

WINTERMAIL

EAA CHAPTER 25

MINNEAPOLIS / ST PAUL, MN

FEBRUARY 2002

Building a KITFOX Series 6 by Craig & Sally Nelson



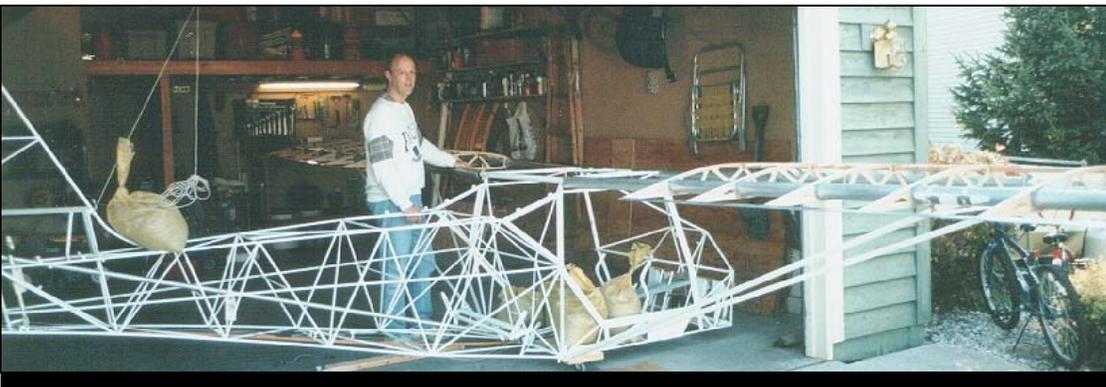
This month, Craig describes the technical side of building a KITFOX.

Next month, Sally will share her perspective as a wife and mother.

I suspect that most members are somewhat familiar with the Kitfox series of light airplane kits available from Skystar Aircraft Corporation (www.Skystar.com). These planes are of the tube and fabric design and they use a combination aileron and flap (flaperon) which hangs below the trailing edge of the wing and spans most of it's length. The most common model is the Classic IV which is a 1200 lb gross weight plane that is usually powered by 2 or 4 stroke Rotax engines of up to 80 HP.

My kit is a Series 6, which is larger, carrying a 1550 lb gross weight and the capability of being powered by the more traditional Lycoming or Continental engines of up to 125 HP. Another feature of the Series 6 is that it is convertible between conventional and tricycle landing gear configurations.

(Continued on page 6)



CARIBBEAN NIGHTMARE -PART 3

By an anonymous member—Can you guess who I am?

Last month, we left our travelers in the air over Crooked Island, lost in a rainstorm...

...After flying low, searching for the airstrip with no success, I suggested that we return to Matthew Town, Great Inagua Island before we got too low on fuel. He agreed. We finally got back to Matthew Town safely and ended up sleeping in the airplane. Sleeping in a Cherokee is not a pleasant experience. It was a battle just getting all the

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Cleared for the Approach

by Frank Hanish



As of February 5th, the proposed Sport Pilot rating

was published in the Federal Register. An EAA executive summary as well as an FAA link to the published NPRM can be found at <http://www.sportpilot.org>. This NPRM has been of high interest to a number of you, and I was pleased to see your interest at our January meeting. There were a couple of Sport Pilot – Light Sport Aircraft questions after my presentation. EAA Government & Industry Relations Specialist Randy Hansen was kind enough to take a moment this past week to answer our questions as follows.

Can the owner of a qualifying vintage airplane (such as a Cub, Champ...) change the certification to Experimental Light Sport? EAA Answer: Due to FAA and manufacturer issues, the NPRM states in Part 21.186(d)(2) that "the aircraft must not have been previously issued an airworthiness certificate in the standard or primary category." So the answer is No.

Can a builder/owner of a qualifying experimental – amateur-built aircraft change it's certification to an Experimental Light Sport? EAA Answer: First of all, EAA does not understand why a person would wish to do so, since the operating limitations of an experimental amateur-built aircraft allow much more freedom - anyone can work on the aircraft, you can do major repairs, etc. The only restriction is that if you are not the builder you must have a FAA certificated mechanic do the annual inspection. The operating limitations of an experimental light sport aircraft will contain more restrictions.

Is there any provision for an experimental light sport aircraft on skis, amphibian, or floats? EAA Answer: These provisions should appear in the follow-on guidance (AC's and Order's) issued by the FAA. But, in the NPRM there is no specific provision except for the allowance of a reposition-able landing gear.

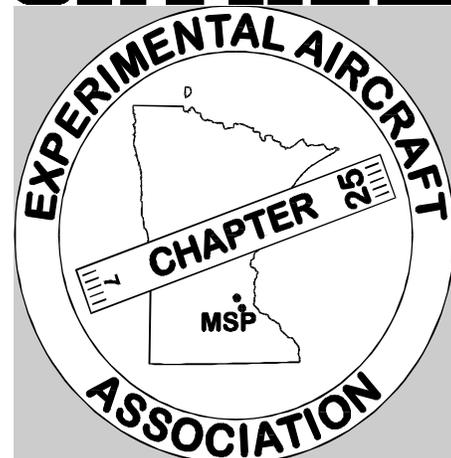
The EAA's Bob Warner, Executive V.P., gives these words of advice at this point, "We have 90 days to comment, so take your time, evaluate the proposal carefully, and be very cautious and thoughtful in your comments. Everyone has a different set of very detailed questions. One of the beauties of the rule as proposed is that the rule enables various flexibility's, but does not give procedures on how to do certain things, such as "how" to change a two-place ultralight trainer to an experimental light sport aircraft. This type of detailed information will be forthcoming in advisory circulars and guidance material yet to be developed."

From a recent e-Hot Line distribution, it was learned that the EAA sent an open letter to the aviation maintenance community in response to a news release from the Professional Aviation Maintenance Association (PAMA) that claims aviation safety will be compromised by the Sport Pilot/Light Sport Aircraft proposal. The purpose of the EAA letter to the aviation maintenance community is to help set the record straight. In fact, EAA writes, sport pilot brings higher levels of safety to aircraft maintenance. "This multi-faceted proposal brings a higher standard of maintenance and safety to these aircraft," said Bob Warner. "Those who un-categorically state that maintenance levels will be harmed via enactment of this NPRM have responded emotionally, and have failed to understand the facts in the entire proposal."

How to comment on the Light-Sport Aircraft NPRM? I will have this information, and we can discuss it at the upcoming chapter gathering.

—Frank

ON FINAL



Minneapolis/St. Paul

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The Leader In Recreational Aviation

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Ready for Rotary? (Part 2)

by Eric Strandjord

Last Month, I talked about some of the subjective aspects of the Powersport Rotary Engine. To me, the prospect of a smooth, light, reliable, *and modern* alternative to the venerable "Lycosaurus" ("real" Lycoming airplane engine) is nearly irresistible.



Unfortunately, at least until just recently, every seemingly reliable alternative has had an Achilles heal of some sort. Affordable engines,

(usually converted auto engines) are heavy, under-powered, or both! Turbines, well we won't even go there. Exotic engines are just as expensive as "real" airplane engines and still require a lot of integration work. Any "perfected" engine systems package turns out to be the same price as the Lycoming but usually offers less than optimal performance or some unacceptable quirk. (How many times have you looked at the "Engine package of the Future" at Oshkosh but never see one fly?)

In the first part of this article, we had left off comparing some general specifications of the Powersport Aviation RE-215 engine with those of the Lycoming IO-360. Both engines weigh within a couple of pounds of each other fully installed. Two things I failed to mention were fuel consumption and propeller availability.

Here are some meaningless comparisons using the average of various pilots claims, manufacturers, and other sources.

Powersport: 10 GPH at 65% power (139HP)

Lycoming: 13GPH at 75% power (150HP)

If this was a linear relationship the Rotary would use about 11 GPH to give 150 HP.

Subjective aspects aside, an extra 15 horsepower for the same weight seems mighty attractive. However in practice, the demonstrator RV6 only performs on par with a 200HP Lycoming powered RV6. This little detail is what had always made me wary of "new" engine solutions in the past. I'm still wondering. So far, I have not had the courage to point this out to their salesman.

Powersport claims to support fixed and constant-speed propellers, both hydraulic and electric. That said, I have never seen how they address the installation of a governor for the hydraulic prop. The last demonstrator I saw used an extremely sexy (and expensive) electric MT three-blade unit. The MT propeller is reputed to be very smooth and nearly as efficient as a good two-blade prop, with much less weight. It costs at least a third more and weighs about a third less, go figure.

One of the reasons I went with the new Lycoming from Van's is that they offer a brand new Hartzell in a box, for around \$4,000. They offer the MT for \$7,500 or more.

Tecky Stuff:

The Powersport ignition system comprises 2 separate ECU's with 10 years use in rally car racing, each with independent engine sensors. The result is essentially two separate engines sharing the same crankshaft. Because of the rotary engine's characteristics, the engine continues to run smoothly with one of the rotors shut down and still develops 100 HP. The ECU's continuously monitor engine RPM (load), throttle position and intake air temperature and pressure. The ECU's then provide optimum ignition timing and fuel mixture for stoichiometric combustion. An optional mixture

(Continued on page 7)



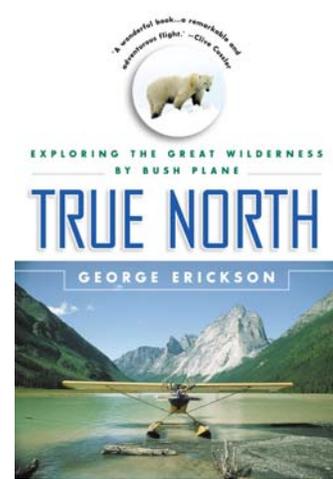
Coming April 17

George Erickson

author of the
Canadian bestseller

True North:

Exploring
the Great Wilderness by
Bush Plane



This Month-Feb 20 6:30 pm

Fred Nauer

recounts his
Air Force experience
in the
F4 Phantom



From the North: Take 35W south to the 46th street exit and turn right. Proceed west on 46th street to Nicollet Ave. Turn left. Proceed south on Nicollet to 50th. Turn right. Skip next paragraph.

From the South: Take 35W north to the Diamond Lake Road exit and turn left. Proceed west on Diamond Lake to Nicollet Ave. Turn right. Proceed north on Nicollet to 50th. Turn left.

Continue west on 50th past the Junior High School (at 50th and Nicollet) to the Senior High School 1 block west of Nicollet. Turn right into the south parking lot and park anywhere space is available. Use Door #9 to enter.

If the south parking lot off 50th is full, turn right and drive around to the parking lot off 49th Street on the north side of the school. Then walk around to the south side to enter the school using Door #9.

The meeting will be held in Room 119.

CARIBBEAN NIGHTMARE

(Continued from page 1)

mosquitoes cleared out so we could get some shuteye.

After a restless night, we awoke early the next morning to the roar of aircraft engines, only to find that we were in the shadow of the wing of a DC-3. We were in luck. The arrival of the DC-3 brought a contingent of people from town, including the man in charge of fueling. Finally fueled and cleared through Customs, we were on our way north. We crossed Crooked Island again but with full fuel tanks this time. We flew on to Nassau where we went through Customs again.

A young couple in the terminal was looking for help getting back to the states and asked for a ride. They had wrecked their catamaran in a storm and had to get back to get repair materials. We could not accommodate both of them, so the young woman rode with us back to West Palm Beach. There we cleared Customs, fueled the plane and headed north again.

Overnight at Chattanooga

As we were flying along in the night sky I realized my pilot friend was not sure of our position. I showed him on the sectional where I thought we were and he disagreed with me. He indicated we were going to land at a small airstrip because he had to use a restroom. We landed at very remote airport which was unattended and using a flashlight to look into an office we identified the airport. I was correct regarding our location.

Everything else being OK, we again flew north. It was about two a.m. when we landed "hot" at Chattanooga, Tennessee. No maintenance people on duty to fuel us, so we talked an airport guard into letting us sleep in the terminal for the night.

North into bad weather

After fueling the plane in the morning, we headed north. As we were flying along we ran into some bad weather and had to land at Quad City Airport, Iowa. The ceilings were the big problem according to a weather briefing and it was worse to the north. After thinking about it for a while, my pilot friend said, "You know, the Mississippi River is right out there and it goes all the way to the Twin Cities. We can just follow it and we won't have any problem. What do you think?"

By this time I was getting kind of anxious with his decisions and judgments but relinquished myself to his plan. We got into the airplane and started following the river. We were flying low enough that he was concerned with high electric lines that crossed the river, so he asked me to help him with locating them.

As we proceeded along, we ended up in a snowstorm north of Prairie du Chien, Wisconsin, and seemed to be getting bounced around a lot as we were flying almost at the same level as the cliffs along the river. I then realized that snow was getting into the airplane via the cabin vent system, and told the pilot. He got concerned and we reversed our course and landed at Prairie du Chien. After landing he called Flight Service for a weather briefing.

Prairie du Chien

They reported that it was clear from La Crosse to the Twin Cities. My pilot friend felt we could make La Crosse ok although it would be bumpy, so off we go again. This time the visibility

was worse and it was a lot more turbulent. We were now flying over the ground next to the river because it was somewhat smoother air. There was suppose to be an antenna farm coming up but we could not locate it. Suddenly, we found ourselves

right in the middle of it. We circled around one of the antennas and flew back to Prairie du Chien.

The pilot called Flight Service and again spoke of continuing on. I informed him that he could go ahead by himself and that I would be taking the bus home in the morning. Hearing me say that, he decided we should wait until the morning to fly back to the Cities.

The next morning we awoke to a clear blue sky and twelve inches of snow on the ground. Airport maintenance personnel were getting their equipment ready to start plowing the runways and taxiways. My pilot friend was very eager to get going so we got aboard the airplane and he tried starting the engine to warm it up so we would be ready to go as soon as the plowing was done. The engine did not want to start, but the pilot kept cranking away.

I thought I saw some vapor coming through the vent system at the windshield and told him. He waved his hand at the vapor and said he did not think there was a problem. After a short time I said I thought there was a fire. He then panicked and told me to exit the aircraft which we did. He had grabbed the fire extinguisher and we quickly pulled the cowling off and found a fire in the carburetor. He extinguished the fire and after looking things over, replaced the cowling. Now the battery was too weak to crank the engine so he found someone to provide a battery to jump start the engine.

Plowing snow

Now he was real anxious to get going so he wanted to taxi out to the runway to see how the plowing was coming along. On the way we ran off the taxiway and got stuck. We then hailed the plowman, who hooked up to the airplane's tail and pulled us back onto the taxiway. Then we took off to the west over the bluffs.

This time I was very apprehensive until we were at altitude and on our way to Flying Cloud Airport because I did not think the pilot inspected the engine compartment very well. Fortunately, we had no problems and landed without incident at Flying Cloud Airport. Later at work the pilot told me that a mechanic at the airport inspected the airplane and indicated we should not have been flying it in that condition.

I never flew with that pilot again. I decided that before I would ever get in another small airplane, I would attend an aviation ground school so that at least I would have a better understanding of any decisions regarding aircraft and flight. Getting caught up in the excitement of it all, I continued my aviation education by getting my private pilots certificate. I now hold a



Young Eagles Winter Flight Fest *by Mike Dolan*

February 2, 2002

To Young Eagles Volunteers,

We did all right today! It started out looking like we were not going to have any airplanes show up. Then finally Frank Hanish, our current TOP-GUN YE pilot showed up with his Debonair. When I was happy to see him in the pattern. Dick Reinke is getting the troops registered and Greg Cardinal is getting the scheduling in order. Just after the Debonair got going with some YE's another trooper showed up in the Cub. Norm Tesmar grabbed a YE and got going. Oh well, now at least we have 4 seats flying Y.E.'s and the 20 or so



Young Eagles waiting for a ride are in our Young Eagle ground classes and Steve Atkins is keeping them quiet, teaching them what to be aware of so they will enjoy their flight experience even more. Here comes Frank in the Debonair, and behold, Mark Kolesar is also in the pattern with his A-36. Now, at least, I don't think I'll have a rioting group of restless Young Eagles on our hands.



CARIBBEAN NIGHTMARE

(Continued from page 4)

commercial certificate, flight instructors certificate, basic ground instructor certificate, multi-engine, instrument, and seaplane ratings.

In case you haven't guessed by now, the author of *Caribbean Nightmare* is Chapter 25 member Mike Dolan, our Young Eagle Coordinator.

Mike's experience with aviation goes back to the late 50's, when Mike was a parachute rigger in the Navy. He remembers jumping out of a DC-3, part of the required training program. Mike took advantage of his Navy experience to run a skydiving club called *Yellow Streaks* in Antigo, Wisconsin in 1964-65. Following his Caribbean adventure in the mid-70's, Mike began flight training, and eventually taught as a flight instructor at the University of Minnesota.

Mike lost track of his pilot friend, but describes him as someone who habitually exhibited risky behavior in many areas of his life. The Cherokee used for the Caribbean flight was eventually destroyed by a rental pilot who attempted a loop near White Bear Lake with three passengers aboard.



Noel Allard is chaperoning the Y.E.'s to Mark's airplane and now it seems we will get the mass of Y.E.'s into the air to see why we all love flight so much. Ron Oehler fired up the computer and printer to get the certificates ready. Pete Gavin popped in and started helping on the ground crew, his Warrior was down for maintenance. Here comes Dan Carroll in his Baron. As soon as he taxied up and shut down, I went out to meet him. Asked if he was going to fly Young Eagles, and said that I hadn't expected him to come to the Rally. Dan said that he thought we could use the help. What kind of karma is that?



Now the day was going to be a success for sure! Tried to take a digital picture of Dan loading up for a flight. Whoops, forgot the memory stick. Saved again, Roy



Landela, who was helping with the ramp chaperoning, had a digital camera with him and took the job as official photographer. He even had a photo printer with him and gave out some pictures to participants. Peter Denny and Fred Nauer came in with a C-172 and started helping our ground crew. At the end of the day we gathered the entire rally crew by the Cub for a picture, and along came someone named Dorothy, said she was on the field for a promo for DIFFA, and there she is in the picture...what's a DIFFA? I think I made a new friend.



Anyhow, Dorothy jumped in a passing SUV and was gone before I could ask any questions, and the rest of us retired to the Buckboard for sandwiches and a debriefing. Success!

Our total was 39 happy Young Eagles. Several from Lakeville CAP, and 26 from Minneapolis, most from Washburn Sr. High, thanks to Peter Denny and Fred Nauer. A group sent by Greg Cardinal and a few from a friend of mine. 22 of the Y.E.'s were 13 or older.

—Mike Dolan



Building a KITFOX Series 6

(Continued from page 1)

Switching configurations can be accomplished after the plane is completed. My kit is the tail dragger version and after a fair amount of deliberation I have decided to use a 100 HP Rotax 912S engine. The weight savings and fuel economy of the Rotax were the clinching factors.

The “classic” look of the Kitfox has always appealed to me and when I got serious about pursuing a building project it was immediately a top contender. I went through a fairly rigorous process of determining whether I should actually strike off on such an endeavor. I am mechanically minded and like to do projects where I use my hands. I don’t get this kind of activity at my desk job. I also know that this is quite an undertaking and I was concerned about keeping the proper balance between family life and making progress on the project. After reading multiple articles (in Aero-Crafter, Sport Aviation, etc.) on the building process and attending a SportAir Workshop on plane building I decided it was indeed right for me. The workshop also showed me that a tube and fabric project was what I wanted.

So why the Kitfox? I fly for the love of flying vs. a desire to get somewhere. I like the idea of short hops into grass fields for pancakes or some camping and just general bumming around. I wanted a kit that was well established with lots of completions and a good safety record. I also wanted the ability to carry two large adults with a fair amount of cargo without having to cut back too far with the fuel on board. When Skystar introduced their Series 5 and its 1550 lb gross, it seemed like the ticket. I also liked the idea of being able to use Lycoming/Continental engines and the fact that the kit was quite complete with all the welding done at the factory. This keeps the build time to a reasonable level meaning an easier fit with my desire for balance with the family and actually being able to complete the project.

The final step prior to ordering the kit was to go for a ride. My wife Sally and I decided that we would plan a long get away weekend around a visit to the Skystar factory in Caldwell, Idaho. In early November of 1999 we paid our visit, toured the factory, went for a demo flight, and still had some time for some sightseeing in the area. The test flight went well. I had recently started flying again after a many-year hiatus and had gotten my tail wheel check-off prior to the trip. I found the plane to be nimble on the controls with good slow speed manners. I ordered my Series 5 firewall back kit for a March 2000 delivery.

While waiting for delivery Skystar released the Series 6 and discontinued the Series 5. The main difference is the convertible landing gear configuration discussed above. They also started supplying more quick-build components and some options as standard for a higher base price. This turned out to be a good deal for me because when I popped open the crate in my driveway I found quick-build wings inside even though I had not ordered them as an option with my Series 5 order. I am building in my walkout basement.



In went the components through the double service doors that I installed prior to my trip to Idaho. The boys helped me take inventory. I found the kit to be very complete with all the components and hardware packaged in groupings by major assembly. Nuts and bolt type items are in small individually labeled zip lock bags.



The building process has been slow but steady. I started with the tail “feathers”, bonding ribs onto the horizontal stabilizer and elevator. These major components were then fitted to the fuselage. I ran into a bit of a problem fitting the elevator. The elevator is attached by running bolts through holes in welded-on tabs which fit over the ends of bushings mounted to the horizontal stabilizer. A jiggling problem at the factory resulted in the tabs having holes whose centers were not parallel to the leading edge tube of the elevator. I could not run the bolts through the tabs and bushings without excessive binding. After consultation with the factory, I ended up shipping the elevator back for rework. They decided to just replace the unit with a new one, which meant I had to redo all the rib work. I made sure to mount the new elevator prior to doing the ribs to check for binding and it worked great. I wish I had done that the first time...you learn.

Fuselage assembly was next. This entailed fabricating mounting hardware and installing all the flight control mechanisms. These are push-pull tubes with the exception of the rudder, which is controlled by cables. I also needed to fabricate and install the adjustable rudder pedal option that I ordered. Other components that needed to be fabricated or trimmed and fitted include the floorboards, center console, seat pan, and doors. A small amount of wiring was also needed for the electric jack-screw that raises and lowers the leading edge of the horizontal stabilizer for pitch trim.



Inserted in the middle of the work above was a 3-week trip to Ukraine to adopt our daughter Anna. This occurred during the summer of 2000. Working the adoption process, getting ready for the trip and all the adjustments that followed with a new daughter ate up most of that summer. As the weather turned colder I was once again in the basement in the evenings after helping put the kids to bed.

My goal for this past summer was to do the initial wing set-up before the weather turned too cold. In early October I removed all the tail components and moved the fuselage into the garage. With some help from my brother I mounted the wings and positioned the strut attachment brackets on the wing spars to get the correct sweep, dihedral, and washout. This is done by leveling the fuselage and then measuring changes in angle from a level baseline created by holding a 4-foot level against a feature on the plane. (Continued on page 8)

Ready for Rotary? (Continued from p. 3)

control is available to allow the pilot to adjust the mixture 10% rich or lean from the stoichiometric value to allow slightly greater power at increased full burn or use additional leaning for cruise. The Powersport engine achieves 215 HP and 450 ft-lbs torque @ a much lower 2450 propeller RPM, and exceeding their target of 215 HP at a conservative propeller RPM limit of 2620.

Eric's Observations About Wankel Engines Verses "Real" Airplane Engines:

Wankel Compared to Lycoming:

- Smoother
- Higher Tech – Electronic ignition, water cooling, instrumented
- Better Power to Weight (215 verses 180 HP with same weight)
- "Exotic"
- Comparable Fuel Consumption
- Simpler Engine (1/3 the parts Count)
- More Complex Installation (Reduction Drive, Radiator, Computer, Exhaust)
- Cost (Yes, they cost more!)
- "Exotic"
- Few Installed (As good as it looks, you are still a pioneer!)
- Concerns About Seal Wear
- The Rotary RV-6 Demonstrator is not dramatically faster than conventionally engined RV-6's with less claimed power.

A Few Comments:

*Many people question the reliability of "auto" engine conversions when compared to traditional aircraft engines. Personally, my biggest worry about having a Lycoming is a failure of a magneto, vacuum pump, wrist pin plug, or spalled lifter (*HAD engine!). The people that race Mazda 13B derivatives swear that, "If the engine will start, it will not quit when it is not supposed to." The nature of a Wankel bears this out. It's the seals (equivalent to piston rings) that wear out. If there is enough compression to start the engine, it will keep running. The crank, gears and other parts are short, stocky, rugged and nearly bullet proof.*



A sexy RV-4!

The challenges to perfecting a Wankel engine for Powersport, Mazda, and others have been to reduce fuel consumption, emissions, and wear of the seals. Powersport seems to have licked them all. With their modifications, they get more power with less fuel than Mazda has ever achieved. For me, all they need is a bit of experience. The last time I asked, they had sold 8 engines and systems.

Read more about Rotary aircraft engines in this month's [Sport Aviation!](#)

Welcome New Members

**Patrick Halligan, Eric Sisler,
Fred Nauer & Robert Hunt**

Pete Engine Bowl

by Dale Johnson

I was helping my wife by drying dishes. Since this requires minimal brain-power, my hands were on autopilot and my brain was working on the Pete. The problem at hand – how to come up with an engine bowl. Fiberglass was out – it didn't exist in 1923. An aluminum bowl would be nice, but I didn't have an English wheel and even if I did, I don't know how to use it.



I figure some place there must be a shape and material that would work for an engine bowl. About that time I looked down at my hands to see what I was drying. There it was – right in our kitchen. It was the right material and almost the right shape. To me it looked like an engine bowl. To most people, including my wife, it looked like the lid to her electric frying pan.

The width is just right, about 12", but it has to be a little longer. If I cut the lid in half and add 11" of aluminum, I would have an engine bowl 12" by 23".

Cut a big hole for the prop and a hole for engine oil cooling, then powder-coat it in gloss black. Add some chafing to the lip, mounting brackets, and I have an engine bowl. No one will ever recognize it as a frying pan lid.

Now I have to go shopping for my wife.

Recent Departures ...

Members Gone West

by Frank Hanish

John Dill, age 73

John & Patricia spend the winter months in Key Colony, FL. John's departure, his "final flight" in this life was on 2/2/2. He was fond of sharing stories about flying DC-3's for the airlines. We heard of many challenges he faced during his flying career; icing up over Denver, goose strikes shattering windshields, etc... The funeral service was held 2/12/2002 in Richfield, MN.

Jimmy Pedersen, age 52

Jimmy was the son of Drusillia Pedersen, and brother to four sisters. He died on Jan. 18, 2002 as a result of a house fire. Jimmy regularly attended the chapter meetings at the Air National Guard, and those at the Airlake Airport. Whenever we needed a cook, Jimmy was there with several grills. A machinist, he had an interest in the mechanical aspects of aviation and auto racing. The funeral service was held 1/25/2002 in St. Paul Park, MN.

Chapter Gatherings

Feb 20 EAA Ch 25 Meeting, 6:30 pm
Washburn Senior High School, Rm 119
1 block west of Nicollet & 50th (see p.3)

2002 Chapter Meetings planned for
Washburn Senior High School
Mar. 20, 2002 -- 3rd Wednesday
Apr. 17, 2002 -- 3rd Wednesday
May 15, 2002 -- 3rd Wednesday

Apr 17 Presentation by True North
author **George Erickson**, in conjunction
with Apr meeting at Washburn Sr. H.S.

Fly-Ins/Special Events

Feb 16 Flying Cloud Arprt MN (FCM)
Pancake Breakfast on Charlie Lane
Marv Getten's Hangar 763/473-5398

Feb 16 Glencoe MN (GYL) 10a
EAA U/L Ch 92 Jan Meeting

Feb 23 Springfield IL
Ultralight Safety Sem., IL St Fairground
Roy Beisswenger 618/664-9706

Feb 24 Warroad MN
Lions 24th Annual Skiplane Fly-In
218/386-1818

Mar 2 Duluth MN (DYT) 10a
Wheel & Ski Plane bbq buffalo Fly-In
Sky Harbor Airport. Julius Salinas
800/432-2884 j.salinas@lsc.mnscuedu

Mar 7 Alexandria MN 7-9 p
"Fighter Aces of World War II", Alex-
andria Tech College, Maj. R.A. Peterson.
Register early. 320/763-6646

Mar 14 Alexandria MN 7-9 p
"Target Berlin," Alexandria Tech.
Register early. 320/763-6646

Mar 21 Alexandria MN 7-9p
"357th Fighter Aces Reunite 1992"

Mar 21-22 St Paul MN
MN Aviation Mtce. Technicians Conf
Radisson Riverfront Hotel.
Mndot/FAA 800/657-3922

Mar 23 Eden Prairie MN (FCM) 9a
"Stall/Spin Awareness"
Modern Avionics, FCM by Rich
Stowell. IAC Ch 78 952/943-2182

Apr 7-13 Lakeland FL (LAL)
Sun 'n Fun Fly-In 863/644-2431

Apr 13 Fort Dodge IA (FOD) 11a-2p
Chili Fly-In, Ft Dodge Reg. Arprt

Apr 17-19 Bemidji MN
MN Council of Airports Symposium
Northern Inn. Mndot 651/297-1600

Apr 20 Bloomington MN 5p
MN Aviation Hall of Fame Induction
Banquet. Thunderbird Hotel. Contact
Dorothy Schaeffer, 4815 28th Ave S.
Apt. 312, Minneapolis, MN 55417.

We had an interesting experience while doing this exercise. We would tweak the position to get it just right and then go back and recheck to find something had shifted and in fact the fuselage was no longer level. We would re-level everything, tweak some more and find that things had shifted once again. After a few cycles of this we got suspicious and started scrutinizing the level we were using. Turns out it did not give the same level indication when swapped end for end...ach! With this fact known we proceeded to maintain the same orientation of the level and do a final adjustment that came out right on the money.

With the struts adjusted and their attachment brackets permanently mounted to the spars it was time to turn the garage back over to the cars so into the basement went the plane. You may notice in the pictures that I have not attached the landing gear to the fuselage. This is because I can't get the fuselage through the basement service doors with the gear on. I have determined that I can get it through the atrium walk-out door if I remove the fixed section of glass. As I get further down the road and start doing firewall forward installations I will put the gear on with the plan of taking it out the atrium door.

My activities this winter involve completing the wings in preparation for covering. I just finished installing the bottom false ribs. After applying epoxy varnish to the wooden components in the wings, I will install the fiberglass gas tanks. I will also need to attach the brackets and hardware for the flaperons. My goal is to cover the plane this summer so that I can work outside and not stink up the house with the chemicals. Sally loves to quilt and work with fabrics so we plan to do the covering together. It will be fun to work on the project as a team.

My goal is to have it flying in the summer of 03. I still have a lot of work to do. I have started thinking about the instrument panel. It will be a basic VFR panel with a handheld GPS. Nothing fancy. For now I keep plugging away, one step at a time in the evenings and snatching some time on the weekends. I'm having a good time. Starting the project has proven to be a good decision.

Chapter 25 Sponsor



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Apple Valley Ford
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(952) 445-2420

Stuff for Sale/Wanted

For Sale: Hangar: Benson Airport (6MN9), in White Bear Township, is expanding the number of private hangars at its 2,000' grass airstrip. T-hangar in a 2-6 unit condo, a single, or other configuration. Final size and cost will be determined by the buyers. Construction to begin in spring of '02. For more info, contact 651/631-8903 keith.bogut@wavefront.com

Wanted: Kit project, new or used, partially built OK. Partnership acceptable. Looking for cruise range ~150. 952/435-5597 funtimes450@yahoo.com

For Sale: Lycoming O-235C, 0 SMO, no accessories, all logs. \$4900.
John Curry 952/983-0742

For Sale: 62-29 VW prop, beautiful condition for plane or den, \$300, plus numerous new and used engine gages.
Bert Sisler 952-8848920 sisle001@tc.umn.edu

For Sale: One Share in J-3 Cub Club, currently \$100 per quarter plus \$20 per hour wet. Hangared at Crystal, priority to chapter members.
Keith Miesel 651-227-6199

For Sale: One set of wings for a '77 Bellanca Decathlon; one yellow tagged engine mount for same.

Mark Kolesar H 763-544-6766, W 612-371-5171

For Sale: Hartzell propeller from Piper Cherokee 180
Ron Winkler 952-829-5654

For Sale: Ski's A-1500 \$600. EAA Chapter 587 hangar on FCM
Marv Getten H. 763-473-5398

For Sale: O-290-G Lycoming, 1 hr on overhaul, mounted on test stand with prop. \$2,500
Cessna 150 main gear, wheel pants, wheel cyl., tires-complete \$250
Buick and Olds. Aluminum V8 engines-both \$200
8" spinner w/plates—cont. bolt pattn, new in box \$50
Gene Stinar EAA 121451 651/258-4432

For Sale: Hartzell HC-C2YK-1BF/F7666A-2 (Constant Speed) Typically IO-360, or 0-360. Van's, Husky, Falco....
Contact: Frank Hanish 952-974-0561.

KR-2 Kit \$1995
Ron Barsness, Cyrus MN 320-795-2708

For Sale: 1/2 interest in RV-6A, completed and flying. George Jevnager's partners are selling their half.
George 952-933-2485