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Air Show Schedule!

THE WIPAIRE WINDOW

THE WINDOW Vol. 01 Num. 03 SPRING / SUMMER 2008



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Why Are These 11 Caravans Lined Up?

Wipaire has become the Caravan capital of the world. Nothing displays this statement more than the impressive display of over 15 Cessna 208 aircraft parked throughout eight expansive hangars. Our 180 employees are dedicated to maintenance, refinishing, upholstery, avionics, floats, skis, and numerous aircraft modifications for this impressive aircraft.

Wipaire supports both commercial and private owners with the highest level of products and services. Caravan products include our famous 8000 seaplane/amphibian float, PT6-114A engine upgrade to 675 horsepower, 8360 lb. gross weight increase compatible with seaplane/amphibian Wipline floats, single point fuel system, and custom aircraft interior. As an Authorized Cessna Service Center our expert maintenance crew perform flawless annuals, landing gear inspections and repair, borescope inspections, full PT6 service, factory installation options and de-ice shield boots, and much more.

Multiple custom avionic suites are available for sale and service including: Garmin 400 and 500 series GPS Wide Area Augmentation System (WAAS) upgrades, custom cabin entertainment systems, and the ability to perform IFR certifications and service for existing avionics. Nothing impacts a first impression like a custom Wipaire paint job. Paint schemes can be developed to match your flare and airbrush services provide a touch of class on any aircraft.

The hidden value at Wipaire is found within our ability to reduce ground time by as much as 70% and even more under special circumstances. This saves valuable time and allows commercial operators the opportunity to generate more revenue. Private Caravan operators realize the benefits of personal travel and recreational use.

Randy Juen, President

Visit our website to view our newly released Wipaire Video!



ARE YOU BALANCED?



By **JASON ERICKSON**



Jason Erickson Director of Maintenance-WipCaire

One item often that comes to light during pre-buy and annual inspections is flight control balance. Most aircraft require that the flight controls are balanced within an inch pound spec. If you are buying an aircraft and it has had recent paint or flight control work, be sure it has had the flight control balance checked and an entry stating that it has been performed. If it has not been recorded or the balance results are not made available, you will need to have them checked. Fresh paint on control surface hardware is a tell tale sign that there may be a problem.

Unbalanced flight controls can cause flutter. Results of flight control flutter can be devastating; the percentages of surviving are pretty slim. Google “control surface balance”, there are some great resources on the web. It is very important to make sure that changes to flight controls are balanced and your control system is correct. Flutter can be caused by a mis-rigged control system, a bad rod end, loose cables, or other worn components. Maintenance manuals and structural repair manuals all contain allowable balance specifications for required flight controls. Some surfaces range from a few inch pounds to over 30 inch pounds of variation. In other words, some controls can be from a negative two to zero inch pounds, while others are zero to plus 30 inch pounds. The procedure for balance can be a balance bar and one pound weight or simply hanging weight at a specified location in a specified amount. Each aircraft manufacturer has its own procedure and needs to be followed. A balance bench with knife edges is a must for this operation to not only ensure a quality balance, but to keep from damaging the surfaces. Balancing a control surface worth over \$40K is always interesting.

At your next inspection, pre-buy inspection, or paint job, make sure that the flight controls are recorded as being checked for balance. This will ensure that the likelihood of control surface flutter is greatly reduced.



Introducing One Of Our Float Experts -Your Connection to Float Flying

Dan Gutz

Exciting things are happening at Wipaire! We are proud to introduce float salesman Dan Gutz as an aircraft float expert. Customer loyalty and our commitment to excellence have resulted in unprecedented growth in our business. Dan’s highest priority is to maintain our exceptional standard of service during this industry-leading expansion.

With almost 20 years of service at Wipaire, Dan is eager to share his extensive knowledge about Wipline floats and provide answers on all of Wipaire’s products and services.

Brush Up Your Summer Seaplane Skills

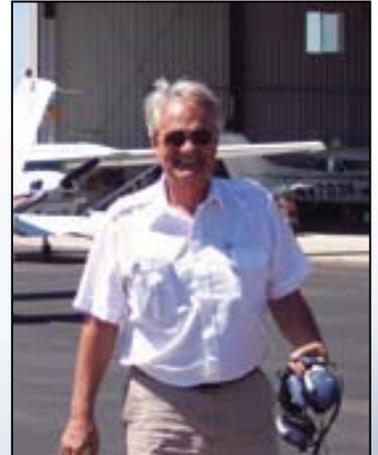
By BRIAN ADDIS

It's spring flying season! Well, okay, spring didn't arrive this year. So, it's summer flying season! It's time to think about those things that will keep us safe and happy seaplane users through the season. First on the list: Water temperature. The last reading on my lake registered 49 degrees Fahrenheit. I do not want to go "seaplane dumping" in those water temperatures. Brush off those procedure skills. Remember, the best defense against a "gear down water landing" is a triple check before touchdown; the last check representing your last chance for that landing. Also, check out your floatation devices and survival gear. A good preflight of this equipment should be on your list for the season.

Wind is second on the list. Too much wind, no wind and everything in between deserves respect. Practice a couple glassy water landings with wind so your skills are sharp. Touchdown

attitude, descent rate, enough water in front of the airplane and enough room to get out of there—if things don't work out—are the key factors.

High wind results in mechanical turbulence. The airport planning engineer spends lots of time and money to insure trees and other obstacles are set back far enough at an airport to minimize mechanical turbulence. Seaplane pilots don't take planning engineers with them. The seaplane pilot's only defense against the effect of mechanical turbulence is situational awareness. Look at the site. Make some predictions based on the wind velocity; be aware and be prepared to react. Several months of great seaplane flying are in your future. Be safe and enjoy the season.



Brian Addis *Chief Flight Instructor - Lake & Air Pilot Shop*





Satellite Processing of 121.5/243 MHz Emergency Beacons To Be Terminated On February 1, 2009

by Rick Walkman, Avionics Manager

The International Cospas-Sarsat Program, a program that uses a satellite constellation to relay distress alerts to search and rescue authorities, announced at its 25th Council Session that it plans to terminate satellite processing of distress signals from 121.5/243 MHz emergency beacons on Feb. 1, 2009. Mariners, aviators, and individuals using emergency beacons will need to switch to those operating at 406 MHz if they want to be detected by satellites.

All TSO-C126 ELTs transmit on 121.5 and 406 MHz and most transmit on all 3 emergency frequencies (121.5/243.0 and 406 MHz). The ELT automatically activates during a crash and transmits the standard swept tone on 121.5 and 243.0 MHz. The ELT also transmits a 406.025 MHz encoded digital message to the Cospas/Sarsat satellite system, which allows for rapid identification and reduces Search and Rescue response time. Some of these ELTs may also be interfaced with an on-board GPS which enables latitude and longitude data to be transmitted as part of the 406.025 MHz message.

With an activated 121.5/243 MHz ELT, the typical search area may be a 15-20 kilometers radius. A 406 MHz ELT tightens that radius to 1-2 kilometers. When coupled to the aircraft navigation system (GPS, etc.) the position accuracy improves to approximately 100 meters.

The implication of this Cospas-Sarsat decision is that users of beacons that send distress alerts on 121.5 /243 MHz should eventually begin using beacons operating on 406 MHz if the alerts are to be detected and relayed via satellites. Meanwhile, anyone planning to buy a new distress beacon may wish to take the Cospas-Sarsat decision into account.

Maintain *Your* Shine!



Dave Utsch Paint and Interior Manager -WipCaire

Keeping your aircraft looking good year after year can be easily attained by following some recommended tips.

Using powerful degreasers is an easy way to remove oil and exhaust tracks on the belly of aircraft. Powerful degreasing chemicals not only strip off the oil, they also take any wax or protectant that was shielding your paint from all of the elements. Just make sure you apply a new coat of protectant to the affected area.

Windows get more punishment than deserved. When you are cleaning your aircraft, make sure the windows are free from any dirt that may be on the surface. When wiping the windows use a clean cloth. Even a little dirt can scratch them to the point the windows become hazy and sun-glare will be very bothersome.

Basically, periodic cleaning and waxing is always a good idea to protect your investment. If your aircraft no longer beads water when you wash it and it is getting dull, it is more than likely due for polishing and a coat of wax. In some cases the finish on an aircraft is actually due for a complete refinish if waxing no longer does the job. Either way, bring your airplane to the professionals at WipCaire and we will be more than willing to look at your aircraft and get you an honest opinion to help make it look new again.

Be sure to ask about our other great services while you are at Wipaire. This will help you get all our aircraft needs completed in one stop. WipCaire will get you on your way and looking great!

SPARE PARTS, SAVE CASH!

As float season comes into full swing for many of our customers, we are reminded daily of what good preventive maintenance can do, and why it can be so important to stock just a few spare parts on a shelf.

Items like gear advisory bulbs, water rudder pulleys, wheel bearings, and tires on a shelf in the hangar can mean the difference between an enjoyable flight in your plane and having to wait for a parts order to arrive. By keeping just a few parts on the shelf, you can also save money on shipping as there are fewer parts that have to be rushed to you.

Each aircraft is different, and each owner or operator has different needs, but everyone can benefit from maintaining a relatively inexpensive spare parts inventory, and doing some basic routine preventive maintenance to ensure their aircraft is fit to fly when they want to use it. We're more than happy to talk about our recommendations for spare parts for your aircraft and floats, and with Wipaire's 24/7 Customer Service, we're always here to help answer your questions so you can get back in the air.

Rachel Norman

*Customer Service Manager
-WipCaire*

Get Your Floats Ready for the Season

Preventing flying issues ensures happy flying moments and is key to a great time on the waterways. At the beginning of the float flying season, airplane owners need to run a check on their airplane to ensure all is well with their floatplane.

Top things to check every float season:

- Check the overall appearance of float hulls and rigging. Inspect for any obvious damage or signs of corrosion to any components or attachment points and fittings.
- Check that all pump out plugs are installed.
- Inspect pump out cups and tubes. Make sure they are attached and are free from debris. Pump out any liquid in your float compartments. When storing floats for long periods of time, leaving inspection covers and baggage compartments open or removing them completely will allow the compartments to dry. If floats are to be stored outdoors, this may not be possible, however the compartment should be as dry as possible prior to storage and in the spring they should be opened for inspection as well.
- Check float covers for fit and seal. Make sure gaskets or caulking still provide a watertight seal and all of the screws are installed.

Additional items to inspect on amphibious floats:

- Check tires for wear, tire pressure, and overall condition.
- Check wheel bearings and make sure they are still functional. The beginning of the season is the perfect time to repack them, if necessary.
- Inspect the brake system. Check that the discs and pads are within tolerances and the brakes operate evenly and correctly.
- Inspect your hydraulic system. Check for leaks at connections or around the pump and reservoir, and check the fluid level in the sight glass.
- Check that all of the bulbs on your gear advisory system are working and the indication system is working correctly.

These items are not meant to replace a thorough annual performed by licensed maintenance personnel on your floats. The owner or operator is many times the first step in finding an issue, and an inspection of these items both allows the pilot to be familiar with their equipment, and can be the first step in determining whether there is a problem before something breaks.



For more detailed service information, including recurring inspection and maintenance recommendations, refer to our service manuals found at www.wipaire.com

As always, if a question or issue arises, Wipaire Customer Service is available 24/7 @ 651.451.1205

Visit us at Oshkosh for our Garmin Giveaway Drawing!

One More Chance!

We are giving away yet another Garmin to someone at Oshkosh. Be sure to visit our display at Oshkosh (Booth 55-57) to register for your chance to win a Garmin 496!

Wipaire gave away a Garmin 496 GPS this year at Sun N' Fun. Susan Greenberg from University Park Florida walked away as the lucky winner of the GPS. Susan's husband Jerry, being a pilot is ecstatic about her winnings!

Reggie Joy was the drawing winner for the Alaska State Aviation Tradeshow in May! Congratulations Reggie!



Come Visit Our Display At These Shows!

Week	Show	Location
June 21	New England Safety Expo	Naples, ME
July 9 - 13	Arlington Fly In	Arlington, WA
July 14 - 20	Farnborough Air Show	London, England
July 28 - August 3	Oshkosh	Oshkosh, WI
August 17 - 19	ALA, Miami	Miami, FL
September 4 - 7	Greenville	Greenville, ME
September 10-14	Reno Air Races	Reno, NV
September 19 - 21	Clear Lake Splash In	California
September 12 - 14	Eagle River Fly In	Eagle River, WI



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*This is a Special Newsletter
created for Everyone In the
Aviation industry!*

www.wipaire.com

Photo CONTEST | ENTER! TODAY!



by *CHRIS PATRY*

Email submissions to: npone@wipaire.com

Mail photos to: Wipaire, Inc.
Attn: Nancy
1700 Henry Ave.
South St. Paul, MN 55075

Thank you to all who submitted entries for the winter photo contest. It was a VERY difficult decision this time as we received so many shots of great aircraft in some great locations! Congratulations to *Chris Patry* for submitting this gorgeous photo of his 1977 Hawk XP on Wipline 2350 amphib. It was taken at his camp on Long Lake in Maine. A \$100 Lake & Air gift certificate is on its way to his mailbox!

For this quarter's contest, we really want to see your plane captured with the most fun or breathtaking places your plane has taken you. If there is a story behind your photo, we'd love to hear that too. Remember that photos with a 300dpi or higher resolution are best. Prize: \$100 Lake & Air Gift Certificate (quarterly) Include your name, address and phone number with submissions.

For the interactive online version, please visit www.wipaire.com/newsletter