

The **W**ingman

EAA Chapter 495 - Roseburg, Oregon

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Around the Patch

by Joe Messinger
Newsletter Editor

To say that not much happened at the last meeting would be selling our new Young Eagles Coordinator, Ken Nicholls, more than a bit short. Not only did he prepare a burger meal that would give any burger joint in town a run for its money but he followed it up with a comprehensive discussion of the latest on the Young Eagles program. As we all should know, there are a few hoops to jump through in order to be able to indulge in the joy of taking a kid for a ride in the Young Eagles program.

It almost goes without saying (but we'll say it anyway) you need to be a member of EAA, be a licensed pilot (LSA or better), possess a current medical certificate (if applicable), be current to carry passengers in the airplane you'll be flying, and have a current flight review. You need the proper insurance and the airplane must be legal. That means current annual, an airworthiness certificate on display, and any other documentation necessary for day to day flying. All Young Eagle pilots must also have completed both the online training and background check as part of EAA's Youth Protection Policy. We know it sounds like a lot of hoops to jump through but when you really analyze the requirements, you've probably covered most of them just to fly your favorite airplane.

EAA National requires all Young Eagle Coordinators to have completed the new **Risk Management Training** and suggests all pilots, ground personnel, and chapter officers also complete the training. It's free and the more we know about the program, the more attractive it will be for parents. Just think, how would you feel? You're about to turn your little darling over to some guy who smells of 100 LL and oil, sporting a six day fuzzy face, wearing a rumpled aloha shirt, flip flops and a ragged ball cap, to take little Johnny a couple thousand feet in the air. The parent asks a question and gets a blank look from the pilot. The more you know about the program, the better for everybody. Don't be that guy that says, "I don't know, I just fly the plane." I took the test and passed with a near perfect score (missed 1 of 15) and it took about 45 minutes. Most of it is common sense.

You can learn more about the program by visiting EAA.org/YEVolunteers and finding "Young Eagles Risk Management Training" under the "Chapter Resources and Information" section. The entire training and test, which you must pass with a score of 70%, or better will take less than an hour. Since the discussion around Young Eagles took up most of our allotted meeting time, our treasurer's report was brief. Yes we do have some money. On top of that, look for spaghetti and meat balls or sauce for this month's meal. We could probably use salads, garlic bread and desserts from members. If you have a topic for a presentation you just can't wait to share with the chapter, contact Dennis Rose and he'll set you up. This is your chapter so let's participate.

Take a 3-D tour of the Antonov AN-225 Mriya

If you don't know about the website Simple Flying, take a look. Yes, it's mostly oriented toward airlines and big jets, but occasionally they come up with something of interest to any pilot or anybody who just loves airplanes. I recently ran across an article on the Antonov AN-225 Mriya, known as the largest airplane ever built. Unfortunately, it was built and hangered in Ukraine, and was targeted by Russian airstrikes early in the ongoing war. But before this happened, a [3-D tour](#) of the airplane was made using Google Maps and it's on the Simple Flying site. You can tour pretty much most of the interior of the airplane except the cockpit. So if you have a half hour to spend, take a look. It'll be worth your time.

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2023 Begins in Grand Style with Freedom Flight 16

We kicked off the year with the 16th annual Freedom Flight. This year's event was dedicated to the late Paul Schafer who initiated the annual affair. Pilots and friends gathered at Elmer's Restaurant for breakfast and then retired to Roseburg Regional Airport for a day of flying. After a short wait for clouds to burn off the sound of engines could be heard from one end of the runway to the next. One by one they made their way to the south end of the runway and turned into the wind. Throttles were advanced and as airspeed built up they lifted off, one after another. We joined Kevin Bruton in his Cessna 175, jumping into the back seat behind him



and Will Geschke, a reporter/photographer for The News Review. Kevin took the young man for a real (first time in a small airplane) flying experience, which he seemed to thoroughly enjoy. We rendezvoused with Chris Boice in his Cessna 205 and shot air to air photos. Others flying were Ken Nicholls in his Ercoupe 415C, Wayne Boyter, flying his RV6, and Mark Ralston, flying his Steen Skybolt. Allen Goodwin and John and Colleen Roberts also joined the fun later in the day. Most everybody who wanted a ride got to fly that day.

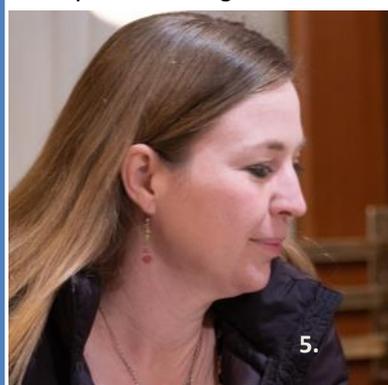


Freedom Flight is our opportunity to celebrate our freedom to fly in this country. In many other countries the every-day citizen isn't afforded that privilege. Paul Schafer served in the US Marines

and was a patriotic individual who wanted to celebrate this right that we have so he started this event. This is why we chose to use Joe Rosenthal's Pulitzer winning photograph of the Marines raising the flag on Iwo Jima for the flyer advertising the event. In case you might be wondering, the bi-



plane is Paul's unique round engine Starduster.



1. Roseburg Airport in the background as we depart the pattern to the south. 2. Ester Nicholls, Ken Nicholls, Dennis Rose and C. J. Bryant keep the conversation going. 3. & 4. Numerous folks contribute to more conversation. 5. The lovely Miss Maria Rose 6. Mark Ralston takes to the air in his Steen Skybolt.





Top L. Airplanes wait to go flying. Top R. Chris Boice in his Cessna 205. Bottom L. Wayne Boyter fires up his RV6. Bottom R. A happy Ken Nicholls prepares to start his Ercoupe 415C for a flight. "Clear prop."



Rose GlaStar January 2023 Build Report

This month continued with instrument panel equipment installation and wiring plus a couple of other things. I just looked at the mess of wires behind the panel and estimated that there were over 200 wires, though some are for equipment I am not using at present. Is there a point when you have too much information and redundancy?

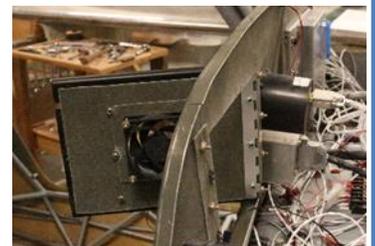
The month started with cutting a large hole in the pilot side instrument panel for the 10.1 inch GRT EFIS. Cutting holes is always scary for me, though fiberglass is a little easier to fix than aluminum if you goof up. I have also learned (through experience) to start small and work your way to full size, measure and level six times, get your wife to approve, etc., before cutting. I couldn't figure out a way to hinge the EFIS in order to access behind the panel but left the wire harness long so it can be easily removed. I plan to use an iPad as a secondary EFIS and thus purchased a holder with a built-in thermostat-controlled cooling fan. This is mounted to a hinged door for behind-panel access. Unfortunately, I didn't follow my aforementioned cutting rules and cut the fan hole too big.



GRT EFIS



iPad



Hinged Access Door

I purchased a remote magnetometer for determining magnetic heading on the EFIS and had to find a mounting location away from ferrous metal and electrical fields. This is usually placed at the wing tip for aluminum planes but there are wires out there so a GlaStar recommended place is on a shelf in the aft composite tail. I also needed a location for the uAvionix tailBeacon X, Mode S transponder/ADS-B transmitter. This is designed to mount where the aft white navigation light goes that the GlaStar is not designed to have. So I also put it inside the aft composite fuselage. Unlike aluminum, composite is radio frequency transparent and doesn't require external antennas. I created a fiberglass shelf for the magnetometer and a bracket for the tailBeacon X.



MAGNETOMETER



MAGNETOMETER SHELF



TAILBEACON X



I installed a PVC conduit under the seats to the aircraft front for all the wires to the aft fuselage. These include the magnetometer, electric elevator trim and position sensor wires, and wires for the uAvionix tailBeacon X.

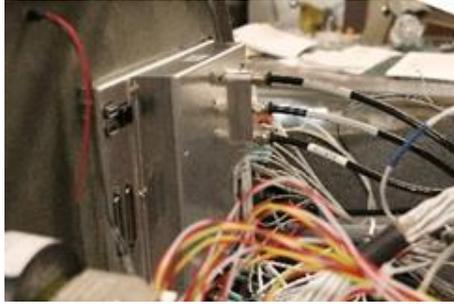
I purchased a header tank fuel pump monitoring system made by Aircraft Extras that included two fuel optic sensors and a timer relay board to turn a pump on when low, off when full or for a set time period, from eBay (along with the iPad mount and tailBeacon). I replaced the two Amazon sourced auxiliary fuel tank pump timers with the new relay timer board and a pump selector switch. I plan to place the optic sensors on the fuel lines between the main fuel tanks and their small header tanks to detect a low fuel status. The GlaStar fuel gauges are not real accurate and there are attitudes when a low but not empty tank can temporarily stop feeding.



OLD



NEW



I started hooking up the EFIS by connecting the static and pitot lines. This was made much easier than for previous planes by using quick connect fittings instead of slip-on hose fittings and clamps.

The next ten days were spent wiring all these different systems plus the autopilot and com radio together via switches and fuses.



I am not sure if I will save money but I am making my own leather seat cushions using Confer foam and bison leather. The foam sheets come in different densities (hard, medium and soft) that you can layer together for personal comfort. Bonnie wanted a little softer seat so she got an extra layer of soft foam on the top. I have shaped the basic seat contours but still have some side trim to add before temporarily covering them until the leather is ready.



SEAT FORM

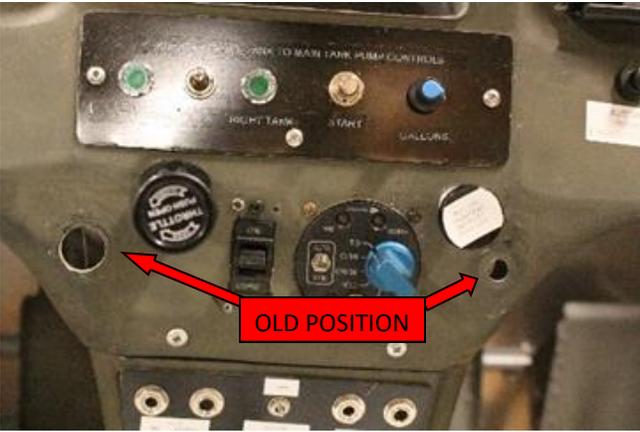


CUT FOAM PIECES



BASIC SEAT CUSHION

With the basic seats in, I was able to sit in the airplane and work on the control stick placement followed by installing the Infinity stick grips. Because of the shape of the GlaStar stick, the grips add to the length. I thought I had placed the controls in my custom panel such that there would not be any interference but I was wrong. I had interference with the throttle and cabin heat controls so I spent a full day relocating them out of the way. I have the co-pilot side installed and am working on the pilot side.



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