

Sticks and Tissue No 54 – May 2011

I'd like to thank all the contributors, without whom this newsletter would not be possible.

If you can contribute any articles, wish to make your point of view known etc please send to or phone 01202 625825 JamesIParry@talktalk.net

Thanks to Mark Venter back issues are available for download from <http://www.cmac.net.nz/>

Writings and opinions expressed are the opinion of the writer but not necessarily the compiler/publisher of Sticks and Tissue. The content does not follow any logical order or set out, it's "as I receive and put in".



St Albans Vintage 04.06 2011

I have been asked by St Albans MAC that would all fliers please ensure that they do not arrive at the St Albans Vintage Meeting before **09.30 hrs**. There is no access to the club site before this time.
Tony Tomlin.



John Taylor's electric powered Pixie

Built from RCM&E free plan.42" span covered in Airspan.

Powered by a small bell motor from BRC Hobbies costing £12 including the speed controller. 9"x5" slow fly prop. Battery is a 2cell lipo--1300mah giving up to 15mins power run. Weight ready to fly is 15ozs.

From Brian Lever

On reading the April " Sticks and Tissue" I noticed the request (plea) from Walter Snowden for someone to take up the challenge of producing a publication on Vic's life and designs. I am editing along with Brian Waterland,a new SAM 35 Yearbook, number 15,planned for publication by Christmas 2011. There will be a host of wondrous new material for readers to enjoy after the turkey and pud and included in the intoxicating mix will be a delightful article on the designs Vic produced in the last 10 years of his life.This has been produced by SAM 35's very own Mike Parker and will go some way to satisfying Walter's request.

Ron's Day David Kinsella

To Biggleswade on the old LNER line left me with 4 miles west to Old Warden. With boater set and an 8ft Cody Kite furlled and at the slope, I did it in an hour — hardly 2012 stuff hut nifty for a Shuffler. Good stick Jonathan Moulton was ready with a coffee, the big Ron Moulton display almost ready. I stood my blue Cody in a corner (Ron founder of the BKFA and author of kite books) and toured the airfield, then to see the magnificent and growing. Shuttleworth Collection. Thanks to the Barton Boys, Finch Fliers and Perriam Patrollers the VTR area buzzed all day thanks to Messrs Miller, Jephcot, Toogood, Orchard, Tribe and Lewis and a strong supporting cast. Stuff was shifting too, pongs and sounds and colourful designs we all love upholding: all that's best about VTR. Laughs with Brian Lever and Roger Gedge, not forgetting good fellows Delgado, Taylor and Court were inspiring. They are so keen, these A and B boys. Rightly Roger Gedge won the Moulton Trophy (so neatly prepared by Dick Roberts) for a restored Moulton design and loud cheering closed the proceedings. More detail in my Column, Dinah., Ray, Chris and Jonathan having launched the Moulton Trophy perfectly. Verily, The Ron Moulton Memorial Trophy has a eat future.

8 May 2011

(David's column is prepared several months in advance however it seemed right that this addition should be included this month JP)

From Jörgen Daun.

Hi James sending you some pics of this winters labour, my Madcap from Old School and Scram from Falcon models and last the Scoundrel from Steve Adams a beta kit.



Scram



Steve Adams beta kit



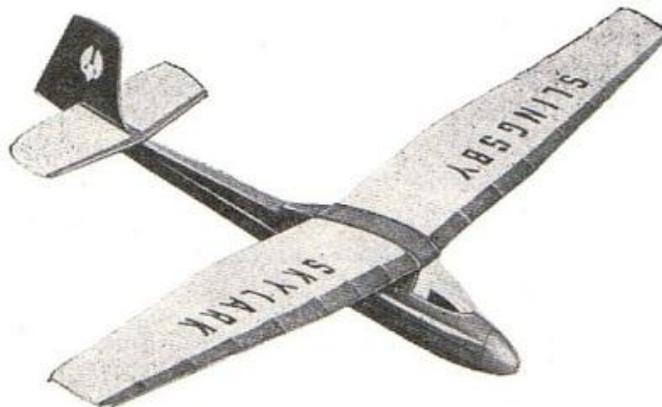
Madcap

Lament of my favourite PAW - JP

Back in the late 80's and early 90's I bought many different PAW engines such as 1cc plain bearing and several 149 plain bearing both standard and schneurle ported along with the couple of 2.5's and 19's and a 80 SBR. My particular favourite and still is being the 149s. I used them in control line models and whilst compared with recommended engines as stated on the plan such as Elfin 149 etc they are a little heavier and bulkier but not unreasonably so. These engines are still giving great service now in my Wessex League mini speed model the only thing letting the times down being my setting up and not using a compression lever lock arm or nut. I have bought others since such as a 55 and 19 for RC use in a power duration model which I have yet to build, sorry Bill Longley.

Skip forward to May 2011 and seeing a brand new 149 plain bearing I couldn't believe how much the engine has grown. It is longer, bigger crankcase and additional weight. I guess it performs equally as well as my 149 DS3's etc but how to hide that bigger engine in a cowl of a CL model and cope with those extra grams of weight up front? Times change and production is going to be geared to demand and ease of making etc but I now lament the loss of the "smaller" 149 motors, still with the long life out of present engines they may just last until the grim reaper chases after me, he (or she) won't have to run fast!

Still I'm grateful that there is a company still producing a range of diesel engines that really are cheap for all that goes into them (Don't let Messrs Eifflander read this bit) and from my experience work well once their individual foibles have been worked out and have a long life if treated properly.



Duke Fox's early Combat Specials and Rat-Race engines - by Brian Cox

Over the past three years, we've been showing engines from my screen-saver file in S&T, and these seem to have been appreciated, particularly in the form of the year-end Specials. More recently, I've been doodling a bit, to produce PC wall-paper images to suit my own tastes (or lack thereof!), and it occurred to me that these images, transformed into a vertical page format and with a few captions, could make a nice looking page for S&T. James didn't object (he never does!), so this is a little tribute to a few of my own favourite engines: Duke Fox's early Combat Specials and Rat-Race engines.

Firstly, the historical context... SAM35 control-line activity, although very healthy, doesn't include Combat, which was originally all diesel in the UK anyway. In SAM US, I don't think there's any control-line activity at all, which can only be described as « regrettable » for the country that invented control-line! Anyway, the bottom line is that the early American CL combat engines have no representation at all in world-wide old-timer activity, which is a shame as some of them, particularly Duke Fox's engines, are unequalled in delivering huge power, easily and reliably, irrespective of unbelievable abuse, crashes, mid-air, you-name-it!

The first of these engines, the 1957 .35 Combat Special, although superficially resembling earlier Fox production, had an entirely new crankcase, which was to form the basis of a new dynasty of Fox high performance engines. The general stocky and rugged appearance, and the generous webbing, are obvious. The needle valve alone incorporates a couple of interesting « crash-proofing » features. Firstly, it's as small as is practically desirable, thus minimising vulnerability, and is machined in one piece from strong steel, not just wire. Secondly, this engine inaugurated the characteristic Fox « spade-tip » fuel needle. For anyone unfamiliar with these, the needle tip is a flat « arrow-head » shape, which keeps the tapered part of the needle centrally located in the spraybar bore, irrespective of any slight bend in the needle, i.e. it contributes to the consistency and « crashproof » performance of the engine.

The second Combat Special is outwardly identical to the first, except for the chemically blacked head, but there are detailed internal differences. These first two Combat Specials were extremely successful in competition, and the « Fox cult » was born among the American stunt and combat fliers. The same crankcase was used to produce two slightly downrated sports engines, the .29X (in 1958) and the red-head Rocket .35, in 1959.

In 1960, the need for a « ball-race » engine became evident. However, rather than develop a totally new crankcase, the successful existing case was retained, but with the addition of four lugs on the front. These allowed the front bearing to be machined off, initially for the Combat Special only, and a dual needle-bearing front end, with the characteristic square intake, to be grafted on. Thus, the first needle-bearing Combat Special (the Mk III) appeared in 1960, with a second, very slightly modified, version in 1961 (both basically using the sports « Rocket » crankcase!). This development process is clearly illustrated by the engine photos shown. Incidentally, it was Peter Chinn's very impressive test of this Mk III Combat Special, in the June 1961 issue of Model Aircraft, that first sparked off my interest in Fox engines.

In parallel, and throughout the latter part of this Combat Special development, the various versions of the same crankcase were also used for the Rat-Race .40 engines. Here, Duke came up with another bit of ultra-practical reasoning. The same basic .35 crankcase could still be used for the .40, but with the head mounted on top of 2 or 3 mm of bare cylinder, protruding from the top of the crankcase(!), and this is clearly visible on the bottom three engines in the image.

The last engine shown is the famous Golden .40, first produced in 1963, with a slightly modified version in 1964. At this point, Duke reverted to a one-piece crankcase, no doubt for rigidity, and abandoned the dual needle bearing setup for a ball-race rear bearing and needles at the front. A great, great engine... That just about deals with the engines shown in the image, but it's not the end of the tale. The one-piece crankcase was used for the well-known .36X sports engine, and other models from .29 to .40. Duke continued his crankcase-sharing habits, so that the next Combat Special was actually marked 36X, but is recognisable by its finless head (I believe it's known as the « Baldy » in the States). Thus, the uninitiated (aren't we all?) should be advised that there are several Fox engines, the real identity of which is not that shown on the crankcase!

UK references are: Peter Chinn's Engine Tests (Model Aircraft - June '61 and Jan. '62), Ron Warring's test (Aeromodeller, Nov. '63, but Ron was a little out of his depth with the Golden .40) and the Aeromodeller (May '67) cover photo of George French's monumental Ramrod 750.



From Jon Fletcher

I noted your comment alongside the CS Tiger 2.5 diesel. Having rebuilt two for others I'd suggest you were correct. Plenty of engineering shortcomings. A4 page full of written errors on the last one I did. To avoid confusion in the future perhaps we should all consider using the following notation.

John Oliver and Son made their Oliver Tigers. Splendid engines that deserved their world wide reputation for design and product quality. Copies made by others can be described as Tigers, but not Oliver Tigers. Only Messrs. Oliver and their authorised successor Tom Ridley made and make Oliver Tigers. So therefore the CS Engines copy is a CS Tiger, not a CS Oliver Tiger.

I have been using this notation myself to feel more comfortable when describing the CS copies. Same notation would apply to the CS Silver Streak, a copy of the Rivers Silver Streak. Also AMCO 3.5 PB and ED Hunter CS copies.

BMFA EAST ANGLIAN GALA,

Sculthorpe Airfield, 23, 24 July 2011. Sculthorpe airfield offers the largest unobstructed flying site in the UK set in the heart of the Norfolk countryside. Apart from the model flying there are plenty of other things to do in this part of the country. Visit Norwich, the Norfolk Broads, sandy beaches at Wells or Hunstanton and stately homes such as Houghton, Blickling, Felbrigge, or Holkham. Accommodation information is available from the Fakenham Tourist Information Point, 075283 00103. Camping nearby at Fakenham Race Course, 01328 862388 and the Garden Caravan Site, Barmer Hall, Syderstone, 01485 578220.

Saturday 23 July
BMFA Combined Glider,
BMFA Combined Rubber
Classic Rubber /Power
Tailless
SLOP
E30
HLG-CLG.

Sunday 24 July
Combined Power
Classic Glider
Mini Vintage
P30
C02

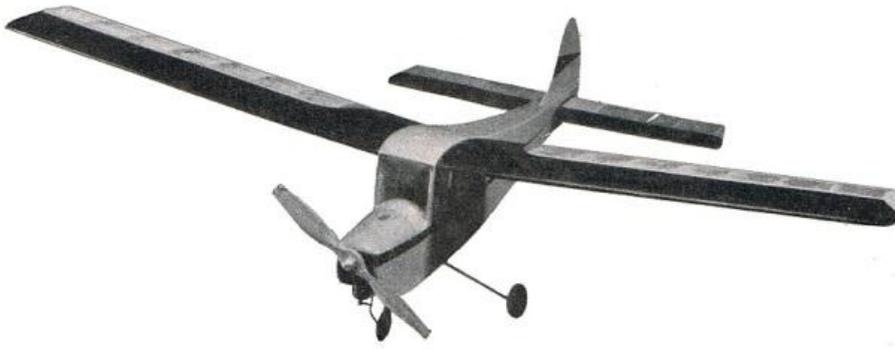
BMFA Senior Championship points for above events.

Start time 9.00 am, finish 6.00 pm. each day. Competition entry £10.00 for first class, £2.00 thereafter each day. BMFA rules apply.

For further information on this BMFA event contact Michael Marshall 01223 246142

SAM 35 will hold an RC assist, pylon and non pylon competition on Saturday the 23 July start time 10.00am. and will organise the Bowden competition, start time 11.00 am on Sunday. Further information on these events contact Harry Perkins 01507 479 668.

Location. Sculthorpe airfield, OS Map reference TF 852300. 100 Metres in a NE direction along the B1454 from its junction with the A148 road from Kings Lynn to Fakenham. No refreshments on the field this year but there is a cafeteria close to the entrance. BMFA membership essential. Site regulations do not permit dogs or children under 16 years of age.



**Fantasm by M Campbell
a 38 in span model, just
right for any .75 – 1.3 cc
motor, and very
crashproof. From Model
Aircraft October 1953**

Fantasm was designed and built as a simple rugged model for small space flying, with regard

to the odd trees, goal posts, etc., that litter the local park and have such an attraction for model planes seemingly bent on destroying themselves. The sheet fuselage and knock off wings have proved their worth in this respect, and justify the extra work.

Fuselage

Mark off and cut out two identical sides from medium 1/16 sheet, with positions of all uprights and details. Cut out windows, wing tongue slot, hole for wing retaining band, and tailplane position. Sand outsides smooth, cement to sides longerons and all uprights, including F.6.

Cement celluloid to insides of windows, make up front and rear wheel assemblies, binding and cementing well to 1/16 in. ply formers F. 1 and F.4. Join sides with all cross pieces and formers, F.1, 2, 3 and 5, cover top of fuselage with 1/16 in. medium sheet, after sanding outside smooth, grain running along fuselage, from F.5 rearwards, leaving half of F.5 and 1/8 in. X 1/8 in. cross piece exposed for butt-jointing cabin roof later. Cement rear undercarriage to fuselage with 1/8 in. sheet gussets. F.3 locates this assembly. Drill holes in engine bearers, and bolt to engine, slide into position, and cement well, with side thrust as shown on plan. Cover bottom of fuselage with 1/16 in. medium sheet, grain lengthwise, sanding outside beforehand.

Remove engine and fill in between engine bearers and cowl sides with 3/8 in. sheets, add 1/16 in. sheet grain vertical to insides of cowl cementing well giving a plywood effect to reinforce them. Plank in from F.1 to F.2 for windscreen decking, 1/16 in. medium sheet is used for this. Make up soft block top cowl hollowing out to suit engine, using dress fasteners or your own method for holding it in place. Cut out wing tongue from very hard 1/8 in. sheet (balsa offcut packs are useful for this) or ply, crack down centre for dihedral angle and place in position, but do not cement.

After wings are built push on to tongues, block up tips to correct dihedral angle and cement tongue using scrap balsa to reinforce where cracked. Cover top of cabin with 1/16 in. sheet grain across fuselage, and fit windscreen, cementing inside 1/16 in. sheet at front cabin supports up against the 1/8 in. sq. upright.

Wings

These follow normal construction except maybe the I section mainspar, which is very strong as well as light and well worth the extra construction on any model. Mark off and notch trailing edge; pin to plan. Make up ply rib template and cut out all ribs, trimming root ribs as shown for sheeting. Position 1/4 in. x 1/16 in. bottom mainspar and 1/16 in. X 1/8 in. secondary spar. Cement all ribs in place with leading edge. Assemble wing boxes bind and cement well, fit in between root ribs using 1/8 in. sheet to line up with slots in wing ribs. Reinforce with 1/8 in. X 1/8 in. scrap, and use 1/16 in. sheet for webbing between top of box and top mainspar. Cut out 1/32 in. sheet webbing pieces and cement in place between ribs and in centre of bottom mainspar, then cement in top spar and wing tips. Wing retaining hooks are cemented in place as per plan, and top of root sheeted in, remove from plan and repeat for underside.

Finishing

Sandpaper fuselage lightly, rounding off all corners. Cover completely with rag tissue, using paste, or doping fuselage and "brushing" on with thinners; give two coats of clear dope and two of sanding sealer, sanding in between coats with fine sandpaper. Colour dope as desired; an all sheet construction allows a good finish to be obtained, and if you are using a heavier engine than the original Mills .75 c.c. it will help to get the correct e.g. position. Wing and tailplane are sanded smooth all over and covered with medium rag tissue, double cover tailplane where shown. Water spray and give two coats of clear dope, colour trim as required.

Flying

Balance model at e.g. which can be slightly behind but not in front of position shown. This should give a long flat glide; if not pack up tailplane to obtain one. Set the trim tab for left circles. An 8 in. X 4 prop gives steady flights with Mills or Asneo though downthrust may be needed if the engine is not giving its best.

BOURNEMOUTH MAS CLUB CLASSIC RUBBER MIDDLE WALLOP - APRIL 2011



Mike Turner receives the Cup from John Taylor

The very worthy winner with a clear margin was **Mike Turner** and indeed his first win in the event. For the Strato Hawk design it was its second time in first slot. Close behind were **Ron Marking** up from Cornwall and **Ted Tyson** from Bournemouth. Club Classic continues to be popular and we can now regard it as firmly established with two annual events in the south. With 12 entrants this year no model type stood out with seven different types in evidence. Two Last Resorts, Urchins, Mentors, Boxalls and Trip Sticks produced no clear ascendancy.

This was the 8th annual Club Classic Rubber event staged at the Bournemouth MAS Gala. Although the wind was fairly strong from the north, it was warm and summer-like. Unfortunately this wind direction was difficult causing models to be flown close to and parallel with the western perimeter. The maximum was set at just 100 seconds to minimise loss of models into the village area. For the same reason a limited fly-off was adopted. My first experience of this was at Odiham last year and it is very effective. The Bournemouth Club have since adopted it for domestic events at Beaulieu. The D/T limit was set at 100 seconds and the actual D/T timed along with the total flight. Any positive error in D/T was doubled to establish a penalty and subtracted from the overall flight time. I heard no dissent about the arrangements and several comments of approval.

Two names are sadly missing from the results this year, Vic Wilson and Laurie Barr both previous winners. I recall how pleased Laurie felt when Club Classic was introduced, because it gave him the chance to air his Trip Stick in competition once more. May Trip Sticks and all the other interesting Club Classic designs

grace our skies for very many years to come. Thank you all for your support, we hope everyone will revisit Club Classic at Middle Wallop in August.

Results

1	Mike Turner	Strato Hawk	5.00 + 4.50
2	Ron Marking	Urchin	5.00 + 2.10
3	Ted Tyson	Last Resort	5.00 + 2.02
4	Peter Michel	Trip Stick	5.00 + 1.58
5	Adrew Longhurst	Bim Bam	5.00 + 1.40
5	John Minshull	Boxall	5.00 + 1.40
7	John Andrews	Last Resort	3.09
8	John Oulds	Boxall	2.80
9	Peter Norman	Mentor	2.50
10	John Lancaster	Urchin	1.40
10	Bob Taylor	Mentor	1.40
12	Robin Kimber	Trip Stick	-



Peter Michel with Trip Stick



Andrew Longhurst with Bim Bam and Scram

James

These are a few models and flyers that I photographed at the Bournemouth Rally last Sunday at Middle Wallop, other than Club Classic. Hope they are of use. Regards Martyn







CROYDON AIRPORT/THREE KINGS CLUB

Paul Eisner and myself have been resurrecting C/L flying interest at the old Croydon airport, where C/L has been flown since the 1960's. I met Paul there in 1976. Over the last few years the surface has become almost unusable with weeds and exposed coarse aggregate where the tarmac has weathered over time. It has also been subjected to illegal motorcycles.

With the Three Kings club we decided to resurrect a semi circle annulus with a strong mix of plastering sand and cement, also with temporary posts and barrier tape to cordon off the circle when in use. Over several weeks 8 of us have put in some sterling work, and finance. On Saturday 23rd April, Paul had a successful flight with an F2a in the pylon. This is a valuable C/L site with sufficient hard surface for 2 stunt size circles, a pylon and grass area for flying. We have access through a locked gate and need support from anyone interested in the survival of C/L flying. We need help, so whether you are active at the moment or not as we are an endangered species, please join the Three Kings club. Membership can be obtained by paying £13 this year,

Cheques made payable to The Three Kings Aeromodellers and sent to the treasurer:

Brian Glithero
19 Military Road
Rye, East Sussex
TN3 17NX

Any additional donations would be appreciated to help with our costs for the remaining repairs.

Richard Miles

Mike 'Spike' Spencer (Salisbury MFC) reports a follow up to the plan feature for the Gee-String that featured in S&T No. 51.

A few weeks ago I was able to offer an old chum the use of the Salisbury site to maiden his recently completed Gee-String with electric power. This was John's largest model for many years and he was somewhat cautious about the small size of his normal (Cricket ground) site. Quite by coincidence, I notice that the last S&T (No. 53) contained several references to Neil Webb. In the early 1960s John and I both trained as 'Fetchermite's' under Neil's guidance while he was Secretary of ADMFC and he introduced us in a most stimulating way to a lifelong hobby. John's first Gee-String during that era was flown with RCS reeds.

Due to site and home influences, John now concentrates on all-electric models and has recently been seen at various OW and Cocklebarrow Farm events with his DebutantE and Poppet types. When I first handled this

Gee-String my immediate comment was that it had a significantly lower wing loading than the original, thanks to modern equipment. There was no doubt that it would fly with the power onboard and showed great promise as a Classic Aerobat. The subsequent minutes in the air confirmed its pedigree. Weather permitting, it will be flying at the forthcoming Vintage event at St Albans.

GeE - String. Builder - John Mellor

Model details

Span: 68" 1750mm

Chord: 12" 300mm

Motor: MVVS 6,5/910 (Puffin Models)

Speed controller: JETI Spin 66 Amp (Puffin Models)

Max current 60amps

Battery: LiPO 3900 3S (West London Models). Looks as if it will give 12 to 15 minutes at half power.

Radio: Spectrum DX6i 2.4gig

Servos are a mixture of old standard ones (Futaba and Hitec) out of the model box.

Flying weight 5.5 lbs (2.5Kg) against plan guide of 7.5 lbs!! - no wonder it floats around.

Difficult to source parts: Cockpit canopy and decent size U/C. Plus low cost crumpet in the cabin.

Comments

Easy to build but needs a largish workshop. John took 3 years to complete this Gee-String but did build 3 other planes during that time. Built as per plan but with appropriate mods for electric propulsion. CG position is currently as indicated on the plan but first flights needed a fair bit of down elevator to stop it going up like a lift on power and sticking its nose up on glide. A real pussycat to fly.





"FIR-KINELL" From Ken Croft

Had I known of such an expression of surprise at the tender age of ten or twelve years, the sound and sight of Kenny Baines and his big brother flying an E.D. Bee powered control line Veron "Bee-Bug" just round the corner from my poor end of town, would have certainly justified it's use.

That experience was my first encounter with aeromodelling and engines. It was responsible for the hobby that has been with me for sixty years and it will be one of my two abiding memories of model flying. When the other memorable event happened, I was well familiar with the vernacular, and the expression was delivered in unison by the assembled multitude. I have little doubt that the memory will join with the earlier one and accompany me to my grave.

This piece is really about the second event, but to appreciate the situation you must cast your mind or your imagination back 45 years to 1966. Model engines were not as developed as they are today. The Oliver Tiger was probably the most powerful commercial 2.5cc engine, glow engines ran on as much nitro methane as you could afford to burn, silencers were around but tuned pipes had never been seen on model engines. Today's 2.5cc competition glow motors produce in excess of 3 bhp and the world control line speed record is over 200 mph on straight fuel with no nitro methane. In 1966 the world speed record for 2.5cc models on unlimited nitro stood at a fraction less than 140mph, and like all sporting records it had been creeping up each year by only the odd mile per hour. The speed models were tiny. The engines were run up to almost full revs on the ground; they quickly leapt into the air and promptly did the business.

The world control line championships were held in England in 1966, at RAF Swinderby. As a "professional" speed-watcher, the speed event was my particular interest. The grape vine chat was indeed very interesting. The USA team of Chuck Schuette, Roger Theobald and Bill Wisniewski had been practising on a nearby US airbase for the week prior to the championships, and the buzz was that terrific speeds had been obtained. When Wisniewski came out to fly, his model was like nothing seen before. Christened the "Pink Lady", it was much larger than the tiny models that were popular for speed flying, and it had an exhaust pipe as long as the model, said to be a "tuned pipe", but never before seen on a model engine. A large crowd had gathered in expectation of a very high speed run.

The engine was started but it could barely achieve any decent revs at all. Seemingly in desperation the model was released on its dolly with the engine rough and blowing lots of smoke.

It could hardly pull itself round on the ground let alone fly. After several laps on the ground the hapless Wisniewski, again apparently in desperation and seeking to avoid being a laughing stock after such high expectations, yanked the model round a bit faster and dragged it into the air. It barely flew at all, but dragged itself around the circle, nose high and blowing smoke.

That was it, we thought. Bloody cocky Americans with all the bull about high speeds! Is that the best they can do? Ho, ho, ho, what a pack of plonkers!

Then it happened. Wisniewski whipped the model up to speed, the pipe came on song and the motor produced a noise like we had never heard in our lives. The speed was unbelievable.

"Fir-Kinnel" was the almost audible expression of disbelief uttered under the breath among the crowd.

When the watches had been compared and the speeds computed from the charts, Wisniewski had raised the World speed record by 20 mph to just under 160mph! In athletic terms that was the equivalent of raising the high jump record by one foot, or knocking thirty seconds off a four minute mile!!

And how did Wisniewski celebrate his win? By keeping the secrets to himself? Not a bit of it. He gathered all those interested and he held a small symposium detailing his tuned pipe and engine developments, and he handed out design details to all who attended.

For me, nostalgia is not about puttering petrol models, even though I enjoy them immensely. It's about Kenny Baines and his ED Bee, and Wisniewski and the Pink Lady. Those were the days.



Ballerina all ready to Rock and Roll from Dave Bishop of DB Sound.

My super buddy Derek Foxwell, boss of the Old School Model Aeroplane Factory kit manufacturing company, kindly sent me a pressy for a "big" birthday recently. Well "recently" was January actually and I defy anyone to re-pack the kit of many parts back into the box that it arrives in. Dell's wife Valerie performs the magic with every kit that is produced and there is a knack in doing it, so she says.

Derek does something a bit different from most kit manufacturers inasmuch as he always weighs and measures each and every piece of wood that he uses in his kits. The only other person I have witnessed doing that was the late Cliff Goater of the Balsa Cabin who always "wore" a micrometer on the little finger of his left hand and he was constantly measuring all of his wood, all of the time.

So a visit to Avicraft at Bromley, gave me the necessary extra's needed (glue, covering material's and stuff) plus a nice sheet of see through clear plastic sheet to cover the detailed and very nicely drawn plan. Derek uses Coral Draw 11. The very few items that weren't "quite right" were so small as not really worth mentioning, except that there is one mistake on the radio installation and there clearly printed where the receiver (RX) should be, is written TX. It's only a small detail, as I said, and surprisingly the error wasn't spotted by the other 4 people who had been asked to check the plan out before it was finally subjected to the printers.

The building of the Vic Smeed's (way back) designed Ballerina, is such a pleasure and the way the wood slots in place with a perfect fit gives such pleasure and reflects the endless hours spent on Derek's huge screen computer. He takes up a lot of time getting things right and the result makes a pleasant build for everyone. I found the rear top fuselage longerons needed steaming to match up when building both sides of the fuselage on top of each other and it is a very nice sweep that enhances the model and looks good when finally covered with Litespan.

The soldering of washers on the wheels was completed after Alistair/ Robert Newman at Avicraft of Bromley suggested a sleeve tube of plastic to take up the different diameters, which made for a much nicer fit. I hate wobbly wheels on badly fitting axles.

I also added a "slide bolt" for the light ply hatch for the loading and re-charging of the Overlander Batteries 7.4 volt 2S Sport 25C Lipoly cells. I have also bought a "balanced" Overlander charger so that both "Lunn Poly" cells in series, will receive the right amount of "poke" without damaging either of the cells through being overcharged.

Well now my shiny and colourful Ballerina is ready to Rock and Roll and I hope that I get as much fun as I did when we test flew the first kitted Ballerina at Epsom Racecourse a few weeks ago along with the editor of S&T who was test flying another OCMFC creation at the same time. I have deliberately used extra colour on my model because I found that times I semi lost sight of the model being almost all the same colour. This "difference" should help a bit when R/C-ing.

As with all of my model aeroplanes, I have named them all after old friends and wonderful aeromodellers and this particular one is named after the best man at my wedding, David Boddington that will be "Boddo" as he was universally known. If you remember some S& T's ago, the free flight Polidy I built with James's help providing me a plan, was named after the great Cliff Goater and my OSMFC Tomboy named Alex after Alex McDonald another regular attendee at my Family Model & Craft Show at Plumpton Racecourse that I ran for 20 years.

My next model will be named "Geoff", after yet another pal to recently go to that big flying field up there, Geoffrey Dunmore. A total gentleman but then they all were, weren't they?



My new Ballerina electric powered OSMFC all ready to Rock and Roll.



Another view of "Boddo" the new Bishop - Ballerina.

Showtime Long Marston Airshow May 7-8. Dave Bishop

I know that S&T is not really the right place for show time reporting but that is how I have spent most of over 50 years of presenting aeroplane shows both model and full size, world wide. Consequently I thought that the editor might allow this small piece to be included (possibly) in the next issue. The reason for bringing this up is because I took my DB Sound business to the second aeroplane show at Long Marston (near Stratford upon Avon) on May 7-8 and the man in charge of the flying was Tony Hooper along with a super team of helpers. The hosts were the excellent Avonvale club team, a great group of people who worked very hard to make everyone welcome, ran it all.

The standard of this friendly show was extremely high and we were thrilled with the excellent flyers who displayed their aeroplanes without any one of them bad piloting towards the crowd line during the whole weekend.

Now one particular showstopper who thrilled the crowd with his excellent display of a electric fan jet Haboo was Luke Bishop who brought the crowd to their feet. It was a super 8-minute slot with complete with smooth flying up and down the flight line and finished up with a perfect landing. He was asked to bow to the crowd afterwards and this he did to a huge round of applause. Luke was 7 years old and is an obvious world champion in the making. His grandfather is Steve Bishop, the Telford Western Park show boss for the last

20 years. Steve, along with son Mathew, knocked everyone dead with the big Red Arrows Duo complete with a full performance of music and sound effects and (wait for it) Red, White and Blue smoke from each of the quarter scale BAC Hawks at 114" wingspan and Jet Cat P200 turbines. The price of both of these superbly finished aeroplanes has been estimated at £14,000 and each flight costs £100. Added to those was an excellent set of models and flyers of all disciplines amongst them young Ali Mashinsky, whose name alone more than doubles the crowd intake at the gates. His Viper Jet, Haboo, with the tiny new Jet cat P20 turbine that he has developed over the last year was fantastic. His Opus powered Glider that flew at over 200 mph and the Fox glider at 7 metres wingspan and a Graupner Booster turbine were all show stoppers. The Sukhoi and the T33 Skymaster plus the totally immaculately finished low passing Grumman Cougar, were all a joy to behold.

The Dawn Patrol are now an established group of classical flyers with their WW1 formation flying and always welcomed by the crowd-line (and the commentator) and "Jez" Harris Nieuport 28c has one of the finest models I have ever seen that flies like a dream and put him alongside Michael Brody with his Fokker DR1 and Pat Cuss (a very serious flyer and diligent builder) with his stunning Bristol M1c. That particular slot is over far too soon for my liking.

There were fun flyers and a Panic team welcomed from Oxford along with Shane Harding and Josh Spiers who delighted every. The "boss" Tony Hooper flew a BAC drone along with the Ghost squadron with their huge Bell Huey helicopter and an enormous A10 Thunderbolt and many others including some super helicopters and the good news is that they will all be on show at the 20th airshow at beautiful Western Park in Telford over the Fathers Day weekend and also at the 25th annual Jane Stephenson's Wings & Wheels show at North Weald aerodrome.



Seven-Year-old, Luke Bishop, flying in his solo slot



The superb Red Arrows Hawks duo of Steve and Matt Bishop with red, white and blue smoke on.



The super crossover caught by cameraman Neil Hutchinson.



The wonderful Grumman Cougar of Ali Mashinsky Jnr performing yet another low pass. Note, his father stopped the show at Old Warden (so many years ago) when he appeared there with a Gee Bee racer, which looked great and at the hands of Ali (senior), with his radio controlled flying

David Kinsella's Column

What Fun We Had

And here's our Ron as I'll always remember him. My Dalesman to Class C (Dooling 61) built by Alan Walker, the hefty tome on the mighty Moss signed to Ron by Stirling. As I remember it, I took the shot with Ron's camera during yet another wonderful day at Old Warden. For some years Ron laid on tea and cake at his tent. One year, sitting near him in said tent I noticed an expression of incredulity spread across his face. Pzzleed for some time, he later whispered that my trousers had given way. Dhobi wallah late on duty that day, I'd gone commando!



Good Stuff From Staffs

Model Engine World, published for several years by John Goodall of Barton Model Products, is well worth hunting down. Lots of info and pictures over 32 A4 pages, tests and reviews and letters from around the world make fine reading. John published a good ninety editions before selling the magazine. Then came his celebrated Oliver history which all should have.

Toot Toot

Students on the grass slouching, (unrehearsed) through a spot of classical with their clarinets were joined by a mature fellow not seen on campus. He knew his instrument and the pieces and played well. Thanking the young men, the ace got up and left. Later they realised that the visitor was Benny Goodman from Chicago but making it big in California, The King of Swing cut hundreds of records and for years dominated the world of dance music. The famous 'Goodman ray' told a sideman that he was fired.



Big Skidder

For 1952 the FAI declared that cycle wings were out. Full width bodies from now on at le Mans and elsewhere, seatbelt manufacturer Les decided to bring his Allard into line. Then he attempted to average well over the ton on MI before a restriction came in (probably inspired by the Cobra incident). Les told me that 150mph was advisable to secure even 130 average, but oil left the dif and the whole lot locked solid. Busy at the wheel for some minutes as the storming device (Chrysler hemi VB on Webers) covered all lanes plus the hard shoulder and centre strip, Les took the all-time skid record for MI

Big Auctions

Dominic Winter holds two specialist auctions at South Cerney, near Swindon, in May and November.. Models, pictures, books, flying gear, props, maps and model engines there in quantity, a trip west should be considered. Contact number is 01285 860006. This could be the place for that Camel or SE5 prop. Big models seen include a Lancaster, Vimy and Albatros in full fig colour. A van might be a good idea.

Risky Business

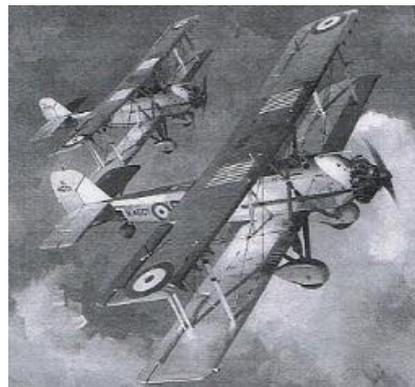
The amazing adventures of Eileen Nearne were recently explored in the papers, but erroneously pictures of her sister were printed in instead. Both were front line in the wartime SOE, Jacqueline starring in Now It Can Be Told (1944, RAP Film Production Unit) on her return from France. Stills show her with an automatic, hill walking, employing the Fairbairn-Sykes aiming technique, mining a railway, tapping out Morse and signalling for parachute drops. The F-S fighting knife was a foot long and it was 007 stuff - but for real! More than a few agents vanished...

Dick and Dan

Handing over to Duncan Caree (S&T No 46) Noel Johnson became Dan Dare! Space adventure stuff was recorded on vinyl at Star Sound Studios in London and were separate from those in Eagle. Like so much else, the discs were soon destroyed after the broadcasts. Or were they? There's a rumour that a few exist in Spain. Huge quantities of Barton material are held at the BBC, but there's lots more elsewhere. That a box of discs lost somewhere in the UK seems unlikely, there's often a fellow around who can't bare the thought of history rubbed out to save space. In this way the detailed Allard Build Register was saved from the flames forty years ago.

Jupiter Days

A winner at the Guild Show in London, here Roger Middlebrook gives us two from the Empire's Silver Biplane Era on patrol. Hand starting these beasts was done by placing a bag-like device over the tip of a blade, then a team of three or four would pull smartly on the rope attached to it. In hot areas - and suicides caused by heat were known - crews flew in cork helmets and spine pads. At big dances along the North West Frontier the Brylcream Boys (term used before WW2) would share young gals from the Fishing Fleet with fellows from Hodson's Horse, Probyn's Horse, the Frontier Force Rifles and dashing sticks from Skinner's Horse. Coming home after a tour of duty it was traditional to cast one's Bombay Bowler into the Suez Canal, 15,000 tonners in blues-striped white and called Somersetshire or Dorsetshire well loaded and sometimes carrying horses. By P & O liner was the way to do it if a voyage could be wangled.



A Solution

Do you fire or fondle? If the latter, John at Finescalebrass (0113 276 1759) will preserve your mint live steam Asters by offering Gauge One models in brass and steel and driven by a powerful electric motor! GWR Halls, LMS Scots and Jubilees are the ticket for happy track days, all investments safe and secure. Radio and chuffing sounds add to the fun. My 27in North West Frontier in LMS crimson lake is rivet perfect, heavy and soothing too in these troubled times. Act now and all will be well.

King Steam

Possibly less attractive today, locomotives in the age of steam had a huge following. Boris III of Bulgaria drove the Orient Express when it passed through his kingdom and in a white boiler suit took the crack LMS Coronation Scot streamliner on her journey north. Dvorak was a keen train spotter, the opening of his Ninth Symphony clearly with the sounds of a mighty engine starting away. The magnificent piece by Vivian Ellis is regularly heard although composed eighty years ago. And with it Paul Temple lives again.

Fighter Boys

Aces a plenty, over the double page we find Kent (Biggin CO), Banks (Air Commodore and Schneider fuels expert), Mitchell (son of Reg), Page and Gleave (cockpit fire victims), Baxter (TV, Farnborough), Cunningham and Quill (test pilots), Dowding (daughter of Stuffy). Several require no introduction at all! Several wrote fine letters to me.



Not Quite

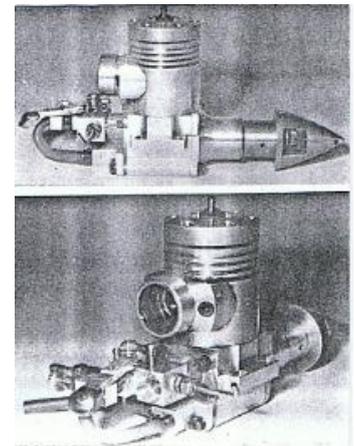
In the Village I sometimes see a car that looks like a Bugatti, chap in leather helmet and goggles as he drives off. A supercharged 35B, for example, has an exhaust note like no other - hard and brittle with a dollop of ripping canvas sounds plus pongs from Castrol R and racing fuel. Then there's the matter of cast wheels with brake drums, also the alfresco brake and gear levers (when wet, a 'drysleeve' was worn on the right arm). Tiny too, and a lump of the ignition system sticks through the dash into the tight-squeeze cockpit, the passenger easier with his right arm stretched across the tail. In flight, as well as the exhaust streaming astern of the pointed tail, there's the whirring clockwork sounds from the gearbox and blower. A tough act to follow. Top Bugatti man Conway designed the 50p piece

Thin Staffing

The bearing down on heads in the workplace has unfortunate results these days, viz communication problems and much else! Calling a high street name I went straight to voicemail. After another attempt which failed, I found a live voice which gave me another number because everyone was too busy to talk to me. I rang, but was answered by someone in - Scotland! With another and after endless options and "your call is important to us" repeated plus bursts of Verdi, yet another recording said that I would be charged for the call (but I was using my phone!) and would be billed. Declining further games with twits, I sent them a letter. I think I put a stamp on it...

Bob-Weight Action

Ron had several visitors at Aero Modeller's offices. One day Jack Frye turned up with two of his American Speed models, much of the 5cc and 10cc engines of his own making. Pictured is the 5cc which featured K & B and Super Tigre parts and a special fuel device which cut in by bob-weight action when the model hit 120mph. It was 1969. Later both models went to; Miguel, the super-collector, and later still both were sold at the huge all-day auction in Kensington, an army of enthusiast arriving from all over. Lots of piping was part of the fuel system.



M1 Again

In Little Duce Coupe the Beach Boys tell us how to soup a V8. But thinning cylinder walls for more cubes could be risky. One day at 100mph on M1 a cylinder collapsed, compressed water knocking out the crankshaft and raising a cylinder head. The whole event causing a terrible noise and streams of black oil on the concrete. Steaming, AKS 747 rolled to a standstill. Sadly my friend had not packed a change of underpants.

Treasures Nearby

Aldwych, 100ft down and cosy, was the Tube choice when the bombs fell. The service still ran, of course, snoozers advised to put their beds close to the white tiles and adverts for Player's and urgings to Dig For Victory. Just the other side of the wall were the famous Elgin Marbles from the Acropolis and Parthenon. Other valuables went to Cheshire's salt mines and the pits in Wales.

King's Cup Winner

In reply to my question Alex Henshaw, the great pioneer and test pilot and famous for his Mew Gull, said that he was given dozens of club ties and couldn't remember what he was wearing. His books on the Merlin and the Mew Gull are freely available, but for the serious student of aviation and art comes Alex Henshaw - Flying Legend. A landscape format stunner with Michael Turner's fine paintings. Try studio 88 for supplies.



Mighty Model

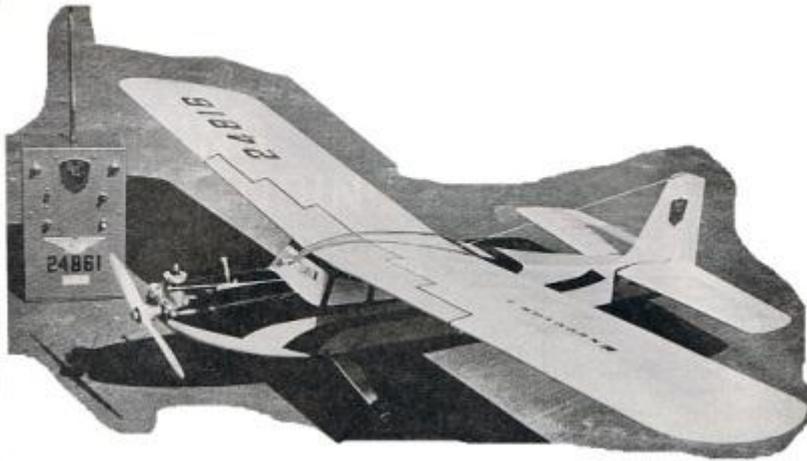
Seen at Modelzone recently, the 1ft model of Lawrence's Brough Superior is drenched with detail and highly collectable. Selling quickly, a few may be available from Grand Prix Legends (0844 887 8888). Often riding in full RAF uniform and smartly too, the Fellow of All Souls cut a remembered dash

Always Good Stuff

Dick Roberts continues to give us the juice on all that's good in the world of model aero engines. His Ear column is a must-read, and agile youngsters scanning this should know that Dick was testing for Aero Modeller and John Goodall's magazine years ago. He praised fine originals and Hende's several replicas and was fair to Basil's ED Racer, 60 this year and a fort-holder for those who could not afford an Oliver - or wait for one. Speed model Gook showed how well a Racer could go (World Record) and the 246 did well in Class A and Free Flight too. As Dick would no doubt agree, the early magnesium ones are the best and Basil was horrified when I showed him one of the later Racers made elsewhere. Gaze on all that black and red and you'll be agile too. Time for a fondle.



Executor Dave Platt's intermediate R/C design is simple, strong and certainly does the job! From Model Aircraft May 1963



There cannot be much doubt that the great majority of modellers who venture into R/C, have far more ambition than their finances will allow them to realise. We would all like to build and fly a pukka multi model, but most of us could barely manage the cost of five servos—let alone all the rest! These economic facts of modelling life have resulted in a very strong following for “more for less” R/C: cascaded escapements, simple-simul, etc. Simple-simul (Galloping Ghost) has never been as popular as the escapement deals

though, probably because of the un-aesthetic control-surface wag and somewhat complex circuitry involved.

When R.E.P. announced their new “Twin Triple” outfit, I seized on this as the best system for the “intermediate” model. No impossible button pushing and yet enough controls to make the model a really good aerobatic flyer—if the full potentiality of the system were realised—and thereby hangs a tale. Firstly, the escapement system as provided with the outfit, gave only sequence elevator, quite obviously not as good as a compound giving selective movements, for the same button pushing as the rudder control already demanded. My rudder-only experiences had given me several wrecked models, until I changed to compound escapements and for me to have sequential elevators, would be asking for trouble! Not everyone has this trouble of course—some R/C’ers even prefer sequence control.

The modified “Corporal” provided with the standard “Twin Triple” outfit was therefore reverted to its original form, for use as the engine control escapement and I bought another “Commander” for the elevator. This completed my R/C gear requirements. The engine I selected was the O.S. Max-III .15 R/C of which I had heard good reports. These proved well founded, and its good power, easy starting and really beautiful idling, make it an excellent choice for the Executor and similar intermediate models. In a short while the first model was built but an unexpected snag delayed the first flight, later traced (thanks, John Dumble) to the battery box. Vibration would set the rudder escapement madly rotating as soon as the receiver was switched on. The reasons for this I will not go into here, since this is an aeromodelling story and not an electronics one. Anyway, the box was accordingly discarded and the battery mounted in sponge rubber, a method used ever since.

This first Executor was broadly similar to the Mk. 4 presented here, the main differences being in the wing section which was flat bottomed, the tank, which was a 30 c.c. T/R type and, most important of all, the control surface drives from the escapements, which were of the standard 1/4 in. sq. balsa torque rod type. Span was 48 in., area 420 sq. in. and weight 36 oz. This model flew well and would loop, roll and do satisfying touch-and-go landings, but would not bunt, quite obviously due to the excess air pressure on the elevators in the dive. However, a little inverted flying was done within the limitations imposed by the fuel tank. At this point it was abundantly clear that the impossible (at this time) bunt was the key to a fully acrobatic model and so all further efforts were concentrated on this manoeuvre.

A new model was designed and built in short order. Area became 550 sq. in. with a span of 56 in., wing section was changed to 15 per cent, semi-symmetrical to help the promise of inverted flight along and the tank was the usual polythene bottle type. The elevators were aerodynamically balanced. This Mk. 2 weighed just 40 oz. ready-to-go. The fuselage was a little more bulky and I hoped that the greater drag of the larger model, together with the elevator balance, would produce the bunts by preventing too great a build-up of airspeed.

The first flight of the new model showed that the trouble remained, the elevator flattening out in bunts. The following evening, with static balance on the elevators as an addition, I tried again. Still no joy! I flew no more, took the model home and started some serious thinking. One consolation was that the semi

symmetrical wing section had shown no bad tendencies—it was, if anything, more inherently stable than the previous version, the model flying perfectly well on rudder control only.

A few days later “the penny suddenly dropped.” I would modify the elevator escapement to drive via a pushrod instead of a torque-rod! A word of explanation is necessary here. The standard “rocking crank” system of drive is subject to considerable blow back of the elevator for two reasons. Firstly the torque-rod itself, being so long, will twist readily, removing perhaps half of the applied movement. Secondly, whatever movement remains can be flattened out by the airstream against the torque of the rubber driving the escapement. So having got rid of the lost movement due to the torque-rod twist—by using a pushrod—it remained to take the power of the airstream away from the rubber motor and lose it elsewhere. This could be done by using the bridle system as applied to the Elmic “Corporal.” Any force now put on the elevator would make the bridle tend to push on the pin in the escapement wheel, but not drive the escapement round. At this stage Dennis Elmes of Elmic was contacted and he made for me a modified form of “Commander” to my suggested layout. I would like here to give credit to Dennis, whose excellent workmanship and enthusiasm to help in the project, made everything so much easier. The new escapement was mounted to drive the elevator of the Mk. 2 and suitable flying weather was awaited with considerable impatience. Such is fate in this R/C game that the model was only to survive two more flights before it was badly damaged, due to pilot error, but the breakthrough had indeed been made. No elevator blowback was experienced and one bunt was tried and successfully completed. In a state of high anticipation, the Mk 3 was built. This time modified “Commanders” were used on both elevator and rudder, size was reduced a little to 54. in. span, 520 sq. in. area and the balancing of the elevator, not now being necessary, was done away with. A fully symmetrical, 18 per cent. thick wing was used to further enhance the stability and symmetry of the model. No sidethrust was used and a very large left hand circle was obtained on straight line-up; since “right” is the first signal this is a very safe trim. The weight of this model was 38 oz. and, trimmed with very little decalage, it was very fast, but again, completely safe to fly on rudder only. This model proved to be the complete answer and would loop, bunt, roll, perform horizontal and vertical eights, and—given bags of practice—fly some rather dicey inverted, although this latter movement is NOT recommended for slow thinkers!

The Executor 4 presented here is almost identical to the Mk.3. It is somewhat easier to build and the R/C equipment fits in more neatly now. It has been my aim to give good protection to the R/C gear in this design and this has been borne out in countless minor and major crashes, in which the receiver has never suffered any damage. The wing of Mk. 4 is a little thinner at 15 per cent and the tailplane has been integrated with the fuselage, with the result that unintentional variations of trim are no longer a threat. If built accurately, no adjustments should be necessary, but the elevators and rudder can be “twisted” to good effect if something does seem a little wrong. Weight should be about 2 1/2-3 lb.

So much for the story behind this project. The words hardly seem to do justice to the hours of head-scratching and sometimes downright frustration involved; the jubilation as each problem was overcome and the final triumph. Only brief notes on construction are given here, since it is felt that the story would be of more interest to those who might try a similar project using this R/C gear.

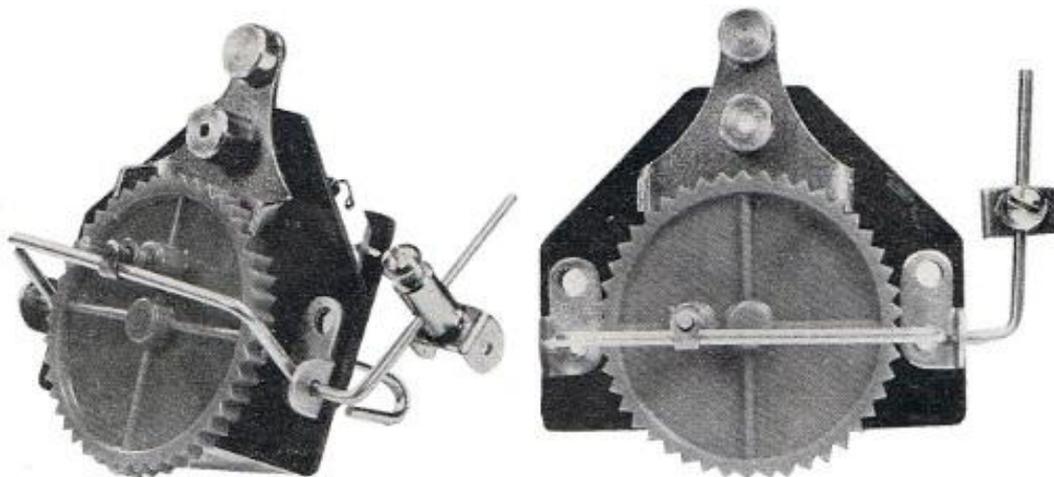
The only part of the construction that might seem difficult is how to build the wing. This can be overcome by cementing all four spars to the central 1/4 in. dihedral brace, then building the wings one at a time on the bench after sliding the ribs into place along the spars and glueing. Be careful not to introduce any warps as the model flies at high speed and is, therefore, sensitive to any building inaccuracies. Use wood of the specified hardness for all parts—experience has determined these, over months of flying. I removed the 4- and 2-pin plugs from the “Twin Triple” receiver and led the four wires to a standard 4-pin plug. This saves space and has less potential of weakness with only four solder joints.

Dural for the U/C can be obtained from J. Smith & Sons, St. John’s Square, Clerkenwell, London, E.C.1, at approximately 8s. 6d. per sq. ft. Paxolin for the engine mount can be found in junk shops and nothing less than 1/8 in. thick will be any good (incidentally, it is a good idea to carry a spare when you go flying). Any sidethrust adjustment needed can be put into the plate when cut. It is recommended that newcomers to R/C fit a 1.5 c.c. engine (an A.M. 15 R/C would be ideal) until experience of flying is gained. Elevators can be cruel to the novice! Engines can be freely interchanged in this design and I suggest that discretion is exercised even for experienced rudder only flyers.

I could have got quicker results by using the “Corporal” elevator escapement provided because this escapement utilises a pushrod and bridle, which I later discovered was essential. However, the additional work modifying the “Commander” was worthwhile, in order to have selective elevator positions and I cannot recommend the sequence (Corporal) method for this model.

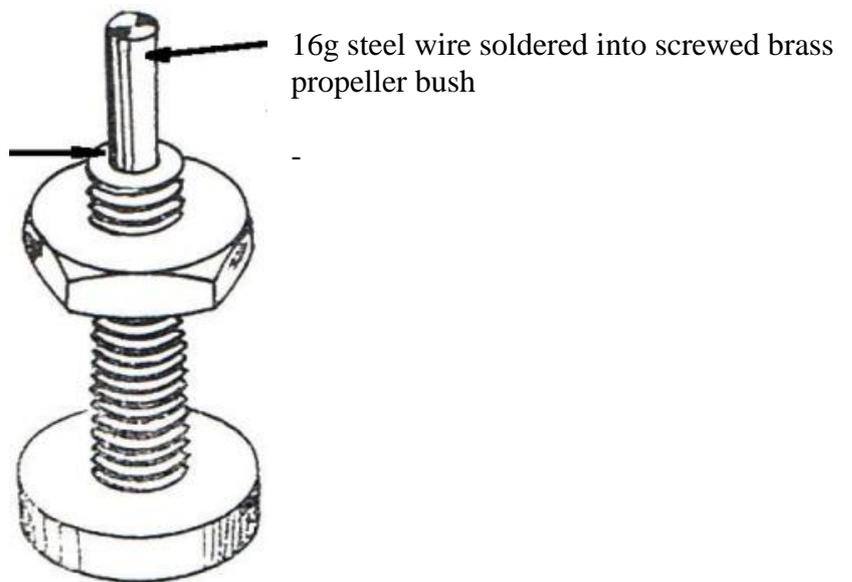
For those with a mechanical “bent” the modification of a standard “Commander” escapement to convert it for pushrod use, is a comparatively straight forward process. The whole bridle linkage is identical to that fitted to the “Corporal” escapement, supplied with every “Twin Triple” outfit and this should be used as a pattern when fashioning these additional parts for the “Commander.” The parts themselves may be used if they are not to be employed for the engine control linkage. The only operation requiring extra care is the re-positioning of the drive pin on the wheel which, on the pushrod “Commander,” must be mounted at 90 deg. From the original position. To do this it is necessary first to saw off the existing pin flush with the wheel surface (use a piercing saw). A new 16 s.w.g. pin is soldered into a shortened 16 s.w.g. “rubber model” screwed brass prop bearing bush and this assembly is then mounted in the wheel, in the new position. It will be necessary to remove the wheel before starting the mod and this is easily done by unsoldering the rubber hook on the rear of the escapement, when the wheel and shaft may be slid out. I must emphasise that although the modification described is not difficult, it does require accurate workmanship and obviously no responsibility can be accepted by the manufacturers if you wreck your escapement (or model), as a result of faulty assembly!

We are pleased to be able to announce that Elmic are making available a specially modified “Commander” for use with pushrod linkages (but without the quick-blip contacts), so if your metalwork technique is at all suspect—buy the finished product (see the Elmic advertisement on Page 164) .—EDITOR.



The Elmic Commander supplied by the manufacturer, modified for pushrod use. Left hand shows on position and right Neutral. DIY modifiers must reposition the drive pin on the original escapement by 90 degrees as described below.

Bush face should be almost flush with when tightened into the escapement nut



Razzamachas by Chas Taylor from October 1961 Aero Modeller

Britain's most experienced team race pilot offers his 'gen' on Class B racing with his fast, monowheel Razzamachas including tanjk detail and engine modifications.

Things have come quite a way since the commencement of Team Racing in this country. We can well



remember, in our first race, being trounced by the Editor and his E.D. 346 model, pitted by his wife and H.J.N. That takes quite a memory, but by gum, it was really good fun, in the days ten years ago when 80 m.p.h. was really going, and not a single pilot so much as poked a friendly elbow in another bod's ear! However, the price of progress is bound to be more cut-throat competition, and well worth it to gain the satisfaction of a good, fast time. It is a constant struggle to keep somewhere at the top in "B" as with any branch of our sport, but the fact that the West Essex Club have managed to win and place in quite a few races is due entirely to persistence, really hard work, and always the search for the little something that will give a few more m.p.h., that extra lap, and a second saved on a pit-stop. The means are at everyone's disposal to win, and if any tip this article contains may assist some aspiring future Nationals winner, then a decade will not have passed vainly. The greatest advances have been made with motors and fuels.

The model itself has remained more or less

the same since the introduction of the present rules some nine years ago, and provided it is of clean design, of reasonably light, though tough construction, and flies steady as a rock in any weather, no fantastic advance appears possible. Monowheel undercarriage has made its appearance, and would seem to be a necessary evil whilst such a landing gear is permitted by the rules.

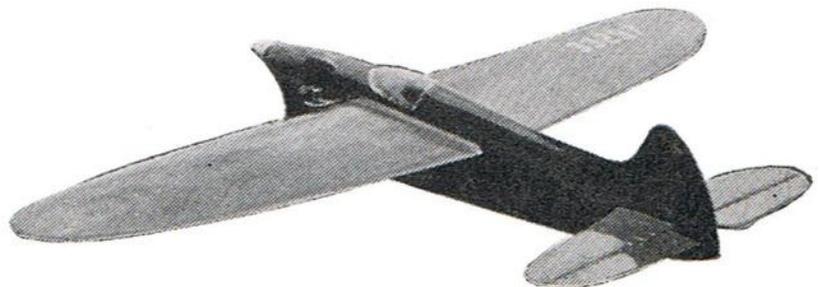
Having tried both single and dual leg on the "Razzamachas", we know that the disposal of one leg and wheel does add at least 3/4 m.p.h. on a 100 m.p.h. plus model—which could mean about 12 secs. on a 7 minute race-5 laps-which is a comfortable margin by which to win these days. We do feel that it might be a good thing if monowheel were outlawed, but whilst it is not, then we must use it.

One most important item on the model, of course, is the tank. Here opinions are divided between the single-cell tank and the "chicken-hopper" 2-cell type. We have used both once again, and far and away our best results have been obtained with the "old-fashioned" single-cell. Certainly it has proved the more consistent, but of course it must be of the correct shape, and perhaps even more important, be positioned correctly in the fuselage. The tank design we use is shown on the plan, and has been used in all our models for the past 4 or 5 years, working perfectly each time, proving that it is not suited to one model or motor only.

It should not be assumed that all the foremost Class B teams use motors of the "Special" variety that are not

available on the open market. Obviously, if

some re-working of a standard motor can improve performance, it should be carried out, but there is a limited amount that can be done by the average modeller without access to any sort of precision machinery or the skill and experience to carry out a complete re-build. A well-known example of contest success with a standard motor was the 7 mins. 9 secs. set up by John McNess at the 1955 Nationals, a time which was not bettered until 1960. Then there is Ray Tuthill, past Nats. winner, who has put up the very good time of 6:44, once again using a perfectly standard ETA 29, this motor certainly appearing to be the best bet in this country at the moment. We have recently carried out some trials with a Merco 29 and found it to be most economical, the model doing 60 or so laps, although the speed was obviously down a bit, at 95. The model



itself was a heavy (35 oz.) battered old test-bed, so there does seem a good chance that, given a new, very much lighter model, say in the region of 20 oz., it would not be beyond the bounds of possibility to do the 70 laps non-stop at around the 100 mark. We are sufficiently interested to be getting such a model constructed to investigate further, but for the moment, the ringed-piston racing motor is tops, it being unfortunate that the ETA VIc very good though it is, is the only one of its type and capacity manufactured in this country. We ourselves have been using both the ETA and the McCoy 29 for some time, and carry out no mods to the standard ETA at all. The running-in however, on this motor, we do carefully and most religiously, until the motor has had at least 1 hours running. With the McCoy, 4 basic mods are made. The cylinder head is scrapped and replaced with another having a hemispherical combustion chamber, with a cut-away for the deflector on the piston crown, as is now incorporated on the new "wisniewski" K. & B. 15 and 29. The alloy disc-valve is replaced by one made of "Tufnol", recessed on the rear face to reduce friction, and the "open" needle assembly is replaced with a single-hole spray-bar. The only remaining mod is to polish the transfer passage as much as possible, using a piece of emery cloth on the end of a shaped piece of wood (with the cylinder removed), On the bench, we have found that, generally speaking, if one of our motors will turn an 8 x 8 "Power" prop at 14,000 r.p.m. or more, using any of the usual team-race brews incorporating 20 per cent, nitro methane, then it should be good for at least 105 m.p.h. But we have one notable exception which will do no more than 12,200 on this combination, yet musters 110 m.p.h. in the air, so where does one go from there? The moral, of course, is to treat bench readings a little sceptically as far as performance in the model is concerned—and fly the darned thing!

To do a fast time—something like 3:20 in the heat, 7 mins or under for the final, it has become absolutely necessary to do no less than distance on one tankful in the heat—preferably about 40 laps, allowing a good margin for safety. Up to about 18 months ago we found this most difficult to achieve consistently, but since that time have been able to do so with regularity, due to a great deal of research on fuels, both theoretical and practical.

An article on Class B fuels, giving details and reports to all our past and present formulae, including that used in the Razzamachas when the present fastest time of 6:42 was established (in a race), will appear in next month's AEROMODELLER, and should be of considerable interest and assistance to those seeking either extra laps or extra "urge". Till then—the best of luck mates!



Glue in nose block, B2, B1, B3, B4 and B5 in that order.

Make and install the torque rod and rear bearing; fit the fuselage top. Check for free movement of the rod and, if satisfactory, glue the top in place. Add the fin and rudder and tailplane platform, etc. Slide the torque rod and rear bearing back, lift out the escapement and carve and sand the fuselage to the sections shown on the plan. Cover the fuselage with lightweight Modelspan doped on.

Make up the battery clips, mount the switch and complete the installation wiring to suit the receiver. Leave wires long enough to allow access when changing the batteries. Glue F1 in place; it is not necessary to glue in F2.

The construction of the wings and tailplane is quite conventional, but it is essential that the tailplane be kept as light as possible; the original weighed 1/3 oz. Cover wings with heavyweight Modelspan and the tailplane with either light weight Modelspan or hard white tissue. Give the wings two coats of clear dope and the tailplane one. Colour-dope the fuselage and give the whole model one or two coats of clear Belco or similar varnish. The finished model should weigh approximately 20 oz. The original weighed s 19 1/2 oz.

Flying Instructions

Check the c.g. position and add more weight to the nose if necessary, although the original did not require any additional weight or packing. This trim is satisfactory for towline flying, but for slope soaring more ballast will be required in the nose. The amount will vary (with conditions) from 1/2 oz. up wards, with packing under the tailplane to suit.

When slope soaring, first trim the model over level ground to suit prevailing conditions. Launch from half to three-quarters of the way up the hill, or higher on a calm day (5-10 mph wind) and stay lower on a windy day (10-20 m.p.h.). When the model is airborne, give the receiver a couple of quick signals, to ensure that the rudder is functioning properly. Allow the model to fly outwards from the hill for a time and if the launching site is a good one, the model will climb at something like 55-60 deg. (although still at its natural gliding angle). If it is not climbing, it may be because it is trimmed for too much penetration.

If, however, there is a steeper part of the hill within easy reach, fly towards it. There will be an increase in flying speed as the model turns out of the wind. Allow the model to fly in close to the steep part of the hill as it does so, it should gain 50 ft. or so in altitude. At this point, watch out for a stall (although it is unlikely that this will occur). If there is a tendency to stall, give a touch of rudder in the same direction as the model is turning. The excess speed will soon fall and 50 ft. will have been gained.

Once the area of greatest "lift" has been ascertained, keep in this area, either by zig-zagging or making circuits, until the model has gained a good altitude. It will be noticed that the "lift" is not constant along the full face of a hill. If the model climbs too high, fly upwind, away from the hill; this will amount to perhaps five minutes' flying time and the model may then be so far away as to make it difficult to determine in which direction it is heading (a pair of binoculars are useful here). Nevertheless, it will soon lose altitude, when the return flight will only take about 30 sec.



If the model is lacking in penetration, go easy on the Tx button; it is surprising how too many signals will upset and hold it back. When the model is flying up-wind, it may suddenly bank as much as 45 deg., without going much off course. This is caused by side gusts, but it will level out again

without requiring any correcting signals.

I think the most satisfactory flying is had in an area where the lift is just strong enough to support the glider without gaining or losing any height.

Please visit our website: www.martyn.pressnell.btinternet.co.uk

MSP PLANS PRESENTS FOR 2011

Vintage, Classic, Sport and other Duration Designs

MSP PLANS drawn by Martyn Pressnell, offer a collection of model aircraft designs selected for their aesthetic qualities or unique origins. 'Popular Plans' are stocked, the more complex 'Collectors Plans' are printed to order including Historic Notes. All drawings are A0 size, some as twin plans. The list below includes Vintage Models generally pre 1951 and Classic Models 1951 to 1961. Photos of most models can be seen on my website.

POPULAR PLANS - £7.00 EACH INCLUDING UK POSTAGE, FOLDED FOR POSTING

MICK FARTHING 1942 The 40 in span *Lightweight Contest* rubber model with a diamond fuselage. Redrawn from an early source drawing, now as a fully developed plan showing all details. A model to the older FAI specifications, about Wakefield size.

MICK FARTHING'S 'THE PAPER BAG' This is the unique plan of the late Mick Farthing's last lightweight rubber model of 1946. The very light machine had a near vertical climb and extended duration in fairly calm conditions. Produced from the designer's working drawing. Meets SAM Small Rubber class rules. Twin plan with the **RAFF V**.

RAFF V 1947 Designed by Norman Marcus who was National Champion in 1946. His very successful **RAFF V** was typical of the lightweight type of rubber model, now suiting the BMFA Rubber class rules and SAM small rubber rules. Better proportioned than many, it proved a thoroughbred with its single-bladed folding propeller. Twin plan with the **PAPER BAG**.

ODENMAN'S 1950 NORDIC A2 Swedish Championship glider, placed second in the first World International in 1950. Acknowledged trend setter, probably the best vintage Nordic A2 glider before the Classic era of 1951. Published in Sweden.

SENATOR 1950 RUBBER Designed by Albert Hatfull and kitted in 1950. Probably the most successful kitted rubber model of all time. Renowned for its stability and contest performance, with 30 in. projected span (32 in. true span) and tip dihedral. Twin plan with the **ACE**.

ACE 1950 RUBBER Designed by Bill Dean and kitted in 1950. Reliable and attractive beginner's model of 30 in span and vee-dihedral wing. Drawn with traditional balsawood free-wheeling propeller. Twin plan with **SENATOR**.

ENGLISH VIKING 1953 A2 GLIDER Designed by Bill Farrance after his experience with the GB Team at the 1952 World Championships in Austria. Capable of a full 4 minutes from the 328 ft towline, an acclaimed glider of proven performance, twice winner of the SAM Radislav Rybach trophy.

CRESTA A 38 in wingspan low-wing design for small diesel power, original drawn by MSP for kitting in 1955. Now redesigned as a complete plan and including electric motor installation.

FRED BOXALL'S 1956 OPEN RUBBER MODEL One of the most successful open rubber models of its time, designed by this highly respected British team member. Winner of the Model Aircraft Trophy at the 1958 British Nationals. Potentially as capable today with 75 gram rubber as a BMFA Rubber class model. Approved by the Bournemouth MAS for Club Classic Rubber events. Twin plan with Boxall's **SEAPLANE**.

LAST RESORT 1956 CLASSIC RUBBER The remarkable small Open Rubber Model designed by Jim Baguley, a model resembling a small stretched Wakefield of 1953. Dependable and easily trimmed, climbs in a steep and rapid spiral climb. Has proven to be the most popular model approved for Bournemouth MAS Club Classic Rubber events. Twin plan with **FIRST RESORT**.

WINDING BOY II 1956 design by Urlan Wannop from Scotland with many successes north of the border, a 38 in. span, V dihedral wing of geodetic construction and with a diamond box fuselage. This is a potentially high performance rubber model to suit the BMFA Rubber class, while being an approved Bournemouth MAS Club Classic rubber model. Twin plan with **McGILLIVRAY'S LIGHTWEIGHT**.

JACK MCGILLIVRAY'S LIGHTWEIGHT 1958 The ultimate Canadian lightweight rubber model of 36 in. span, V-dihedral wing, with jig-built diamond box fuselage. Two piece wing to avoid damage and for easy transport. Approved Bournemouth MAS Club Classic design. A challenge to the discerning builder, or with simplified construction for the BMFA Rubber class. Twin plan with **WINDING BOY II**.

CAPRICE 1959 GLIDER The renowned lightweight glider of 51 in span, designed for kitting in 1959 by Neville Willis. The most successful competition glider ever kitted, with innumerable wins to its credit. A favourite with aeromodellers world wide. Twin plan with **GAUCHO**.

VAKUSHNA 1959 A2 Designed by Brian Dowling this glider won the 1960 Pilcher Cup along with other successes. It should be regarded as a straightforward and satisfying build, very suited to rough British weather Accepted for SAM events but not meeting BMFA publication requirements.

GAUCHO 1960 POWER DURATION A first class model for 1.5 cc engines. Designed in 1959 by Neville Willis, it proved an ideal kit introduction to free flight power duration. A classic model suited to British Power events today. Twin plan with **CAPRICE**.

FRED BOXALL'S SEAPLANE (1965) Completing this duo of contest machines, commemorating Fred Boxall The Seaplane established itself in this challenging form of flight, constructed in his inimitable style, guaranteed to fly well. Twin plan with the **1956 OPEN RUBBER MODEL**.

FIRST RESORT 2006 Designed by Martyn Pressnell for the BMFA Rubber Class, development of Jim Baguley's design using 50g of rubber, 36" span, tip dihedral. Twin plan with **LAST RESORT**.

COLLECTOR'S PLANS - £10.00 EACH FOLDED OR ROLLED, WITH HISTORICAL NOTES

JUDGE 1945 WAKEFIELD This design was conceived by Bert Judge to the 1945 rules as a direct descendent of his 1936 Wakefield Cup winner, as kitted by FROG. It was closely related to the FROG **JANUS** power model of 1947. The Wakefield was not built until Bert's retirement many year's later. A beautifully conceived and well-proportioned model with aerodynamically clean lines.

HERMES MAJOR A 150% enlargement to 61½ in span, of the 1949 **HALFAX HERMES**, the purposeful high wing sport model, designed by John Magson for Halifax Models in 1949. In the true vintage style but sleek to capture the competitive thrust of that time. Well suited to Texaco type events or for stooing around with i/c power or electric motor. Designed for radio assist, by Martyn Pressnell.

FRANK LOATES' 1949 WAKEFIELD The Canadian Wakefield that placed 5th in the World Championships staged at Cranfield, England, in 1949. A distinguished model of attractive appearance, and with a double-bladed folding prop.

BORJE BORJESSON'S 1949 WAKEFIELD The Swedish Wakefield which placed 6th in the Championships staged at Cranfield, England, in 1949. A semi-streamlined, triple finned, shoulder winged model with a free-wheel prop. The most visually attractive in the top group.

GHOST WAKEFIELD 1951 John Gorham's 1951 Wakefield, produced from photographs and in accordance with the original working drawings. One of the most successful rubber models from the early 1950's. Suitable for 75 gram motor as defined for Classic models from 2007.

RON WARRING'S 1952 WAKEFIELD The geared geodetic model, developed by Ron Warring for twin motors, being the ultimate design in his long series of famous Wakefields. Drawn from the original model and contemporary sources.

NIGHT TRAIN Mk II 1960 George French's Night Train which pioneered the use of VIT systems in the UK, to control the power-on trim of FAI models. Coming at the end of the Classic era it was to prove immensely successful in future international events. A most attractive model with elliptical surfaces, it will perform well in Classic and SLOP events today.

TO ORDER:

To order plans for UK delivery please write with cheque (£ sterling) made payable to Martyn Pressnell at:

1 Vitre Gardens, Lympington, Hants, SO41 3NA. For overseas delivery of Popular Plans send local bank notes equivalent to £10.00. Enquiries: please write or email martyn.pressnell@btinternet.com

From Bryan Passey

I would like to thank Bill Longley and George Stringwell for filling in for me the life of my old RAF friend Steve Webb.

On seeing the photographs of Steve, one memory of many comes to mind of him and that was his loose fitting oversized jumpers. Whenever we flew at Larrbruch, he wore them, and I can't help but think the one he is seen wearing in the photographs is the very same one he wore all those years ago!

Steve almost became a member of my family when he became friendly with my sister. I often wonder what would have transpired if the relationship had continued. I never met any of his family but I did visit him in Wantage where I saw his work/bedroom, a sight to behold with models of all description, built or part completed, stacked all over the place. I recollect that when in Germany I sold him a control line B25 Mitchell, it was there propped against the wall. The asking price at the time was 45DM, but instead of payment he gave me my first ETA 29 complete with a magnesium bottom pan!

My latest control line scale pulse jet model is now complete, and was to be test flown at our recent fly for fun meeting at MOD Machrihanish but the weather put a stop to that, but we did manage some very brief engine startup test which went well in the capable hands of Dick and Mathew Hart. (Jim Gill of the Dundee MAC has posted a record of the event on YouTube, including the pulse jets, well worth a look)

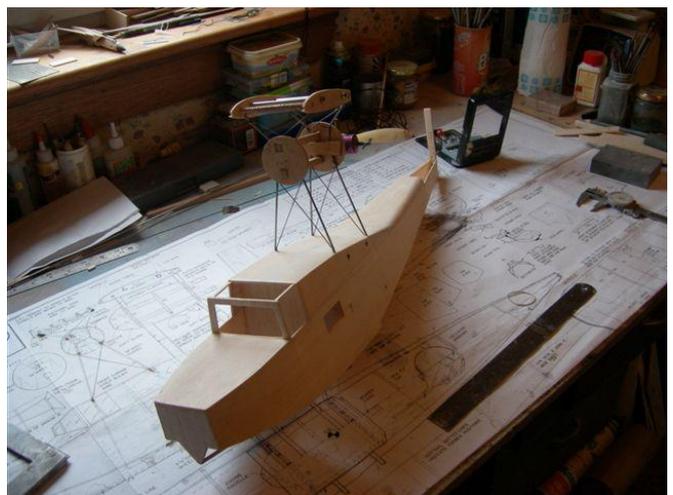
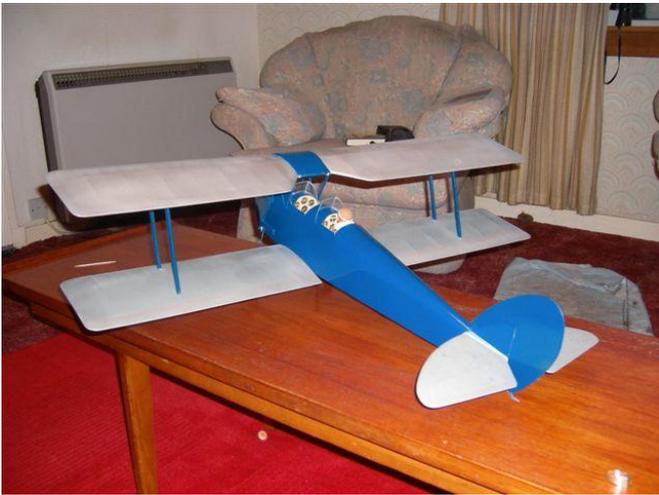
Both of my scale jets are now in the hands of Dick Hart with the intention of flying them both at a later date, possibly at the Nationals, or a Barton "bash" so look out for them there.

Since I enjoy building most types of models my time has been recently taken up with the building of the old Mercury Tiger Moth kit, the plan being supplied by my friend down there in Wales, Peter Williams. It was to be test flown at Machrihanish, but it was far too windy for that, so I'm now busy building the free flight Walrus from an old Aeromodeller plan. I did build this model back in the 60's and one thing I do remember about the model, despite all my efforts it



would not ROG. It would taxi at high speed in a straight line but never did it show daylight under the wheels. I could have used it as a tethered racing car! I wonder if any readers of Stick and Tissue have built this model and suffered the same experience, and perhaps offer a remedy.

Below are a couple of photographs of models mentioned in the text.



Michael Burke's Valkyrie





From Stephen Winkworth

Remember Pete Russell's 363 delta from June 1968 Radio Modeller? I've always wanted to build one - in fact I even bought the plan! Well, in the nostalgic spirit of 'change the scale, add lipo', I've made a smaller version: a 0.46 times version, actually (looked about right, don't ask me how I arrived at this factor). So, 363×0.46 equals (rounded up a tad) 167, which is the name of my new mini-delta, built to exercise the dog on windier days. She (not the dog) weighs 195gm, with a 'Nano Cyclon' driving a 7x3 prop, and a 2-cell 500 lipo.

Since these 'maiden flight' photos were taken, the wheels have been painted aluminium (essential to any high-performance model to be one-up on those feeble little park flyers with yellow plastic bits). A special electrostatic radar dome has also been incorporated (obtained from Balaclava Bill's tecky cousin) just under the C.G. This by a happy coincidence makes her much easier to hand launch. As you can see from the pictures, the grass is a little long for take-offs here. I am glad to report that she operates very well from tarmac, on the club flying site, but that means the dog has to be tethered as she (the dog) is capable of amazing acceleration (167 too of course) where a crunchy morsel of balsa and Jap tissue is available.



Checking



Looks flyable



Climbing high

From Karl Gies

What could be more satisfactory than carving a balsa propeller or whatever you do to make one. This ranks slightly higher than making a laminated noseblock. You study the model and if it has the block layout I generally follow that unless of course they were delusional or the printer made a mistake. One goes through his wood stash and sometimes you find a suitable block or if not some lamination is in order. After that of course is taking an appropriate pen/marker and marking the lines to follow in cutting the block. These measurements are determined by being pretty scientific and desiring a proper p/d ratio so you play around with your calculator using the time honored formula of prop diameter times pi times the depth of the prop block at the tip. This number is then divided by diameter and the result divided by prop block width at the tip. Most expert modelers use something more sophisticated along the lines of a variation of $E = mc^2$ or some similar formula. Ascertaining the p/d ratio sometimes ranks right up there with alchemy. These results are marked on the block. I like to score these lines so that the cheap, affordable band saw I have will somewhat follow the scored lines. Locate the exact center of the block to drill the prop shaft hole and this will be done before any sawing of the block. After this is all done it is the moment of truth, the actual carving of the prop. At this point, to bolster my courage, I remind myself that I have done this before many times. But if it has been several months since carving the last prop all is forgotten in your memory. Starting the carving is akin to watching a movie where some poor chap has appendicitis and there is no doctor available at all. The best scenario is someone on a radio walking the actor through it or having a book called "Surgery For Beginners." Most of the guys who do this in the movies previous experience of any kind was dissecting frogs in high school biology lab. They always succeed though, notably in the movie "Ensign Pulver." The first cut is the hardest and then it all comes back to me. I carve the back first to a finished state and never mess with it again. Prominent modelers have told me that to do so will change the pitch. I carve to a diagonal line that was drawn on the prop tip but quit carving at least an 1/8" back of this line. I then wrap sandpaper around a CA kicker bottle which is 1 1/4" diameter and a nice smooth surface. This pretty much ensures that both blades will be pretty much the same. Proper knives for carving. I like the utility knives with snap off blades that are sold at hardware stores. My favorite is a brand called "Olfa" and I bought one online at www.olfaproducts.com. These are extremely sharp and you can put the blades back to extreme sharpness by using a butcher's steel and an old razor strop. Now comes the blade fronts and I draw lines a little back from the leading edge w/a felt pen so as not to carve right to the edge. I rough shape the blade and then finish it by starting with coarse sandpaper, say 80 grit and finish with finer grits. I now mark the blade shapes and remove the excess blade and finish the prop. Others do this blade shaping much earlier and maybe someone can weigh in on the time to do this. I don't bush the prop shaft hole but glue on facings cut out from thin brass or aluminum sheet. It is easy to line up the prop shaft to be perpendicular to the prop by positioning the last face plate (front) to be glued on and using a jig. Not to forget balancing and this can usually be done by doping one blade more than the other. Other decisions to be made before this though are is the prop to be a free wheeler and what sort of free wheeling device to use or is the prop to be a folder. I

have went to fiber glassing all of my props using 3/4 ounce fiber glass cloth and Z-Poxy. When all of this is done and the prop finished it is time to have a drink of whatever you drink and admire your handiwork. Always remember that the worst prop you carve will be better than any plastic prop you purchase. Friends who know me pretty well look at my props and I can always read the word bubble over their head "Do I really know this guy, he is the worst klutz in the world." My younger brother is a highly skilled carpenter and he told my cousin Tony "I know Karl carved that prop and built the model but he could not build a crude dog house."

Middle Wallop Radio Assist by Tony Tomlin

Sunday, 24th April was the first of the three, planned vintage events at Middle Wallop in 2011. [courtesy of the Army Air Corps MAC]. After losing the last two events in 2010 to the weather, we were all hoping for better conditions at this excellent site. For once we were lucky with a little mist first thing, then Sun for the rest of the day with a gentle breeze.

Apart from the Vintage R/C flying there was the first round of the nine, planned R/C Tomboy events for 2011, a Vintage Power Duration event organised by Bill Longley, and control line flying that was well supported and continued all day.

Thirty nine fliers signed on with about 63 models. Brian Targett always turns up with interesting models and his Alpha Corsair was impressive. Mick Butler was flying another model, new to Middle Wallop, which was a Gamma Gull. There were a number of large models including the Mercury of Garth Pierce and the Majestic Major of Adam Chambers. Many smaller models were seen including Peter Rose's scaled up electric Ajax and a large number of Tomboys [a gaggle!?!].

Competition Results

Tomboy 3.

There were 9 fliers in the mass launch flyoff, with all the regulars, and a new Junior flier, James Collis who flew well. The conditions were perfect, with Jeff Fellows from Kidderminster winning by over 2 minutes from Tom Airey. Dave Stock did what a number have done before and launched with his engine running backwards! Dave had made good times in his preliminary flights but all was in vain!

Results:

1/ Jeff Fellows 14mins 44 secs. 2/ Tom Airey 11mins 11secs 3/ Tony Tomlin 11mins 02secs. 4/ Stephen Powell 10mins 38secs. 5 / Paul Netton 10mins 21secs. 6/ James Collis 9mins 42secs. 7/ Tony Overton 9mins 10secs. 8/ John Strutt 3mins 17secs. 9/ Dave Stock 00.03secs.

Tomboy Senior

Eight fliers made the flyoff. Unfortunately Mike Burke who was unaware of the time failed to turn up. The remaining seven all got away as the start board was lowered. Tony Overton was soon in trouble having failed to switch on his receiver and the model was lost OOS! This time Tom Airey came out on top with 15mins 28secs, nearly half a minute more than second place man Andrew Fellows.

Results

1/ Tom Airey 15mins 28secs. 2/ Andrew Fellows 15mins 00secs 3/ Derek Collin 8mins 24secs.
. 4/ James Parry 6mins 28secs, 5/ Tony Tomlin 6mins 16secs. 6/ Stephen Powell 2mins 58secs.

Vintage Power Duration

There were 3 entries for this new event Tony Tomlin and Chris Hague both flew Zoot Suits powered with PAW19s and Bill Longley flew a Starduster 600 with a K+B 19.

All the lift had gone when these models flew and times were only average. The results were based on the total time of 3 flights with a 4 minute max.

Results

1/ Bill Longley 558 seconds. 2/ Tony Tomlin 521 seconds. 3/ Chris Hague 516seconds.

The Tomboy awards were presented by Brenda Pierce to bring to an end a very pleasant day.



John Hoyle's models



Bill Longley and his Starduster 600



Bryan Targett with his Stentorian electric powered of course

BMFA News and a query from me (JP)

I was glancing through the BMFA news and on page 6 under heading Aftermarket Receivers your responsibilities I read the following;

Whilst there are well defined compliance requirements for transmitters on 2.4 GHz which are outlined by the ETSI standard EN3000-328 this standard makes little reference to the receiver end of things, with fairly good reason. The main purpose of the standard is to define protocols that ensure transmitting equipment does not interfere with other users sharing the same frequency band so by default concentrates on the transmitting equipment. Given that there is little in the way of compliance requirements for receiving equipment where does this leave the end user.....

I emailed Manny Williamson as follows on the basis that if a "receiver" can also transmit back to a Tx surely that Rx must be considered to encompass both a receiver and transmitting capacity I suppose 2 way? This is the query and reply.

*Just read BMFA news and "Aftermarket Receivers, Your Responsibility"
I have a concern in that I would have thought that whilst what you have said sounds fine there is an advert in BMFA news whereby telemetry is part of the Multiplex package whereby information is sent from model to Tx, at least I assume that is the case therefore I wonder if receivers is a misnomer for such equipment and in fact the Rx both receives and transmits?*

If this is the case does advice on such matters need clarification?

Also I recall ages ago reading that in such circumstances of transmitting and receiving as it were a reply there would be issues with requiring a license? I believe it was in respect of boats but presumably we are all subject to same frequency controls?

Again if that it is correct does it not change the whole status of flying radio controlled model aeroplanes?

James Thank you for your Email.

Airborne transmission from model aircraft is lawful provided that appropriate frequency and power output constraints are adhered to, the situation is still the same, equipment is either legal or it isn't.

There is no licensing requirement for the frequencies that we use for model aircraft flying or for the airborne transmitting/receiving capability.

I hope this is of assistance. Manny Williamson Development Officer

ADVERT TIME

Model engines for sale (I bet that got your attention!)

Hi James, I list the engines, could you put my email and phone 01306 881000, then people can contact me with offers. geoffgg1@btinternet.com

Regards

Geoff Goldsmith

Mk1 ED Bee

Frog 100 mk1

Frog 175 petrol all points etc are ok.

Cox 049 4 off

Ohlson 60 late model 1\4 inch plug no tank.

Forster 29 with tank etc.

Madewell 49 with tank

Os max 60 in box black head

Os max 60 in box gold head.

Super tiger 23 in box with silencer.

Ad. From Ian Russell

Astro Flite Inc. "El Mirage". Contest 049 f/f kit - 48" nice tough Jedelsky construction, contest quality wood - £35.

John Venti Pinnochio - vintage French f/f biplane, span 24", rejigged for lightweight R/C. Excellent quality wood, £45.

Both + post if posted. Deliver by hand if mutually convenient.

rustler@aero.fslife.co.uk



**'Ebenezer' Great Lakes Biplane From Den's Models
£18.80**

The Ebenezer Great Lakes free flight is a compact biplane that features big performance and fun. The very rugged all sheet balsa construction provides ease of construction and low cost. The elegant classic lines make this plane a joy to watch in the air. If you have never tried a free flight plane, the Ebenezer Great Lakes would be a great first project.

WING SPAN: 16' Upper and 15" Lower

ENGINE: .010/020 Glow 0.2 - 0.5cc Diesel

SKILL LEVEL: Easy

Kit includes:

Profile fuselage

Sheet wings

Landing gear and wheels

Complete building and flying instructions



Or email me at:

info@densmodelsupplies.co.uk

You can also phone on: 01983 616603

Glo-Bug £29.90

Designed and kitted by Carl Goldberg in the late forties, the Glo Bug was one of the first control line models intended for the O & R 0.23 glow plug engines. Today, this design will fly well with any modern 09 or similar. I have flown mine with an Enya 11CX Diesel and an Enya 09 Glow and it goes great with both. With its profile fuselage and sheet wing the model is easy to build and makes a great trainer or sports model. A classic vintage design that is capable of simple aerobatics, its a whole bunch of fun!!

The picture shows mine with an Enya 11CX diesel.



WING SPAN: 27 1/2 inches

LENGTH: 21 3/4 inches

WEIGHT: 13 oz. ENGINE: .15 to .25 SKILL LEVEL: Easy

Kit includes: Profile fuselage, Solid wing. Complete hardware package with wheels

Korda Gas Job power model with plan from Belair

1939 Power model by Dick Korda, suits radio assist or free flight (ours is powered by an Ohlsson 19).

WING SPAN 55.38" (53.74" PROJECTED)

WING AREA ...

Price: £37.50

<http://www.belairkits.com/Productdetail.asp?Id=541>



What do I read?(JP)

Occasionally I'm asked the question what magazine do I read? Well I admit I don't buy one of the monthly magazines regularly but when I see a copy in Smiths I often glance through and buy AMI. Why, well it is obvious that the editor Steve Dorling as far as I can glean did his aeromodelling apprenticeship at a young age and loves the smell of diesel fuel and getting oily that shows through and of course there is the Aeromodeller section. I know it's not Aeromodeller stand alone magazine but it does at least keep the title going and does have some readable articles. So AMI is the one I head for.

