

### **June 2023 News Letter**

**AUTHOR: Patrick Murphy** 

### The June 10 Members meeting begins at 8:00 a.m. (Summer Hours)

### **New Members**

The club welcomes new members Aaron Tindall, Daniel Manning and Jacob Arroyo. At the time of this writing, we have 109 members.

### **New Planes**



Steve DeBord flew his new E-flite Eratix on May 27. He loved the way it flew. First flight was in the hands of Eric Charley, who wrung it out on high rates. Later, Steve flew it in a more sedate manner.

Victor Fuentes's new Huey is huge and gorgeous.





Left, Randy Wegner has a new scale RV-8. It is really slick-looking, even without the wings attached. Randy is thrilled at the way it flew out of the box. Presumably, the wings were installed for flight.

Below, the Editor's long-awaited Fokker DR-1 triplane has finally made its first public appearance. It took over a year to build, working off and on.



This was built from a Dancing Wings kit. The build was listed as "difficult," and it did not disappoint in that regard. The instructions were almost non-existent. The wings alone include eight different lifting surfaces, none of which wanted to work in concert with the others.



The plane has not actually flown, yet. I have brought it to the field about four times. Each time, the local experts have pointed out manufacturing defects that make it unflightworthy.

This will be the first plane I have built that I will not maiden myself. There is too much at stake to rely on my own mediocre flying skills. Also, I have not flown in months, myself.

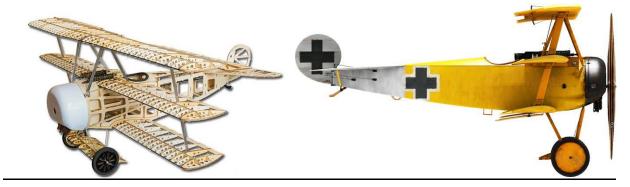
I am hurrying to build some simpler planes to regain my proficiency before I fly it myself.

The yellow covering is actually period-correct. The Red Baron's brother, Lothar, flew a yellow DR-1. This plane is modeled loosely after Lieutenant Bobenheimer's plane, which was almost entirely bright yellow. I wanted to deviate from the blood red that is typical of DR-1 models.

Of course, this is not a strictly scale model, like Keith Koppos builds and flies. For one thing, it has a tailwheel, instead of a skid, as a concession to our hard field surface.



The model is electric powered, because I didn't want to get such a pretty show pony all dirty with glow fuel.



Left, Dancing Wings photo of uncovered model. Right, the DR-1 of the legendary Oswald Boelcke of Jasta 2.

There are no surviving Fokker triplanes, but replicas have been built. The aircraft was as dangerous to its pilots as it was to the enemy. Flying it will be an adventure. The plane embodies a challenging array of undesirable flying qualities.





Above, left, a full-scale DR-1 replica making a fairly typical landing. Above, right, full stop.

### **Scale Detail**

Right, Victor's Huey is decorated in Rambo II style. However, Victor has made the controversial choice to put a Chippendale's dancer in the pilot's seat. To each his own....





Left, Randy's RV-8 does not have a pilot installed, yet, but the control panel looks cool.

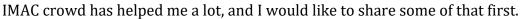
### **Tendons 'n Stuff**

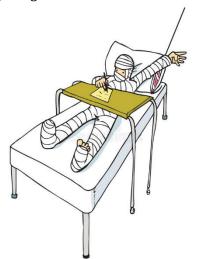
Contributed by Special Correspondent Randy Wegner

So, I am a bit crippled right now. due to a rotator cuff reattachment, and a secondary surgery to drill a hole in my bone half way up from my elbow, and cutting short another tendon and stuffing it through that hole. I don't even know why that is supposed to relieve pain but...whatever!

I'm typing one-handed and trying my best to do it well. Capitals are hard. I know we looked a little bit at mixes, but I got ahead of myself in doing so. BTW, I'm really doped up right now, so take that into account, here, please.

I wanted to step back a little and cover some things that may be helpful before setting up mixes. First is setting up your airplane in the shop, and then doing initial first flights to set up general flight characteristics. Flying with the





Factory cg recommendations are usually only a safe starting point. When you do first flights, that is when you will find the real cg setting for your plane. The same is true of engine/motor thrust angle settings. I usually look on line to see if anyone has found sweeter angles. Setting up servo arms and linkages is critical. Make sure ball links are not sticking so that the flight surfaces always return to center perfectly. Also, unless you are doing freestyle, attach your ball links so that the servo arm link connection is further toward the inside, and the control horn link is further out, BUT ONLY TO A POINT WHERE YOU STILL HAVE RECOMMENDED THROWS. Setting up your plane this way will give it stronger holding at the servos in flight, and much better resolution. It results in smoother flight.

Unless I have missed anything, now would be the time to do initial flight-tests. But before advancing the throttle, you should consider reading a very good article online, on airplane flight trimming called, *Peter Goldsmith Trimming Procedure*. It is a very logical step-by-step process on how to set up your plane to fly it's best, and make you look even better than you are now. Look that up, read it, and do as it says. If you do, then a couple things can happen:

- 1. your plane can be trimmed to fly better, and
- 2. I won't have to type it out here.

Typing single-handed is really tough for me, right now. 'specially CAPITALS!!

### --Randy

Post-Script: *Ed.*—*Randy was pleasantly surprised to find that he could fly quite well with his arm in a sling.* 

Ed.—On the next page, I have attached a checklist for Peter Goldsmith's trimming procedure. There is also about six pages of text. It can be found many places on the web, including:

https://kapitiaeromodellersclub.files.wordpress.com/2015/09/trimming-guidepeter-goldsmith-edit-michael-williams.docx

### International Minature Aerobatics Club

## Aerobatic Trim Chart

# (based on "Trimming" by Peter Goldsmith)

Trimming Step	Maneuver to Perform	What to Look For	How to Fix It
1 Center of Gravity	Crosswind, 45° up-line, roll inverted	Nose rises towards the sky     Nose gently falls	Add nose weight, C.G. is aft You're in the zone
Notes		Nose falls too quickly	Add tail weight, C.G. is forward
2 Lateral Balance	Vertical down-line and pull to level flight	☐ Wings are not level	Add weight to the high wing tip
3 Right Thrust Angle	Upwind, vertical up-line	☐ Model drifting to the left	Add right thrust
4 Up Thrust Angle	Crosswind, horizontal line, slow from a high speed	Model pitches upward     Model remains level and decends     Model pitches downward	Add upthrust, remove up elevator trim You're in the zone Add downthrust, remove down elevator trim
5 Alleron Differential	Upwind, 45° up-line, apply full Right aileron Upwind, 45° up-line, apply full Left aileron	<ul> <li>─ "Walking" to the Right</li> <li>─ "Walking" to the Left</li> <li>─ "Walking" to the Left</li> <li>─ "Walking" to the Right</li> </ul>	Decrease downward travel on left aileron Decrease upward travel on right aileron Decrease downward travel on right aileron Decrease upward travel on left aileron
6 Throttle → Aileron	Upwind, vertical down-line Horizontal line, slow from a high speed	- Rolls to the Right	Use left aileron at low throttle (2% to 5%)
7 Throttle → Rudder	Upwind, vertical down-line	☐ Yaws to the right	Correct with mix at 1/2 throttle or less
8 Rudder → Aileron	Flat Rudder Turn to the Left Flat Rudder Turn to the Right	<ul> <li>□ Rolls Left (proverse roll)</li> <li>□ Rolls Right (adverse roll)</li> <li>□ Rolls Right (proverse roll)</li> <li>□ Rolls Left (adverse roll)</li> </ul>	-Correct with a linear mix (2% to 5%)
9 Rudder → Elevator	Flat Rudder Turn	☐ Pitches Up ☐ Pitches Down	Correct with a curve mix (2% to 10%)
10 Downline Mix	Crosswind, vertical down-line	☐ Model pitches up	Add 2% down elevator at 0 throttle

### Please attend the June 10 Club Meeting 0800 Hours (Summer Hours)