August

The EFO Officers 2004

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<th>Vice-President:</th>
<th>Secretary/Treasurer:</th>
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<tbody>
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<td>Richard Utkan</td>
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<td>Commerce Twp., MI  48382</td>
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<tr>
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Ampeer subscriptions are $10 a year US & Canada and $17 a year worldwide.

The Next Meeting:

Date: Saturday, August 7  Time: 10:00 a.m.
Place: Midwest R/C Society 5 Mi. Rd. Field

What’s In This Issue:
Upcoming NY meet – Push-E-Cat kit 4 Sale – Upcoming SHARKS E-vent - Specifications for GP Gee Bee - NEAT Fair Reminder – Prop Stoppers Reminder - From the Cape - EasyStar Follow-up - Spitfire Drawings - Sig Rascal 40 ARF – Li-Po? – Mid-Am Report – Upcoming Events

The Electric Powered Aeromodelers Present the All Electric Fun-Fly, Saturday, August 7, 2004

Join the Fun … of quiet, clean flight -- or just watch as the newest in R/C aircraft and favorite standards take to the sky.

What: Fly your electrics from slow flyers to gliders & EDF’s Any Size or Scale

When: Sat, Aug 7, 2004 – 8:30 - 4 pm
Where: Maalwyck Park, Off Rt 5, Glenville, NY
Why: JUST PLANE FUN!

Contact us:
Daytime: John Maggs (518) 237-9452
Evenings: John Hackert (518) 355-4450
E-mail: epaclub@localnet.com
SPECTATORS WELCOME!
Free Parking Free Admission
PILOTS:
Current AMA Membership required
Electrics only - Grass Landing strip

Pilot Registration Information:
Go to website:
members.localnet.com/~jhackert
Or call Dan Whiteman, CD: (518) 377 4081

Directions:
From Village of Scotia, Rt. 5
Proceed West on Rt. 5 – look for signs to Maalwyck Park & Soccer field opposite the Industrial Park.

Plane Kit For Sale
Push-E-Cat, New-in-Box - $70.00
Matthew Gladd, (313)-565-7938 or gustaviseng@aol.com
This is a great trainer and fun sport plane. Easy to assemble. Almost indestructible. Lots of fun.

Upcoming SHARKS E-vent
From Graham McCallister
gm@mcallisterdesigns.com

Hello Ken,
I would like you to add our Electric Fun Fly to your calendar please...
details are:
Date: 8/14/2004
Time: From 9 a.m. to 4 p.m.

The SHARKS present our first All Electric fun fly. The emphasis will be on giving pilots as much airtime as possible. There will be no competitions. We are the Sheboygan Area Radio Kontrol Society and our club field is close to Sheboygan Falls, Wisconsin.

We have two 500 x 35 foot blacktop runways with parallel grass areas if you prefer.

Food and refreshments will be available. AMA membership is required and must be presented to fly.

Pilots fee $5, spectators free. For further information and map please contact Graham McAllister at flyin@mcallisterdesigns.com or call (920) 208 6863

Specifications for Chris Balser’s GP Gee Bee
From Chris Balser cambriatool@dmci.net

<table>
<thead>
<tr>
<th>Component</th>
<th>Specification</th>
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<tbody>
<tr>
<td>Motor</td>
<td>Hacker C 50-14XL 6.7:1</td>
</tr>
<tr>
<td>Speed Controller</td>
<td>Hacker Master 77-3p opto</td>
</tr>
<tr>
<td>Batteries</td>
<td>Thunder Power 3p9s</td>
</tr>
<tr>
<td>Propeller</td>
<td>APC 20x13E</td>
</tr>
<tr>
<td>Amps</td>
<td>48</td>
</tr>
<tr>
<td>Flying weight</td>
<td>12.5 lbs.</td>
</tr>
<tr>
<td>Wing area</td>
<td>743 sq. in.</td>
</tr>
<tr>
<td>Wing loading</td>
<td>39 oz. / sq. ft.</td>
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Hello Ken,

Sure was a nice day, Saturday, at Dave Grife’s meet for Keith Shaw! It is always fun to see that group of guys having fun.

I said I would "E"mail you the specifications for my Gee Bee that Keith flew that day!

Rich sent along the following info on his 80% Dreamboat. The young man in the photo is his grandson, Branden Flichbaugh of Willard, MO. KM

This Ken Willard design was reduced to 80% of the original. He has had many excellent flights with this model. It has a 42” wing span, weighs 45 ounces and is powered by a Mega 16/15/5 using a 7x4 prop and an 8-cell 1200mAh Sanyo pack. It is fast and takes off in about 30 feet. It will take off of wet grass. Flight times are in the 8 to 10 minute range. It flies great, but is faster than he expected.

In his letter he also asked about the EasyStar. KM

“I take issue with Mike Forrester’s comments on your handling of the EasyStar. Your report in the Ampeer seemed appropriate and professional. Since I currently have one on order, do you have any additional thoughts that you believe would be
helpful? I plan to substitute a new small Mega brushless in place of the 400. Is that a sound idea? Would you recommend using the new Lithium cells instead of NiMH? I am aware of the dangers!"

Personally, I’d use the supplied 400. I’ve found the 6-cell packs of Sanyo 1100AAU cells to provide close to 20 minutes of flying time and they balance the model properly. Using Li-Po cells will either require several packs in parallel or the addition of ballast to balance the model. If you decide to go brushless and Li-Po, I’d love a report. KM

On July 19, Rich sent this follow-up info.
Just yesterday I was able to get the new EasyStar in the air for the first flights. Got three in. The longest was 14 minutes with some energy left. Had to increase the rudder throw two holes, in. Other than that it was in good trim.

I did use a MEGA, only because I had it - brand new! It is a 16/15/6. It weighed exactly the same as the Speed 400. I also used the Castles Creations Phoenix -25 that I had. Used a pack of 8 – 1050 Sanyo cells. With this combination and a 6 x 5 prop, it's A GOING MACHINE! Really moves out. Am going to try it again on Wednesday, if the weather cooperates.

EasyStar Follow-up
From Dave Roberts Drv49@aol.com

Hi Ken,
A while back, after reading your review of the Multiplex EasyStar, I "took the plunge" and ordered one from Tower, complete with radio, for use as a trainer.
It's proved to be all you indicated--durable, forgiving, and fun. Still experimenting with various battery flight pack combinations, and enjoying the learning process.
Checking the Multiplex website, I noticed their transmitters and was wondering what you thought of the Pico-line series. (I downloaded the user's manual and liked the very basic instructional approach, though I still have many questions. Also, the "expandability" features caught my attention.)

I've found in this hobby if you ask 5 people for an opinion, you need to be prepared for 5 very "enthusiastic" responses :-), and it is difficult for the beginner to sort through the emotion.

So, rather than precipitate a great debate in the local club, I thought I'd ask you since everyone (even the IC guys) agrees the EasyStar was a good choice.

Thanks again.
Dave Roberts

I found the info on the Multiplex Pico. I see why you are interested. I did not find that Multiplex USA have them, but they are available from http://www.hoellein.com/websites_neu/angebot/fernstueuerungen/sets/mpxset_ex.htm
They are available for export on 72Mhz from Hoellein in Germany. Sounds like a good deal to me.
I got my hands on Multiplex Evo a couple of months ago at the Keith Shaw Birthday E-fly. It was Jim Ryan’s. That just makes me want to have my own even more. I love the design. It is a much better feel in the hands than the brick of a Tx that I fly.
I say go for it! KM

Spitfire Drawings
From Louis Dionne dionnel666@hotmail.com

I received the following and thought it worth passing on to all of you. KM
See below for high quality info on excellent Spit plans. Work done with Rhino as I recall. He can provide plans at scale requested.

Louis Dionne dionnel666@hotmail.com
Manotick, ON, Canada

The following was forward through Frank Reaume:
While at the Rideau event last weekend, I saw impressive scale drawings of the Spitfire, in Mk IX and Mk XVI versions.
The drawings are available in 1/5, 1/6, 1/7 or 1/8 scale or can be printed to a custom size. They are amazingly detailed. Even down to showing wing incidence at measured stations on the wing. Rivet for rivet, screw for screw! Prices range from $42.00 upwards.
These are not plans of a model. They are drawings of the aircraft.
Thought I would get the word out. Several years went into the preparation of these drawings.
They are produced by: (Paul Monforton)
Monforton Press, 1281 Cornfield Crescent, Greely, Ontario K4P 1B5
Dear Ken:

I am in the process of converting a Sig Rascal 40 ARF to E-power following an article in Quiet Flyer, December 2002. That article determined that a Jeti Phasor 45-3 brushless motor with a Jeti Jes 40-3P sensorless ESC turning an APC 11 x 7 prop turning at 9200 rpm and drawing 30 amps would be ideal for this project. The recommended power would be from two 7 cell packs of RC 2000 or CP 2400 SCR cells drawing + or - 30 amps.

I am okay with the Jeti Phasor and the recommended ESC but need some input on the power source.

I would like to use "LI Poly" cells for power and would like to buy them "off the shelf" at a reasonable cost. The mAh current of various "off the shelf" packs varies greatly. MFA direct offers 7.4-volt cells at 1500 mAh. Two packs in series would give me about 14.8 volts, which at the lighter weight would probably be adequate.

I would like to get 15 to 20 minutes of flight time, more if possible. The current draw seems to be my problem. Will two 7.4 volt 1500 mAh packs in series give me close to the recommended 30-amp draw? What if I added another such pack in parallel?

I am confused as to how another 7.4-volt pack in parallel would impact the total current and/or amp draw. Would it double either one or both? Or will the properties of that third pack merely be divided into the original two?

No. While 4 cells in series may or may not be enough volts, I’d go with 5 in series, you’d have to parallel at least three, possibly four, of the packs you’ve mentioned. The capacity would be 4.5Ah or 6Ah. You’d need a 4S3P, 4S4P pack for what you suggested or a 5S3P or 5S4P as I’d suggest. KM

I am sure this question has been raised and answered before but I don't know where. You might even have a suggestion for a better and/or cheaper power system, which will do the trick.

I’d use what has been suggested for the motor and ESC. If I were to use Li-Po batteries, I’d use a 5S2P of Kokam 2.1Ah cells. They are rated with a 20C discharge rate and a 5S1P would do the job, but only provide about 8 to 10 minutes of flying time, depending on throttle management. Putting a second pack in parallel increases the capacity to 4.2 Ah and puts it into the 16 to 20 minute range you are seeking. The 5S2Ps pack would weigh about 30 oz. (about 15 oz. for a 5S1P). Remember, because of the 20C rating, a single 5S1P could be used, but the capacity would only be 2.1Ah. A 14 cell NiCad/NiMH pack of adequate size would be a little less than 30 oz., but if GP 3300 were used, only yield 3.3Ah of capacity. If I was going to do this conversion, I’d use the 14 GP 3300 mAh NiMH cells. KM

The Sig Rascal's wingspan is 72.5 inches - area 728 square inches - weight 109 ounces with a loading of 21.6 ounce per square foot with the recommended Ni-cads.

I would appreciate any advice you can provide. I am in the middle of this project.

I learn much from your Ampeer but when you get into your computations I get totally lost. Never was very good with math.

Thank you for your time and consideration.
John

Mid-Am Report
Ken Myers

What a glorious weekend. Friday, setup day, was perfect for flying, with many “out-of-towners” arriving early and getting in a lot of flying. Saturday and Sunday were also perfect weather days. We were blessed with the best three weather days in a row that Michigan has seen this year. There was lots of sun, low winds and lots of fun.

88 pilots registered for Saturday, with 57 carrying
over to Sunday. Six more folks registered on Sunday bringing the total registration to 94. That is just the right amount friends for a great weekend of flying.

Dave Hares orchestrated another great potluck on Saturday evening, and flying continued well after dark.

There are tons of folks to thank for this great event. Midwest RC Society deserves a HUGE thanks for allowing the use of their field. They also provided the concessions stand and workers for the concession stand. The Ann Arbor Falcons, headed by Warren Plohr, manned the impound all weekend. Debbie and Jim McNeely handled the busy registration area on Saturday. Dave Stacer did double duty as a parker on both days and along with Rick Sawicki helped with the judging. A special thanks also goes to Marty Jasin of the Midwest club. He was there to do everything and anything asked. I also want to thank Jim Reid and Ron Daniels for their special help in getting the event set up on Friday. Of course there are a lot of folks I missed in this thanks, I really do appreciate everyone who pitched in to make this event such a success!

Vendors’ Row

Thanks also go to the vendors. It is really great that you folks come to make the Mid-Am extra special for the pilots. This is a pilots’ event!

A thanks also goes to our many sponsors who provided a lot of “swag” for our pilots to take home.

**Our Sponsors:**

- Dremel
- SR Batteries, Inc.
- Ryan Aircraft
- Radio Controlled Models, Inc.
- Model Electronics Corp., Inc.
- JMGlascraft
- Vinyl Graphics by Greg
- Tower Hobbies
- AirAge Publishing (Model Airplane News)
- Windsor Propeller Company
- Boca Bearing Company
- RWDRC
- Flying Models
- Radical RC
- Z-Planes
- Cambria Tool/Chris Balser

Classic Aero/Al Mrock

Dynamo Electrics

Thanks to the Oak Leaf Region of the Model A Restorers Club for once again sharing their vintage cars with us.

**The Winners**

Actually, everyone who showed up and flew was a winner! What a great weekend.

**Saturday’s Awards**

All up/Last down: Walt Voyt – Zagi (yes – Zagi!)

Best Scale: Dave Grife – Mosquito

Grife’s Mosquito – Bob Blau photo

Most Beautiful: Mark Rittinger – B-26

Best Ducted Fan: Chris True – A-10

Best Sport Plane: Kevin Murray – E Sport
CD's Choice: Jim Young – B-29  
Most Innovative (special award provided by Radical RC): Tom Hunt – P-38

A special note about the most innovative. The plane was a very nice flying Flying Styro kit with an excellent power system, but it was awarded the most innovative because of the props. One prop was of standard pitch and the other reverse pitch. That’s not the innovative part! They were “grown” by Tom Hunt using stereo-lithography. Using a computer, these props were grown in a powder. They are beautiful and unique. Excellent job Tom Hunt!

Sunday’s Winners

Pilot's Choice: Marc Thompson - CL-215 tumbling water bomber  
Best Scale: Laddie Mikulasko - Savio-Machetti trimotor

One of many, many highlights of this meet was watching Jim Zare of Ohio fly his twin Speed 280 powered Jr. Skylark. It was finished much like on the original Goldberg kit box. To contact Jim about this plane and other plans and components he sells; Jim Zare, 5123 Summer Drive, Sylvania, Ohio 43650 or email jimzare@cs.com.

More Flying Photos by Bob Blau

Laddie’s Airforce
Most Beautiful: Jim Young - B-29  
Best Mini-E: Joe Price - The whole gaggle  
Best Multimotor: Joe Rubenstein - Bloch 210  
Geg Cardillo (pilot)  
CDs Choice: Dan Schwartz – Stratos

Dave Grife’s Fokker

Jim Young’s Mr. Mulligan
Dave’s Mystery Ship

Keith Shaw placing his King Crimson – still flying great after all these years!

Large and large-scale airplanes are the rule rather than the exception at the Mid-Am. Chris Balser’s is shown above. A Senior Kadet is typical of the large, non-scale planes flown.

You’ll notice many of Dave Grife’s planes in this issue. His planes are superior in all ways. That is why Dave was awarded the 2004 Charlie Spear award for his contributions to electric flight. Congratulations Dave!

Keith and I thank everyone who participated and helped this year. See you all again next year! We love ya!
Upcoming E-vents

**August 7** (rain date: Aug. 8) Propstoppers Walt Bryan Memorial Electric Fun Fly, (see info this issue)

**August 7** Electric Powered Aeromodelers All Electric Fun Fly, Glenville, NY, John Maggs (518) 237-9452, Evenings: John Hackert (518) 355-4450, E-mail: epaclub@localnet.com Web site at: http://www.sireray.com/epa/index.html

**August 7 - 8** Cedar Rapids (Iowa) SkyHawks Electric Fun Fly, Website http://216.15.238.56/skyhawks/funfly

**August 8** PMAC AC/DC Electric Fly-in, Pontiac Lake Rec. Area, off of White Lake, Rd. Contact Sterling Smith, 248.673.2882 or email smitty559@comcast.net


**August 14** Sheboygan Area Radio Kontrol Society (SHARKS) All Electric fun fly, (see details this issue)

**September 11** Cocalico Prop Busters Electric Fun Fly, near Wyomissing, PA, contact: Karl Benson 610.678.1447, also open to CO2 power.

**September 17-19** NEAT Fair www.neatfair.org for full details.

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The Next Meeting:
**Date:** Saturday, August 7  **Time:** 10:00 a.m.
**Place:** Midwest R/C Society 5 Mi. Rd. Field
             Mid-America Electric Flies