The Seminole Flyer



.

A chartered member of the Academy of Model Aeronautics AMA Charter #216, 1969-2011



www.seminolerc.com

"The Seminole Flyer" is a publication of the Seminole Radio Control Club of Tallahassee, Florida

FEBRUARY 2011

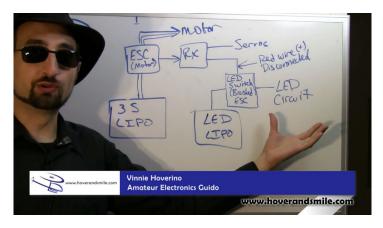
INDEX

- Letter from the Editor
- Chief Pilot Report
- Chief Copilot Report
- Chief Treasurer Report
- Chief Scribe Report
- Remote controlling your LED circuits



Letter from the Editor- Fred Schmidt

As we continue the countdown to our opening day ceremonies, don't forget to get those aircraft ready to WOW the audience. Last month, Chris Bailey brought one of his "night-flying" craft to the meeting and was ready to light up the room, until he realized he was missing a needed connector. With a few minutes of discussion, it was clear he was on to some pretty neat tricks using the LED light strips. So, for a month, I've been hunting for a source that could stand up to the needs of the novice night flyer – at least with respect to light installation. I think I found the glowing golden site -- http://www.hoverandsmile.com/nightflying. There is a series of LED tutorials, with You-Tubes narrated by Eric R. Krystof and his side-kick, "Vinnie Hoverino." It's worth a visit just to watch the videos! What I've included in the newsletter is the text instructions for installing a LED controller on your plane using a brushed ESC to control the LED circuit. Very cool, er HOT!



Chief Pilot- Jim Ogorek

Well, a month has gone and we are moving forward under new officers. Your board members have been working hard on some new ideas for the club for the coming year. The first, for those that missed the last meeting, is an official opening day and night fly. Yes, a night fly! Some of our general membership have electric power planes that are equipped with LED lights for night flying. We have scheduled the 12th of March for both the opening day and our first—and hopefully future—night flying activity. To be in compliance with our lease, the night fly is limited to electric aircraft only, fixed and rotary winged.

Our plan for the opening day is to have a small landing fee to help cover the cost of dogs and drinks, much like we do at the meeting. I will ask at the meeting for a consensus about offering burgers as well. Let's keep it simple and make the event an opportunity for all of us to get to know new and old members better. It would be great to have a few simple fun fly competitions we all can participate in, so if any of you have a favorite or suggestions, please drop me a note.

My hat is off to Bill Ashbaker, our treasurer, for an expert job of updating our membership roster as well as bringing all our outdated paperwork back in line. I would recommend that you attend this month's meeting to learn all about the specific updates.

Some of you asked at the last meeting about the cost of electricity used at the field. I read the meter and just submitted the usage to Talquin Electric Cooperative. Our meter showed that we used 3 kw. This amount is from the initial installation up to this month's submitted reading. Once I get the statement with the dollar amount for this usage, I will have Bill include it in the monthly Treasurer's report so we are all aware.

Finally, at this month's meeting I will be opening discussion about our membership enrollment and our current enrollment policies. The board members are in agreement that we need to know who at the field is a member and is current with the AMA. We are leaning towards membership cards that would be required in place of your AMA card at the field. Our feeling is that we need to have a better method of verification of both AMA and club enrollment before any past, present or potential members fly. Look forward to hearing your point of view!

Jim

Chief Copilot- Jeff Owens

It is shaping up to be a busy spring flying season! As noted above, the Club's kick off with an Opening Day Fly-in for members and their families on March 12, 2011 should be a great start for the season. The intent is to make an effort to get as many club members and their families out to the field so that we can all get to know one another. We are also intending to have a night flying session that evening, so get those lights ready!

The Southeastern Model Show at Perry Georgia is coming up on March 4-5, 2011. There is a link to a web site about the event on the "Events" page of our web site. The Club will have some tables there, as will HobbyTown USA.

We have been invited to participate in the EAA fly-in on May 14, 2011 at the Quincy Airport. We will have a static display there on Saturday in order to show off our planes and publicize the Flying for a Cure event that is scheduled for May 21, 2011. We have also been asked to put on a night flying demo session on Friday night at the Quincy Airport. This could be fun!

<u>Club Calendar</u>-The schedule reflects current Club events planned for the year to date. Check monthly for additions and deletions at the meetings and in the newsletter. For regional, sanctioned AMA events, see your AMA magazine or visit the AMA website section "Calendars".

February

3 - Club Meeting at Hobby Town

<u>March</u>

12 – 2011 "Opening Day" Fly in and Night Fly – SRCC field.

Chief Treasurer- Bill Ashbaker

Editor's Note: The Treasurer's report is published for Members only. The public version of the Newsletter does not include account balances.

Seminole Radio Control Club Financial Statement for Month Ending January 28, 2011

Checking Accounts

Capital City Bank Premier Bank

Savings Accounts

Capital City Bank

Other Accounts

PayPal

Cash on Hand

Total Assets

Liabilities

Outstanding Checks

Net Funds Available

Income

Dues/New Memberships
Activity Sales
Meeting Food Reimbursement
Contributions/Donations
Interest on Savings
Interest on Checking

Total Income

Net Cash Flow

Expenses

Field Maintenance Repairs & Supplies Field Improvements Awards Miscellaneous Expenses Donations

Fees: Banking

Fees: State of Florida

Meeting: Food & Refreshments

Total Expenses

Chief Scribe- Chris Bailey

Call to Order at 7:06pm

New Club President, Jim Ogorek, gave an opening statement and introduced the new club officers, including presidential appointees.

New and returning members were introduced: Dwayne Wood, returning member; Bob Roller, returning member; and, Joe and Tanner Warwick, new members.

Jim encouraged members to review the club's constitution and by-laws

An update on newsletter printing was provided by Fred Schmidt: Due to increased production costs, Apogee printing is no longer able to print 25 color newsletter copies for free. Fred will research other options for providing printed newsletters at the meeting, including the possibility of decreasing the printed number from 25 to 15.

Administrative duties:

Minutes from the December 2, 2010 club meeting were approved.

Treasurer, Bill Ashbaker, provided the monthly treasurer's report.

- -Informed club members that the PayPal account has been reactivated.
- -Informed club members that he would like to consolidate the club's multiple accounts with different banks into a savings and checking account at one bank.
- -Requested club members' responses to the treasurer receiving a debit card from the bank at no additional cost to the club. There were no objections.

Old Business

Don't drive on the grass: Jim, at the request of county officials, requested club members to drive on the road instead of using the grass. Additionally, Jim notified the club that the county is preparing to add more stone to the road in the near future.

Storage Container: Club members discussed the container keys and who should be the gatekeeper, responsible for dispersing new keys to club officers. It was decided that Field Marshall, Gordie Meade, would handle the responsibility. It was also discussed whether or not all club members should have access to the container. Gordie volunteered to look into alternative ways for the entire club to access the container without necessarily having access to the lawnmower and other grounds-keeping equipment.

Miscellaneous:

Jim offered to donate flood lights to the club for use in the upcoming night flying events. Locks will be added to the electricity timers on the power poles.

New Business

Killearn Lakes HOA: Fred read a letter of appreciation from the Killearn Homeowners association for our generous donation to their annual event.

Opening Day & Night Flying Event: Jim proposed an opening day flying and night flying event for March 12th. Club will charge a nominal landing fee and provide an all you can eat lunch.

Mike Levine expressed interest in the club adding lights to the parking area. Jim said temporary lights would be available.

Park Flyer Club Membership: A trial period was established by the club in 2009 or 2010. A question was raised as to whether or not the club should continue the membership beyond the trial period. It was decided that the trial period will not continue.

Club Badges: Mike Levine expressed the importance of having club members wear badges at the field to identify themselves and show current AMA and club membership.

Jim: The board would review several options and would report back at the February club meeting. **Micro Planes:** It was decided that "micro" fixed winged aircraft are allowed to fly over the north helicopter pad when other larger aircraft are active over the runway.

Airfest Event: Jeff Owens gave an update on the May 14th air festival taking place in Quincy, FL. The event organizer will provide an open hangar for static displays, but flying is not allowed.

Steve moved to have the club do its annual "fly for a cure" event the weekend following the air festival. The "fly for a cure" event is scheduled for May 21st.

Perry Swap Meet: Joe noted that the club has four tables available for the swap meet.

With no further business on the agenda, the meeting was adjourned at 8:12pm.

LED Night Flying Part 10 – Remote Controlling your LED circuits

Excerpts from Eric Krystof and "Vinnie Hoverino" @ http://www.hoverandsmile.com

For a full video tutorial, visit... http://www.hoverandsmile.com/nightflying/87/led-night-flying-part-10-remote-controlling-your-led-circuit.

Remote Control - Flick that switch!

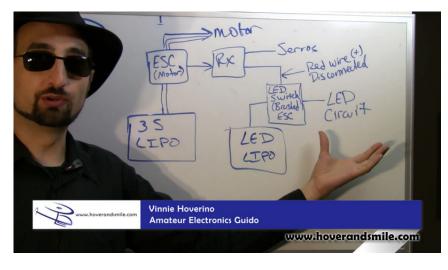
Remote controlling your lights is a completely optional addition to your LED circuit. There's no need for it, but it's got a cool factor that can't be beat. Consider the capability of remotely controlling your lights without having to manually land and connect them.

Not only that, but you can use mixing capabilities of your transmitter to control brightness levels (based on how you do the wiring). I've used a dial on my transmitter to dim the lights to my preferred brightness level based on the light outside or if I'm taking photos. You could also mix them to say, your throttle... Beef up the juice and your afterburners begin to glow!

So let's take a look at the basics. You can buy receiver controlled dimming switches, or you can just take a simple BRUSHED ESC and adapt it to your LED needs. If your receiver controlled switch is a simple on/off toggle, you can't dim your LEDs, but a brushed ESC will let you dim to your heart's dimming desire.

The basic idea here is to let your receiver switch your LEDs on and off, but NOT power them. Powering LEDs off your receiver works for simple LED circuits – I do NOT recommend it for anything on the scale of illuminating your craft to the point where you can fly it at the dark of night. This is why we're just using an open receiver channel to control the switching of the LED circuit on and off. The power for the circuit will come from elsewhere, which can be the flight pack battery balance plug or a completely separate battery.

The Brushed E S C circuit



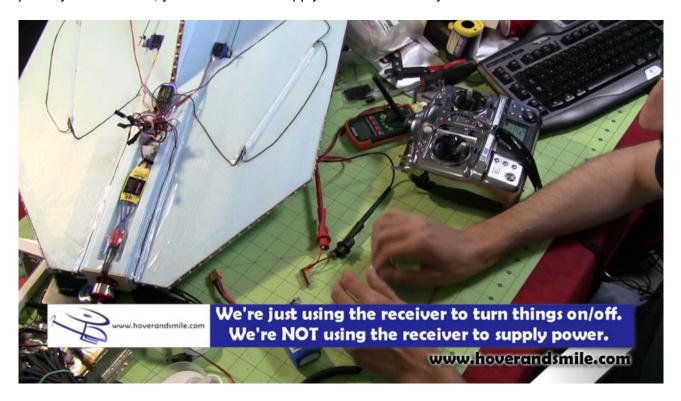
Consider our diagram with Vinnie at the helm:

The entire upper left portion of this diagram is exactly the basic configuration you'll see in any electric flyer. The rest of the circuit for the LED circuit utilizes a BRUSHED ESC to work as a remotely controlled *voltage regulator*. We take our brushed ESC and instead of plugging it into the throttle channel (since we already have our primary ESC handling throttle), we plug it into an open receiver channel for switching.

You need an open channel for this. Gear, flaps, etc. can be used to switch your circuit on or off. If you don't have an open channel, you could use a Y servo adapter and share it with a servo.

But we don't plug in the brushed ESC to your receiver completely. We want to *remove* the red wire from the servo plug from our brushed ESC. Clip it or slide it out of your servo connector, tape it off with electric tape and leave it alone. You're only plugging the brushed ESC into your receiver for common ground and signal, only two of your three wires are used.

UNPLUG THE RED WIRE from your brushed ESC! Your receiver is alreayd getting power from your primary motor's ESC, you don't want to supply it with more from your LED Brushed ESC!



Now, that's where the servo connector from our brushed ESC is used. As for the rest of the cables, you're plugging the power cable to your brushed ESC into a battery – either your flight pack battery or a separate lipo.

What about the LED circuit? It plugs into the brushed ESC where you'd normally connect a motor. See the connection? We're using a brushed ESC just as you would in a regular plane, except instead of using your receiver to drive throttle of a motor, we're using our receiver to drive our LED circuit.

I used a simple GWS Brushed ESC here, it can accept two or three cell Li-Po batteries, and since my circuit is designed for 12 volts, we'll be just fine.

I've used this setup on a gear switch open on my receiver. Plugging in my brushed ESC for my LEDS into that open channel (RED WIRE DISCONNECTED), plugging the flight pack battery into my brushed ESC's power, and then taking the output of that power into my LED power block, I've got total control of the LEDs from a simple on/off standpoint.

But what about dimming? How do we *gradually* turn lights on or off? You'll need to learn your transmitter's mixing to control your brushed ESC to vary it's voltage from off all the way through on. My transmitter has a dial, so I can control complete dimming.

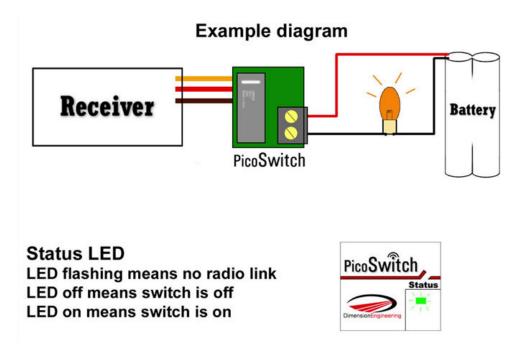
Remember, the brushed ESC is a voltage regulator – you can use it to control full on/full of switching, or dimming 'in-between' full on and off.

Remote Controlled Relay Switches

If you don't want to use or have a brushed ESC to use, you could purchase a remote controlled receiver switch. Here's an example – a Pico Switch from Dimension Engineering.



The circuit is just like our brushed ESC – we connect to a receiver channel, but the POWER for our circuit comes from the other side of the switch:



We've not tried the Pico Switch, but it's the same as brushed ESC, although it may not allow for partial voltage regulation, so you may not get dimming out of this (in fact, I'm assuming it's just a simple on/off relay).

Either way, from a remote controlled relay switch, remote controlled dimmer, to brushed ESC, experiment with controlling your LEDs remotely!

Seminole Radio Control Club Tallahassee, FL

AMA Charter #216, 1969-2010

SRCC Officers

President – Jim Ogorek
Vice President – Jeff Owens
Secretary – Chris Bailey
Newsletter Editor – Fred Schmidt
Treasurer – Bill Ashbaker
Field Safety Officer- To be Appointed

Field Hours

Electrics/ Sailplanes- 9:00 am till 9:00 pm. Gassers and Nitro- 12 Noon till Dusk. Electric Service- 8:30 am- 9:15 p,m

Training Notes

To schedule a training time contact Mike Atkinson.

Flight Instructors

Mike Atkinson- Primary/ Advanced Fight Instructor	926-4692
Geoff Lawrence- Primary/ Advanced Fight Instructor	942-9807
John Hall- Primary/ Advanced Helicopter Flight Instructor	893-6457
Jeff Owens- Ground School/ Airworthiness Instructor (Fixed Wing)	894-2504
Frank Bastos- Hobby Town Flight Demonstrator	671-2030
Jim Ogorek- Primary/ Advanced Fight Instructor	766-2477

Club Meeting Location and Time

November- March: The regular club meetings are held on the first Thursday of each month at **7:00 PM** at **HobbyTown** on Thomasville Road. The Club offers food and drinks for a small charge at 6:30. **April- October:** The regular club meetings are held on the first Thursday of each month at **7:00 PM** at the Flying Field. The Club offers food and drinks for a small charge at 6:30.

Newsletter Submissions- Submissions are requested to be in M.S. Word format or via e-mail text. Photos should be in .jpg or .tif format. We will, however, accept anything to make it easier for those who wish to contribute. Submissions are due no later than the 28th of the month. Send your submissions to Fred Schmidt. schmidtfis@gmail.com