Upcoming Events:

September Chapter Events
- 3 - Saturday, 8:30
  Breakfast, Cedar Falls Family Restaurant
- 6 - Tuesday, 7:00
  Board Meeting, Airport Conference Room
- 20 - Tuesday, 7:00
  Chapter Meeting, Airport Conference Room
- 24 - Saturday, 8:00 - 12:00
  Young Eagles Rally, Livingston Aviation

September Events:
- 11 - Sunday
  Carroll Breakfast & Airshow
  6:30 - 1:00 Breakfast
  Noon Free Airshow
carrollairshow.com
- 23 - 24
  Fly Iowa 2016
  Clinton Municipal Airport
flyiowa.org

Iowa DOT Calendar:
iowadot.gov/aviation

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Oshkosh! What a great place to immerse one’s self in all things aviation! Many of our members were volunteers and attendees at the airshow and I would like to request that you write about your experiences for the newsletter. I volunteer at Emergency Aircraft Repair, where we help folks that have problems with their airplanes. This year was the “Year of the Flat Tire”. We must have helped at least thirty people who had flats. There were a variety of reasons: bad landings, pinched tubes, rotten tubes, mis-installed tubes, etc. We also had the usual things like discharged batteries, fouled plugs and oil leaks. The most unusual problem we ran into was a Cessna 120 that lost the passenger door on the way to Oshkosh. Fortunately, the pilot was able to locate and install a replacement.

My AirVenture shopping list was fairly short this year. One of items I thought I might buy was an ADS-B system. I decided to wait for a while before I buy the ADS-B out equipment, but I did buy a small “in” device for 99 bucks that seems to work well. I tried it in the airplane and I could see traffic, but I haven’t been anywhere near weather that might show up so I don’t know how well that works.

I attended the Chapter Leaders’ Breakfast while at AirVenture. Last year, EAA announced they were getting back to basics by placing emphasis on the chapters. This year, they talked about some of initiatives that have been implemented in the interim. These include establishment of a chapter advisory council with members from around the country, chapter boot camps and trying to get EAA members to join chapters.

One of our long time members was honored at the Chapter Leaders’ Breakfast. Marv Hopenworth received the Lifetime Achievement Award, which was announced at the Chapter Leaders’ Breakfast. Congratulations Marv!

As mentioned in the August newsletter, our annual Young Eagles Rally is set for September 24th. There’s a lot of work to be done to prepare for it. Matt and Rebecca have requested some help with the planning and preparations for that event. Please contact them or me if you can help.
The Board has completed reviewing the ideas for promoting sport aviation. Many good ideas were received from chapter members, in fact, there were so many that it was necessary for the Board to filter the ideas before presenting them to the membership. A number of factors were considered while discussing the ideas, such as cost, availability of personnel, practicality and alignment with the stated objective. Selection was not an easy task and the Board spent the majority of several meetings working on it. Here are the ideas that survived the selection process:

1. Expand activities at Young Eagle events. This might include some additional hands-on activities and/or presentations on various aviation topics.

2. Hold additional YE Rallies for select groups. We did this for the Boy Scouts in 2014 and it was a tremendous success.

3. Develop a high quality video that promotes EAA and our chapter in particular that could be shown during our events and as part of presentations to local groups. It is envisioned that a condensed version could be broadcast on local television stations.

We will be voting on these ideas in the November chapter meeting.

I decided to go to the Mankato, MN flight breakfast on the 21st of August. It was sponsored by EAA Chapter 642 and they did a really nice job. The food was excellent, at least by my standards. They had eggs that could be fried to order or scrambled as well as pancakes and sausage. The sausages were especially good and about the size of a hot dog. They even had real maple syrup, which I noticed was from Wisconsin. The parking lot was full of cars and they had a live band playing swing and early day rock and roll. When I signed the aircraft register, the airplane count was above 50. I certainly would recommend this flight breakfast.

The monthly breakfast for September will be held on Saturday, September 3rd at the Cedar Falls Family Restaurant. The chapter meeting will be Tuesday, September 20th. The meeting on the 20th will be especially important as it will be the final organizational meeting for the Young Eagles Rally.

Let’s get some daylight under those airplane tires!
Take a FREE airplane ride & learn about flying!
Become a Young Eagle! Receive a certificate & logbook!

EAA YOUNG EAGLES
FLIGHT RALLY

Saturday, September 24, 2016
(weather permitting, with Sunday as alternate)
8:00am – 12:00pm
Waterloo Regional Airport
Livingston Aviation

For ages 8-17
Register on-site anytime between 8:00-11:30
A Parent/Legal Guardian must be present at Registration
Rides will be given on a first-come, first-served basis

Hosted by:
Experimental Aircraft Association (EAA) Chapter 227
For more information, visit www.eaa227.com
Lone Rock Fly Out, July 31st  by John Bender

Another great Flyout. 6 of us. The attached screenshot is of Chuck near Lone Rock. Other shows lots of traffic, most returning from OSH I’m sure. All going away from Osh.

Ankeny Fly Out, August 4th  by John Bender

Rick and I had to go around a pop up shower just before Ankeny. Taking off, I got a couple sprinkles, and when we got closer to Waterloo, it started looking dark. Coming back, Chuck was just to my left. I got back with no rain, but looked pretty dark to NW. We had a great time. Chili's food was absolutely great.
Pella Fly Out, August 5th  by John Bender

The one screen shot was a plane flying over top of me at 8900'.
I actually saw him, but too much reflection taking a pic looking up at him.
Was very busy traffic at Pella today.

GREAT time.
Good food.
All went well.
Thanks to all.

Amana Fly Out, August 16th  by John Bender

Another great day for all.  9 of us.
Food was the usual GREAT.
Thanks to all.
Monticello Fly Out, August 19th
by John Bender

Got home in good time.
Weather was still west of Waterloo when I landed, as you can see.

Another great day. FUN TIME. (who was that, that suggested Ice Cream?)

This just hit.
Really hard rain.
Was home in good time.

Monona, Waukon & Abel Island Fly Outs, August 21st
by John Bender

Here are some screen shots of all the traffic at Monona, Waukon, and Abel Island. Great time and great day overall.
Thanks to all for another great day.
**Muscatine Fly Out, August 23rd**  
by John Bender

Another great flyout. 7 total. Nice to see the restaurant across and down the road open again.

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**Lone Rock & Rushford Fly Outs, August 25th**  
by John Bender

Another great day at Lone Rock. Some of us went on to Rushford Mn for Root Beer Floats. What a day. The water around Decorah was getting better.
Another great day.
150 miles for me.
Lots of people.
Great breakfast, some really great old planes to look at.
Some are one of a kind left.

Greenfield Fly In & Museum, August 28th  by John Bender
New FAA Advisory Circular - Winter Operations
An Update from Keith Kaspari, ALO Director of Aviation

Included, and still hot off the press, is a new FAA Advisory Circular for Airport Operators performing Airport Field Condition Assessments during Winter Operations.

Beginning on October 1, the FAA will be going to and using new terminology for communicating field conditions to the pilot community.

So, I wanted to share a copy in PDF of the new AC with EAA Chapter 277.

One thing that I also wanted to make the group aware of is that this is just one part of a larger initiative to communicate airfield conditions under a new Takeoff and Landing Performance Assessment (TALPA), a Runway Condition Assessment Matrix (RCAM) and the use of new Runway Condition Codes (RCC’s).

Therefore, it will be, as always, very important for chapter members to always check current NOTAMS for ALO.

As a staff, we’ll be doing some training with regard to communicating and issuing field condition reports, participating in some FAA conference calls, regarding the issuance of NOTAMs, and a relatively new NOTAM Manager via the E-NOTAM system.

Follow this link to the new FAA Advisory Circular:

http://www.eaa227.com/waterlooregionalairpt.htm

“...it will be, as always, very important for chapter members to always check current NOTAMS...”
It was just another afternoon when the phone rang. A woman introduced herself and explained that her grandson was visiting from New York City. “He wants to be a pilot” and asked if I knew of any aviation activities that he could go see. It just so happened that we were going to Burger Burn (3rd Thursday BBQ) at MCW that evening and we asked Ben to come along. We met at Livingston around 5:00, Grandma waved good-bye, and off we went.

Ben is 12 and lives in Queens. He was visiting his Grandma and Grandpa in La Porte City during the month of August. Earlier this summer, he had the exciting opportunity to attend the EAA Air Academy in Oshkosh and now hopes to make it an annual experience.

Ben’s eyes scanned back and forth between the ground and instruments on the way there. He named several instruments (you could tell he spent a lot of time on simulators at camp). Once we arrived, he headed over to the Millennium Phenom to see the 3-D Star Wars images painted on the exterior. When people heard why he was there, they introduced themselves and anxiously whisked him away to look at more aircraft. He sat in a Taylorcraft L-2, F-1 Rocket, Stearman, Navion, Citabria, and Beaver. Doug Rozendaal put him in a P-51C Mustang. There was a small crowd watching, envious of what we saw. “If you were 12, you could sit in it too” Doug quipped. Ben was so excited he hardly had time to eat as he ran from the table to watch a Citation land. He also befriended the pilot of a Cessna 185 only to find out he had been together in Oshkosh with his son.

When we were ready to leave, David asked him if he wanted to sit left seat and as we loaded up, a small crowd gathered to watch. Ben held the yoke as we taxied, David walked him through the run up, and we took off. Above the runway, we rocked our wings “good-bye” and up we went. Once we reached altitude, Ben took control. He flew until we started our descent holding the heading and altitude as well as any seasoned pilot. His simulator time was obvious.

Ben helped us put the plane in the hangar and we went to meet Grandma. Ben’s eyes glistened as he told her about his experiences.

A few days later, Tim Roberts, took Ben on a tour of the control tower. Thank you, Tim, for giving Ben that wonderful opportunity. We got a note from Ben explaining how grateful he was for the tour and how he couldn’t wait to tell his mom and dad about his unforgettable vacation in Iowa.
A big “Congratulations” and “Thank You” goes out to Chapter 227’s own Larry Lyman. This year at Oshkosh, Larry held one of the Forums; his program was “Contact Tower” with ATC. Larry’s Forum was well attended, despite the fact that his time-slot competed with the air show (conversation paused while the F16 went to afterburner!). There were over 60 pilots and controllers who took the opportunity to draw upon Larry’s vast knowledge and experience as an air traffic controller.

Larry took us through Preflight; encouraging IFR or VFR Flight Following, weather awareness & preparation for the route and the destination.

We were reminded of Basic Terminology: “Roger” only means that you heard the controller... “WILCO” is much better communication meaning that you “understood and will comply”. Don’t be afraid to use the response of “unable” if your directive is not possible.

He took us through the pitfalls of departure – check your frequency (verify that you pushed the flip-flop button between controllers) listen to your clearance and understand the limitations. NEVER taxi onto or across a runway without permission (whether it is an active runway or not!)

Larry reminded the IFR Pilots of clearance limits, routes, altitudes and holding instructions.

For the enroute segments of flight we were encouraged to use a flight plan, observe the odd-even altitudes for your direction of flight and maintain a constant altitude. Remember that ATC frequencies are for controlling and not for social chatter!

Preparing for arrival at your destination, listen to the ATIS before contacting Approach Control (the controller expects that you know it). Listen before keying your microphones... don’t cut into a communication. Be aware of your surroundings... pay attention to other aircraft’s call-sign, location and intentions.

Have you become confused? Ask for clarification... when in doubt, don’t guess. Ask the controller for more detail.

As always, Larry delighted the audience with an entertaining and enlightening blend of knowledge, experience and good humor. One question that we still need to ask Larry... “Do controllers actually refer to us as FLIBs?” And, what does that stand for, anyway? 😊

Thanks again Larry!
What happens when entering controlled airspace? Well, the controllers are hoping that you are ready to listen to their instructions, and they expect you to understand those instructions. Let’s look at some common errors. First, there’s the pilot who calls when they are inbound, but they haven’t listened to the ATIS first. After initial contact, the controller is expecting the pilot to say who they are (callsign), where they are (from the airport), what altitude they are at, their intentions and the current ATIS code. With this information, the controller can develop a plan for sequencing you into the flight pattern quickly and efficiently. Without this information, the controller will have to ask you for whatever is missing. That takes time away from implementing a plan. Remember, the controller may be working with ten or fifteen aircraft at the same time as they are coordinating to meet your request! Controllers typically are broadcasting on two or more frequencies, so, even though you don’t hear another aircraft on frequency, that doesn’t mean that no one else is out there! In addition, you, as the pilot in command, must understand the controller’s instruction. If it is not clear, don’t be afraid to ask for clarification! Finally, remember that, as pilot in command, you are always the final decision-maker as regards your aircraft. If the controller instructs you to do something that you are not comfortable with, let the controller know and they will formulate a different plan. Controllers are there to help you complete your mission! With your cooperation, that can and should be a good operation for all concerned.
Last month I talked about crank case cleanup and inspection. Now let’s talk about crankshaft.

Many of the crankshafts have a hollow nose section. When these engines are used with fixed pitch props, there is a plug (Welch Plug) in the nose end of the crankshaft. That needs to be removed such that the nose cavity can be cleaned and inspected. The crankshaft is normally inspected for cracks using a Magnaflux process. I believe either of our shops at ALO can do that. Then there are dimensional inspections. Assuming all dimensions are OK, the mechanic will probably polish the journals. If wear is below minimums, you may have the option of having the shaft reground. In that case, you will then use bearing inserts for the undersized shaft.

The cam shaft needs to be similarly inspected. In my case this was done as a farm out job. I think in virtually all cases, the cam faces will need to be reground. This is a pretty common failure point in Lycomings, so it is not an area to skip. You may find it nearly as economical to replace the camshaft with a new one.

The lifter bodies in mine were also sent out for redressing. Again, I’d do everything you can to make that cam face to cam follower interface as good as you can.

Connecting rods will be addressed. Over the years, Lycoming has used several different types of connecting rod bolts and associated methods of tightening and locking them. In my case, the newest rod bolts required a slight bit of remachining on the rods and/or rod caps. Again they were sent to an Oklahoma engine shop for that machining. This is a place to rely on your A&P to insure that you have the most current type of bolts, and that the rods are properly machined for those bolts and that you understand the correct tightening procedure and locking system. By the way, you do realize that you do NOT reuse connecting rod bolts, don’t you?

Speaking of new parts, when you started this project, you probably realized that there would be several parts that will be replaced. You can buy an overhaul parts kit that will contain many of the smaller “always replaced” parts such as bearing inserts, gaskets and seals, some hardware, etc. Buy the kit – it will be far cheaper than trying to locate and purchase each individual piece.

There are several other smaller parts in the lower end and accessory housing that you and your A&P will want to visually inspect. In my case the only thing I remember replacing was the tach drive shaft, as the seal had worn a groove in the shaft. Failure to replace that shaft would probably have resulted in an oil leak later on.

The next major part of the engine is the cylinders. This is a topic in its own so I’ll continue on that note next month.
Here we go: Final #OSH16 facts and figures! from eaa.org

**Attendance:** Approximately 563,000, an increase of nearly one percent over 2015.

**Total aircraft:** More than 10,000 aircraft arrived at Wittman Regional Airport in Oshkosh and other airports in east-central Wisconsin.

**Total showplanes:** 2,855 (up 7 percent over 2015): 1,124 homebuilt aircraft (up 11 percent), 1,032 vintage airplanes (up 7 percent), 371 warbirds (up 6 percent), 135 ultralights and light-sport aircraft, 101 seaplanes, 31 rotorcraft, 41 aerobatic aircraft, and 20 non-categorized aircraft.

**Commercial exhibitors:** Final total of 891, a 10 percent increase over EAA AirVenture 2015.

**Forums and Workshops:** A total of 1,050 sessions attended by more than 75,000 people.

**Social Media, Internet and Mobile:** More than 35 million people were reached by EAA’s social media channels during AirVenture; EAA AirVenture app had 1.6 million screen views; EAA video clips during the event were viewed 957,000 times; and EAA’s 1,100 photo uploads were viewed more than 7.4 million times.

**Guests registered at International Visitors Tent:** A record 2,369 visitors registered from a record-tying 80 nations. Top countries represented: Canada (578 visitors), Australia (340), and Argentina (167). [NOTE: Actual international attendance by country is undoubtedly higher, since these are self-reported figures only.]

**Media:** 750 media representatives on-site, from six continents.

Thank you everyone!
Thank you to Rex Pershing who has donated some tools to the chapter! Along with them is a prop extension to sell and donate the proceeds to the chapter.

**FOR SALE:**

SAE 1 Prop Spacer
It is a 6 inch extension off a Lycoming 235 that uses 3/8 inch bolts.
$100 or best offer

Please Contact:
Doug Mattson
dougmattson@gmail.com
319-939-0179

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FOR SALE:

**Continental C85-12F Engine**
from a Cessna 140.
I cleaned and pickled this engine before 2000.
Asking $2500

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**Carburetor "MA3SPA"**
I used it on the O290 engine in my exp Mustang II.
Asking $400

I have more photos if needed.
In my hangar.

Please contact:
John Peacock
johnnyfpeacock@gmail.com
319-266-3417 voice only.

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Whether you are looking to sell something or looking to buy, please send your information to chrisr@cfu.net.
And be sure to let me know when it sells!
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