NAAA

Last week the House overwhelmingly passed a major aviation policy bill to reauthorize the Federal Aviation Administration for the next five years. NAAA's considerable advocacy efforts resulted in the legislation's inclusion of safety and competition provisions directing the FAA to protect low altitude manned aircraft from drones; augmenting funding for general aviation airports (\$103 billion in aviation funding over the next five years); and preventing the privatization of air traffic control.

Proactive advocacy on NAAA's part resulted in the introduced bill including language that would amend section 49 U.S.C. § 44807, which is the section that provides the FAA to all certain exemptions to allow drones over 55 pounds to operate in low-altitude airspace. The amending language states that "Nothing in this subsection shall be construed to give an unmanned aircraft operating pursuant to this section the right of way over a manned aircraft." The introduced bill was still void of low-altitude manned aircraft safety provisions from drones operating beyond visual line of site. As a result, NAAA enlisted the support of Congressman Bruce Westerman (R-AR) and Rick Crawford (R-AR) to introduce an amendment to that section directing the FAA to "ensure the safety of manned aircraft operating in the national airspace system." Thanks to Congressman Sam Graves (R-MO), chairman of the House Transportation and Infrastructure Committee that has jurisdiction over the bill, the amendment was unanimously accepted resulting in its inclusion in the bill. These two provisions should eliminate the FAA from allowing drones to operate without detect and avoid equipment and not providing right-of-way to manned aircraft in all circumstances, or else face a serious legal challenge. NAAA thanks Congressmen Sam Graves, Westerman, and Crawford and the Arkansas Agricultural Aviation Association for their help.

As tends to be the case when aviation policy is debated in Congress, there were attempts to amend the bill to privatize air traffic control, which results in the levying of user-fees for aircraft. NAAA worked with a coalition of other general aviation organizations to defeat the amendment.

Although NAAA advocated to include provisions in the bill to ensure rural towers—whether meteorological evaluation towers (MET) or communications towers—between 50-200 feet and 10 feet in diameter are marked and logged into an FAA database, the Goliath communications industry quashed efforts that they require to both mark and log. Committee staff informed NAAA that the bill would not have passed had the communications industry had to do both. However, there is a provision in the bill to push the FAA to promulgate the language from the 2018 FAA reauthorization enacted bill that requires MET and other towers to be both marked and logged and communication towers to do one or the other. The language states if the FAA has not promulgated the tower rule within one-year of the bill's enactment, it must "submit an annual report to the Committee on Transportation and Infrastructure of the House of Representatives and the Committee on Commerce, Science, and Transportation of the Senate on the status of such rulemaking, including—(1) the reasons [it] failed to issue the rulemaking; and (2) a list of fatal aircraft accidents associated with unmarked towers that have occurred over the 5 years previous to the date of submission of the report."

The bill will also address aviation workforce shortages and will maintain the U.S.'s position as "the gold standard in aviation," stated Chairman Sam Graves.

The next FAA reauthorization step is Senate consideration. NAAA is working on ascertaining similar amendments on manned aviation safety from drones in the Senate bill. The FAA's current authority to operate will expire at the end of September if the bill isn't enacted beforehand. All of that means it's likely that an extension for the FAA bill will be needed. NAAA will keep you posted on this important issue.

## NAAA Advocates Farm Bill Inclusion of Exempting NPDES Permits for Pesticide Applicators and Other Key Regulatory Relief Provisions

The Pesticide Policy Coalition (PPC) held two briefings for congressional staff this week to highlight the coalition's farm bill priorities, which include NAAA's policy priorities of NPDES permit relief and state pesticide preemption. During the briefings, Andrew Moore discussed the impacts of unnecessary, costly and duplicative NPDES permits on aerial and other pesticide applicators. He highlighted the impacts on both crop protection and vector control, stressing the potential public health impacts on communities. The briefings were offered to staff legislative aids to congresspersons and senators of their respective Agriculture Committees.

### ***NAAA CEO Andrew Moore briefs congressional staff on Farm Bill priorities of the aerial application industry.***

Other PPC farm bill priorities include strengthening the role of USDA's Office of Pesticide Management Policy and the Endangered Species Act Interagency Working Group, federal pesticide label preemption, trade, and supporting the use of precision agriculture and adjuvants in farm conservation programs.

## Grant Lane of Lane Aviation in Rosenberg, Texas, Passes

The agricultural aviation industry lost one of its titans with the passing of Grant Lane on July 12. Grant was the longtime president and CEO of Lane Aviation Inc., which was founded in 1945 by Grant's father and uncle, George and Milton Lane, respectively. Read Grant's obituary [here](#).

Grant Lane took a hands-on approach with his customers. As the first company to become an Air Tractor dealer in 1974, Grant and Lane Aviation had a seemingly ubiquitous presence at state, regional, national and international ag aviation conferences. "At Lane Aviation, we take great pride in providing the absolute best products and services in the industry," Grant declared in a note to customers on Lane Aviation's website, which included this pledge: "I make it a point to work personally with every client to ensure they leave satisfied to the fullest extent."

Grant put those words into action often. After Grant was named the co-recipient of NAAA's 2011 Larsen-Miller Community Service Award, in a piece written for *Agricultural Aviation's* January/February 2012 issue, Sun Valley Dusting Company owner/operator Pat Kornegay described Grant as the "ever-present Air Tractor dealer who is always there at the state, national or international conventions with a warm smile and a firm handshake." Kornegay continued:

He is also known to many of us as the guy who has shown up on our airstrip in the middle of a hot season, stepped out of his late model Baron in a starched, clean shirt and jeans, broke out the tools and dived into changing a fuel control unit or starter generator that he had brought with him. After putting us back in the air quickly, and with the ever-present smile and handshake, he hops back in his airplane and disappears over the horizon.

Lane Aviation celebrated its 75th anniversary in 2020, and Grant received numerous accolades of his own over the years. Together, Grant and his father, George Lane, received NAAA's prestigious Agrinaut Award in 2006 for Lane Aviation's creation in the 1970s of the Lane Brake, a major breakthrough in pump fan brake technology.

Grant Lane headed over the horizon for the final time on July 12. Among the numerous relatives Grant is survived by are his brother, Mark Lane, Lane Aviation's chief pilot, and his son, Logan Lane, Lane Aviation's vice president.

The staff, board and members of NAAA extend their deepest condolences to the Lane family and Grant's extended Lane Aviation family in their time of grief. Per Grant's wishes, there will not be any funeral services, but Lane Aviation will host a celebration of Grant's life sometime in the fall.

In lieu of flowers, the Lane family is requesting donations be made to your local blood bank or to the PAASS Program in Grant Lane's name. Donations to PAASS may be made [online here](#) or by mailing to:

**National Agricultural Aviation Association**  
1440 Duke Street  
Alexandria, VA 22314

## NAAA Taking Every Opportunity to Press FAA on Safe UAS Integration

Last week, NAAA submitted comments on two Petitions for Exemption to the Federal Aviation Administration (FAA). These petitions, both from Uncrewed Aircraft System (UAS) light show companies, were seeking relief from portions of the **14 CFR Part 48** requirements for registration and marking of small UAS. The basis for each company's claim is financial, as they have thousands of UAS in inventory that require individual marking, registration and (every three years) reregistration.

One petition was merely seeking an alternative process to renew all their previously registered/marked UAS at once (think a spreadsheet of registration numbers). The other petition sought to apply for a single registration number for their entire swarm of UAS, though it was not clear how they would achieve this through the specific sections of the CFR they requested exemption from.

NAAA commented against the concept of a single registration number being used for an entire UAS swarm but in favor of the FAA providing an alternative method for standard reregistrations to be applied for in a batch format to relieve unnecessary administrative overhead within both the private sector and the FAA itself. However, NAAA also used these comments as a platform to continue imparting the importance of UAS safety to the FAA. An excerpt, included in both comments, is copied below:

NAAA has a shared goal with the FAA of enhancing aviation safety, not abating it. As incremental changes are continually made with precedent-setting exemptions to 14 CFR regarding UAS, NAAA grows increasingly concerned of the hazard posed for crewed aircraft. Alone, exemptions such as this may not seem significantly impactful. However, put together in the broader context, it appears that the FAA has found itself on a path toward prioritizing the integration of UAS into the NAS over the safety of crewed aviation.

NAAA would like to reiterate to the FAA its position that the safety of crewed aircraft should always be prioritized, and that UAS should always give the right-of-way to crewed aircraft. Regarding beyond visual line-of-sight (BVLOS) operations, NAAA also reiterates to the FAA that detect and avoid (DAA) systems should be certified and that shielded operations, as prescribed by the UAS BVLOS Aviation Rulemaking Committee (ARC), should not be permitted in any environments or under any circumstances. NAAA has continually urged the FAA to prioritize safety regarding these matters, most recently in a 2022 letter regarding the UAS BVLOS ARC Final Report and again in a 2023 comment on Docket FAA-2023-1256 regarding BVLOS operations.

You can view the petitions, as well as NAAA's comments on them, at the links below:

- [FAA-2022-1737 – NAAA's Comments](#)
- [FAA-2023-0471 – NAAA's Comments](#)

## NAAA Responds to FAA Part 137 Certification Changes for UAS, Highlighting Safety and Competitive Concerns

This week, in coordination with industry stakeholders, NAAA issued a letter to Federal Aviation Administration (FAA) Acting Administrator Polly Trottenberg regarding changes to the Part 137 certification process for Uncrewed Aircraft Systems (UAS) operators outlined in [FAA Notice 8900.659](#). This notice was issued June 13 and was summarized in the [June 22, 2023 NAAA eNewsletter](#).

In the letter, NAAA addressed the changes and expressed concern over FAA policy that may impact the safety of its crewed ag aircraft pilots who share this airspace and competitive concerns favoring new UAS businesses entering the aerial application industry over veteran crewed and UAS aircraft businesses.

The notice relaxes the requirement for FAA-administered [§ 137.19\(e\) Knowledge and Skills tests](#), allowing for new UAS applicants to self-administer the test. It also completely relieves the FAA of any required regular surveillance for UAS operators. The FAA justified these changes by deeming UAS operations as "lower risk" than other operations. NAAA pressed for clarity on how this risk assessment was made and to whom the "lower risk" is in reference. Citing specific NTSB accident reports, NAAA asserted that crewed Part 137 operators and pilots are a clear risk bearer of uncrewed Part 137 operations. Further, the unique nature of already busy airspace in agricultural areas during key application windows heightens the need for UAS operators entering this airspace to have rigorous FAA-verified competency to safely operate there.

The notice details a new streamlined process for Part 137 UAS applicants to receive their operating certificate through a central office via email. NAAA expressed concern that this separate centralized approach for UAS may prove to further alienate crewed and uncrewed Part 137 operators, as they would deal with distinctly different FAA officials and oversight, even if treating adjacent fields. NAAA stressed that as airspace becomes concentrated with interacting crewed and uncrewed Part 137 operations, FAA safety coordination becomes more and more important.

There were also distinctly positive changes in the notice, in which NAAA commended the FAA. A minimum of a third-class medical will be required for UAS operators, something NAAA has pushed for across all commercial UAS operations for years. UAS operators will also have a new requirement to generate operations manuals and training programs. Regarding the shift to a UAS central office, it is hoped that the relief FSDOs will get through these changes will subsequently expedite processing for crewed and mixed (crewed/uncrewed) Part 137 applicants.

NAAA will report updates on this matter, including the associated update of [Advisory Circular \(AC\) 137-1](#), when it is made available.

You can [read the letter in its entirety here](#).

## Apply for 'Ag Wings of Tomorrow' Scholarship by Aug. 31

From seeking a mentor to finding the funds for training, the road to becoming an ag pilot is fraught with obstacles, but having \$5,000 in seed money certainly helps. Thanks to the generous support of BASF and Thrush Aircraft, \$20,000 in aid is available through the [2023 NAAA "Ag Wings of Tomorrow" Scholarship Program](#) to assist four aspiring ag pilots in their journey.

The goal of NAAA's "Ag Wings of Tomorrow" Scholarship Program is to strengthen the aerial application industry by helping operator members bring new pilots into the profession and help fund their training. Applicants must be sponsored by an NAAA Operator member. Scholarship recipients may use the proceeds for flight training or aviation or ag-related coursework at a university, college, community college or other institution of higher learning. A stipend for a trainee in an NAAA Operator-sponsored apprentice program is also permissible. The scholarship program is administered by NAAA and funded by educational grants from BASF and Thrush.

This year, NAAA will award up to four scholarships valued at \$5,000 each. Investing in aspiring ag aviators is a win-win for NAAA Operator members and individuals seeking training funds to support their pursuit of becoming a professional ag pilot.

## How to Apply

To be considered for the 2023 scholarship, along with completing the two-part application, every applicant must submit:

- **A letter of recommendation** from the NAAA Operator member sponsoring the applicant.
- **An essay of 250 words or less** explaining why the applicant wants to pursue a career in agricultural aviation and how they would use NAAA's "Ag Wings of Tomorrow" Scholarship to further their education and training.
- **A one-page résumé or list of activities** detailing all agricultural and aviation experiences, education and training.

Last year NAAA awarded \$5,000 scholarships to Ross Edwards of Sherwood, Arkansas; Tommy Koebel of Geneva, Illinois; Drew Kroeplin of Highmore, South Dakota; and Adam Jacobs of Graymont, Illinois (pictured above with his sponsor, Scott Petersen, at left, of Pontiac Flying LLC). NAAA will announce the recipients of the 2023 "Ag Wings of Tomorrow" Scholarships in December at the Ag Aviation Expo in Palm Springs, California.

## Application Process

To learn more about the 2023 NAAA "Ag Wings of Tomorrow" Scholarship, review the [application instructions and checklist](#).

Applicants must apply using NAAA's [online application](#). The applicant will fill out ALL applicant and sponsor information. The NAAA Operator Sponsor must write a letter of recommendation on behalf of the applicant. Upload all required material noted in the Application Checklist and any additional supporting documentation using the Ag Wings of Tomorrow Scholarship's [online application portal](#).

A link to the scholarship application portal can also be found at [AgAviation.org/scholarship](https://AgAviation.org/scholarship).

Please contact NAAA at (202) 546-5722 or [information@agaviation.org](mailto:information@agaviation.org) for clarification about any of the application requirements.

While the applicant must be sponsored by an NAAA Operator member, NAAA membership is not a prerequisite for applying for the scholarship. Still, becoming an NAAA Associate member is an excellent way for candidates to learn more about the industry and augment their training.

**The deadline to apply for the 2023 "Ag Wings of Tomorrow" Scholarship is Aug. 31.**

## Restrictions

With the introduction of the new [Charles Stokes Memorial Turbine Training Scholarship](#) this year, applicants may only apply for one NAAA pilot-training scholarship per year. They can apply for the NAAA "Ag Wings of Tomorrow" Scholarship or the Charles Stokes Memorial Turbine Training Scholarship, *but not both in the same year*.

NAAA Operator members may only sponsor one NAAA "Ag Wings of Tomorrow" Scholarship applicant a year. They can also sponsor a Charles Stokes Memorial Turbine Training Scholarship applicant in the same year, but the applicants cannot be the same person applying for both scholarships in the same year.

Two \$3,000 scholarships are available for turbine training to eligible NAAA Operator and Pilot members applying for the [2023 Charles Stokes Memorial Turbine Training Scholarship](#).

## Apply for C-PAASS 2023—Certified-Professional Aerial Applicator Safety Steward

If you've recently participated in a 2022 and/or 2023 Operation S.A.F.E. Fly-In and you're receiving this eNewsletter because you are an NAAA member, you have completed two of four requirements to apply for C-PAASS certification for 2023.

Apply for [C-PAASS certification](#) today, which is offered on an annual basis to individual ag pilots, both operator and non-operator. As the first year for C-PAASS, its requirements are based entirely upon education and professional opportunities already available:

1. **Annual PAASS Attendance for three (3) years**
  - 2020-2021 season, AND
  - 2021-2022 season, AND

- 2022-2023 season
2. **Biennial Operation S.A.F.E. Participation**
    - 2022 season, AND/OR
    - 2023 season
  3. **Annual Membership in NAAA**
    - 2023
  4. **Annual Membership in a State/Regional agricultural aviation association**
    - 2023

## To submit a 2023 C-PAASS application:

1. Check your eligibility at [education.agaviation.org/cpaass](https://education.agaviation.org/cpaass).
  - You will need to log in using your NAAA username/password. Contact [information@agaviation.org](mailto:information@agaviation.org) if you need assistance.
2. If eligible, scroll to the bottom of the page and locate the **2023 C-PAASS Application** tile. Hover over it and click the green **Register (Free!)** button.
3. You will be prompted to attest to your completion of each of the requirements and directed to upload documentation of your 2023 membership in a State/Regional agricultural aviation association. NAAA Staff will be automatically notified to review your application once this documentation is submitted.
4. Your application will be reviewed within three (3) business days.
5. If your application is accepted, you will be provided a link to pay the certification fee (currently \$100) and obtain your digital certificate.

Aerial applicators, now more than ever, operate in an environment of competing interests. An ever-increasing demand for timely and effective applications is challenged by factors such as added regulatory burden, rising insurance costs and stiffer pesticide label language, just to name a few. The agricultural aviation industry is rising to these challenges and, in character, has moved to advance education, rather than regulation, as the path forward.

NAAA and NAAREF jointly launched the Certified-Professional Aerial Applicator Safety Steward (C-PAASS) program earlier this year to serve as the industry's flagship certification and as a roadmap for the pursuit of the best educational opportunities currently available. This voluntary program allows those aerial applicators who strive to constantly educate themselves to better their safety and application quality to be recognized for their efforts. Secondly, the certification can signal to customers, regulators and others outside the industry their commitment to professionalism.

**Apply for C-PAASS certification today!** Utilize it to inform regulatory officials and insurance agents and to market to your customers that you have undergone additional training and development to ensure you can provide the highest quality service.

## Has Your Aircraft Been Pattern Tested Yet? There Are Tools to Help

If you have not attended or scheduled an Operation S.A.F.E. Fly-In for this season yet, the time is becoming short in many parts of the country.

NAAREF recommends having your pattern assessed, at minimum, every other year or when major changes are made. This is vitally important to ensuring your aircraft is ready to make effective applications this season. Accordingly, NAAA has included biennial Operation S.A.F.E. participation as a core component of its **C-PAASS** professional aerial applicator certification.

If you are unable to attend one of these events, as an NAAA member, you have alternative options.

Earlier this year, NAAA **announced the release of DropFlight**, an iPhone/iPad app that allows extremely fast scanning and analysis of water-sensitive spray cards, all on your Apple mobile devices. This tool, created in part by an aerial applicator, is targeted specifically for aerial applicators to use in assessing spray pattern uniformity, effective swath width and droplet size across the swath.

### Download DropFlight from the App Store

Use NAAA member code: **NAAA23**

Another option for conducting your own spray pattern testing is to use AccuPatt, the same desktop (Windows/MacOS) software that Operation S.A.F.E. analysts use. Originally developed to run the string testing systems you may have seen at a fly-in, AccuPatt has grown to include spray-card-analysis functionality that can be used independently to perform spray-card-only pattern testing. Now, it is being offered to NAAA members for use in their own operation at no cost. A flatbed scanner is required to digitize the spray cards for analysis.

### Download AccuPatt for Windows/MacOS

Consult the **User Manual** to get up and running

To further reduce friction in getting your spray pattern testing underway, DropFlight is also offering all the needed **testing gear**. Available as a **convenient kit** or by the piece, DropFlight's card mounting system makes it simple to lay out cards uniformly and in the correct



orientation to the wind. This testing gear will work with DropFlight and AccuPatt and is the fastest and most convenient way to acquire all the equipment you need to conduct your own pattern testing.

As always, if you consult with a [NAAREF-recognized Operation S.A.F.E. analyst](#) about your pattern testing data, they can report this to NAAREF as participation in Operation S.A.F.E. NAAA members will receive an official letter of participation and credit toward C-PAASS certification.

## Makeup PAASS Programs Now Available for 2021, 2022 and 2023 – Get C-PAASS Certified Today!

The impact of the PAASS Program on reducing the number of agricultural aviation accidents and drift incidents is proven—26% reductions in both categories since the program first hit the stage. In an effort to present the program's life-saving curriculum to those who may have missed it, the National Agricultural Aviation Research and Education Foundation (NAAREF) has leveraged the NAAA Education Center to host recorded webinars of the PAASS Program from 2021, 2022 and 2023.

If you want to be C-PAASS-certified for the 2023 season but missed one of these three PAASS Programs, this is your opportunity to fulfill that requirement and complete your C-PAASS application. If you missed the 2023 PAASS Program, it is now available for credit for \$850. Starting July 1, its fee will increase to \$1,700. The 2021 and 2022 programs are each now available for credit for \$1,700.

NAAA members also have the option to purchase one year of unlimited access to not-for-credit versions of PAASS for \$120. The not-for-credit versions of the 2021 and 2022 programs are available now, and the 2023 program will be available starting July 1. More than just a review for yourself, educate your ground crew or other stakeholders to impress upon them the importance of safety and environmental professionalism in your operation. The \$120 option will not give you official credit for PAASS attendance and will not count toward C-PAASS.

The best way to experience PAASS is a live program at your state/regional agricultural aviation convention. However, situations occur that may prevent this from happening. By offering these online options to make up PAASS, everyone can benefit from the wealth of information presented and help move the needle in preventing ag aviation accidents.

[Click here](#) to view all archived PAASS Programs.

## Important Call for GPS Data to Protect Manned Ag Aircraft from Drones

In 2022, an FAA advisory committee weighted with drone interests from Amazon, Google and other unmanned corporate interests suggested that the agency promulgate rules that drones operating beyond visual line of sight be permitted to:

- Increase their weight to 1,320 pounds
- Not equip with ADS-B identification technology
- Not give the right of way to manned aircraft when operating in rural, low-altitude airspace because they claimed there are no other users of this airspace.

As an ag aviator, you know these requests to be patently unsafe and based on false premises. As such, we call on you to help us collect information on ag aircraft's use of the low-altitude airspace. NAAA is working with and supports Mississippi State University's (MSU) Raspet Flight Research Laboratory and its continuing research on safe operational distances between low-altitude, manned aircraft and drones. The study's objectives are to:

1. Identify Ag Aircraft Operational Trends
2. Develop Ag Aircraft Operational Model
3. Validate Model through Observation/Collection of Empirical Data
4. Inform/Educate UAS Operators
5. Promote Safety in all Low-Altitude Ag Environments

**Your voluntary participation in this study is critical** to achieving these objectives. NAAA encourages you to donate your GPS flight log data to participate in this timely research. Logs from any year(s) are welcome and will be washed of any identifying information prior to use.

Many of you have previously contributed during the first stage of data collection from 2017 to 2020 when NAAA members donated 49,180 flight logs from 20 states. The second stage of the study began in 2021 and seeks to additionally include aircraft make and model info. These details are important, as the airspace modeling will be impacted by aircraft types differently, such as fixed-wing versus helicopter operations.

More GPS flight log data is needed to continue this study. Because of the diverse growing areas and unique geographical challenges experienced by aerial applicators, it is imperative that as many states and regions as possible are represented. This will ultimately help facilitate the safe integration of unmanned aircraft into these different airspaces.

As a reminder, NAAA and Raspet have agreed that all submitted information will remain confidential, and all GPS flight logs will be stripped of any personally identifying information before any research is conducted using the data.

There are several methods available to submit your data:

1. Request a secure upload link for larger uploads OR email directly to Madison Dixon, Research Director.  
**Email: [mdixon@raspet.msstate.edu](mailto:mdixon@raspet.msstate.edu)**
2. Mail a flash drive or other storage device to the address below. (The device will be immediately mailed back once data is received if a return address is provided):

**Address:**

Attn: Madison Dixon  
Raspet Flight Research Lab – Bldg. 2  
114 Airport Rd.  
Starkville, MS 39759

## NAAA Releases Book of the Century! Buy It Today

NAAA has released the book of the century—a century of agricultural aviation, that is.

One hundred years ago, an aerial crop dusting experiment spawned the birth of the agricultural aviation industry. To commemorate agricultural aviation's 100th anniversary, NAAA is pleased to present ***Agriculture's Air Force: 100 Years of Aerial Application***.

*Agriculture's Air Force* provides a new, updated account of aerial application's history, 35 years after Mabry Anderson's masterpiece, *Low & Slow: An Insider's History of Agricultural Aviation*, was published. NAAA's meticulously sourced book is based on a collective history of the agricultural aviation industry based on material from *Agricultural Aviation* magazine, *AgAir Update*, *Low & Slow* and other resources.

Beginning with ***Agricultural Aviation's Spring 2021 issue***, NAAA published excerpts from *Agriculture's Air Force* and continued to do so through the ***Fall 2021 issue***. Those stories are just a small slice of what's in the 268-page hardback edition, however. The complete book contains so much more.

*Agriculture's Air Force* delves into the intersection of agriculture and aviation. It chronicles the agricultural aviation industry's growth from its infancy in 1921 through the boom times after World War II and on to today's modern era of high-tech aerial application.

The finished hardback book has been years in the making but well worth the effort. "This is a significant piece of work covering not just the industry's history, but its essence," NAAA CEO Andrew Moore said. "We are proud of it and believe it will make a lasting contribution to the industry."

The story of agricultural aviation is much like the broader story of aviation: It is mostly punctuated with interesting smaller moments sandwiched between milestone developments. Aerial application is also the story of technological leaps and bounds.

*Agriculture's Air Force* covers five eras spanning more than 10 decades. In addition, it features 34 Spotlight pieces focused on significant individuals, organizations, trends, technologies and topics related to aerial application.

*Agriculture's Air Force: 100 Years of Aerial Application* may well be NAAA's most enduring 100th anniversary initiative. One thing's for sure: It is no textbook. The commemorative book is written from a fresh perspective that is entertaining and enlightening. Readers will come away with a new appreciation for agricultural aviation as a profession and the dedicated individuals who propel it forward.

## Order Your Copy of Agriculture's Air Force Today!

*Agriculture's Air Force* retails for \$45, excluding shipping. Order it from **[AgAir Update's Online Store](#)**.