



EAA Chapter 478
COCKPIT CHATTER
Lexington Park, MD December 2024
A Silver EAA Chapter



EAA Chapter 478 Monthly Gathering

March 18, 2025

**Program: A-1 Build Experience in Pictures
2W6 Terminal Building Conference Room**

6:00-6:30 PM Social

6:30 PM Program Begins

In this edition of Cockpit Chatter

From The Top – New flying season is right around the corner, Pax Museum STEAM Day report

Board of Directors Meeting Minutes – 4 March 2025

Treasurer Report – Current Status

Young Eagles Corner – Young Eagle Flights begin in April

The Homebuilder's Corner - Challenger II getting ready to fly

The Flying/Maintenance Corner – C175 Panel and Engine Upgrade Update, Garmin Avionics technical tidbit

For Sale – Items donated to the Chapter

FROM THE TOP

Darryl Crawford, President EAA Chapter 478

Better flying weather is right around the corner. Make sure you and your airplane are ready for the season. We will be kicking off Young Eagle mini rallies after the April VMC meeting, assuming the weather will cooperate.

A big thank you to Sid Wood, Bernie Wunder and Paul Gambacorta for supporting the Museum's STEAM day last weekend. See the summary writeup below. They really helped to introduce the kids the aviation.

We are coming up to crunch time if we are going to run a Build-N-Fly event this year. We need a chapter member who has a passion for this event to organize and plan the event. The EAA program can be followed or a different approach can be used. Once a leader has been designated, other volunteers will be willing to help, but as with any Chapter activity it all starts with someone willing to lead the activity.

Chapter dues are due, still a bargain at \$20 for the year. There is a Paypal link on the Chapter website if you want to use that, you can also pay the Treasurer at one of our Chapter events.



QR Code to donate to the Chapter

PIREP-PRNAM STEAM DAY 2025

Submitted by Bernie Wunder

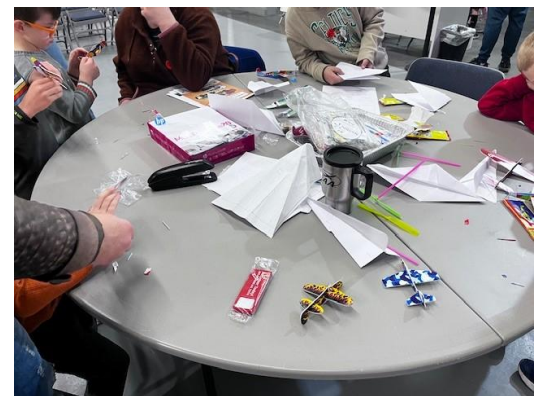
Several years ago, the Patuxent River Naval Air Museum started conducting an annual STEAM (Science, Technology, Engineering, Art, and Mathematics) Day to give kids a hands-on experience in the wide world of technology. The museum invites companies, the Navy base, and organizations like the Patuxent Aeromodellers to set up exhibits for kids to learn some science and technology. This year the museum conducted their STEAM Day on March 8th and three of our EAA chapter members supported it by operating the five interactive kids exhibits the chapter donated to the museum.



Sid Wood, Paul Gambacorta, and I operated the interactive exhibits (hot air balloon, Bernoulli Box, Reaction Timer, Vert Rep Simulator and wind tunnel) to give kids exposure to many things related to aviation. We made paper airplanes and put them in the wind tunnel, flew hot air balloons up to the roof trusses, watched



kids & parents try to drop ping pong balls into a silhouette of a ship with a hole to replicate helo vert rep operations, all while trying to maintain law & order among an ever-increasing crowd of kids and parents. The museum sold over 500 adult tickets for the day, so figuring there might be 1-2 kids per adult, there were probably 500-1000 kids milling around the museum throughout the day.



We gave out every cheap airplane model and whirly gig that we had. It is a lot of work and by the end of the day we were beat, but like any kids' activity, it is great to see all the smiles and hearing the positive comments from the parents.

UPCOMING EVENTS

March Gathering – 18 March
Sun-N-Fun – 1-6 April
April Board Meeting – 1 April
April Gathering – 15 April
April VMC – 19 April
April Mini YE Rally – 19 April

EAA CHAPTER 478 MEETING MINUTES

EAA Chapter 478 Board of Directors Meeting March 4, 2025 – 6:30 PM

Attendees: John Attebury, Darryl Crawford, Tom Weiss, Don Byrne, Paul Gambacorta, Sid Wood, Chris Moody (phone), BJ Hall, Greg Stevens

Discussion:

1. March program will be a review of the A-1 build.
2. April will be a review of the 2W6 future plans. Board reviewed the new master plan drawing. Ken Reed will review the 2W6 rules for aircraft owners.
3. Build and Fly has not been scheduled. EAA has a new RC airplane offering. Need a leader to volunteer before the program can be defined.
4. EAA Memorial Wall nomination for Donna Stewart, cost \$500, may be cost shared with the family. Deadline for this year's submissions is April 15, 2025. Board decided to authorize up to \$250 of Chapter funds.
5. AirVenture Chapter group camp spot names are being collected. 6 have shown interest. Can reserve up to 6 sites that will be all together. Darryl will be the lead. May not be worth it. Probably will be worked off line between the Chapter members.
6. Ryken kids could use EAA members to be mentors. Not sure how this will work and what the expectations are for the Mentors.
7. YE Credits for 2024 is \$910, must be spent for supplies that support the YE Program.
8. Chapter has 40 paid members.
9. The Post Office Mail Box has been closed down, this was a cost to the Chapter that was not necessary in the digital age.
10. New YE website is up and running, accessed through EAA Chapter website.
11. March VMC is planned for March 15.
12. Possible future programs on Wilkerson Tire Recycler and an update on the airport future.
13. Mini YE Rally's start after VMC meetings starting in April.
14. 2025 major events:
 - a. YE Rally on June 7th @ 2W6
 - b. YE Rally on the Saturday of Labor Day Weekend @ 2W6
 - c. Chapter Fly-Out to Massey
 - d. Open Hangar June 17th
 - e. Also Ryken and BJ Hall's group for smaller YE events

- f. Cambridge Wags, Wings and Wheels, 9 August.
 - g. September Picnic
 - h. Chapter Fly-Out to Gettysburg for Pancake Breakfast
15. Need to merge Newsletter Email Distro list, membership roster and treasurers list.
16. Membership Dues are due for 2025
17. We may be a “Gold” Chapter this year, waiting for confirmation from EAA HQ.
- Adjourned: 8:08 PM

TREASURER’S REPORT

Submitted by Don Byrne

Note from Treasurer:

It’s that time of year to pay Chapter dues! The amount hasn’t changed, still the low low price of \$20.00 . There’s three ways to pay;

- 1) See the Chapter Treasurer at a meeting (VMC, Board meeting or Chapter meeting) and slip him cash or a check
- 2) Send a check to; Don Byrne
12108 Double Tree lane
Lusby, MD 20657
- 3) use the PayPal link on our Chapter Website (<https://chapters.eaa.org/ea478>)

I will repeat this request in the March newsletter then start sending emails reminding people of dues delinquencies.

Help support our Chapter,
Don Byrne
EAA 478 Treasurer

| <u>EAA Chapter 478 Financial Report</u> | |
|--|---------------|
| <small>Through 28 February 2025</small> | |
| Fund | Amount |
| Petty Cash | \$24.40 |
| Savings | \$439.00 |
| Checking | \$24,890.72 |
| Total | \$25,354.12 |

YOUNG EAGLES CORNER

Young Eagle Coordinators – Greg Stevens, BJ Hall, Paul Gambacorta

Editor's Note: I am posting an email that many of us should have received on changes to the Young Eagle website, please note the information about passwords and the section I highlighted. There were some issues at the last mini Young Eagle Rally with the website, it appears there is still a transition phase taking place trying to get to the new website. Stay tuned, more to come as it is received.

I am thrilled to announce that the new version of Young Eagles online registration is now live! The new tool, EAA Chapter Events, can be found at EAAChapters.org.

As a current user of YEDay.org, your profile has been migrated to the new tool. The new online software is directly integrated with your EAA.org account. Therefore, your credentials are as follows:

- Email: (Email)
- Password: EAA.org Password.

If you have forgotten your password, you can reset it by clicking "Forgot Password." This will reset your password for EAAChapters.org and EAA.org as your profiles are now one and the same.

Once you have logged into the new tool, please click your name in the upper right-hand corner to review your profile for accuracy. You will notice that you can now list multiple EAA chapters that you are affiliated with.

Although the new tool is now live, EAA is already working on Phase 2 development. This next phase includes the following:

- Additional event types (Flying Start, Young Eagles Build and Fly, Young Eagles Workshop)
- Non-EAA member access to the tool
- Optional function to reserve seats for first-time fliers
- Cleaning up reporting functions
- Many more enhancements for the user experience suggested to EAA during beta testing

With the go-live of the new tool, I'd also like to update you on the shutdown timeline for YEDay.org.

- October 1 – Chapters cannot add new events to YEDay.org
- December 31 – YEDay.org will be decommissioned
 - YEDay.org will redirect to the new site
 - EAA will work with chapters with any existing events scheduled for January 1 or later

If your chapter has any events scheduled in [YEDay](http://YEDay.org) between now and the end of 2024, you may finish those events out on YEDay.org.

I appreciate all your patience during this transition period. Make no mistake, there will be hiccups, but the Young Eagles team is committed to developing a high-quality tool that will make your life easier as a Young Eagles volunteer.

EAA Digital Signature App – Important Note

During this transition period, your login credentials for the digital signature app will not change. They will remain the same as your YEDay.org login. When YEDay.org is shuttered, the login credentials will transition to match the EAA Chapter Events tool.

Young Eagles Flown by Pilot in 2024

| Pilots | 6/8 | 6/8 | 6/20 | 6/21 | 7/19 | 8/10 | 9/7 | Oct-Nov | Other | 12/7 | Total |
|--------------------|-----|-----|------|------|------|------|-----|---------|-------|------|-------|
| Joe Arvai | | | | | | 2 | | | | | 2 |
| John Attebury | | | | 4 | | 5 | | 4 | | 1 | 14 |
| Robert Bray | 5 | | 2 | | | 4 | | | 1 | | 12 |
| Don Byrne | 3 | 1 | 1 | | 4 | 5 | 4 | | | | 18 |
| Dan Byrnes | | | | | | | | | | | 0 |
| Richard Byrnes | 3 | | | | | 4 | | | | | 7 |
| Ken Cahill | | | | | | | 4 | | | | 4 |
| Darryl Crawford | | | | | | 1 | | | | | 1 |
| Michael D'Errico | 2 | 1 | | 3 | | 2 | 6 | 3 | 1 | 2 | 20 |
| Egon Frech | 5 | | 2 | | | | 5 | | | | 12 |
| Paul Gambacorta | 4 | 1 | | | 6 | 2 | 7 | | 3 | | 23 |
| Don Gates | | | | | | | | | | | 0 |
| Grant Miller | | | | | | | | 1 | | | 1 |
| Chris Moody | | | 2 | | | | 5 | 4 | | | 11 |
| John Nelson | | | | | | 2 | | | | | 2 |
| Robert Jake Piercy | | | | | | | | | | | 0 |
| Charles Quandt | | | | | | 4 | | | | | 4 |
| David Rivera | | | | | | | | | | 1 | 1 |
| Guy Sappah | | | | 2 | 4 | | | 1 | | | 7 |
| Marc Slavin | | | | | | 4 | | | | | 4 |
| James Spencer | 4 | 2 | | | | | | | | 2 | 8 |
| Richard Van Natta | 2 | 1 | | 8 | | | | | | | 11 |
| Brian White | | | | | | 5 | | | | | 5 |
| Benard Wunder | 6 | | 2 | | | 3 | | 4 | | 2 | 17 |
| Total | 34 | 6 | 9 | 17 | 14 | 43 | 31 | 17 | 5 | 8 | 184 |

| EAA Chapter 478 Young Eagles Total | | | |
|------------------------------------|-------------|--------------|-------------|
| Year | Flights | Year | Flights |
| 1992 | 6 | 2012 | 242 |
| 1993 | 54 | 2013 | 79 |
| 1994 | 44 | 2014 | 127 |
| 1995 | 79 | 2015 | 248 |
| 1996 | 89 | 2016 | 206 |
| 1997 | 90 | 2017 | 205 |
| 1998 | 47 | 2018 | 209 |
| 1999 | 23 | 2019 | 112 |
| 2000 | 113 | 2020 | 2 |
| 2001 | 94 | 2021 | 65 |
| 2002 | 90 | 2022 | 269 |
| 2003 | 101 | 2023 | 164 |
| 2004 | 66 | 2024 | 184 |
| 2005 | 138 | 2025 | |
| 2006 | 97 | 2026 | |
| 2007 | 122 | 2027 | |
| 2008 | 51 | 2028 | |
| 2009 | 113 | 2029 | |
| 2010 | 156 | 2030 | |
| 2011 | 187 | 2031 | |
| Total | 1760 | Total | 2112 |
| Grand Total | | 3872 | |

THE HOMEBUILDER'S CORNER

Challenger II Builder's Report

Submitted by Bernie Wunder

Challenger II N26383 is getting closer to making some noise and, hopefully soon, putting some air under its wings.

The story began in 2007 when Bill Englehart purchased a Challenger II kit from Quad City Aircraft. He worked on putting the kit together until around 2015 when he ran out of garage space. Sid Wood and I had purchased Challenger kits in 2019 and were done in by COVID when the factory basically went bankrupt (another long story). So Sid bought Bill's kit and started finishing the build in 2020. He progressed a long way and was getting close to starting the engine, which required having aircraft in-motion insurance at 2W6. Age and other factors did him in when finding the insurance was next to impossible. Sid put the kit up for sale last year. That is where I entered the picture.

I (and several others) had helped Sid cover/paint the airplane and finish up the build. I found out that the United States Ultralight Association would sell just LSA/Ultralight liability insurance with no age restrictions. When I found out I could get insurance at a reasonable cost because the Challenger is a LSA, I made an offer to Sid to buy the Challenger and get it flying with his help. There were too many of us

locally who wanted to see this project completed.

Sid and I are now getting very close to starting the engine. On March 14th (Pi day), we rolled it out on the



ramp, checked the steering and brakes, and just practiced getting the airplane in and out of the hangar. Sharing the hangar with a Zenith 601 makes getting this Challenger aircraft in and out of the hangar challenging (no pun intended) to say the least. Putting it on dollies and rolling it in sideways is the only way it fits in. Eventually this will go away when its new home becomes MD50. I am now struggling with getting the airworthiness certificate. Getting the registration took about 2 ½ months, so I think the airworthiness certificate will be just as challenging. Hopefully we will have some updates and flight test reports soon - we have a test pilot waiting in the wings to conduct the first flights.

THE FLYING/MAINTENANCE CORNER

C175 Engine Upgrade

Submitted by Noel Fallwell

Well, progress on this major STC update has slowed considerably. Several months ago I reported that the upper cowling looked to fit good and the lower cowling needed major surgery to fit around the new engine.

That statement turned out to only be partially true. Now, the upper cowling DOESN'T FIT!

If you remember, the engine was changed from the original Continental, to a newer Continental (Lycoming Clone)...one that has the starter motor on the front with a new ring gear. The older engine had the starter on the back side and no ring gear. When the top cowling is put in place (well, attempted to be put in place) it contacts the up-front ring gear. See the attached photo of the new ring gear.



Before the upper cowling fit issue can be address, the worn out cowling support brackets and "rubber" vibration dampeners need to be

replaced. See photo 2. These items are what the cowling attaches to. They seem to be somewhat scarce and have yet to be ordered. No brackets = no progress on fitting the cowling.

More to come on the C175 (hopefully) in the near future.

On another front, two RV-6 aircraft have shown up in the shop. Both are older aircraft with new owners, and both want newer avionics. I will update the chapter on how that goes.

And on still another front, my son has asked me to look into upgrading our RV-6A aircraft from a steam gauge panel to all glass. I'll keep the group up to date on that project also.

Until next time...



Garmin Installation Tip

Submitted by Noel Fallwell

Just FYI...

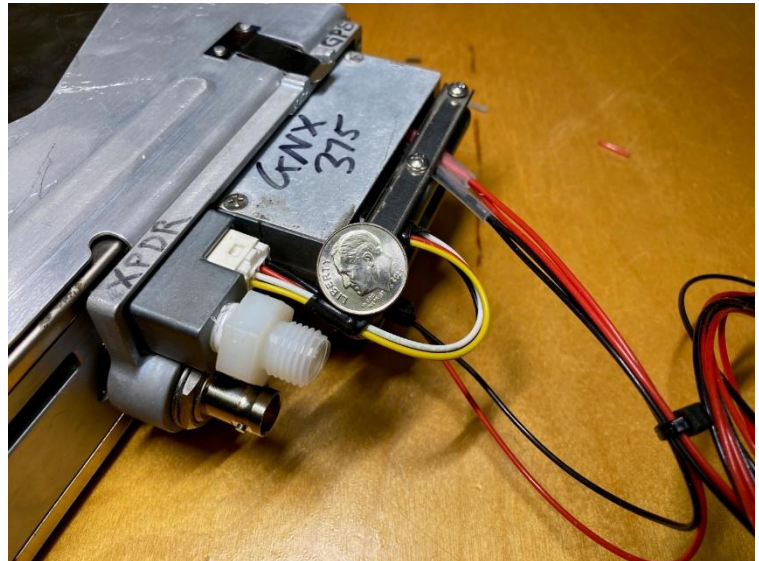
Back in the day, Garmin sold a number of panel mounted avionics boxes. And these boxes required that a number of configuration items / selections had to be entered before the unit would operate correctly. Once entered (you did save these configuration parameters...somewhere didn't you?) you were done. If the unit ever needed to go to the shop for repair or replacement, it was quite a task to remember all of the correct configuration data needed to be re-entered.

Garmin solved this task of re-entering the configuration data by providing a non-volatile memory module that is installed in the metal back shell housing of a number of their newer units. These connectors are attached to the back plate of the units mounting rack. See the photo of the Configuration Module. Now, when a piece of equipment is removed, the configuration stored in the Configuration Module stays with the mounting rack. When the repaired / replacement unit is reinstalled in the rack, the unit can gather the configuration information from the original Configuration Module.



The next iteration of this idea is provided in the GAE Pressure Sensor Module. See the attached picture. This device contains the configuration information as well as a threaded connection that attaches to the Static Source of the aircraft. This GAE provides altitude information to the attached unit that can then send altitude information to other installed devices that may need it (GPS, Txponder, etc.) This GAE Module takes the place of a blind encoder. Again, it is attached to the units backplate and stays inside the aircraft when the host device is removed.

Saves space and a power connection.
Later...



FOR SALE

Our EAA Chapter received a donation of aviation supplies from Adml Steve Abbot with a request that proceeds from selling these items would be used to support our Chapter's youth programs.

Here's a list of items that the Chapter still has for sale with suggested selling prices. If you think the price is too high, make an offer. Details and purchases can be made by contacting Don Byrne (Treasurer) at byrnehangar@comcast.net or 301-602-7403. Items can be delivered to the Chapter meeting or other arrangements can be made.

Bose A20 Headset (with 6 pin lemo connector) \$250

Stratus 2S ADS-B In receiver \$200

Stratus 1 ADS-B Receiver \$50

Garmin GPS MAO 496 (with manul, antenna and charge cable) \$400

Life Raft, Survival Products Inc, 4 person \$500

Aircraft Cover for Cirrus SR20, Bruce's Custom Covers \$200

Don Byrne
EAA Chapter 478 Treasurer

CHAPTER 478 CALENDAR OF EVENTS

| Date | Day | Event |
|--------|-----------|---|
| 18-Mar | Tuesday | EAA Chapter 478 Members Meeting 6-8 pm @ 2W6 Terminal |
| 1-Apr | Tuesday | EAA Chapter 478 Board Meeting 6-8 pm @ 2W6 Terminal, Sun n' Fun, Lakeland FL |
| 2-Apr | Wednesday | Sun n' Fun, Lakeland FL |
| 3-Apr | Thursday | Sun n' Fun, Lakeland FL |
| 4-Apr | Friday | Sun n' Fun, Lakeland FL |
| 5-Apr | Saturday | Sun n' Fun, Lakeland FL |
| 6-Apr | Sunday | Sun n' Fun, Lakeland FL |
| 15-Apr | Tuesday | EAA Chapter 478 Members Meeting 6-8 pm @ 2W6 Terminal |
| 19-Apr | Saturday | EAA Chapter 478 VMC Meeting 9-10 am |
| 6-May | Tuesday | EAA Chapter 478 Board Meeting 6-8 pm @ 2W6 Terminal |
| 10-May | Saturday | Massey Aerodrome Chili Fiesta Fly-in In 10 am - 2 pm |
| 17-May | Saturday | EAA Chapter 478 VMC Meeting 9-10 am |
| 20-May | Tuesday | EAA Chapter 478 Members Meeting 6-8 pm @ 2W6 Terminal |
| 21-May | Wednesday | US Naval Academy Graduation, Annapolis MD |
| 22-May | Thursday | US Naval Academy Graduation, Annapolis MD |
| 24-May | Saturday | Harrisburg Air Show, Harrisburg PA / Stafford Airshow, Stafford VA |
| 25-May | Sunday | Harrisburg Air Show, Harrisburg PA / Stafford Airshow, Stafford VA |
| 26-May | Monday | Memorial Day Holiday |
| 31-May | Saturday | Gettysburg EAA Chapter 1041 Spring Fly-in/Drive-in Pancake Breakfast 8- am - 12 pm |
| 1-Jun | Sunday | Gettysburg EAA Chapter 1041 Spring Fly-in/Drive-in Pancake Breakfast 8- am - 12 pm |
| 3-Jun | Tuesday | EAA Chapter 478 Board Meeting 6-8 pm @ 2W6 Terminal |
| 6-Jun | Friday | World War II Weekend, Reading PA |
| 7-Jun | Saturday | Young Eagles Day 9 am - 1 pm @ 2W6 Terminal, World War II Weekend, Reading PA |
| 8-Jun | Sunday | World War II Weekend, Reading PA |
| 10-Jun | Tuesday | Open Hangar Night 5-7 pm @ 2W6 |
| 14-Jun | Saturday | Ocean City MD Air Show |
| 15-Jun | Sunday | Ocean City MD Air Show |
| 16-Jun | Monday | Aero Educate Camp 8 am - 5 pm @ 2W6 Terminal |
| 17-Jun | Tuesday | Aero Educate Camp 8 am - 5 pm @ 2W6 Terminal |
| | | Aero Educate Camp 8 am - 5 pm @ 2W6 Terminal; Summer Solstice flight to Hummel (W75) with dinner. |
| 20-Jun | Friday | |
| 21-Jun | Saturday | EAA Chapter 478 VMC Meeting 9-10 am @ 2W6 Terminal / Massey Antique Fly-in, Mas |
| 22-Jun | Sunday | Dayton Airshow, Dayton OH |

In the Chocks

Thanks for all of the inputs this month, looking forward to seeing all of you at a Chapter event soon.

Build, Repair and Fly Safe.

Tom Weiss – Editor

Cockpit Chatter is published monthly by the Experimental Aircraft Association (EAA) Chapter 478 solely for the dissemination of information and ideas to the membership. Gatherings are held on the Third Tuesday of the month at 7:30 PM in the Patuxent River Test and Evaluation Museum. Membership is \$20.00 per year and requires an active membership in EAA. Any opinions expressed herein are strictly those of the author and do not necessarily reflect the opinions of the chapter or the Experimental Aircraft Association.

Chapter Officers

President: *Darryl Crawford 2024-25*

Vice President: Rich Byrnes 2025-26

Secretary:

Treasurer: *Don Byrne 2025-26*

Committee Chairs and Chapter Advisors

Social Chairman:

VMC Coordinator: Paul Gambacorta

Program Coordinator: Paul Gambacorta

Young Eagles: Greg Stevens, BJ Hall

Flight Advisors: *Bill Posnett, Joe Arvai*

Technical Counselors: Sid Wood

Newsletter Editor: *Tom Weiss*

Web Editor: Chris Moody

Tool Crib Committee: Colin Cline

Board Members

Sid Wood 2024-25

Chris Moody 2025-26

Jeff Panko 2025-2026

John Attebury 2023-24

BJ Hall 2025-2026

Greg Stevens 2025-26

Keith King 2025-26

John Pechon 2025-26

Past President Tom Weiss 2024-25

Chapter Web Address

<https://chapters.eaa.org/EAA478>