

The Mooney Flyer

The Official Online Magazine for the Mooney Community
www.TheMooneyFlyer.com

January 2019

**Happy
New Year**





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Editors

Phil Corman & Jim Price

Contributors

Bruce Jaeger | Bob Kromer | Tom Rouch | Paul Loewen | Geoff Lee | Linda Corman

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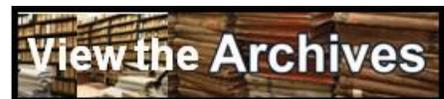
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Non



Mooney





From the Editor

Phil Corman

Non-Mooney Pilots' Main Gripe with Mooneys

I am always amused when I hear non-Mooney pilots complain about how small the cockpit is. It's within 1/2" of the width of a Bonanza. I am just short of 6' and have plenty of headroom. To be sure, the cockpit is "tight", but do you ever hear Porsche or Ferrari car people ever complain about how "tight" they are? Nope. It's a selling point.

I never feel like I'm boarding my Mooney. Rather, I feel like I'm strapping her on and, as Richard Bach would write, becoming one with my Mooney! Her controls are an extension of my mind and body. I swear it's the lack of slop in the controls (No cables and pulleys for me). If I think of a turn or ascent/descent, she leads me that way.

3-Bladed Props

The truth and the myth.

First **the truth**: 3-Bladed Props on Mooneys make them look

Now **the myth**: On rare occasions does the 3 bladed props. produce a significant increase in cruise speed. However, you can expect some improvements in your takeoff run and your climb.



How do you know a Mooney pilot is exaggerating his/her Mooney's speed and fuel efficiency? Their lips are moving!

Another **truth**: They are better at braking your airspeed on final approach than a 2-blader, and finally, a 3-blade prop makes more difference on a 6 cylinder engine than a 4 banger.

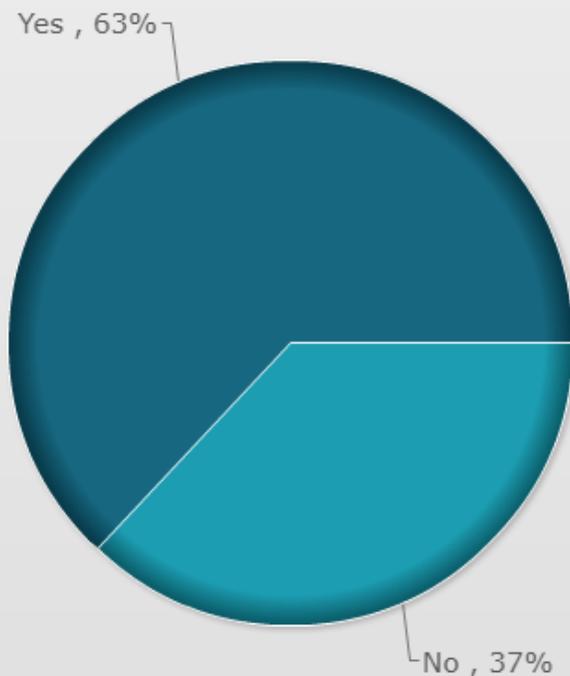
Mooney Looks

Is it just me or do Mooneys look great on the ramp! To me, they look poised for takeoff at any second. I get more compliments from other pilots about my Mooney than any other airplane I've flown. Is it me or do they just look great with the gear retracted in flight? To me, they look like a piston version of a fighter aircraft with a better paint scheme. They look like a stallion galloping that is in seventh heaven. Few airplanes can outshine a Mooney on the ramp or in the air. Sigh. I'm sorry... but I am totally in love with my Mooney. Happy New Year!

Do you have a 406Mhz ELT?

Poll created by [Phil Corman](#) on 10/04/2018

Poll Results



Next month's poll: "Regarding ADS-B " [CLICK HERE](#) to vote.



APPRAISE IT
Check Your Mooney's Value 

[M20C](#) [M20E](#) [M20F](#) [M20G](#)
[M20J](#) [M20K](#) [M20R](#) [M20M](#)

Mooney Instructors  for the most comprehensive list of Mooney instructors in the United States

PROP SUPER CENTER

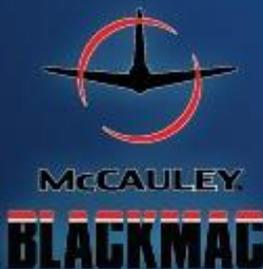


We won't be undersold!

Mooney Props



Airplane Eligibility	Prop Style	STC #
M20A-J	2 bladed Scimitar	SA0241CH-D
M20C, D, E, F, G	3 bladed	SA4529NM
M20J	3 bladed	SA4529NM
M20K	3 bladed	SA1505GL
M20R	3 bladed Scimitar	SA02004CH
M20R, S, TN	3 bladed Scimitar	SA03024CH
M20R, S, TN	3 bladed Composite	SA02482CH



Airplane Eligibility	Prop Style	Part #
M20A-G	3 bladed Scimitar	PL60152
M20C, D, G	3 bladed Scimitar	PL60154
M20E, F	3 bladed Scimitar	PL60149
M20J	3 bladed Scimitar	PL60136
M20K	3 bladed Scimitar	PL60199
M20R	2 bladed	M20R241-01
M20R	3 bladed	M20R418-01
M20S	2 bladed	M20S239-01



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Engine Fax: (254) 752-3307 | Parts Fax: (254) 756-0640

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Good afternoon, Gentlemen. I just read your brief notes on Va in the Dec Mooney Flyer. You are right about Va not being of much value in the real world. Quite some time ago, I had an email conversation with Barry Schiff about what Va should be in the real world ... Anyway, you might be interested in his notes on the subject at: http://www.barryschiff.com/sam_pp2.htm
Neil F

An advertisement for LASRR. The background shows a hangar with several small aircraft parked outside. The text '15% OFF All Online Inventory' is prominently displayed in white over the image. A red button at the bottom says 'SHOP NOW'.

15% OFF
All Online Inventory

SHOP NOW

USE PROMO CODE **HAPPY2019** AT CHECKOUT.

GETTING OLDER CREATES AN INTERESTING OPPORTUNITY

Every day vintage Mooney owners are disappointed with aging interiors. Even if a Mooney is hangared, the plastics will, over time, yellow and crack. It's no wonder, since the earliest 201 (1977) is now over 40 and a majority of the Mooney fleet is even older.

If you are a vintage Mooney owner, or by chance, a crafty person looking for an opportunity, read on.

Of course, there are professional upholsters that do tremendous work. That skill comes with a price to pay that can be too high, when factoring in the value of a vintage Mooney. We are always looking for an affordable way to keep these tremendous airplanes flying and looking great at the same time.

Some time ago, an idea to create recessed overlapping panels replacing arm, foot and baggage area side walls was put into motion. These panels, part of a ***Spatial Interior***, were ultimately approved for Mooney models from the 60's through the youngest 252. Increased room and near elimination of screws pleased owners and mechanics. A unique and simple install process was ultimately developed. Refinements progressed to colors, fabrics, coordinating storage pockets and a durable cabin door trim.



All of this was great, but aging headliners, window and baggage area upper pieces remained a challenge. The development of acrylic tape, soft aluminum, a two-part automotive epoxy, SEM aerosol colors and protective clear finishes, changed the outlook. A plastic repair learning curve was worked through, and now, even significantly deteriorated pieces are repairable.



Thanks largely to a few articles and word of mouth from satisfied customers, interest in the ***Spatial Interior*** has soared. The availability of a revitalizing kit that incorporates portions of the ***Spatial Interior*** design, is expected to increase interest even more.



Here's where the opportunity lies.

Bruce Jaeger, designer, distributor and now STC holder, is actively developing a network of installation centers. Mooney interiors revitalized by a trained regional installer – ideally with an owner's help – would save miles and time, further reducing cost. If you're intrigued by plastic repair, handy with aviation nippers and a Dremel tool, you could qualify as an installer. You'd only need an interest in the work, some basic tools and a willingness to help others. Bruce would provide

personal hands-on training, a step-by-step manual, an established material, vendor lists and advertising. Bruce is confident that after a single training project, you'll look forward to your first solo.

If you're looking for a personal opportunity — or a way to grow your current upholstery business — contact Bruce at bruce@jaegeraviation.com or 320-444-3042. To learn more about ***Spatial Interior***, please check out www.jaegeraviation.com.

The vintage Mooney is a classic airplane worthy of looking its best!



Bruce Jaegar

Facing the Inevitable

You have enjoyed your Mooney for years and the time has come to pass the pleasure and responsibility on to someone else. Life is about to get interesting.



Though not on your mind in the beginning, preparation for sale started with the decision to purchase this very Mooney. You asked all the right questions and confirmed there was no corrosion. If damage history helped lower the price, someone else is now going to expect the same treatment. You have been a responsible owner and never landed without the wheels and kept hail stones away. Some of your maintenance has been completed by a Mooney service center. Of course, the same paint is showing its age and the interior will raise questions. Reasons to sell are simply not flying as much as in the past and this is not going to change. Some service items are

pending, including the no longer perfect windows. Hopefully it's leak free, but older fuel tanks can be an issue. You are pretty sure the propeller blades are serviceable, but overhaul was long ago. Your engine is mid-life, but beyond factory recommended overhaul years. You cannot imagine that one missing logbook will be a problem. This history and much more will be part of the equation for developing a sales strategy. Putting yourself in the place of a buyer will help you come up with a plan. What will put your airplane on top of the "I'm interested" list?

A significant question will be whether to market on your own or ask for help. From a previous life of over 30 years selling and servicing Mooney airplanes, I can assure anyone that this may not be for the timid. You will rightfully have a personal attachment and it may be difficult to understand the feelings of a purchaser. Determining the right value will require investigation and maybe some soul searching. Preparing an ad, being available to answer the phone or reply to a message, arranging a demonstration or pre-purchase half way across the country, dealing with a trade, completing paperwork and the possibility of not so pleasing proposals are only a few of the challenges facing a seller. A sales specialist will earn their keep. Your time may be best dedicated to whatever business enabled you to own a Mooney in the first place.

Select someone who specializes in Mooney and ask for references. A local specialist would be nice, but keep in mind a real buyer is probably not in your backyard.

So, what can a Mooney sales specialist offer?

- As their success depends on making you happy, every effort will be made to complete a sale.
- Recent experience with your same model may have provided residual prospects. You might be surprised how many airplanes are sold without being advertised.
- A prospect will likely be more comfortable dealing with an agent rather than the owner, as questions can become personal.
- He or she will likely have a close relationship with a service center.
- A specialist will determine all there is to know about your airplane through a flight test and pre-qualification before setting a value. (Eliminate ever hearing a prospect comment, "If only I would have known?") Experience has proven that it is never good to have to apologize.
- Pricing to sell, not just advertising, will drive interest in your Mooney. Detailed market comparison will add comfort.
- Knowledgeable about titles, liens, etc.
- Writing and placing a strategic, well written ad. Interesting and meaningful photos documenting performance with a good look inside the wing and tail will distinguish your Mooney. An ad that emphasizes the positive, while fully disclosing history would be refreshing.
- Providing trade-in assistance could make a difference.
- Assist seller in making a good sale decision and handling all the paperwork.
- Experience in handling the negotiation game.
- Many who have decided to sell on their own would make a different decision next time.



The decision to sell a Mooney will be emotional. If you want someone to help, complete a Google search of Mooney sales specialists. Selecting the right person will be critical. In addition to references, take into consideration the number of competing aircraft currently represented. Reviewing their current advertisements and typical time on the market will help you make a choice. Do not be attracted only by a high suggested price as a fair value needs to be determined. Be flexible and willing to listen to your agent.

What can you do to help?

- That last annual could have included evaluating your Mooney for sale. There is a huge difference between return to service and preparing for sale. Compliance with service bulletins or at the very least full disclosure. If truly prepared to sell, a prepurchase inspection should be a formality, not a stressful time.
- Allow the agent to take control of your Mooney. Immediate response to inquiries and ability to arrange timely demonstrations to qualified prospects are critical. Purchases are often spontaneous, and it would be hard to trust someone who has not personally flown the sale aircraft.
- Be willing to listen to your agent when setting a value. Thoughts of all you have invested need to be set aside.
- Tell your agent everything you can about the condition and history of your Mooney. All will be lost when a prospect discovers something that should have been revealed.
- A purchaser will have emotion and dealing with an agent rather than an owner is likely to be more comfortable.
- Advise your mechanic to be truthful when a prospect's question is directed his or her way.
- All equipment in working order or deficiencies disclosed during the first prospect contact.
- Tell the truth.
- Set a reasonable time frame to complete a sale or change the strategy
- Expect communications and insight from your agent. Time is not your friend.

**When the time comes,
you can be prepared. In
the meantime, enjoy
your Mooney.**



PHIL CORMAN



IMSAFE, BUT ARE YOU?

Most of us know the acronym IMSAFE and that it stands for:

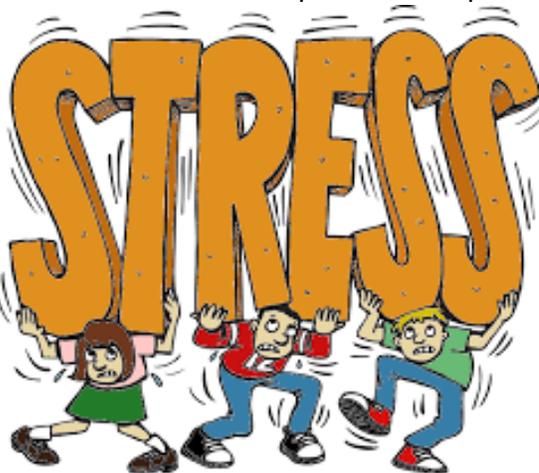
But there are a few more health issues that we will address in this article. Additionally, there is another issue that is NOT covered by IMSAFE, which we will address.

The first issue is the use of this checklist. We are betting that most of us do not review this checklist before each flight and certainly not as often or as diligently as a flight briefing or pre-flight checklist. Most of us will not fly if we are sick or obviously having side effects from medication. But, as with all pilot checklists, performing each step is critical to an informed Go/No-Go decision



Illness is an easy one. Are you sick? The vast majority of the time you can answer this. If you have a cold or flu, that's easy. However, some illnesses are insidious. High Blood Pressure, especially chronic, can lead to a stroke. Another is Diabetes, which is also insidious. What is your blood sugar at departure time? Low blood sugar, or even elevated blood sugar is not a good thing in the cockpit. Is it under control?

Medication is another easy call. Are you on any prescribed meds and are you feeling any adverse side effects, either now, or within the past few hours? Did you take any non-prescribed meds in the past 24 hours with side effects; antihistamines for example. These are notorious for drowsiness side effects. Again, that's not cool in the cockpit. For new prescribed meds, I think the FAA wants you to be monitored for 90 days before flying. If I'm wrong on that, it still sounds like sound advice.



Stress is sometimes a little trickier to determine. If you have a stressful job, then you are often dealing with stress on a daily basis and it becomes second nature. Some limited stress is ok, but if you are overly stressed, you should reconsider an immediate flight. As stress goes up, good decision making goes down; another uncool thing in the cockpit. Stress can show up in your head with headaches or tenseness, or it can unveil itself in shortness of patience and a short fuse temper. Pay attention to these symptoms and deal with them before hollering "Clear Prop".

Alcohol should be a no brainer, but it is not. The [FAA regulations](#) are very explicit here. Do NOT fly, do not pass GO if you have had a drink of alcohol within the past 8 hours.

Many of us have a personal limit of 24 hours. If you are under the influence, do NOT fly. This one is harder since until you pass out, you may not understand how drunk you are. The 24 hour rule covers this shortcoming.

Fatigue is another easy one. Did you get enough sleep before this flight? Have you been burning the midnight oil on a project at work or studying for finals? If so, determine if you are alert enough for the type of flight you are planning. A VFR lunch run might be ok, but an IFR flight to minimums at a Class C airport might not be. You make the call.

Eating is the final easy thing to check. Have you eaten a nourishing meal in the past 4-6 hours. How is your blood sugar? This is a different consideration, but related.



Items to Consider Beyond IMSAFE

There are several health and awareness issues that are not covered by IMSAFE that we'll cover now.

Oxygen Saturation Levels How will you know your oxygen level unless you are "anal" about monitoring it with an Oximeter? Low blood oxygen symptoms include: Shortness of breath, headache, restlessness, dizziness, rapid breathing, chest pain, confusion, high blood pressure, lack of coordination, visual disorders, sense of euphoria and rapid heartbeat. These are the result of Hypoxia. The best antidote is an Oximeter. It's important, because Hypoxia can be insidious. A right-seater might notice these symptoms, but that's subjective. However, they are still a good backup. The Oximeter doesn't lie. Check your O₂ level on the ground. Check it again at altitude. You want to be as close to the same saturation level as it was on the ground. Remember, as you age, you might need O₂ at lower altitudes than the FAA prescribes in the FARs.



Hypoxia, Alcohol, Meds, Stress

More often than not, you are unaware of any critical symptoms. Recently a Mooney pilot, caught on ATC Live, almost took off intoxicated. He may have known, but might not have. A departure was avoided by an "on the ball tower controller". He noticed a slight slur in the pilot's voice and other alcohol induced effects, like not hearing simple directions from the tower. After a few minutes, the Tower asked the pilot to shut down and meet with Airport Personnel. This probably saved a perfectly good airplane and more importantly, the life of the pilot.

Another recent medical situation involved a high time Mooney pilot departing KGYR (Goodyear, AZ) for Denver. This pilot's radio discipline was sloppy; often not acknowledging the Ground controller. At the hold

line, his Speed Brakes were deployed and he only retracted them after the Tower asked him a few times if he intended to depart with them deployed. On departing downwind, the Tower notified the pilot that his gear was still down. There were a few more concerning things, including not hearing calls, and then responding with something other than that which had been requested. More than likely, this pilot was experiencing some IMSAFE issues and may not have been aware of the debilitating symptoms. He crashed on a night time approach to KSAF (Santa Fe, NM). [CLICK HERE](#) for a long ATC Live recording of the departure at KGYR. (Listen for the first call to N113TA at 15:00 minutes).

We are not judging here. Were his symptoms insidious and was he unaware. Did he have any chronic issues that would affect his flight? Sometimes, you just might need the observation and opinion of another person. These insidious effects are like "trolls under a bridge". You don't see or feel them until it's too late.

Getting Older

Another issue not covered directly by IMSAFE is the effects of getting older. Most of us will say we will know when the time comes to stop flying. This may or may not be true and we aren't dealing with that decision here. But here are some items that you need to be on top of as you age.

- **Eye Sight** diminishes as we age and night vision diminishes even faster. You can detect the latter effect while driving at night. Vision also diminishes with altitude. To counter this, get regular eye exams and use Oxygen while flying, maybe as low as 7,000' MSL. You determine your oxygen needs.
- **Hearing** often erodes with age. An annual physical that includes a hearing test would be a good idea. That's because your AME doesn't spend too much time on your hearing. A hearing aid is not a sign of weakness, but a decision to be a responsible PIC.
- **Oxygen** saturation is another concern. Just use oxygen at lower altitudes as hypoxia can set in much sooner than when you were 25.
- **Reaction Times** are best assessed by a CFI and probably should be assessed on a regular basis. Approaches and landings require your best reaction responses. You may only realize reduced reaction times after they have become significantly slower and you end up with a bent airplane.



**Ensure that you are as SAFE to fly as that shiny Mooney of yours.
Pay Attention and Live to Fly Another Day!**

Airspace Review

Class C & D

Jim Price



To enter **Class C** airspace, you need 3 miles visibility. You'll also need to establish communications with ATC. That means that all you need for entry, is to hear the controller acknowledge you by call sign. A formal clearance is not required. You'll also need a Mode C Transponder to fly in or above Class C airspace. Beginning January 1, 2020, you'll also need to be ADS-B "OUT" equipped.

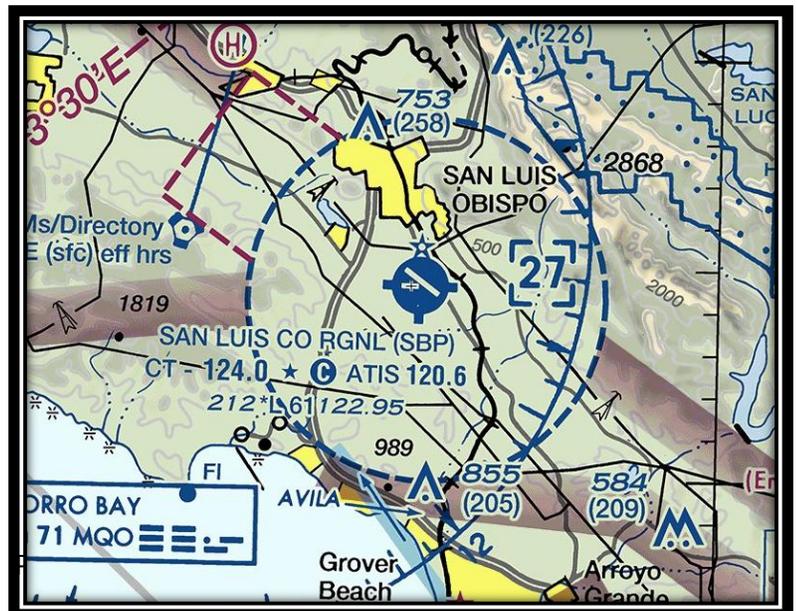
To enter **Class D** airspace, you'll need to establish communications with ATC. That means, that all you need is to hear the controller acknowledge you by call sign. A formal clearance is not required. The top of this Class D airspace is 2,700' MSL. That's indicated by the brackets

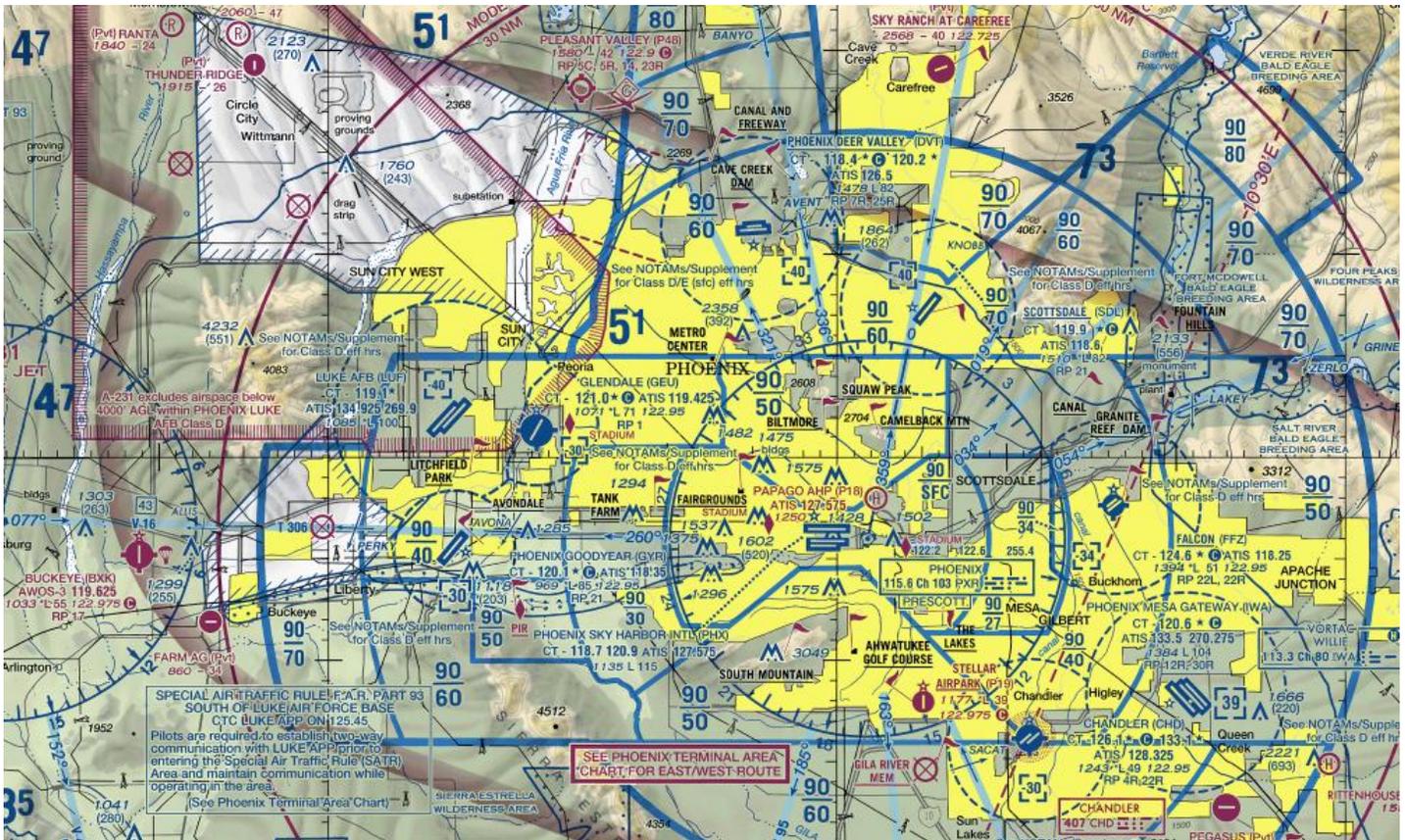
around the 27.

If the top of the airspace is presented with a minus sign before the number, this means that the top goes to, but it does not include the indicated MSL altitude.



On January 1, 2020, to fly in Class D airspace, you do not need to be ADS-B "OUT" equipped, unless the Class D airspace is in Class B or C or airspace, or within the Class B 30 nm Mode C veil.





When a part time tower is closed for the night, the airspace reverts from Class D, to either Class E or G. This airspace reversion is indicated in the **Chart Supplement**, (formerly *Airport Facility Directory (A/FD)*), under “**AIRSPACE**”. When using ForeFlight, the Chart Supplement is still referred to as A/FD. Here’s a sample entry for the Chandler, AZ (KCHD) part time tower:
AIRSPACE: CLASS D svc 1300 – 0400Z other times CLASS G.

PHIL CORMAN

The Seven Deadly Sins *of Radio Communications*



1. “With you.”

If you’re flying cross country, you’ll get switched to a new controller every so often. Sometimes it’s a new approach control or center, sometimes it’s just a new sector in the same facility. Regardless, a check in should be short and sweet: “Cincinnati Approach, Cessna 12345, 4000.” There’s no need to say “with you at 4000.” It seems like a small thing, but it’s wasted airtime and most controllers don’t like it.

2. “Roger.”

It’s not a readback. If ATC clears you for something, they usually expect a readback of that clearance, just to make sure both sides understand what’s about to happen. Simply saying “roger” may sound cool, but it’s not a readback. If ATC says “Cessna 12345, New York Tower, taxi to runway 22R via Papa, Alpha, hold short of runway 31R,” they want to know that you heard each part of that; in fact, it’s required. “Roger” is going to get you chewed out.

3. “ah...” or “and...”

We’re all human, and sometimes the brain freezes when we key the mic. But some pilots regularly start every communication with “ah” or “and,” as if it adds some airline captain quality to the remarks to follow. Don’t do it. Again, airtime is valuable, and there’s no benefit to be gained from these little pauses. Think before you start talking and you’ll be more confident.

4. TMI (too much information).

If you're at Middle-of-Nowhere Municipal on a Sunday night and there is no tower, nobody needs to know that you're taxiing from the ramp to taxiway Alpha. Certainly, if you're crossing an active runway or starting your takeoff, a radio call is a good move, but focus on communicating important information. A good question to ask is, how will this next radio call affect other pilots? If it won't, keep quiet. You might tie up the radio for a neighboring airport that uses the same frequency.

5. Using local landmarks for position reports.

Flight instructors are sometimes as guilty as anybody on this one. Imagine you're inbound to an unfamiliar airport without a control tower. You dutifully call up and say, "Jones Country traffic, Cessna 12345, 3 miles east, 45 for left downwind runway 24." Anybody who's a pilot will know exactly where you are and what your intentions are. Now another airplane says, "Jones County traffic, Piper 54321 is over the red barn for downwind." While locals may know where the red barn is, as a transient pilot you are completely confused by this report. So, avoid local landmarks and keep position reports based on distance to the airport.

6. Using IFR fixes at a non-towered airport.

This is the IFR equivalent of sin number 5, and it's just as bad, if not worse. You're a 15-hour student pilot on your first solo when you hear, "Stevens County traffic, Learjet 12345 is at KWIPS on the RNAV approach." You have no idea what an RNAV approach is, much less KWIPS. Again, it's a meaningless position report for a VFR pilot. It's much better to say, "Stevens County traffic, Learjet 12345 is 5 miles northeast, straight-in on the RNAV approach for runway 26."

7. "Any traffic in the area, please advise."

This is certainly the worst of the 7. It's also arrogant, wasteful and should be punishable by prison time. OK, maybe not the last part, but there's simply no place for this phrase on the radio. You often hear it when an airplane first switches over to CTAF at a non-towered airport. But if want to get an idea of the traffic flow, listen to CTAF on your #2 com radio before switching over, or just listen for a minute before announcing your intentions. This takes up far less airtime and is much more considerate. It is not the responsibility of others in the pattern to announce their position every time a new airplane gets close.

A PASSION FOR FUEL TANKS



An Interview with Paul Beck, Owner of *Weep No More* (Fuel tank repair specialist)

It's not every day you have the chance to visit with someone who has a passion for Mooney fuel tanks. I've heard Mooney owners use all kinds of words about them, which are not nearly so flattering. Is it possible that someone enjoys fixing them? There is such a person and his name is Paul Beck.

Since September of 2000, Paul has dedicated his life to Mooney fuel tanks. That's more than seventeen years and I was advised, well over some 900 Mooney airplanes, give or take. The introduction of a Polysulfide chemical digestant, specialized equipment, resources of the former Willmar Air Service, Paul's dedication and a whole lot of patience, are the reasons for success.

From the beginning, Paul wanted to help the Mooney owner and he knew that someone needed to find a way to make a difference. Leaking fuel tanks and fewer repair options were compromising the value of the entire worldwide Mooney fleet. When approached with an idea by Bruce Jaeger, then owner of Willmar Air Service, Paul agreed to get involved.

Paul, just how significant are tank problems?

Fuel tanks are a concern for every airplane type, from an airliner to a trainer. The integral Mooney tank is a great design that doesn't compromise strength or add weight. When properly sealed, they also provide a very long life. There are serviceable tanks out there that are older than me, and I am now 45. However, it is inevitable that at some point, every tank will start to leak. With over 10,000 Mooney airplanes worldwide, there's a high percentage that have celebrated their 40th or even 50th birthdays. The need to repair tanks is going to be around for a long time.

How did you get selected to work on fuel tanks?

Bruce was asking for help and no one else volunteered. Imagine that. Having experienced cleaning tanks by hand, there just had to be a better way and I was very interested in the chemical process. It looked like there would be plenty of job security and this was something new where I could enter on the ground floor.

Were there growing pains?

The obvious answer to that question is yes. I still recall the first project. It was a 1978 201. The chemical digestant did its job and there was hope. I was excited for the next airplane which turned out to be a nightmare. The chemical would not attack a foreign sealant someone had applied thickly inside those tanks. What makes the unique chemical formula work in fuel tanks is, that it picks and chooses what it attacks. It turned the sealer soft, which made hand removal even more difficult. This project tried my nerves. In the end, the chemical manufacturer got involved and we were on the way to a revised formula. Today, I know exactly which chemical to use for a particular year vintage



Mooney, as there is more than one choice. Protecting paint was another challenge. It isn't possible to remove access covers without touching the paint. I have learned how to limit blemishes to an absolute minimum and a local automotive paint supplier completes the computer color matches. There were a host of other minor problems addressed and solved, one at a time.

Is there special equipment required?

We called the special equipment an apparatus. The original equipment continues to do the job today with only minor modifications. New tools have also been designed to protect paint and isolate leaks when tank life can be extended.

In addition to equipment, a special facility was created specifically for fuel tank repairs. The biggest challenge was paying the heat bill during the cold Minnesota winters. Drains and holding tanks were installed, along with heating and air conditioning systems. This did not take care of certain chemical and sealer fumes requiring personal protection in accordance with MSDS requirements. In addition to the facility, differing sealer part numbers were required for curing in the cool, dry air of winter, versus the warm, moist air of the summer.

Is there risk?

Before attempting the first project, one of our primary concerns was corrosion. After numerous experiments, references and discussions with the chemical company, we were confident that after proper power washing there was no chemical residue. I recall more than one case where someone had used paint stripper to remove the sealer. Sealer was indeed removed and continued to be removed after resealing. There was simply no way to assure all stripper was gone from the skins and overlap joints. The result was not good. Chemicals used today are totally removed with evaporation and pressure washing.



We were also concerned about disposal of diluted chemical and sealer. An evaluation by the local waste water treatment plant advised that once totally diluted, the mixture of chemical and sealer could indeed be flushed down the drain. This was never our choice and as we had an underground holding tank, special pickup was arranged. In over eighteen years, we have not had any question about handling the diluted solution.

When are tank repairs required?

Fuel tank leaks have become a way of life for the vintage Mooney owner; leaks are also found in some late models. Minor repairs to tank covers are quick and can be completed while an owner waits or as part of an annual inspection. An owner may not be given a choice to delay tank repair when required by a mechanic as part of an annual inspection. The service manual gives some direction, but in general, if fuel dries as fast as it leaks, repair can be deferred. A smell of fuel in the cabin needs to be addressed. Of course, fuel leaks will stain aircraft paint, and I can assure you, this will not get better or fix itself. The question whether to totally clean and reseal or repair is, in part, based on the age and inspection by an experienced eye. We start to draw the line at 25 years. If you are considering repainting your Mooney, repair your tanks first.

Is total clean and reseal the only choice?

Minor cover leaks are quickly and effectively repaired. Leaks in the seam, forward of the main gear tire, are also quickly isolated and can be repaired. These leaks are quite common in later model long bodies.

Applying layers of a new sealer over the old is not a good idea. Leaks in the wing walk area are often caused by a screw that can be corrected without removing a cover. Even seam leaks can be isolated and repaired. More difficulty comes when leaks are in multiple locations or in the top of the tank. These top leaks result in fuel seeping from drain holes outside the tank. Believe it or not, I have actually seen these holes, that are totally outside the tank, sealed by someone who does not have a clue. The actual leak is hard to isolate as the leak source could literally be from anywhere. A few tricks, unique equipment and decades of experiences have made a difference. The biggest factor may be our history and number of years in service. Attempts to repair an old or dried up tank may be wasted effort and added expense.

There are other options, which include bladders and different types of sealers. I am pleased to give credit to anyone willing to repair fuel tanks and warranty their work. However, use of aggressive wire wheels or any abrasive tool is unacceptable. I will review the process with any owner interested enough to call.

How does the process work?

Nearly twenty years ago, a polysulfide chemical digestant was introduced to general aviation. One of our Mooney owners proved that it had potential. However, it lacked a way to apply it. We developed a concept that is still used today, which for lack of a better name, is called an "apparatus". The chemical could now be successfully applied. There were plenty of obstacles that included more hand removal than I wanted. The learning curve that started the first day reached a peak about seven years later. The most concerning item was knowing with absolute certainty that after rinsing, no chemical residue remained. Assurance from the chemist was not enough. Multiple early experiments, and now nearly twenty years of history, have proven the risk was worth the effort.



How long does it take and what is your warranty?

I have developed a routine for removal of old sealer which generally takes a relatively short time, at least in comparison to scraping by hand. There is some hand cleaning in every tank as I have no interest in wasting precious chemical. Preparation inside the tank, application of various sealers and required curing time takes multiple days. I have learned that being in a hurry does not save time. Once the work is complete, tanks are fueled to absolute capacity and allowed to sit for up to three days before delivery. I have again learned that fuel will search out the smallest defect. This leak-free time creates comfort for everyone. Depending on tank size, the process can take 2-3 weeks. Though factory warranty was limited to three years, my confidence in the latest sealers and tank repair methods results in a warranty more than twice that long. Just keep your tanks full.



What sets Weep No

More apart from the others?

We were the first to face the challenges of not only how to remove sealer, but how to protect the rest of the airplane. This did not come without disappointment and expense. Protecting the paint, landing gear, fuel tank transmitters, carpet, wing walk, wiring, etc., was part of the learning curve. Gradually each of these concerns became history. More critical and important to a Mooney owner is the new sealer. In my business, there is nothing more disappointing than receiving a call that a recently sealed tank is leaking again. During those first seven years, these calls were too common. Perfection did not come easy. Each disappointment was part of the learning curve. Addressing each of these early experiences has resulted in what I am certain is the most reliable fuel tank repair in the industry today.

Have you ever had a tank you could not repair?

Not really. However, I have discovered surface corrosion on skins and between ribs or spars that needed significant repair before resealing. This condition was not visible until sealer was removed. Not fun.

Another learning experience happened when installing extended range tanks in an early E model. Why sealer would not bond was a mystery. Who would know that the most aggressive cleaner, MEK, would not remove Corrosion X residue? A few calls confirmed that a Naphtha base cleaner was required. Thankfully, I knew how to remove sealer. Another good lesson.

Do you have help?

If by chance you know of someone interested in working with chemicals and tools in small spaces and living in Minnesota, we should visit. I hear the fishing is good.

Can a Mooney owner clean and reseal their own tanks?

From my experience, someone may try once, but not many would do it a second time. If you should decide to try on your own, do not open both tanks at the same time as this will ground your Mooney for possibly longer than you think.

A good way to answer your question may be in this story. A few years ago, a partnership of retired gentlemen owned an early 60's vintage Mooney that sorely needed fuel tank repair. Being retired, it was their decision to

do whatever work they could on their own. Cleaning fuel tanks became somewhat of an obsession. Ultimately, after a year or so on this project, their tanks were indeed cleaned and ready for sealer. As planned, I was called upon to apply sealer. Imagine their disappointment when I had to tell them that the extent of tubular and wing spar corrosion made it impractical to continue. The partnership was dissolved and I expect that was the end of flying for most, if not all of these guys. Getting an experienced evaluation would have still been disappointing, but it would have eliminated hours of hard work. These gentlemen were correct in requesting help, but timing was the problem.

Have you ever had a leak in a newly sealed tank?

Absolutely. Removing the old sealer was the easy part. The best way to apply sealer had to be learned. The only teacher was experience. Bruce and I had plenty of frustration in the first few years, as the sealer simply did not flow and coverage took multiple applications. Even a pin hole could be a problem. Our research resulted in discovering better sealers and concerns gradually went away. Applying filler, base and top coat sealers became an art. I am as proud of zero leaks as I am with the appearance of a professional installation. Being patient is an area where I sometimes have difficulty. I had to learn to slow down, as applying sealer and curing both require time. I am still impatient, but have learned to live with it.

Is it expensive?

Expensive is when it's not done right the first time. As fuel tanks have a typical useful life, just like an engine or any other accessory, it should not be a surprise when repairs are needed. When it is time to market a Mooney for sale, fuel tank history is part of determining the value. Any tank repair is expensive, but a professional, well-known repair also adds value and will be important when selling or trading your Mooney.

Is repairing Mooney fuel tanks your only business?

In addition to Mooney, other manufacturers have similar designs. Weep No More has become the go-to place for the entire Van's RV line. Even war birds have become Weep No More customers. As opportunities arise, procedures to help frustrated owners of other wet wing airplanes are being developed.



The process of repairing fuel tanks provides the opportunity to closely inspect areas of the airframe not often exposed. This is a great time to assure the tubular structure and windows are in compliance with Service Bulletin M20-208. If inspection of the wing, ribs and stringers reveals need for corrosion treatment, this can be done at the same time. As a partner in Oasis Aero, a new factory authorized service center, we have the experience and equipment to complete this service.

Is there a way to keep my tanks from leaking?

I have wondered how in the world a 1960's Mooney could still have original tanks when a much newer airplane has a problem. After repairing leaks in some later model Mooneys, I've learned the reasons. It is always nice to learn from other's experiences and I have taken advantage of their stories. Tanks left empty with rapidly changing skin temperatures are prone to develop premature problems. Keeping your tanks full and out of the sun will make a difference. If concerned about the weight of large or extended range fuel tanks, consider alternating topping the tanks between flights. At least this will keep the sealer moist half of the time.

What is next for *Weep No More*?

As the owner of Weep No More, I intend to continue providing the best tank repairs possible. It is also my desire to expand service to other wet wing airplanes.

As a rated mechanic with substantial Mooney experience, I am aware of aging airplane issues. I have seen the facial expression of an aircraft owner who just learned his or her airplane has a serious problem. Part of the service provided by Oasis Aero and Weep No More, will be to help owners set priorities and protect the value of their Mooney.

How does anyone get to Minnesota?

Though my Minnesota location is both geographically and environmentally challenging, Mooneys come to Willmar nearly every day. I am pleased to report that me and my partner, Eric Rudningen, are the new owners of Oasis Aero, a factory authorized service center for the Upper Midwest. Weep No More is located under the same roof, where we can assist anyone wanting to complete additional maintenance. Minneapolis is a 30-minute flight, where pick-up and delivery at a Twin Cities airport can be arranged. If your schedule is a problem, an experienced Mooney pilot can be sent to pick up your airplane.

Is the *Weep No More* service offered at other locations?

Efforts to provide a more convenient service for distant Mooney owners resulted in training and provision of equipment to the factory, the Pacific Northwest and even a European location. It was disappointing that good intentions turned into difficulty and disappointment. The Mooney factory ultimately sent their warrantied fuel tank work along with referrals my way. Owners continue to come from all around the country. I invite inquiries from European Mooney owners, as we have an option in your part of the world.

Fuel tanks – Store full or not

Should owners keep tanks full, or does that matter? If tied outside, I say keep full. The fuel acts as a heat sink, keeping tank temps lower. If stored inside, especially the large tank Mooneys with the 6 bay system, I like to say, alternate. So on a flight, fill the left; next time, fill the right. This helps to keep excess weight off of the shock discs.

Conclusion

For the greater part of thirty years, a typical Mooney fuel tank does a great job, but then the inevitable blue stain or distinctive smell of Avgas appears. You were hopeful that facing a leaking fuel tank would be for someone else, but no such luck. So now what can you do?

It is time to make a call. Not just to anyone and that may include your local mechanic. Tank repair is a unique service that requires an experienced technician. There are many locations willing to work on fuel tanks, but very few that have the experience to know what's best. Carefully consider your options and invest wisely. Paul hesitated to make a referral, but was very willing to give credit to anyone who offers to repair fuel tanks and warranty their work. For more details visit the Weep No More ad in this issue of The Mooney Flyer.



How to Preflight your iPad and receivers in less than 5 minutes

The iPad has become a primary reference for digital charts. It's also become, among other things, a weight and balance calculator and a performance calculator.

Just as you wouldn't take off without checking how much fuel you have on board, when you consider the importance of your iPad, it's important to check it, too.

iPads are very reliable, but you still want to find out about any issues while you're on the ground and have an internet connection. This shouldn't take more than five minutes.

You should create a checklist that works for your apps, its accessories and your airplane. Customize it so that you'll actually use it before every flight. With that in mind, here's a basic checklist to consider and it applies to most apps:



100% 

iPad Battery fully charged. It's a good habit to always take off with a full charge. It takes 4-6 hours to charge a drained battery. I charge my iPad while

I'm sleeping so that it will be ready to go for my flight. Because I've been surprised after thinking that it's been charging all night, I also ensure that the iPad indicates that it's being charged when I plug in the charging cable. Just because you have a cigarette lighter with a USB outlet plug, that doesn't mean it always works. The December 2018 issue discussed tips to effectively charge your iPad.

Accessories Batteries fully charged. If you fly with an external GPS or ADS-B weather receiver, like a Stratus, these devices should also start out with 100% battery life. You could charge your wireless accessories at the same time that you charge your iPad.





Backup power plan in place. While your battery should be 100%, it's always smart to have a plan B. Backup battery packs or charging cables are cheap insurance. Make sure they are available and accessible. (See the December 2018 issue).

Run the application once. This is especially important if you've updated the app. Check to make sure it won't crash or lock up on initial start-up. This is rare, but it has happened in the past. Recently, an iOS update caused ForeFlight on older iPads to crash. To control

when your iPad updates, you might consider turning off automatic app updates in the Settings app.

Load routes, plate binders and favorite airports. Using these features is a big time-saver in flight, but only if you take the time to do this on the ground. You should know your expected route before engine start, so enter that and adjust any other route settings in your navigation app so you are ready to go when you get to the airplane.



Databases installed and current. Just because you were looking at the charts at home with the benefit of an internet connection does not mean they will be saved for offline use in the cockpit. Make sure your chart coverage areas are appropriate for your route and double check by using the app without an internet connection.

ForeFlight's "Pack" feature is a good way to verify your charts are downloaded. After entering your flight plan in the route editor, "Pack" will analyze your trip and automatically select the necessary charts to download. Just tap the small suitcase icon in the lower right section of the route editor box. A small window will appear showing which charts still need to be downloaded. You simply press the Pack button in the lower right and ForeFlight will take care of the rest. This is also a great way to

verify that all your charts are downloaded before takeoff. If you want to perform one last check that your charts are downloaded, turn on Airplane Mode. This disables your internet connection and you can check to see if the charts are still there.

Turn off unneeded wireless functions. Every iPad has Bluetooth and WiFi, and some models have LTE cellular radios as well. Unless you'll need them in flight, I recommend that you turn these wireless radios off. That's because they drain the battery and can interfere with your aircraft radios. If you need WiFi, for a Stratus, for example, leave it on. If your app requires Bluetooth, leave that on.



Clean the screen and adjust the screen brightness. Having a clean screen, as simple as it sounds, can allow you to use a lower brightness setting. The screen backlight is the #1 user of battery power on the iPad. Set the brightness level to less than 100% if conditions permit. To adjust this, go to Settings, Display & Brightness. Lowering the screen to 70 – 80% can add an extra hour or more of battery life.

This process takes just a few minutes. Customize it to your own flying, but make sure you're doing some type of regular pre-flight before you depart on your next flight.



[CLICK HERE](#) for a printable iPad and Receivers Preflight Checklist

LMS

Loewen's Mooney Salvage

Lampson Airport Lakeport, CA.

There is a big inventory of serviceable airframe parts, including wings for M20C, E, F, G, J, K & R models, empennage assemblies, fuselages, rebuilt controls, rudders, elevators, ailerons, flaps, cowls, engine mounts, landing gear and small parts.

Paul Loewen is offering them online, or by phone. The website is www.LoewensMooneySalvage.com, and he can be contacted in Lakeport, California at **707 263-0462** or by cell at **707 272-8638**. Email is PaulLoewen98@gmail.com. The used inventory is also still available through LASAR Parts at 707. 263-0581



The Mooney Maintenance Puzzle



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models





Ask the Top Gun

Tom Rouch

Founder of Top Gun Aviation, Stockton, CA

Send your questions for Tom to TheMooneyFlyer@gmail.com

Question: Mr. Rouch, what constitutes a good and thorough Mooney Pre-Purchase Inspection?

Answer: I FIRST WANT TO SAY THAT IT IS MY POSITION THAT WITH ANY AIRPLANE PURCHASE, THE INSPECTION PART OF AN ANNUAL INSPECTION SHOULD BE PERFORMED. That is the only true way to certify that an aircraft is truly airworthy. To answer the question, I will try to point out Mooney specific items with emphasis on cost to repair, assuming that the airplane is airworthy.

Number 1 is fuel leaks. Anything short of a full tank reseal is a shot in the dark when it comes to fixing a leak. During the pre-sale, any sign of a fuel stain should be thoroughly investigated. The older the plane, the greater the probability of leaks. Sealant deteriorates with age, and the newer the model, the more difficult and costly to reseal. That's mainly due to increased fuel capacity, so there is more area to leak. You can easily spend \$10K on a reseal.

Number 2 is the landing gear condition. The shock discs are the most common item that need replacement. Also, linkage wear, especially on the nose steering, can run into big bucks. The most common defect that we find, is a dented nose truss.

Number 3 is the condition of the flight controls. Check all the rod ends throughout the system. A small amount of wear at each rod end can add up to sloppy flight controls. Also, look for skin damage, especially at the trailing edge of the ailerons. This can be caused by excessive bending of the trailing edge in an effort to adjust for level flight.

Number 4 is the condition of the cowling and baffling of the engine. This is critical for proper engine cooling and it's the most ignored area for repairs.

Number 5 is the engine itself. This should be a no-brainer, since almost everyone is concerned about TBO and a good compression test. This is an area where the logbook should really be reviewed because the history will tell a lot about how it has been maintained. In addition to the TBO, which is measured in hours, engines are usually to be overhauled after 12 years.

Number 6 is corrosion. There are all types of corrosion, but the major area to examine is the main wing spar. I have seen Mooneys sold to salvage because of spar corrosion. I was involved in a corroded rear spar replacement that cost over \$25,00 to repair. Fortunately, it involved a model that was still valued over \$100,000, otherwise it would have been salvaged.

That is about the major Mooney items to look for. If you have an Inspection part of an Annual done, you will have the ability to price out defects and have a checklist for deferred repairs that you can plan on to reduce future costs and

You should negotiate the selling price if you want the plane. I am sure others will have items they deem more important.

We have done hundreds of pre-sales and it has been our shop policy to only do the Inspection part of an Annual and call it a pre-sale. That is the only way I could call an airplane airworthy. We have actually done some pre-sales where the airplane was so bad, it went from us to a salvage yard. Got some good stories about some of those.

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Mooney meets Porsche for the dawn of a new mystique.

Introducing the Mooney PFM. Powered by Porsche. And driven by obsession.

It was obsession for performance that spawned Mooney's revered line of fast, efficient, and aerodynamically superior personal aircraft. It was a similar passion that created the ultimate German road car and the worldwide Porsche mystique. But it was sheer logic that brought Mooney and Porsche together in the Mooney PFM.

That's PFM as in PFM 3200, Porsche's new aircraft

engine that draws on over 75 years of aviation heritage and relies on basic design components of the legendary Porsche 911 sports car engine.

Light-weight, air-cooled, horizontally opposed, with six cylinders, the 217 hp PFM 3200 seems made for a Mooney. Engine and

airframe merge as a precision flying machine. Exceedingly responsive, uncommonly smooth and quiet—like a fine road car. The Mooney PFM also brings advanced digital instrumentation

and European styling to the cockpit. Twelve extra inches of cabin length. And turbine-like single-lever power control activated by a dual electronic ignition system.

So now the airplane often called the "Porsche of the skies" is available with a genuine Porsche engine. Which is only logical. And aviation's next generation has a ready-made mystique.

The new Mooney PFM. Airframe by Mooney. Power by Porsche. Because you know a Porsche was meant to make you fly.



Mooney

Call your Mooney dealer today. Or Mooney Aircraft Corporation: 1-800-356-6931.
And find out more about the Mooney of your choice.

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Have you
HEARD?

HYH



ASA's new iPad rotating Kneeboard

The **iPad Rotating Kneeboard** is covered with a soft, leather-like material and features a wide hook-and-loop leg strap to hold the Kneeboard in place during flight. The rotating frame holds the device securely and allows for complete 360° rotation of the iPad.

The Kneeboard can be strapped to the leg in portrait position, and the built-in easel allows for customized tilted viewing when worn in landscape mode.

All device buttons and ports are easily accessible with the cover open or closed, and a window exposes the camera lens for picture taking. A small elastic loop is provided to securely hold a pencil, pen, or stylus.

[Priced at \\$49.95](#), the Kneeboard fits 9.7" iPads.

Aspen's Evolution E5 STC'd



Aspen Avionics has received a Supplemental Type Certificate (STC) for the Evolution E5 Dual Electronic Flight Instrument (EFI).

Introduced in April 2018, the STC'd, non-TSO Evolution E5 consolidates attitude indicator plus DG/CDI into a single display with a rechargeable backup battery.

It also includes Global Positioning System Steering (GPSS), air data computer, and attitude heading reference system (ADAHRS) starting at **\$4,995**.

Expect to be shipping the E5 as soon as we receive the Parts Manufacturer Approval (PMA), which is expected very soon," said

Mark Ferrari, Aspen vice president of sales and customer support.

Features of the E5

- Backup attitude indicator not required
- Rechargeable backup battery
- IFR certified with glide slope and localizer display
- Single unit installation – consolidates traditional attitude indicator and directional gyro/course deviation indicator into a single display
- Provides a path for removal of vacuum systems
- Interfaces with most industry autopilots and provides GPSS roll steering
- Non-TSO STC approval
- 6" diagonal, 400 x 760 pixel TFT Active Matrix LCD screen
- Works with existing avionics
- Patented, form-fit design slides easily into existing panel cutouts.

AeroSearcher



SCOTTSDALE, Arizona — Just launched is a new aviation search engine called [AeroSearcher](#), that enables the easy search of three primary aviation search types: Aircraft for sale, aviation jobs, aviation parts, and products.

The new site is designed to make finding any particular aviation listing far easier than ever before.

Prior to the launch of AeroSearcher individuals looking for a plane, an aviation job, or a particular product, needed to visit five, six, maybe even 10 different websites to view the majority of available options. The aviation searcher can find what they're looking for in seconds.

Launched in November 2018, the search engine indexes more than 20,000 aircraft, more than 30,000 aviation jobs, and more than 50,000 aviation parts and products.

Don't pay a private company to renew your aircraft registration

Unless you have money to burn, consider any solicitation you receive about renewing their aircraft registration that does not come directly from the FAA with a healthy dose of suspicion.

Officials at the Experimental Aircraft Association (EAA) say they are aware of several businesses — with names, web addresses, and logos that appear reminiscent of a government agency — that notify aircraft owners of impending registration expirations and direct them to a website or mail-in form where they can renew in exchange for a hefty fee.

Adding little or no actual value to the transaction, these businesses essentially duplicate the same process that the FAA directly administers for a mere \$5.

Unless a business is known to be reputable and offers a tangible service above and beyond a simple registration renewal, such as expedited processing or automatic renewal, consider using the [FAA's online registration portal](#).





Sale and Certification of 121.5 MHz ELTs Prohibited

The Federal Communications Commission (FCC) has issued a rule prohibiting the certification, manufacture, importation and sale of Emergency Locator Transmitters (ELTs) that operate only on 121.5 MHz. This is **effective on Jan 11, 2019**. Similar rulemaking was issued in 2010, but at the request of the FAA and the Aircraft Owners and Pilots Association (AOPA), the Commission stayed the amendment prohibiting 121.5 MHz ELTs. The new rule lifts the 2010 prohibition stay, but it does allow for the continued operation of existing units.

Certification of new 121.5 MHz ELTs is prohibited effective Jan. 11, 2019. The prohibition of manufacture, importation and sales will go into effect after a six-month transition period.

This will accelerate the transition to 406 MHz ELTs

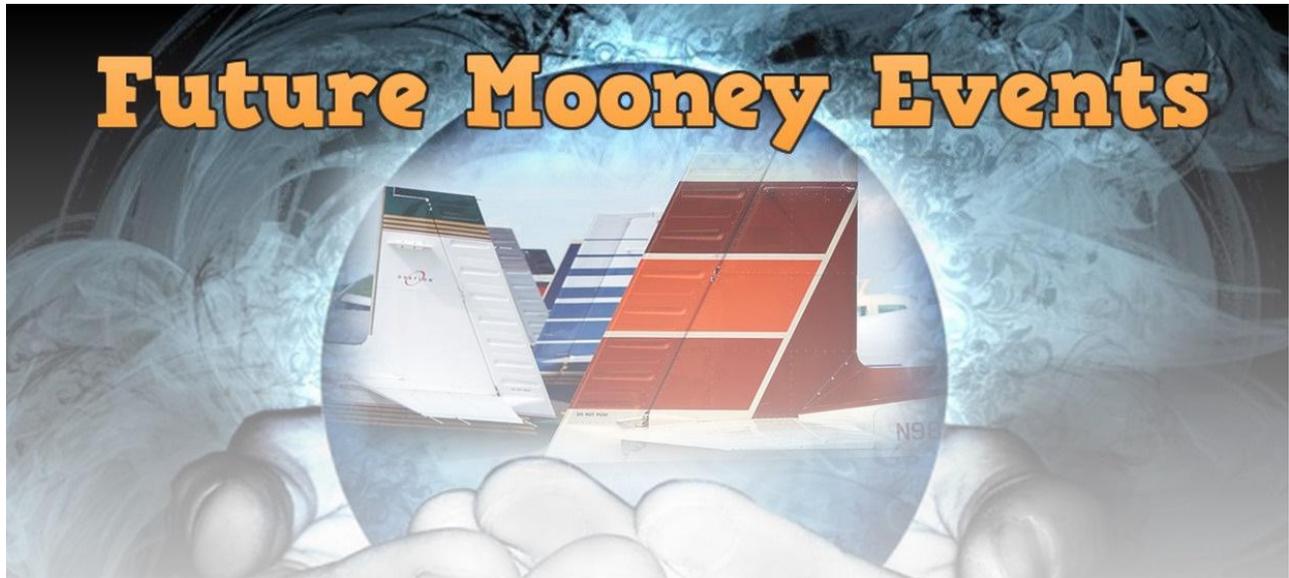
The FCC stated that the cost of 406 MHz ELTs had dropped to the point where “[it] does not appear that removing 121.5 MHz ELTs from the marketplace will impose significant costs on users in terms of a future price differential between 406 MHz ELTs and 121.5 MHz ELTs.” Also, the supply of the 406 MHz units is now sufficient to meet demand and costs have dipped below \$600 per unit.

The FCC is declining to mandate the use of 406, believing that the transition to the higher performing units will occur naturally over time or that other technologies, such as ADS-B, may overtake the need for such a mandate. The FCC also questioned whether such a mandate might get entangled in legal challenges.



If you are not night current, you may not act as PIC if you are carrying passengers. (FAR 61.57). For instance, if the sun sets at 6:15 PM, you must land by 7:15 PM.

To become night current, you must have three takeoffs and landings to a full stop in the preceding 90 days. These landings must be made during the period beginning one hour after sunset and ending one hour before sunrise.



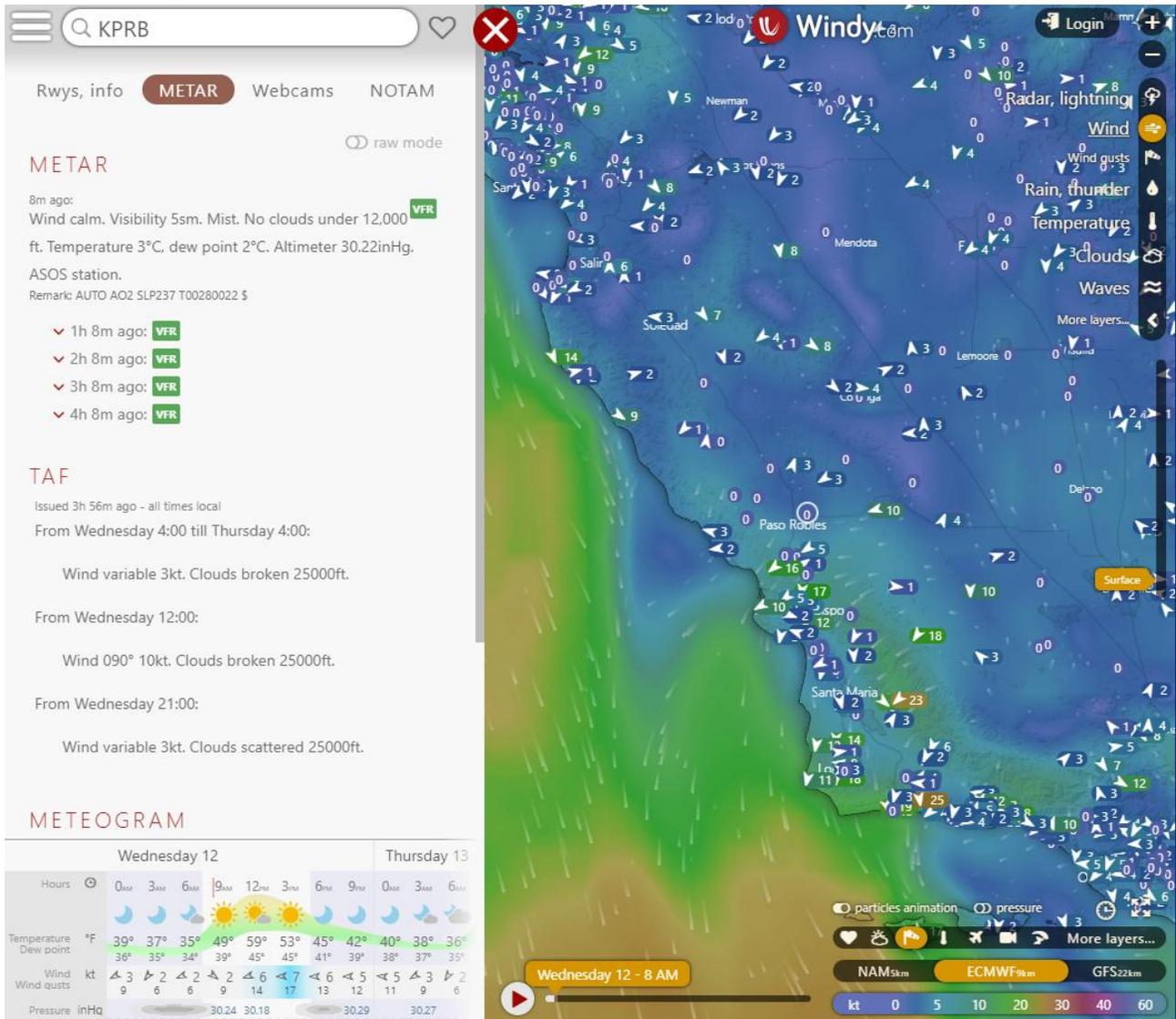
	<p>Contact Dave at daveanruth@aol.com or (352) 343-3196, before coming to the restaurant, so we can have an accurate count</p> <p>January 12, 2019: Leesburg (LEE) - EAA Chapter 534 will cook us hamburgers and hot dogs in their hanger, then after lunch we will car pool to our house to see Ruth's Garden Railroad.</p> <p>February 9: Fort Pierce (FPR) Tiki Restaurant</p> <p>March 9: Winter Haven (GIF)</p>
	<p>January 31-February 3: Yuma, AZ – Formation Clinic</p> <p>July 20, 2019: AirVenture Caravan (KMSN)</p>
	<p>April 5-7: Santa Maria, CA</p> <p>June 7-11: Oklahoma City, OK</p> <p>September 6-8: Atlantic City, NJ (Tentative)</p> <p>October 4-6: Ogden, UT</p>
 <p>Mooney Summit</p>	<p>September 27-29, 2019: Mooney Summit VII, Panama City www.mooneysummit.com</p>
<p>Australian Mooney Pilots Association</p>	<p>March 28-April 1, 2019: 2019 AGM in Ararat, Victoria, Australia</p>
<p>European Mooney Pilots & Owners Association</p>	
<p>Other Mooney Fly-Ins</p>	<p>June 7-9: Walla Walla, WA (ALW) – Wine, Parties, Hangin' Out Contact: Henry Hochberg at aroncadoc@comcast.net</p>



TME PRODUCT REVIEW

WINDY APP & WEBSITE

There are many aviation apps and websites available for Mooney pilots. This month, we will cover the Windy App (also www.Windy.com). First of all, the Windy app does far more than just show you the winds.



METAR
8m ago: Wind calm. Visibility 5sm. Mist. No clouds under 12,000 ft. Temperature 3°C, dew point 2°C. Altimeter 30.22inHg. ASOS station. Remark: AUTO AO2 SLP237 T00280022 5

- 1h 8m ago: VFR
- 2h 8m ago: VFR
- 3h 8m ago: VFR
- 4h 8m ago: VFR

TAF
Issued 3h 56m ago - all times local
From Wednesday 4:00 till Thursday 4:00:
Wind variable 3kt. Clouds broken 25000ft.
From Wednesday 12:00:
Wind 090° 10kt. Clouds broken 25000ft.
From Wednesday 21:00:
Wind variable 3kt. Clouds scattered 25000ft.

METEGRAM

	Wednesday 12						Thursday 13					
Hours	0am	3am	6am	9am	12pm	3pm	6pm	9pm	0am	3am	6am	
Temperature °F	39°	37°	35°	49°	59°	53°	45°	42°	40°	38°	36°	
Dew point °F	36°	35°	34°	39°	45°	45°	41°	39°	38°	37°	35°	
Wind kt	3	2	2	2	6	7	6	5	5	3	2	
Wind gusts	9	6	6	9	14	17	13	12	11	9	6	
Pressure inHg	30.24 30.18						30.29 30.27					

Let's start with the Winds. You can look at the winds at any altitude and also slide the bar to see how they change over time. The visual is compelling and helpful when trying to decide on a cruise altitude.

Another feature is the METAR. It's available over the past few hours so that, once again, you can see the trends, which I think are as important as the current static METAR.

I find that the METEGRAM is most useful for clouds. It shows not only Cloud Bases, but also the tops, and does so over time. The App and Website are **free**. Give it a try.



Parts for Sale

I have several Mooney parts for sale from a 1969 G model. Brand new voltage regulator (never used). Instrument light rheostat controller, cowling plugs and like new fuselage/cockpit and tail feather covers. G model POH. Contact me at Wilson Brown, located in Georgia, 678-469-6182

Wanted

Time on your Mooney. Hangar available. I only need 20-30 hours yearly. I have an empty hangar in Cartersville, GA for your Mooney or Cirrus @KVPC. 3500 hours, 3000 Mooney INST CML no accidents. Please email to: mooney201@gmail.com



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