



Sanderson Field R.C. News



Charter No. 3079

Club Meeting

This months meeting will be held on Thursday April 10th at Choice High School, located at 201 N. 9th St. Shelton Wa.

Time: 7:00pm

*Check out the new web site at
<http://sfrcf.quintex.com>*

The treasurer's report was read and approved as read.

I'd like to welcome a new member back to the club:

Bob Mason

Bob is a retired school teacher who joined while he was still teaching and ended up not having time. Welcome back Bob.

We've scheduled our first fly-in/ barbecue for May 10th from 9:00 am to when ever.

Jody wanted me to let everyone

IF YOU PAY BY MAIL SEND YOUR DUES, PROOF OF 2003 AMA MEMBERSHIP AND A SELF ADDRESSED STAMPED ENVELOPE TO THE TREASURER:

***CHUCK KENTFIELD
6843 Gallagher Cove Rd NW
Olympia WA 98502***

know we'd like to find someone willing to bring a computer and newer flight simulator to the swap meet and also we need a VCR/TV combo or VCR and Television so we can show video's there. If any one can help us out contact me at bigbird@quintex.com or (360) 426-5601.

Pat Zook sent a very nice card thanking the club for the flowers we sent after Don's passing.

We have some field closures to let you know about. Unfortunately it's really to late to do you much good. Sorry but I just found out. Hopefully you look at the web site and you already know.

The Washington State Patrol will be using the runway on:

April 1st and 2nd - All Day
April 28-May 1st - 8pm - Midnight
May 5th - 8th - 8pm - Midnight

The TCMAA has given us their field closures so we can decide when to invite them over. They are:
April 19th and 20th
May 17th and 18th
July 10th, 13th, 20th and 27th.

Other events they've scheduled are:

Big bird fly in June 7th
Museum of Flight June 13th-15th
TCMAA Picnic June 29th
Float Fly ins:
July 12th and 13th
Aug. 16th and 17th
Sept. 13th and 14th
Oct. 11th and 12th
Round Robin Aug. 3rd
IMAC Aug. 30th and 31st.



On April 19th the club is hosting our 9th annual swap meet at the Shelton High School Sub. There will be a raffle for a Hobby People P-47 Thunderbolt ARF, A static display of RC planes and admission is free. Mark it on your calendars. Hope to see you there.

Pressure Test your Tank (part 2)

Pressure Testing Your Fuel Tank

By James Goss

(Continued) So remember that tanks having pressure leaks can cause a lot of problems for your plane and they can be hard to pinpoint without a way of testing such as this. After I set up my fuel tank pressure tester I went back and checked several tanks that I had used in the past with engines that had troubles. **To my surprise I found four tanks that would not hold 5-psi of pressure for a period of one minute.** From now on if I have engine trouble I will let this be the first check on my list. It is a simple test even at the field. Just get access to your fuel lines and connect the pump and pressure gauge. Set the pressure to 5 pounds and see if it holds for a few minutes. Most leaks I found were around the stopper. If you have access to your tank while it is charged to 5 lbs you can also squeeze the tank. This will surge the pressure up and down and a peak pressure of about 6 pounds really makes for a good test.

You might think that if the fuel tank only receives a maximum of 1.5 psi on a 2-stroke, even if the tank had a leak at 5-psi, it may not leak at 1.5-psi. Chances are that if it does leak at any pressure you are going to have trouble in the future. The idea of this test is to prevent a major engine failure

before it happens by testing on a regular basis. If you charge the tank to 5 psi and after 5 minutes it has leaked down to 4.8 psi, even this tiny amount tells you that something is wrong and an inquire is in order.

If you are using a YS engine you had better perform this test for sure. This type engine places about 6 pounds of pressure in the tank. I have not measured the tank pressure that a YS engine develops, but I was told that it was in this range. The next time I run my YS 120 FZ engine I will test it and let you know the precise amount. I know for a fact that a great planes fuel tank will not withstand the feedback pressure of my 1.20 engine. While hovering about 30 feet off the ground the 12-ounce great planes tank exploded from excess pressure and instigated a crash. You may remember

about two years back Great Planes had a massive fuel tank call back. Their tanks would always split down the front seam after only one flight. I had several to do that and several of my friends also had that to happen. So just because a tank is new doesn't mean it is ok. Always check your new tanks under controlled conditions before it is installed into your expensive plane. **Your engine is no better than its fuel tank.** If you are going to spend two, three, or four hundred dollars for an engine, spend a few bucks for an outfit to pressure check the fuel tank. This time will be well spent and worth the effort. Also check the system every few weeks during flying season because leaks can occur at any time and it only takes three minutes of your time. By doing it on a regular basis a fault will show up as a tiny leak before it becomes a major problem.

Here is a handy tip to help

CLUB OFFICERS

President.....Jody Diaz (360)427-6102
 Vice PresidentDick Robb (360)427-4521
 TreasurerChuck Kentfield (360)866-9473
 SecretaryBob Beatty (360)426-5601
 Field MarshalChuck Kentfield (360)866-9473
 Safety Officer.....John Tupper..... (360)426-6383

Board MemberJody Diaz (360)427-6102
 Board MemberDick Robb (360)427-4521
 Board MemberHerb Coslett (360)275-4158
 Board MemberStacy Myers (360)426-9367
 Board MemberDarryl Casad (360)275-8690
 Alt Board MemberBob Beatty (360)426-0677
 Alt Board MemberChuck Kentfield (360)866-9473

insure against pressure leaks on your tanks, especially if the tank is installed out of site. Even if the lines coming out of your fuel tank have barbed connectors or if they are straight brass pipe, use this method. Place small nylon tie wraps around each tank line for added protection against leaks. This is really needed on YS engines, but will improve any system. These nylon tie wraps will work better than the fuel line spring clamps such as Great Planes and Dubro offers.

Update

Since I started this article I have now had an opportunity to check my YS-120 4-stroke to see what the maximum pressure is that the tank must withstand. I did the check last Wednesday (November 28, 2001) at the Eastaboga field. I first checked the pressure that the engine produced without it running. To do this I connected the pressure gauge on the engine side of the check valve. Each turn of the prop generated a peak pressure pulse of 2-psi. With the gauge connected on the tank side of the check valve I started to run the engine. It builds up pressure fast and in about 15 seconds with the engine at max rpm the gauge showed almost 8 pounds of

pressure on the tank. This is more than I was expecting and now I am really concerned about my fuel line connections being able to handle this pressure. The slightest nick or cut on a fuel line can induce a leak in the system. This high pressure is not only acting on the fuel tank, but also on all your fuel lines and fittings that you might be using. So to

pressure test this type engine you would need to charge the tank to at least 10-psi minimum and maybe 12 pounds maximum. I wish all fuel tanks came with barbed connectors because straight brass pipe offers little resistance to the fuel line coming off. I am searching for 1/8 inch barbed brass pipe at this time and if I find any I will let you know.

Keeping your batteries charged

By Bob Beatty

I've heard a lot of excuses for not being able to fly because the batteries were not charged. I occasionally had that problem in the beginning (last year) too. My instructor (Stacy Myers) showed me a diagram of an in line trickle charger and a parts list. It sounded like a good idea to me so I went to the local Radio Shack and picked up the parts. Since then I've always been ready. The parts are all available at Radio Shack (even in Shelton). It costs around \$10 per charger so if you have a bunch of chargers, something like the little trickler, which does the same thing for 3 chargers at once.

It's fairly simple to build and only takes a little soldering experience, however you do need a low power soldering iron (15w). You install the switch in line on your standard

Tx/Rx charger. You need a few simple tools. You need something to cut holes in the plastic case. A small screw driver to screw the case together. Something to cut and strip the wire and some thin CA glue. I should also mention you need to use rosin core solder not acid core. This trickle charger will work for Futaba and JR types with a change in the wiring.

To use it, just plug it in. When the lights are on on the charger, you get full charge. Flip the switches in the morning and you can leave it on indefinitely and your batteries will always be ready when you are.

The parts are listed on the diagram on the next page. If you need more information or help, Contact Bob Beatty at bigbird@quintex.com or (360)426-5601

Other Scheduled Events

May 10th.....Fly-in/Barbecue 9:00am to ???

August 23rdScale fly-in

July 12thInvite TCMAA to our field for a fly-in (Tentative)

No other events are scheduled at this time

WE'VE GOT A \$250 RAFFLE GOING ON SO COME TO THE MEETING AND BUY SOME TICKETS. THAT'S ENOUGH FOR A NEW PLANE FOR THE LUCKY WINNER!

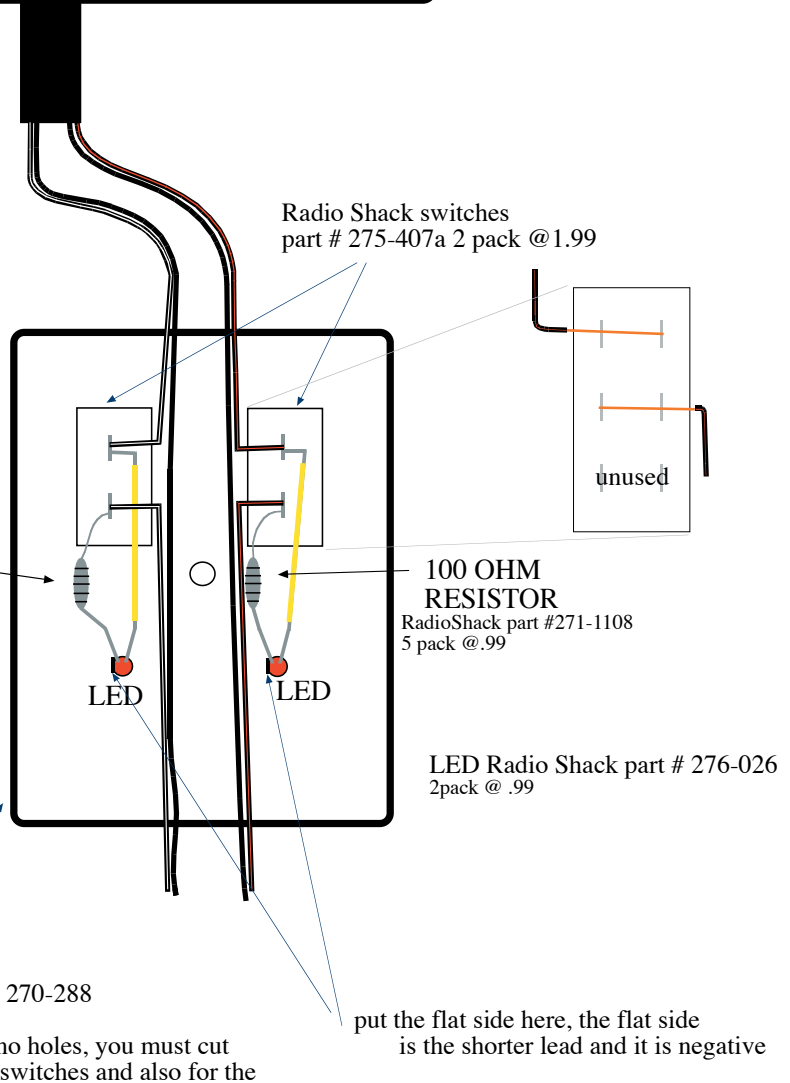
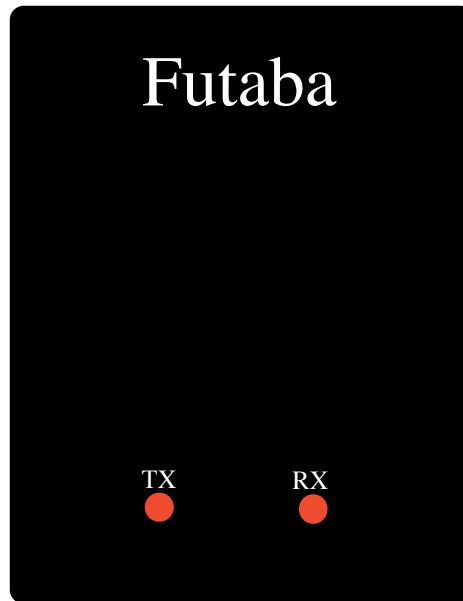
In-line Trickle charge switch

This switch when installed will allow you to leave the charger on all the time so your batteries will always be ready when you are.

When the lights on the charger are on you are getting the full charge that the charger puts out, when the lights on the switch are on you are only getting a trickle charge. You must make the switch your self. i.e. put it on full charge when you get home from the field and switch it to trickle charge in the morning.

A few notes:

- 1.) only cut the colored or striped wire, the black one goes through the switch unbroken. Check the connectors to be sure you get the resistors on the right wire.
- 2.) The LED's can only be wired one way for them to work. The LED's have a flat side (it's hard to see but it's there) check the diagram to see the correct way.
- 3.) Use only rosen core solder and a 15 watt soldering iron.
- 4.) Use only 1/2 watt resistors



For JR chargers...

- 1.) The TX charger has the polarity reversed so you have to use the solid black lead, the black with white stripe goes through unbroken
- 2.) The RX charger has 3 wires, cut the red one. The yellow and brown go through unbroken