

Pine Barren Modelers R/C Club

December 2024



Club Meeting Highlights

(Remember, these are NOT the minutes, so they don't contain sensitive information. The complete minutes will be sent out before the next meeting).

4 December 2024

Club Officers

President—Rich Bombadier
Vice Pres.—Dennis Spatcher
Treasurer—Ralph Ferrara
Secretary—Micki Bowne
Safety Officer—Pat Lovenstein

Contact Us:

For website, classified ads, or any other club information, visit our web site at:

<https://pbm1727.org>

or our Facebook group:

PBM on Facebook

Links to club officer and other e-mails are via the website.

You can also mail us at:

Pine Barren Modelers RC Club
P.O. Box 38
Bayville, NJ 08721

All officers and 24 regular members were present.

Field Reports:

Coyle: All is fine

Temporary Field (Johnson's Pit): Fine. Ralph will take out the trash tomorrow.

Safety Report: All is good.

Instructors' Report: None.

Old Business:

- ➔ Ralph says inventory is good and that he has everyone's order for hooded sweatshirts (we are a bit short on the larger sizes, though). Embroidery for a jacket is \$75 (separate from the price of the jacket). You can buy a jacket there, or you can bring one from elsewhere for embroidery.
- ➔ Ways & Means – Speed controls and UBECs.
- ➔ Dennis reported 2116 web site hits in November, with 530 members on Facebook.
- ➔ Tom Powers extended the red line, but it needs widening (We need more paint).
- ➔ Dennis will continue looking for a new weather station. We want to get a good one, but must balance reliability with cost and theft potential.
- ➔ Christmas party is 6 p.m. on 14 December, at Calloway's. Cost is \$35 per head (You can pay at the door). This year, we have the large room, so noise shouldn't be a problem.

Old Business (Continued)

- Indoor flying starts Friday, 6 Dec., at Central Regional Middle School. Time is 6 p.m. to about 9-9:30. It'll continue every Friday evening (Except 27 Dec.) through the end of February.
- The dirt track has been worked on and looks better.
- Per a township worker, the township will install a new swing-arm, heavy duty gate. Ocean County is annoyed that cars are going in the back area and destroying parts of the rail-trail.
- We have a new wind sock, but we need a 20' length of 1 to 1.25" galvanized pipe to mount it. The pipe will be set in concrete, making it harder to steal. Problem is, we need a way to get the pipe to the field. Anyone with the appropriate roof rack is asked to contact Rich or Dennis.
- President Rich thanked everyone who helped with the Locker St. cleanup. Special kudos to Ron Pinksaw for honchoing it and Chef Gary for cooking the great breakfast.
- Dues are now \$80, with no increases planned for next year. If you don't pay by 10 January, there is a \$10 surcharge; if you don't pay by 15 January, you will be taken off the membership list. *(If you can't pay, contact a club officer and something can be worked out. Do note that there won't be a January meeting, so don't plan on paying at that meeting. On the other hand, if Penguin Day isn't rained/snowed out, you can pay then. Ed. Bill).*
- There were no new nominations and only one person running for each slot. So, by a unanimous show of hands, the proposed slate was voted in. So, please welcome our new officers:
 - President Dennis Spatcher
 - Vice President Mark Tilman
 - Treasurer Ralph Ferrara
 - Secretary Micki Bowne
 - Safety Officer Pat Lovenstein

New Business:

- The club's computer is sick. Dennis will see if it can be repaired, or if we'll need a new one.
- Per President Rich, we have the opportunity to sponsor a lap race at Jersey RC Racing Promotions in Forked River. Specifically, 1/12th scale NASCAR racing. Competitive, durable NIB cars are available for \$179 (including radio) and require only a lap counter be added. Cost will be \$150 to the club, but it will bring us good publicity.
- Penguin Day will be at the Pit. Everyone who gets in a flight will get a stylish Penguin Pin. Pat Lovenstein will bring pea soup (*With penguin – Uh, ham, I mean HAM!*) Other food donations are welcome.
- A committee to review the bylaws will be formed in January. Rich suggested we consider adding club Trustees to the bylaws. Examples of Trustee powers and authorities are being gathered from the AMA and other clubs, for consideration by the By-Laws review committee. Of course, as with ALL By-Law changes, adding Trustees must be approved by club membership.
- We voted to buy an AMA brick in honor of Dick Hada. (*There's a lot of emotion behind those simple words. We miss The Old Guy! Ed. Bill*)
- No January meeting, as it would be on New Years Day.
- Per Ralph, Anthony Cardillo is back in the hospital. Please, keep him in your thoughts and prayers.
- There was no Model of the Month

Bill's Corner

First thing I want to do is say "Thank You" to outgoing President Rich Bombardier. Rich has been President for most of the last 10 years and has led the club through some fantastic growth. Time for Rich and Sue to kick back and just be ordinary members, whilst Dennis takes over the reins.

I noted a nice article on battery care in the Dec. issue of *Model Aviation* (Page 4, written by Gwen Mathis). Two points really stood out.

First, Lipos really don't like cold weather. Worst are the little single-cell batteries used in UM and UMX models. If you fly them in cold weather (like trying to get in a mid-winter flight in your backyard), you'll find they lose their 'punch' VERY quickly (especially with planes like the E-Flite Vapor – those exposed batteries go flat in under a minute when cold!). So, keep the batteries INSIDE your coat and only take them out when you're ready to fly.

Second, storing batteries at storage charge. That's about 3.8 volts per cell (i.e., 7.6 volts for a 2S pack, 11.4 volts for a 3S pack, and 15.2 volts for a 4S pack). If your charger doesn't have a storage mode, get one that does. Investing the money in a better charger means your batteries can last longer. As the world pushes towards Electric vehicles, I expect the price of lithium batteries will only go up – and the availability of hobby batteries will go down (look at what's happened to balsa).

A little personal history: Micki and I switched from NiCADs to Lipos in the early 2000's. At first, we left our Lipos fully charged after each flying session, so they'd be ready for the next session. But, after a few years, we realized the batteries were losing capacity and voltage. Once balance taps started being provided on Lipos, we was able to get – and use - a charger with a storage mode. Almost overnight, we were getting longer flights, with more power, and the batteries lasted longer.

One NiCAD 'habit' we shed was charging and discharging at maximum rates. Now, I never charge ANY of our 3S packs at over 2 amps, even though several are 50C packs (and I ALWAYS use the balance setting whilst charging). I also prop all of our motors to draw well below the batteries' C ratings*. Finally, we use a timer, set so the battery should not be discharged to less than 3.8 volts per cell when landing – then backed off 30 seconds. We NEVER fly to the ESC's cutoff point.

Why the 30 seconds? To allow for a missed landing approach or a fouled runway.

We still have ten-year-old batteries that work well. Not expensive ones, either, just ordinary Turnigy batteries from Hobbyking.

Now, about it taking a bit longer to charge – that's why we have more than one charger. Our charger 'kit' was designed for two chargers, so we originally charged two batteries at a time.

Those chargers were discontinued, so we replaced them with chargers that can handle two batteries each (HiTech RDX 2 Mini, <https://hitecrd.com/rdx2-mini-two-port-50w-ac-battery-charger/>) Now, we can charge (or discharge) four batteries at a time. As soon as we get to the field, I get batteries on charge. THEN we bring out our models, field kit, and so forth. By the time we've set up and said 'Hello', our batteries are mostly charged.

*To check what our motors draw, I use an ancient Astro Flight Whattmeter. That and several equivalent devices are available.

Hobby King: https://hobbyking.com/en_us/turnigy-180a-watt-meter-and-power-analyzer.html

Graves RC <https://gravesrc.com/gtp1gt0112-gt-power-watt-meter-180a/>

Instructor's Insights By Gary Santaniello

RC Radio System Alternatives to Spektrum

When it comes to RC (radio control) systems, Spektrum has long been a dominant player, known for its high-quality transmitters and receivers. However, there are several alternatives to Spektrum that provide excellent features and performance, often at different price points or with specific strengths tailored to different RC enthusiasts. Whether you're into RC cars, planes, boats, or drones, these alternatives offer competitive options that are worth considering.

1. Futaba

Futaba is one of the most established names in the RC industry, renowned for its reliability and precision. Many competitive RC pilots and drivers prefer Futaba due to its excellent signal stability, wide range of transmitters, and well-built receivers.

Pros:

- Reliable and well-engineered transmitters.
- Great response time, ideal for competitive racing and flying.
- Advanced features like telemetry, programmable channels, and robust customization.
- Strong support for RC planes, helicopters, and surface vehicles.

Cons:

- Higher price range compared to some alternatives.
- Complex programming can be intimidating for beginners.

2. FrSky

FrSky has gained popularity as a cost-effective alternative, especially within the drone and DIY RC community. Known for their open-source firmware compatibility and telemetry functions, FrSky systems are highly customizable and often appeal to hobbyists who enjoy tinkering with their equipment.

Pros:

- Affordable transmitters and receivers.
- OpenTX support provides extensive customization and community-developed firmware options.
- Good range and reliable signal performance.
- Strong focus on telemetry with multiple sensor options.

Cons:

- Requires some technical knowledge to fully utilize the system's potential.
- Not as user-friendly for beginners compared to plug-and-play brands like Spektrum.

3. FlySky

FlySky is a budget-friendly brand that delivers decent performance for casual RC users. While it may not offer the advanced features of brands like Futaba or FrSky, it provides enough functionality for those just getting into the hobby or looking for an affordable option.

Pros:

- Extremely affordable transmitters and receivers.
- Simple setup and easy to use, great for beginners.
- Solid range and performance for the price.

Cons:

- Limited range of high-end features and customization options.
- Lower build quality compared to premium brands.
- Not ideal for more advanced or competitive users.

RC Radio System Alternatives to Spektrum

4. Radiomaster

Radiomaster is a newer brand that has quickly gained traction thanks to its integration with OpenTX and multi-protocol capabilities. It's a versatile option for RC enthusiasts who fly or drive multiple types of models using different protocols.

Pros:

- OpenTX compatibility for full customization.
- Multi-protocol transmitters, allowing you to control models using different radio protocols.
- Excellent value for money, with mid-range pricing and high-end features.
- Modular and upgradable design, allowing for expansion as your RC needs grow.

Cons:

- More complex setup process due to OpenTX.
- Still establishing a reputation compared to long-standing brands like Futaba and Spektrum.

5. JR Propo

JR Propo is another high-end brand known for its robust build quality and excellent signal performance. Although JR Propo is not as popular in the U.S. market as Spektrum or Futaba, it has a dedicated following among enthusiasts who demand precision and reliability.

Pros:

- Excellent build quality and precision.
- Great for advanced users in RC aviation and helicopters.
- Durable, long-lasting equipment.

Cons:

- Higher price point.
- Limited availability in some regions, and fewer compatible receivers compared to Spektrum.

6. Tactic

Tactic offers a range of affordable and reliable radio systems, particularly in the mid-tier market. It's a solid choice for hobbyists who don't need extreme customization or advanced telemetry but still want good performance and durability.

Pros:

- Reliable and simple to operate.
- Reasonably priced for the features offered.
- Durable and well-built transmitters and receivers.

Cons:

- Fewer advanced features compared to other brands.
- Limited product lineup compared to Spektrum and Futaba.

Conclusion

While Spektrum remains a leader in the RC industry, several alternatives provide comparable—if not superior—options depending on your needs and budget. Whether you're seeking the high precision of Futaba, the customization of FrSky, the budget-friendliness of FlySky, or the versatility of Radiomaster, there's a radio system out there that can meet your requirements. Each of these alternatives brings something unique to the table, ensuring that you can find the right system for your RC hobby.