NAAA eNewsletter

It's Here! Application Now Open for C-PAASS 2023—Certified-Professional Aerial Applicator Safety Steward

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 have jointly launched the Certified-Professional Aerial Applicator Safety Steward (C-PAASS) program 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. Secondarily, the certification can signal to customers, regulators and others outside the industry their commitment to professionalism.

C-PAASS certification 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 SAFE 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 https://education.agaviation.org/cpaass
 - You will need to log in using your NAAA username/password. Contact 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.

This is only the beginning. As NAAA develops its own Learning Management System (LMS), new on-demand courses and content will be incorporated into C-PAASS. A wide variety of topics will eventually be included in the LMS, including those covered in 14 CFR Part 137 knowledge and skills and those on how to properly set up agricultural aircraft to make on-target applications.

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.

NAAA Comments to EPA on Aerial Application Issues Pertaining to Carbaryl and Endangered Species Protections

On Tuesday NAAA submitted comments to the EPA on its Endangered Species Act (ESA) Workplan Update. The ESA Workplan Update was released in November 2022 and was a follow-up to the **original ESA workplan**. NAAA also submitted comments Tuesday on the proposed interim decision (PID) for carbaryl.

The workplan update laid out the method by which pesticide applicators will be required to mitigate risks to endangered species:

 Pesticide labels will direct applicators to the Endangered Species Bulletins Live! Two (BLT) website: https://www.epa.gov/endangered-species/endangered-species-protection-bulletins

- 2. Once on the BLT site, applicators will select the area they intend to spray on the map, the month during which they plan to make the application, and the EPA registration number for the pesticide they intend to apply.
- 3. BLT will provide a link if there are any bulletins for the combination of location, date, and pesticide.
- 4. Applicators must print or download the bulletin and follow all additional mitigations on the bulletin; the bulletin is considered an extension of the label and is thus law.
- 5. Applicators may obtain the bulletin from BLT within six months of the intended application date. This means that the bulletin used for an application may be printed or downloaded anytime from six months prior to just before the application. The closer to the application date a bulletin is read, the better it is for the species—the info is the most up to date. However, too short a time frame is burdensome to growers trying to plan. So the EPA set it at six months.

NAAA commented strongly in favor of one of the proposed mitigation strategies in the workplan update related to the BLT, where it allows the use of wind-directional buffers. Instead of requiring mandatory buffers next to endangered species habitats, applications would be allowed to occur next to an endangered species habitat with no buffer zone provided the wind is blowing away from the habitat. If the wind is blowing toward the habitat, then a buffer zone would be required. This proposal from the EPA marks a major victory for NAAA, which has been promoting the use of wind-directional buffers for many years.

A main goal of the ESA workplan and the update is to improve the EPA's efficiency with meeting its ESA obligations. The EPA is hoping to reduce the need to consult with the U.S. Fish and Wildlife Service and the National Marine Fisheries Service by proposing that more labels include instructions to protect aquatic habitats and conservation areas via the use of buffers on the label and cover all aquatic and conservation sites, not just those with endangered species. By protecting all of these sites on the main label, there will be fewer individual endangered species that will require further consultation and mitigation, thus speeding up the overall pesticide registration review process. Unfortunately, unlike the BLT buffers, the EPA did not propose making buffers on the main label wind directional. NAAA strongly opposed this in its comments and recommended all buffers—main label and BLT—be wind directional.

NAAA also expressed concerns about proposed mitigations in the EPA plan to reduce the risk of endangered species from pesticide runoff through surface water and soil erosion. Almost all of the mitigation options are under complete control of the grower, not the applicator. NAAA informed the EPA it is unrealistic and overly burdensome to require commercial applicators to police the actions of growers to verify compliance.

The PID for carbaryl closely followed the workplan update, and NAAA commented again that all buffer zones, not just those to protect endangered species, must be wind directional. Click **here** to read NAAA's comments on the ESA Workplan Update and **here** to read comments on the carbaryl PID.

Membership Grace Period Ended Feb. 15, Renew Your Membership Today

Thank you for your support as a 2022 member! If you have not yet renewed, your membership grace period ended Feb. 15. Do we have your support for 2023? Renew **online** or over the phone at (202) 546-5722.

NAAA is committed to creating a positive business climate, promoting safety and professionalism, improving the industry's public image, and influencing policy in a way that is beneficial to the aerial application industry. Our industry's importance to global food, fiber and bioenergy production comes at a crucial time as NAAA fights to ensure the aerial use of pesticides remains available and abundant while other government and activist interests work to cancel or impose unnecessary and burdensome use restrictions. It takes **your membership** resources to save these aerial uses and positively represent the industry before the public.

Resources supplied by your membership are what allows for NAAA to succeed on many issues, including the fighting and winning on important issues like exemptions from FAA user fees and federal fuel excise taxes; tower marking requirements; safety requirements for drones flying near manned, low-altitude aircraft; and as stated above, ensuring EPA keeps a healthy inventory of pesticide products for aerial use without unnecessary restrictions.

Watch NAAA's Video to See Why We're Better Together!

Set Yourself Up for Success; Renew Your Membership

As the industry enters its second century, NAAA and NAAREF have developed a way to augment industry advancement of safety and application accuracy while showing your customers, regulators, insurers, pesticide manufacturers, and the public the professional nature of the industry. Our new **Certified-Professional Aerial Applicator Safety Steward (C-PAASS)** program, launching this year, will fill that very role for those that want to participate. We know education works to reduce accidents and drift occurrences based on PAASS program stats. Since the first PAASS season in 1998-1999, the ag aviation accident rate (number of accidents per 100,000 hours flown) has dropped by nearly 26%, and the fatal accident rate has dropped by 10%.

The impetus for developing C-PAASS was to expand and gain recognition for maximizing professionalism by ultimately receiving additional benefits for being certified, such as insurance discounts and more flexibility pertaining to pesticide label language and for ag pilots to market to their customers that they have undergone additional training and development to best ensure that they can provide high-quality service.

Please make it a priority to **renew your NAAA membership**—the payoff far exceeds what you will spend in dues in the form of effective advocacy that reduces regulation and taxes affecting your aerial application business, and trade association membership dues are tax deductible.

Some membership benefits include:

- Complimentary one-hour legal consultation on Federal Transportation Laws to Operator and Pilot Members.
- Receive markedly reduced attendee and/or exhibitor fees to attend the Ag Aviation Expo.
- Receive the highly sought-after print and online NAAA Membership Directory, where you can find members and allied services in the industry.
- Stay up to date on the latest issues affecting your profession through Association publications, the NAAA eNewsletter, social media briefings and substantive web content at agaviation.org, as well as our Media Relations Kit.
- NAAA membership plus participation in Ag Aviation Expo sessions, PAASS and Operation S.A.F.E. Fly-ins offer pilots and
 operators several ways to improve professionalism, earn potential CEUs, and achieve discounts through their insurance providers.

Your membership helps us better represent your interests. Click here to renew.

FAA Aircraft Registration and Reregistration Changes

When purchasing an aircraft, the use of an FAA copy (formerly called the "pink" copy) of the registration application form 8050-1 for temporary registration has been changed from 90 days to unlimited up to the time the certificate is received, or the application is denied by the FAA. The new policy language is stated below:

Except when the most recent registration of the subject aircraft is expired or cancelled, 14 CFR 47.31(c) provides temporary authority for an airworthy U.S. aircraft to be operated within the United States without registration when a copy of the signed aircraft registration application is carried in the aircraft. This temporary authority is valid (i) until the applicant receives the Certificate of Aircraft Registration, (ii) until the date FAA denies the application, (iii) or as provided by paragraph (c)(2) of this section.

Paragraph (c)(2) referenced above sets a limit of 12 months from when the FAA lists the application as "pending" that the temporary authority may be used. The "pending" period does not start until the application is processed. As of this writing, the FAA is processing applications received in September 2022. With the FAA being behind on processing applications, if you are concerned about whether or not they have received your application, there is a quarterly index of applications received that may be viewed **here**.

Reregistration

The FAA is extending the duration of aircraft registration certificates from three to seven years, effective Jan. 23, 2023. If your registration certificate expires after this date, the **registration certificate** will automatically be extended for an additional four years.

Civil Aviation Registry Electronic Services (CARES)

The FAA is moving toward online registration services. Currently, paper forms may still be filled out and submitted. After Dec. 5, 2022, individual aircraft owners were able to:

- Complete and digitally sign self-guided aircraft registration applications;
- Upload legal and supplemental documents;
- · Receive auto-generated notifications;
- Request aircraft registration N numbers; and
- · Make online payments.

Corporations and LLCs will be added at some point in the future. You will need to sign up for a **CARES** account to access these features. More information on Aircraft Registration is available **here**.

NAAA & NAAREF Board Meetings Begin Today

The February 2023 NAAA and NAAREF Board and Committee meetings begin today in Alexandria, Virginia, and continue through Saturday evening. Click **here** to view a schedule. All meetings are open to NAAA members.

Meeting Location Details

Hilton Old Town Alexandria 1767 King Street Alexandria, VA 22314

NAAA Sets the Record Straight After Misleading Opinion Piece Impugns Aerial Application in Iowa Newspaper

An lowa newspaper published a **full-throated response** from NAAA CEO Andrew Moore after one of its opinion writers wrote a **distorted column** that unfairly suggests the costs of aerial application outweigh its benefits to agriculture and society.

What Moore was especially piqued about is that he spoke at length to the writer, Austin Wu, an editorial fellow at *The Gazette* of Cedar Rapids, Iowa. In return, Wu discarded or questioned much of what Moore had to say during the interview and turned to university "agricultural experts" to vet some of the benefits Moore mentioned. Wu's opinion piece was published under the headline, "Missing the field for crops: discussions on aerial application." Two weeks later, *The Gazette's* editors published Moore's response under the headline "Ag aviation facts contradict columnist's narrative."

Moore wrote that "Wu spun a web of words that deceptively attempts to bait a reader to believe the industry is a culprit of lowa's loss of natural lands, global warming and for jeopardizing human health." NAAA's CEO ended his published rebuttal with a parting shot:

[Aerial Application] is a form of application that has been vital to crop, forestry and human health protection for over 100 years because of its effectiveness, and because it evolves technologically. Wu was informed about this. Unfortunately he took a deceptive approach—one that harms his profession's reputation, not that of the professionals who are aerial applicators.

Moore's full response is available here.

Air Tractor Releases New Turn Smart Video on YouTube

Turn Smart: Respect the Safety Margin, Air Tractor's new safety video, is now available to watch on YouTube. You can also watch it below.



Air Tractor's new *Turn Smart* video debuted at the 2022 NAAREF Safety Session. The video features a combination of interviews, stunning animation and flying demonstrations in an effort to educate ag aviators on how to conduct an ag turnaround safely.

Kyle Schroeder, an Air Tractor engineer, introduces the video by providing information on the lethality of stall/spin accidents that result from improperly turning an aircraft. He's followed by Mike Rhodes, Air Tractor's former chief test pilot, who introduces Steve Gustafson, an ag pilot from Louisiana and an AeroShell Aerobatic Team pilot.

Gustafson describes what a safe ag turn looks and feels like. The maneuver must be planned, and you should preserve a margin of safety for when the unexpected happens. Gustafson also talks about the dangers of uncoordinated flight and the misuse of rudder while making ag turns. To assist with his description, animation is displayed to help pilots understand what can happen when turns are uncoordinated. Rhodes and Gustafson then discuss the change in an aircraft's center of gravity as the contents of the hopper are applied and the need to be a smooth and steady pilot.

To emphasize the importance of maintaining a margin of safety, *Turn Smart* turns to Mike Mullane, a retired U.S. Air Force colonel and former NASA space shuttle astronaut, to discuss normalization of deviance. Normalization of deviance occurs when you are operating under pressure to complete a task, which causes you to consider using a shortcut that is less safe than the normal procedure to save

time. If you survive, you will be more likely to take the shortcut the next time you're under pressure. Over time, the deviation from safety becomes your new normal.

Later, Rhodes joins Gustafson in his T-6 for some flying examples of what happens when a turn is done incorrectly, causing a stall spin.

The video closes with some key points:

- · Beware of overly aggressive turns.
- Back off 10%. Maintain your safety margin.
- · A wing at zero-G cannot stall.
- · Stay vigilant for "normalization of deviance."
- · Practice slow flight, stalls and recoveries.
- · Coordinated use of flight controls in every turn.
- · Pay attention to operating weight and CG shift.
- Turn using no more than 10 degrees of flaps.
- · Choose the correct turnaround maneuver for the mission.

The new version of *Turn Smart: Respect the Safety Margin* is worth watching and rewatching as matter of recurrent training. The knowledge it imparts to ag pilots will undoubtedly save lives. NAAA and NAAREF thank Air Tractor for the time and resources it put into producing such a high-quality safety education video.

Be sure to watch *Turn Smart* so you can turn smart!

FAA Issues Updated Guidance Making Clear Part 137 Operators Aren't Subject to OpSpecs Requirements

Per NAAA's efforts, the FAA has released updated guidance for its inspectors that clarifies an inspector's duties when an ag operator adds a new aircraft to their operation. NAAA **reported** on this expected guidance in the summer of 2022.

In section 3-4228, sub-sections A and B of the guidance, which is available **here**, inspectors are instructed to update and reissue an operator's LOA A003 using WebOPSS upon request from the operator that an aircraft has been added to their operation.

The use of WebOPSS to complete the A003 form has caused confusion with some FAA inspectors, who have mistakenly concluded that Part 137 operators need to fulfill various other requirements related to 14 CFR Part 119 for operations specifications (OpSpecs). In section 3-4227, the updated guidance makes clear that Part 137 operators are **not** subject to the requirements of OpSpecs.

Sub-section C clears up another issue some ag operators have had, which is an inspector insisting an aircraft be inspected before it can be added to the operator's LOA A003. The new guidance clearly states there is no regulatory requirement for an aircraft to be inspected prior to it being listed on LOA A003.

Finally, sub-section D of 3-4228 states that there is no requirement for aircraft ownership interest in Part 137. A Part 137 operator must have use of at least one certificated and airworthy aircraft equipped for agricultural operations. The term "use" includes ownership as well as any other agreement for use of the aircraft.

In summary:

- Notify your FSDO when you add an aircraft to your operation; they must add the aircraft to your LOA A003 and reissue the updated form to you (section 3-4428, sub-sections A and B).
- You are not subject to the requirements of OpSpecs (section 3-4227).
- You do not have to have an aircraft inspected before it's added to your LOA A003 (section 3-4228, sub-section C).
- You do not need to provide proof of ownership, lease, or any other agreement of use for your Part 137 operation's aircraft (section 3-4228, sub-section D).

Dean Wilson Elected to National Ag Aviation Hall of Fame

The National Agricultural Aviation Hall of Fame Nominations Board is pleased to announce that Dean Wilson is being inducted into the National Agricultural Aviation Hall of Fame. Dean W. Wilson, 87, of Clarkston, Washington, has been selected to be the 53rd inductee into the National Ag Aviation Hall of Fame. The induction ceremony will take place at the 2023 NAAA Ag Aviation Expo Dec. 7 in Palm Springs, California.

Dean's aviation accomplishments are many, as he started his flight training at age 13 and his aviation mechanic training at 17. Dean had 13 years of experience as an agricultural pilot and had converted a couple of UMF Wacos into dusters/ sprayers. After being an ag pilot, Dean started instructing and flying sailplanes. He had plans to design sailplane wings for a Waco, which gave rise to him developing a brand-new agricultural aircraft, the Eagle DW-1 biplane. At the time, Dean was working for Joe Terteling in Boise, Idaho, restoring antique airplanes. Terteling financed the Eagle project.

Dean spent four years bringing the Eagle DW-1 from design to production. The Eagle has long wooden wings with microlam spars (engineered wood). Reducing drag on a biplane and obtaining FAA approval for the wings, along with the use of epoxy glue, were some of the unique challenges he faced. The Eagle DW-1 had a production run of 90 aircraft from 1979 through 1983. Many of the aircraft are still in use today, with 30 aircraft currently in the FAA's registration database. The DW-1 was known to have a very good spray pattern and, combined with more current knowledge of nozzles and aircraft spray equipment, is currently being looked at as an aircraft that can be used in sensitive areas.

Dean has an aircraft designer's heart as he went on to develop the Avid Flyer, a kit-built aircraft that is still in production. In 1983 he won the EAA Best New Design for the Avid Flyer. He was the 1998 recipient of the Dr. August Raspet Memorial Award for outstanding contribution to the design of light aircraft. Dean was inducted into the EAA's Homebuilders Hall of Fame in 2010. In 2014, Dean was inducted into the Idaho Aviation Hall of Fame.

In the 100-year history of agricultural aviation, only a handful of individuals and companies have brought purpose-built, newly designed agricultural aircraft to market. Dean Wilson is one of these individuals.

The National Agricultural Aviation Hall of Fame is housed in the Jim Buck Ross Mississippi Agricultural and Forestry Museum in Jackson, Mississippi.

AD Issued to Establish Life Limits on Certain Walter/GE Turboprop Engine Compressor Cases and Drums

The FAA has issued a new airworthiness directive (AD) for certain GE Aviation Czech s.r.o. M601E-11, M601E-11A, M601E-11AS, M601E-11S and M601F model turboprop engines. This AD was prompted by the exclusion of life limits for certain compressor cases and compressor drums from the airworthiness limitations section of the engine maintenance manual.

The AD requires recalculation of the consumed life for the affected compressor cases and compressor drums and, depending on the results of the recalculation, removal and replacement of the affected compressor case or compressor drum with a part eligible for installation. AD 2022-1414 may be viewed **here**. The AD requires action within 90 days of the effective date of March 13.

FAA Adopting AD for Series 500 Continental Engines

The FAA is adopting a new airworthiness directive (AD) for certain Continental Aerospace Technologies Inc. (Continental) GTSIO-520, IO-470, IO-520, IO-550, IOF-550, LIO-470, LIO-520, LTSIO-520, O-470, TSIO-470, TSIO-520, TSIO-550, TSIOF-550 and TSIOL-550 model reciprocating engines with a certain Superior Air Parts Inc. (SAP) cylinder assembly or intake valve installed.

This AD affects parts installed on or after Jan. 20, 2022. Action is required within 30 days after the effective date of Feb. 17. The AD is being issued without a normal comment period, but comments are still being taken and the AD may be amended as a result of comments received.

View the complete AD here. To submit a comment, go to the previous link or directly to the comment page here.

California Unveils 2050 Goals for Eliminating Key Pesticides

California plans to ban toxic pesticides by 2050, according to a new report. California Gov. Gavin Newsome's administration has released a policy framework for eliminating or significantly reducing the use of controversial pesticides by 2050 in California. (Click **here** to see the framework.)

The report, generated by a stakeholder-led task force, details actions targeting pesticides that pose the greatest threats to the environment or socially disadvantaged communities. Pesticides like fumigants, neonicotinoids and organophosphates fall within the priority parameters. Dubbed a sustainable pest management roadmap, the set of recommendations was nearly two years in the making and involved 25 members in the work group, ranging from academics to farmers, industry groups and pesticide manufacturers—alongside environmental activists and tribal members. The document makes clear that group members sometimes had opposing views on the recommended actions and "at times struggled to reconcile their divergent thinking." While the members have signed off on the final report, "not every member values any one of the goals or recommended actions equally."

Along with reducing pesticide use, the report prioritizes the need for state and federal governments to shore up investments in pest prevention, streamlining registrations and evaluations for new products and educating the public on existing safety standards. It also goes beyond rural issues, proposing new standards for urban settings, where nonagricultural uses account for as much as 55% of pesticide sales in California and up to 75% of the reported illnesses.

The report touts a more holistic approach to pesticide management, exploring alternatives to targeted pesticide ingredients before enacting a ban on their use. Soon after taking office in 2019, Gov. Newsom fractured the state's relationship with the agriculture community by ordering the cancellation of chlorpyrifos before the Department of Pesticide Regulation (DPR) completed an evaluation. Afterward, DPR formed a working group to find alternatives to the insecticide. Among the recommendations, the stakeholders urged the department to expand the alternatives work group to develop a more comprehensive strategy that goes beyond one pesticide and addresses other challenges in research, cooperative extension and funding.

States, Farm Groups, Others File Suit Over Biden Administration's Far-reaching WOTUS Rule Redefinition

States and 17 farm, construction and mining groups filed suit in federal court last month to overturn the Biden administration's definition of the upstream reach of water pollution laws. The state of Texas and the American Farm Bureau Federation are two of many entities involved in the suits. The plaintiffs argue that the new Waters of the United States (WOTUS) rule finalized by the Biden administration was irresponsibly broad and covered land and waterways that have no connection to the navigable waters under federal jurisdiction.

The lawsuits to overturn the WOTUS rule were filed in federal district court on Jan. 18, the same day the rule was published in the Federal Register. Like the challenges to the Obama definition, the lawsuits criticized the new WOTUS definition as overly broad, covering areas that may not even be with water. NAAA has concerns with expanding the definition of WOTUS because it would expand the conditions whereby applicators may have to obtain NPDES pesticide general permits under the Clean Water Act. These permits are time-consuming, expensive, duplicative and unnecessary for applicators because pesticides are already tested for water safety under the Federal Insecticide, Fungicide and Rodenticide Act.

Congress said in 1972 that clean water law applied to the waters of the United States and left it to federal agencies to define them. The new WOTUS rule covers more waterways and wetlands than the narrower definition written during the Trump era, which was overturned by a federal court in 2021. An earlier WOTUS definition by the Obama administration was tied up in court and never took effect.

Litigation over the Biden administration's WOTUS rule will launch as the Supreme Court is preparing to rule in a case—Sackett v. EPA—an Idaho case that has the potential to limit the reach of the Clean Water Act by limiting federal protection of wetlands to land with a surface connection to a waterway. In 2006, the Supreme Court ruled that wetlands with a "significant nexus" to navigable waters were covered by the water pollution law. Courts have generally followed that rule since then.

Additional challenges to the WOTUS rule are expected to land in multiple federal district courts across the country.

Update Your Information for 2023 Membership Directory

Have you moved or changed employers since you renewed your NAAA membership? Allied companies, have you reviewed your company description lately? Ensure your listing in the 2023 NAAA Membership Directory is correct by logging into your account. If any information has changed, please let us know right away. You can provide your information by:

- Updating your information at AgAviation.org. Log in using your username and password and update your information under My Profile.
- Emailing your changes to information@agaviation.org.
- Calling the NAAA office at (202) 546-5722.
- Responding to the letter or email that you will receive in a couple of weeks.
- Faxing your changes to (202) 546-5726.

Please provide any corrections ASAP to ensure accurate inclusion in the 2023 NAAA Membership Directory!

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:

- Request a secure upload link for larger uploads OR email directly to Madison Dixon, Research Director.
 Email: 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.