

Master Thy Env



Environment

EDITOR'S CHOICE

By Matt Johnson

The helicopter pilot works in an amazing, ever-changing environment. The skills necessary to accomplish the task at hand for most commercial, or even private helicopter flight operations require a high level of concentration, ability and finesse just to name a few. (social skills excluded)

Regardless of the task at hand, one component that does not belong is complacency. It has no place in aviation and it surely has no place in the helicopter flight arena, where it is even more unforgiving than it is for our fixed-wing brethren. Regardless of the flight profile involved, whether it is flying circles around some of God's greatest work, air medical operations or instructing the next generation of helicopter pilots; how well you utilize your skills can easily be determined by how aware you are with all components of your flying duties. In other words, you must be fully involved and a master of your environment. Often, how well one masters their environment dictates the difference between successful and unsuccessful outcomes.



WHAT IS YOUR ENVIRONMENT?

You can't master what you don't know. Simply stated, you can't master your environment if you don't know the components of what constitutes your environment. For simplistic purposes, environment can be defined as 'the setting or conditions in which a particular activity is carried on'. The activity is easily defined as "flying", however, it is the "setting" or "conditions" that can make or break you; literally. It would be impossible to list all of the components that define your particular flying environment but several are common to most, if not all, flight operations. These mainstays include: aircraft, airspace, weather and regulations.

AIRCRAFT

The use of rental-cars is common for most frequent travelers. You rent the car, key in the ignition, start and drive, adjust the mirrors on the go and there you have it, easy as 1-2-3. Not so with aircraft. Using this mentality in an aircraft and making adjustments on "the fly" can get you lost, stranded, violated or killed. To be a master of YOUR environment you must master YOUR aircraft. If you really want to get to know your aircraft, its systems and emergency procedures, make a plan to review the Rotorcraft Flight Manual on a regular basis. Pick a chapter in the RFM each month of the year and review it religiously. If you are on a 7-on / 7-off schedule, study one section of the RFM upon returning for your hitch. Know the RFM inside and out.

AIRSPACE

I often wondered why Designated Pilot Examiners and 135 Check Airmen were so "stringent" about airspace during checkrides. Then, after a few years of operational flying and getting the life scared out of me by people that didn't know airspace from any bodily orifice, I realized why this was a pet-peeve of many examiners. In my humble opinion, not knowing



airspace, inside and out is like driving in a foreign country with road signs in a language you can't begin to speak let alone comprehend.

If it has been a while since you actually "used" a sectional chart to navigate the various classes of airspace here is a good way to humble yourself; on one of your next flights turn the GPS to OFF! Don't rely on a box to tell you when you are entering airspace. Use good old fashioned pilotage and deck-reckoning to find your way. Ask yourself where you are on the chart, where you came from and where you are going. What airspace are you travelling through? What are the weather minimums? What equipment is required? Transponder? Who do you need to talk to? On what frequency? You get the idea! If you are going to master your environment you must know everything about the airspace you are transiting in and out of. Obviously this idea of turning the GPS to OFF is just to make a point and remind you that you need to know airspace and other information listed on sectional charts. As a matter of practice, I have a rule about avionics and eyeballs that are in any aircraft I am piloting. No avionics OR eyeballs ride for free! If you got'em use them! As an example, if you have two GPS systems use BOTH of them. Use one for your destination and the other for a nearby airport close to your departure area

that has an instrument approach in the event you inadvertently "punch-in" the clouds shortly after take-off.

WEATHER

If you think all you need to know about weather came from those ridiculous questions on the FAA knowledge exams -**YOU ARE WRONG!** Most, if not all operational areas experience some sort of regional microclimate weather issues. Get to know the weather patterns in your area; know what and when to expect them. If you are flying in an area unfamiliar to you, reach out to other helicopter pilots and pick their brain on local weather patterns. The weather is a huge component of the environment that you must master. The accident statistics are full of stories about helicopter pilots that didn't have a working knowledge of local weather patterns.

REGULATIONS

If you haven't noticed, federal regulations change more frequently than many can keep up with. In this day and age of technology being what it is; the current regulations can easily be placed in electronic format on all of the neat gadgets available today. A huge component to mastering your environment is knowing all of the regulations that apply to your particular operations and know them well. If you don't understand a particular regulation, seek clarification! "Wiggle-room" usually has no place when "the man" is ready to take enforcement action against you. A quick survey of NASA reports shows several "high-time" "should-know-better" pilots making mistakes involving regulations. Like the Rotorcraft Flight Manual, the federal regulations pertaining to your certificate privileges and operating activities need a periodic review.

HOW TO STAY SHARP? WHATEVER YOU DO, DON'T LOSE THAT AWE FACTOR.

Not long ago I read a story about a

physician. This fellow was in his late 80's, and he still went to the office every day. His friends and family tried to get him to retire, but he simply refused to do it. He had invented a procedure that he had performed more than 10,000 times. He was asked in an interview if he ever got tired of doing it, if it ever got old. He said, "No. The reason why is because I act like every operation is my very first one." Basically he was saying 'I don't let it become so common or routine that I lose the awe'. If you find yourself losing that "awe" of spooling up and pulling pitch, it may be time for a break. Taking pride in what you do and doing it with excellence can foster an attitude that enables you to master your environment.

If you want to sharpen your skills, go humble thyself! One of the best ways to get a touch of reality is to go be a student again! This pains me to say (just kidding, slightly), but partner up with a good CFI and go fly an airplane if you don't have an airplane rating. If you do have that ASEL rating then go pursue that sea-plane rating you always wanted. Do something



to put you back in the student's seat! If you haven't done something to this effect you will be amazed at how humble one can be and just how much you truly appreciate your abilities to pilot a helicopter. Better yet, renew that CFI rating and get back in the instructors seat. Often, pilots don't realize what they know and DON'T know until they try to teach someone else. I have news for you; if that hair is starting or already turned gray and you have a pas-

sion for teaching, our industry needs you!

Whatever works for you in keeping you sharp and a master of your environment, do it with pride and excellence. ♦

ABOUT MATT JOHNSON

Matt is a full time air-medical pilot and continues to fly law enforcement and flight instruct in his spare time. He is a Master Instructor, CFI-I and Designated Pilot Examiner.

FAST, RELIABLE, LIFE RAFT DEPLOYMENT SYSTEMS



Photo credit: Sergio Mendes



ASI-500 S-76 ASI-800 Bell 412

- Increase operation safety
- Install on one or both sides on S-76.
- Internal and external deployment
- Approved across the globe.



Established in 1985, Aero Seats and Systems is dedicated to innovation in safety. Being cost effective is just a plus.



340 Thomas Place - Everman, TX 76140 - (817) 551 0818 - www.aeroseatsandsystems.com - rcrouch@aeroseatsandsystems.com