

Flypaper



**ROBIN STRANGE'S
3.5m FLAMINGO**

See page 22

**SUMMER COMPETITIONS
REPORTS AND RESULTS**
See page 6



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Cover: Robin Strange with his 1/5 scale Flamingo. Photo: Tony Crawford of Slope Soaring Sussex

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Text for articles should either be in a Word document attachment or simply as plain text within the email message. Photos should be high-resolution JPGs.

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Chairman's Chat

Ben De Vizio wonders if he's blinked and missed the summer!

Well, that's gone quickly to say the least! No, not the Olympics or the first half of the Formula 1 season, but rather the summer! We've all been waiting for it so patiently for the last six months and it's gone in a flash. Now, this summer hasn't been the most productive for flying with it either blowing a gale or raining like hell, or frankly just being too hot. For both dates of the Fun Fly we were either rained off or blown away; hopefully we'll have better luck next year.

This year's summer started rather strangely... while we expected a possible lockdown and a subsequent ban on flying from a spike in COVID, our temporary suspension came in the form of a Rave! A rave in sleepy rural Sussex? Surely not. Well, it did, and it was not something I would have ever expected to deal with as Chairman. Thankfully it all blew over in a couple of days and there was little damage,



View from our gate at Coombes during the illegal rave with badly parked cars as far as the eye can see; many sat abandoned for weeks afterwards, presumably having been stolen. Our flying site escaped almost unscathed (though could not be used during the police investigation of several days); neighbouring fields were much less fortunate

but there was some. On inspecting the field on being allowed up again by the Police, I came across a rather bent fence post. On first glance it would appear one of the revellers had decided to have an argument with the electric fence and lost! Luckily a simple flex and the pole was good again, though I think our reveller may be licking his wounds! Serves 'em right if you ask me!

The rest of the summer has continued without too many dramas, thankfully and flying has continued at pace with members once again reclaiming the air with more of their lockdown builds. Now with the tail end of summer where we find ourselves is typically the time of the Nationals at Barkston Heath (which a good few of our members attend). Sadly, this year due to COVID they had to be cancelled with the exception of the Scale element which was able to be held at the BMFA Buckminster National Centre. I'm pleased to report our very own Dave Knott has once again become the F4C National Champion with his 'Big' Hurricane. Congratulations, Dave! In other more minor news, I managed second in Light Scale losing out by 1.5 points! As they say, you win some you lose some! Hopefully next year the Nats 2022 will be back at Barkston for the big centenary of the BMFA; I'm sure it'll be a party atmosphere.

Now, while we all would have liked to meet up for the first time since lockdown at the Fun Fly it was not to be, but fear not, Club nights at Hill Barn Golf Club are once again on the horizon. The first night is set for the 3rd of September which will be a laid-back social with a 'Lockdown Build/Purchase' theme so bring your models, we want to see them! Later in the year I hear that Lucas's Bloodstone Auctions will be making its triumphant return after an 18-month hiatus, so don't go spending all your hard-earned cash on your staycations. In all seriousness it would be fantastic to see as many members as possible on the 3rd as I think we all need a good social. The full list of Club nights can be found on page 6.

Benedetto De Vizio, SRFC Chairman

Money & Members – August 2021

Treasurer and Membership Secretary Tom Gaskin

The weather did its best to scupper our first social events for a long time, but with the nights drawing in we have started our bookings with the Hill Barn Golf Club for the autumn and winter, starting with a 'show and tell' of lockdown builds on 3rd September.

Membership currently stands at 131, slightly down on the 137 from this time last year. I suspect that our training woes have contributed to this – I have certainly been having to turn people away if they require ab initio training.

Work commitments and duff weather at the weekends have meant that I haven't got out flying anything like as much as I would have liked to, but that does mean that at least I haven't any maintenance or rebuilding to do!

Stay safe and see you at one of the fields soon.

SRFC Gliding Summer 2021

Gliding Competition Secretary Robin Strange reports on a summer's gliding hampered by less than ideal weather

I used 'Summer' in the title but one could be forgiven for questioning its use as the weather hasn't been at all good this year. Having said that the club has so far managed to fly all but one of the planned gliding competition dates so it hasn't all been bad.

Early in the summer when we were just being allowed back out to play the gliding fraternity used Ashurst a fair bit to free up Coombes but since June and July we have tended to use Coombes as it allows us to fly our power models as well. The last time I visited Ashurst the grass was a good foot high which makes landing a glider with a low tailplane iffy but now the cattle have come to our rescue and have been munching their way through it but of course we couldn't use it with the them in residence. The north field gets very boggy near the gates and with the weather we have had it's made its use untenable. Now the cattle have been moved and flying at Ashurst is again possible.

In the meantime the flying has taken place at Coombes and on local slopes and a number of us have visited Beeding Hill in south-westerly winds, Firlie Beacon in northerlies and Itford in westerlies and we have enjoyed a fair amount of good slope soaring.

The gliding competition has two more scheduled dates to go both of which are in September (2nd and 16th) which will bring this year's competition to a close. The current leader has a lead of 1505 points over second position and a further 1621 exist between 2nd and 3rd and then a bigger gap to 4th but with 4000 points yet to be won any of the top three could win.



A motley crew, Beeding Hill, April 2021. "Roll on, summer!"

Diary dates

Make a note of these dates for meetings at Hill Barn Golf Club

- September 3rd - Lockdown show & tell
 - October 1st - Club Auction
 - November 12th
 - December 3rd - Christmas party
 - February 4th
 - March 4th - AGM
 - April 1st - Club Auction
- All meetings commence 8pm*

Competitions at Coombes

Power Competition Secretary John Ivory reports on the June, July and August competitions held at Coombes

Power Competition Report 11th June

We had eight competitors turn up on a quite windy day and after a quick briefing the completion started.

Round 1: Fly 100 seconds and guess the time then land, the time difference being your score.

Round 2: Take off, do three rolls and three loops and land, recording the time taken. The times from both rounds were then added together to give an overall score.

RESULTS

Name	Round 1 (secs)	Round 2 (secs)	Total (secs)	Position
Clive Upperton	3	17	20	1
Chris Foss	5	16	21	2
Neil Harber	5	21	26	3
Robin Strange	6	23	29	4
John Ivory	12	27	39	5
Pim Smith	25	22	47	6
Keith Miles	22	37	59	7
George Evans	3	97	100	8

Clive Upperton being the overall winner was presented with a prize of biscuits and a small bag of tea bags.

I'm glad that it all went to plan taking just over an hour to complete.

Power Competition Report 9th July

This competition involved dropping a soft golf ball from a cup mounted to a model flown towards a target placed on the flying area with three attempts being allowed.

The competition took place with six members taking part in very windy conditions and after a number of practice runs the competition started. On take-off the ball tended to jump out of the cup; such attempts were discarded and another attempt was allowed.

Scoring

1 point for every foot from target, 75 points from 61 foot to edge of flying area, 100 points outside flying area. Pilot with the least points is the winner.

RESULTS

Name	Attempt 1	Attempt 2	Attempt 3	Total	Position
Alan Caldecourt	16	12	17	45	1
Chris Foss	8	9	44	61	2
Pim Smith	33	20	75	128	3
Neil Haber	75	29	45	149	4
Clive Upperton	35	41	75	151	5
John Ivory	35	27	100	162	6

Alan Caldecourt being the overall winner was awarded a prize of two packets of biscuits.

I would like to thank those who took part and hope they had an enjoyable time under quite demanding conditions.



Soft golf balls and streamers...



...placed in a plastic cup on each plane

Power Competition Report 13th August

The object of this competition is the Triple Thrash, i.e. three touch and go's, three loops, three rolls and land. All manoeuvres and landings must take place within the grass area defined by the electric fence. Time will be taken from take-off to landing. The person with shortest time being the winner.

Again, it was a very windy day with winds gusting over 20mph and after a short briefing it was decided to replace the touch & go's with three spins.

This competition sounds quite easy but it turned out not to be the case as on a number of occasions there were some very interesting manoeuvres.

Name	Time (sec)	Position
Pim Smith	26.53	1
Neil Harber	27.40	2
Chris Foss	28.26	3
John Ivory	30.57	4
Clive Upperton	33.57	5
Keith Miles	42.53	6

Pim Smith being the winner was presented with a prize of biscuits.

I would like to take this opportunity to thank all that took part in quite demanding conditions.



*Main picture: Pim's winning flight with Paul recording the time.
Above: Nice to see an IC plane competing: Clive's Ugly Stick.
Top-right: Even Chris found conditions challenging.
Right: Pim being presented with his prize of biscuits*



Galahad, Delta and Speedster

David Trimmings' three lockdown builds

In lockdown I built three model planes. I'm not very good at building and the truth is my planes look very home-made and basic compared to the master aircraft that many of the club members produce. My modelling skills are no better than they were when I was 16, but if I can do it any one can! I would never have tried unless we had the lockdown.

Model 1: Galahad

In the 'sixties I built and flew a Mercury Galahad by Frank Knowles with a MacGregor single-channel radio and powered by an AM15 diesel, all purchased from Henry J Nicholls by my Dad for my birthday. (Older members will remember that wonderful model shop at 308 Holloway Road, London,

often referred to as simply '308'. Opened in 1946 it was the UK's oldest model shop. Sadly it closed in February 2018, its last owner Richard Harris commenting, "I can't find anyone remotely interested in taking it on. Everything's gone internet crazy." There's a message there...



David Trimming's Galahad. The plan for this 1960 54" classic is available as a free download from Outer Zone: outerzone.co.uk/plan_details.asp?ID=5551. If you have not yet discovered this amazing source of free plans have a look at outerzone.co.uk

If you have a local model shop, use it or lose it. Ed)

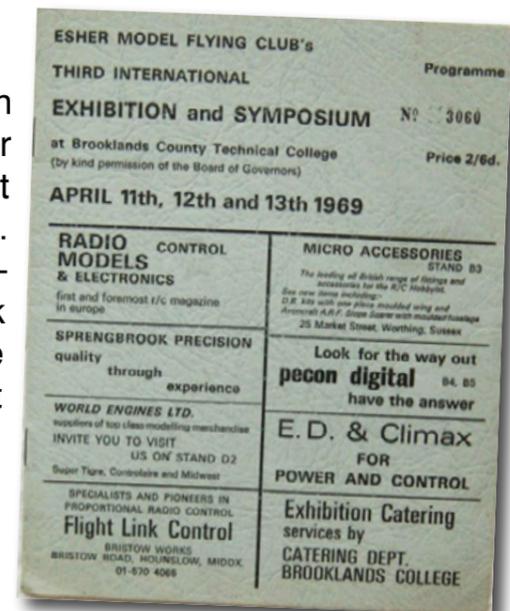
I believe it had a Conquest compound rubber-driven escapement with an Elmic clockwork escapement for engine blip control. The speed control was just a flat piece of tin plate that just partially covered the air intake.

I took the plane for its maiden to Epsom Downs – the long-standing public model flying site – and Frank Knowles kindly trimmed it out and flew it for me; he flew the model to perfection returning it back to us at the top of the race course.

So, it was very much for nostalgic reasons I built another Galahad in lockdown but decided to make it electric this time, with an Overlander T5055/06, powered by a 4S 4500 lipo with 80A ESC driving a 14x7e prop. Control was on ailerons, elevator and rudder. Because of the extra weight I increased the wingspan by two more panels and reduced the dihedral to five degrees. The wings were covered in traditional doped red nylon for strength and the fuselage just doped and painted. It has yet to fly.

Model 2: Delta

In about 1970 I attended the Esher Model Flying Club's Exhibition and Symposium and was amazed to see some large delta models flying as part of the demonstration. I remember the commentator stating that if a delta is throttled back it is very docile



and lands with ease like a trainer.

Those words stayed with me and, 50 years on, I decided to build a large delta of my own in lockdown. Having a Honda Jazz I measured the width of the rear boot space and designed a delta to fit this width. I drew a right-angle for the nose, the triangle increasing to 44" span at the trailing edge. The rest of the design followed based on what I thought looked in proportion. I built in two degrees of dihedral for stability.

I used a Thumper motor T4250/06, 4S 4500 lipo, 60A ESC and 13x6e prop. Control was via ailerons/elevator (elevons) and rudder. The model again was finished with a doped nylon wing, this time orange, contrasting with a black fuselage and fin.

I have flown it once – it refused to turn left or right and would only climb to 6 feet. Investigation needed.

Model 3: Speedster

I had a few sheets of balsa left over from the Galahad and Delta and wondered what to do with them. I decided to design a model plane based on the sheet length. Wingspan is therefore 36" (excluding wing tips), fuselage 36" and tail plane half of 36" i.e. 18". Fuselage height is 3" (well, the sheet width is 3"!) and so on. The result is my Speedster. Electric powered with Thumper motor T4250/06, 4S 4500 lipo, 60A ESC and 13x8e prop. Control is by aileron, elevator and rudder. Doped nylon wing as before with doped and painted fuselage.

I am pleased to report the Speedster flies a treat, very docile and tracks nicely.

My thanks to Paul at Sussex Model Centre who kindly dropped of the supplies I needed to complete all three models during lockdown.

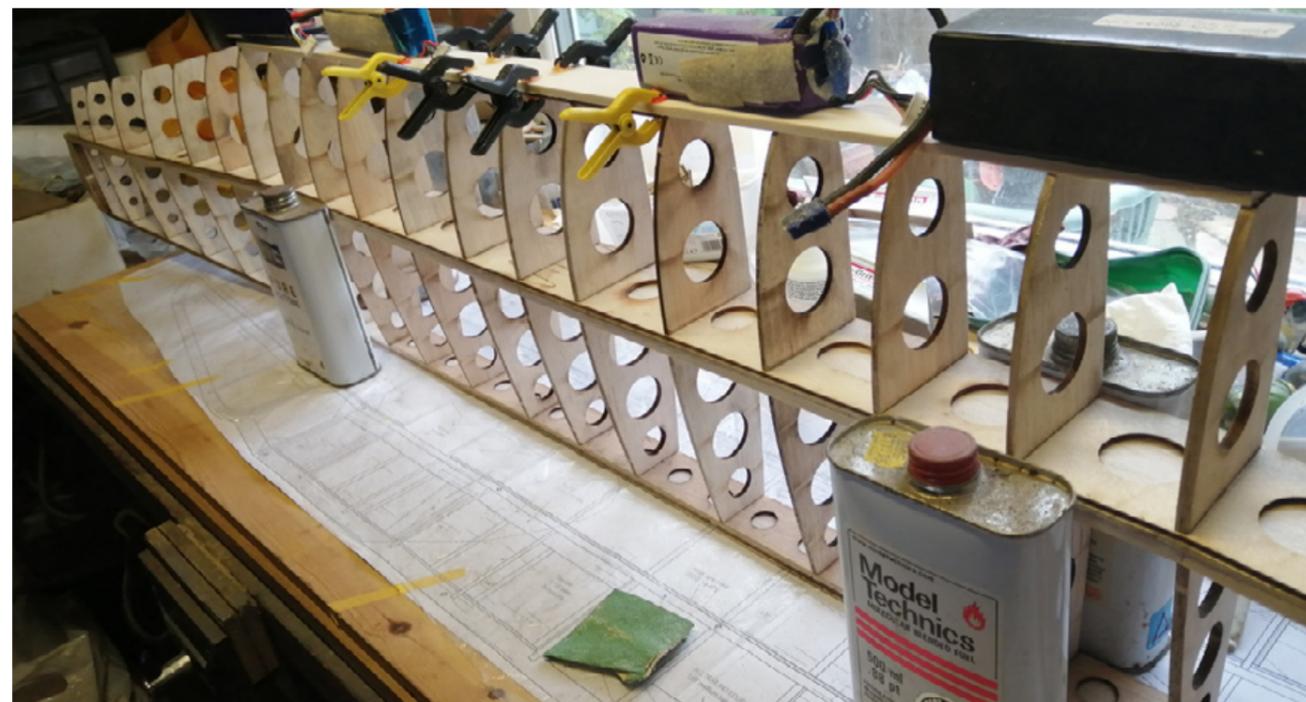


Defiant

A build update on Les Crane's Defiant

Well, I am still building the Sarik Boulton Paul Defiant but have made good progress since the last *FlyPaper*. The tailplane, fin, rudder, elevators, wings, ailerons and flaps are all built and sheeted. The undercarriage is installed and tested. Only a few small balsa tasks remain, e.g. wing fairings, undercarriage doors and fitting and shaping the bottom of the rudder before sanding sealer, glass cloth and resin are applied, after which the tailplane and fin will be epoxied in place.

The model will be finished as an all-black night fighter of 151 Squadron, code DZ•Z, serial N3328. Photos of the actual aircraft can be found via a Google search. Decals will again be provided by Callie Graphics in the States (callie-graphics.com). It will, of course, still be several months before the model is finished.





Defiant Mk1, N3328, with its distinctive shark's teeth, is also the subject of the current Airfix model. There is an interesting article on N3328's excavation in 2002 – the aircraft crashed in 1942 at Barnoldswick due to a severe hailstorm: www.laituk.org/Defiant%20N3328.htm. The pilot – 22-year-old Flight Sergeant John Leslie Goulter from Glen Niven, Queensland, Australia – was sadly killed in the crash and is buried in Barrow-in-Furness cemetery

On a sadder note, and leading to another build, I bought a Tony Nijhuis 62" Hawker Hurricane a few years ago at a Club auction. It had a warped wing and I had to build a new one. On maiden by Pim it flew well albeit with some left trim necessary, but I never managed to fly – and land it – successfully. Alas, a few weeks ago and for reasons I cannot work out, I totalled it but was able to salvage all the electronics/ power train and retracts. So, I ordered a new kit from Tony Nijhuis which arrived on 5th August and I may start a new build to run concurrently with the finishing of the Defiant.

The Hawker Typhoon and Hawker Tempest V are still to be maiden and I am waiting for a suitable time and willing volunteer to maiden them.



*Starting with a vicious bank to the left the Hurricane ploughed in and re-kitted itself
Video stills by Grahame Pearson*



With its distinctive turret the model looks every inch a Defiant

Taking a shortcut to Halifax

Clive Upperton converted HobbyKing's 1320mm foamie Avro Lancaster to a Handley Page Halifax

It is probable that you, like me, had a parent or relation that served in the Forces during World War 2. In my case this was my father who, seeing the writing was on the wall regarding war with Germany, enlisted in the Royal Airforce Volunteer Reserve on 5th June 1939 and was called up for training on 1st September 1939 undertaking basic training in Hove. Subsequently, Technical Training took place at RAF Henesford, Cannock Chase, Staffordshire and resulted in him joining 51 Squadron as a Flight Rigger at the end of May 1940.

Moving on to 1942, 51 Squadron moved into a newly built Bomber Station in South Yorkshire operated by 4 Group namely RAF Snaith. Shortly after their arrival, the Squadron's ageing Whitley Mk5s were replaced by Handley Page HP57 Halifax Mk2s and hence began our family's association with this heavy bomber.

Rather like the Hurricane, which was overlooked as the Spitfire took the limelight, the Halifax was similarly destined to be in the shadow of the Lancaster. This was despite of the fact that it fully met the requirement specification P1/36 including wings of a span under 100ft (to fit the hangars of the time) unlike the Lancaster which exceeded the specification at 102ft.

We now move forward in time to the early 1960's when I became aware of snippets of my Father's wartime activities and a journey to Lincolnshire for a family visit resulted in a trip to the village of Pollington, the location of the now defunct RAF Snaith. I don't recall much of the trip but in later years I became much more interested in my dad's past but too late to quiz him as he was long gone to the great hangar in the sky.

Thankfully, I did have one wartime souvenir crafted by him while at Snaith, a small model of a Halifax made from brass (pictured left). This model resides in my study and some years ago I decided the type would be an ideal modelling project and the Tony Nijhuis Designs 104" wingspan Halifax Mk3 sprung to mind.

However, the overall size and in particular the weight was outside our flying site limits at that time. As a consequence, the project stalled.

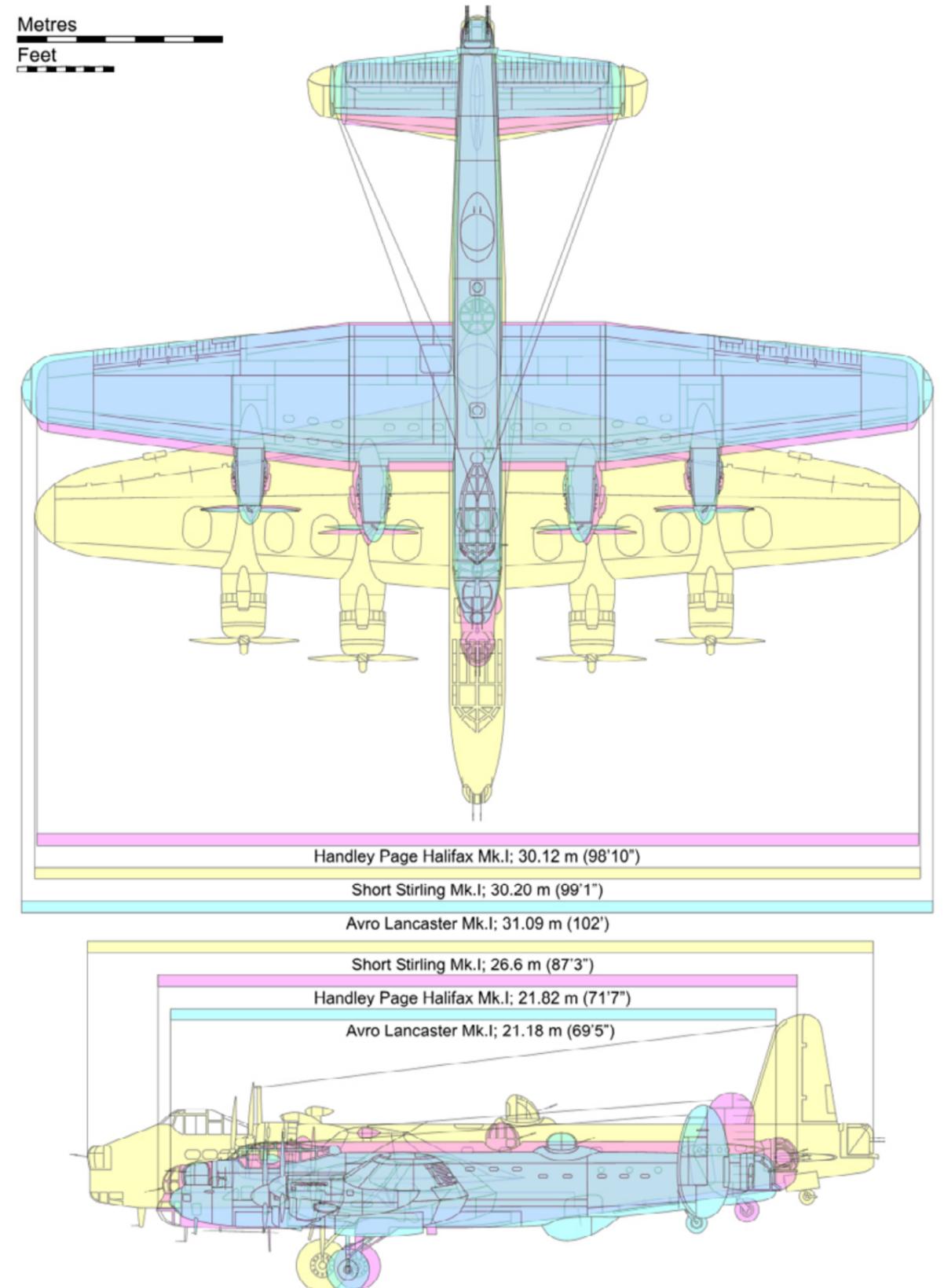
However, an opportunist visit to the HobbyKing website brought their small Lancaster to my attention. Could this be a shortcut to a Halifax? Only an impulse buy would confirm the possibility. I ordered spares items enabling me to replace parts if my modifications failed miserably. The current price of the model is £134.99.



While waiting for kit to arrive I researched the internet for a comparison of the Lancaster against the Halifax and Wikipedia provided the following information:

The overlaid drawing below (from Wikipedia) illustrates the three principle British four-engined heavy bombers the country was using during WW2.

The Short Stirling is significantly longer but suffered in service due to the aforementioned 100ft wingspan limit.



You can see how the outline of the Halifax is just a tad longer than the Lancaster but with a shorter wingspan. Until the introduction of the HP61 version of the Halifax both outlines look alike to the untrained eye – sufficient to fool most of us and supported my belief that I have in the HobbyKing Lancaster a shortcut to a Halifax.

This article is *not* a kit review (it's an ARTF foamie after all!) but to give some details of my purchase the HobbyKing version 2 Lancaster has been revised from the previous version to lose weight with the retracts being removed together with the functioning rudders. The scheme is based on a Squadron operated using Canadian flight personnel. It comes complete with four brushless motors, ESCs and servos with a BEC to supply the buyer's chosen Rx. A 1300-2200mAh 3s battery is required. The foam mouldings are good and well painted, and decals are supplied fitted so minimum time to get the original flying. (*Strangely, it has roundels under the wings – RAF night bombers never bore underwing roundels but these could easily be removed. Ed*) The picture below shows the airframe parts and gives an idea of quality.



To convert the parts into a Halifax Mk2 which was Merlin-powered like the Lancaster (later MkIIIs would be fitted with Bristol Hercules radial engine) the wings are used as supplied complete with motors and three-bladed contra-rotating props. The fuselage needs a turtle deck made from 6mm Depron to be built up behind the modified original canopy.

The tailplane is mid-set on the Halifax and the fuselage underwent surgery to raise the low-set Lancaster position. In real life the fins of the Halifax underwent several revisions, the MkIII for example had rectangular fins, and earlier marks were sometimes retro fitted with these, often in the field. The triangular shaped fins of 'my' Halifax were made from 6 mm depron. The paintwork was refinished where appropriate and decals made from solar trim or printed paper labels. Other details such as RDF housing and aerial were crafted from balsa and a bamboo skewer. Escape hatches in the roof were added and the rear turret modified to more closely



match the Halifax type and the nose turret was also adjusted in shape. The mid-upper turret was omitted as per full-size as this was found to increase drag. The model was completed in March but remained un-flown until recently.

In order to provide yaw control without rudders being fitted, differential thrust is an option suggested by HobbyKing. With Spektrum radio three mixes are used to achieve this. The motors in each wing are paired together unlike the usual arrangement of pairing inners and outers. Also, unlike the full-size aircraft the propellers are handed and are therefore, as mentioned, contra-rotating. The first mix is THRO>AUX1 (which is the left wing motors), the second mix is RUD>THRO (right wing motors) and finally the third mix is RUD>AUX1. With the rates suitably adjusted +/- and a switch selected to enable/disable the differential control. This worked but with Spektrum gear it compromised the throttle cut safety switch, which is not a good idea, so the attempt to use a differential propeller mix although possible was abandoned.

The Halifax had its maiden flight on 4th August; this and a subsequent flight was trouble-free although the lack of yaw control contributed to a degree of side slip when banking but nothing that couldn't be controlled.

Power needs to be maintained when landing and cut at the last moment to avoid potential propeller damage on belly landing. Like the full-size the model proved to be robust on such landings. My short cut to a Halifax was now complete.

4th August 2021: a succesful maiden flight following a launch by Pim Smith



Flamingo Maiden

The September 2020 Newsletter detailed the build of Robin Strange's 1/5 scale 3.5-metre 1947 Brazilian Flamingo HW-4. The maiden flight has now taken place...



Full-size Flamingo, 1947

This model was designed by Chris Williams; I bought the plan and a laser-cut short kit from Laser Cut Sailplanes (lascutsailplanes.co.uk). Chris is better known for 1/3 and 1/4 scale models but recently he's started scaling his designs down for easier transportation and is now producing some 1/5 scale designs, including the Flamingo.

The short kit includes frames, ribs and empennage trailing edges. Lots of balsa was bought to supplement the laser-cut parts. The fuselage is

skinned in plywood (1.5mm in front of the CG and 0.8mm aft) but the wings are quite lightly built in comparison. All-up weight of the completed model is 3.6kg.

With the model completed, a long wait over the winter and spring months of this year ensued while waiting for the right wind conditions (direction and speed). Eventually conditions looked promising and I decided to go to Firle Beacon in East Sussex to fly my model. As it turned out the wind wasn't quite as reliable as I would have liked and although I managed two flights, each had to be curtailed as the wind



Spectacular backdrop at Firle Beacon
All photos: Clive Upperton

strength dropped drastically calling for a rapid unplanned landing in less than ideal conditions.

I would have preferred to fly from Bopeep, further east from Firle Beacon, but that site needs north-easterly winds whereas Firle Beacon has slopes that work best in close to northerly winds. Both slopes have large landing areas away from the South Downs Way hence potentially clear of walkers and the general public. Bopeep is free of trees, Firle Beacon not, but in the event I went to Firle Beacon as the wind direction dictated the one to use. Both locations have convenient car parks at the top of the Downs.

With the gentle wind blowing off she went. I had to be quite genteel with the controls but the great thing was I had very little trimming to do (two tweaks of the elevator). Rob Stanley of Slope Soaring Sussex did the first launch while SRFC's Clive Upperton used my camera to catch the action. For the second launch Clive did the honours.

The model is equipped for aero towing as well so I'm hoping to get the chance to try that later this year. The tow release mechanism has been tested with a pull of 7.5 kg – equivalent to twice the model's weight – which is what I have been recommended to test it to.



Rob Stanley of Slope Soaring Sussex
launches Flamingo

Lancaster – work in progress

**Traditional balsa basher John Wase's Tony Nijhuis
72" Lancaster is well underway**

When I heard there was a Lancaster kit up for sale I jumped at the chance to buy it. With the lockdown still on, a 'builder's model' was ideal. I always liked multi-motor planes; having built a Britten-Norman Islander twin and had great success flying it I knew I was ready for the next step: a four-engined model – and what better than a Lancaster bomber. Tony Nijhuis produces plans for two versions of his Lancaster: 72" and 134"; mine is the smaller version – though at 6 feet wingspan it is by no means a small model.

From the word go it was clear this would be a big project. It is recommended for an advanced builder, someone with more experience than myself if I'm honest. Anyway, after a slow start it is now taking shape. There is a lot that you have to fabricate yourself – it is assumed if you buy this kit you know what you're doing. Either that or learn on the way – well, you learn by your mistakes! It is quite a challenge but enjoyable.

I have found all the information is right there in the club for free. On several occasions when I have got stuck I have just asked other members for advice. Every time they have put me right on set-ups, etc, saving me time and money. For example, I was not aware you could not extend battery leads; instead you need to alter the leads from the ESCs to the motors. Also, I was shown how to disconnect the live wire from the ESC to the receiver and advised to power the retracts with a separate battery. All very good information to make the build successful and safe.

Les Crane advised me to contact 4 Max to obtain information on the set-up



Basic airframe nears completion but still much work and many hours to go!

required and also pointed me to a comparison chart so I could buy wherever I liked. I ended up getting the motors and ESCs from Sussex Model Centre (four Overlander motors 28/30 and four 30 Amp ESCs). Props are 8"x4", two normal and two counter-rotating.

To cover the model (still a while away as I write) I'll be using traditional tissue and dope with an aerosol paint finish. It won't be finished for a few weeks yet but I'm in no hurry. It may slow down a little as we are now able to fly again but I get to the workshop as and when possible, e.g. when too windy to fly.

When it's finished I will need another project to keep me busy. This build is my third this year; first was a Ben Buckle Flying Quaker, followed by a Deperdussin. I've flown the Quaker but not the Deperdussin – still waiting for a dead calm evening for that one. All in all the lockdown has not been too bad for me. And of course for SMC!

Hopefully the next issue of *FlyPaper* will contain the conclusion of my Lancaster build and the flying report and photos!



**Flying Quaker flies beautifully
Photo: Grahame Pearson**



Deperdussin awaits a dead calm late summer evening – remember those?

Wot, another little 'un?

John Ivory's Micro Wot 4 was featured in the last issue of FlyPaper. It was only a matter of time before an Acro Wot Micro followed

Now we can go flying at Coombes I've been enjoying flying my Micro Wot 4. As it flies so well I decided to make an Acro Wot Micro with a similar wingspan of 22". There were no plans available but I had a full-size foam Acro Wot which would provide me with scaled-down measurements. With ruler in hand and a 1"x12" strip of sheet lead started to draw up a plan of the wing first, using the flexible lead strip to obtain the profile of the wing sections then tracing and reducing them by 50%. To finish the wing plan off I just needed to draw its outline, rib, spar and servo positions (Photo 1).

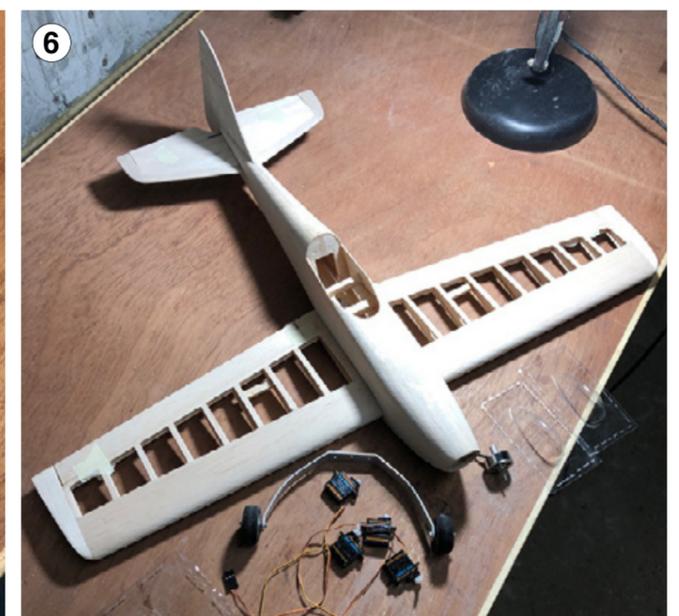
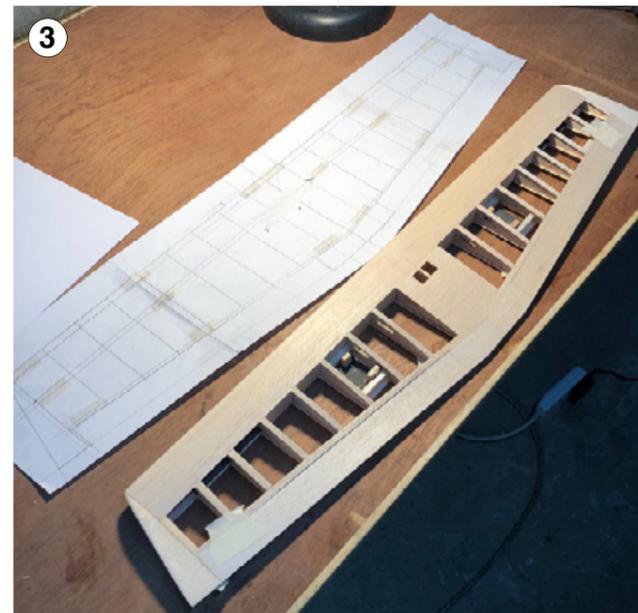
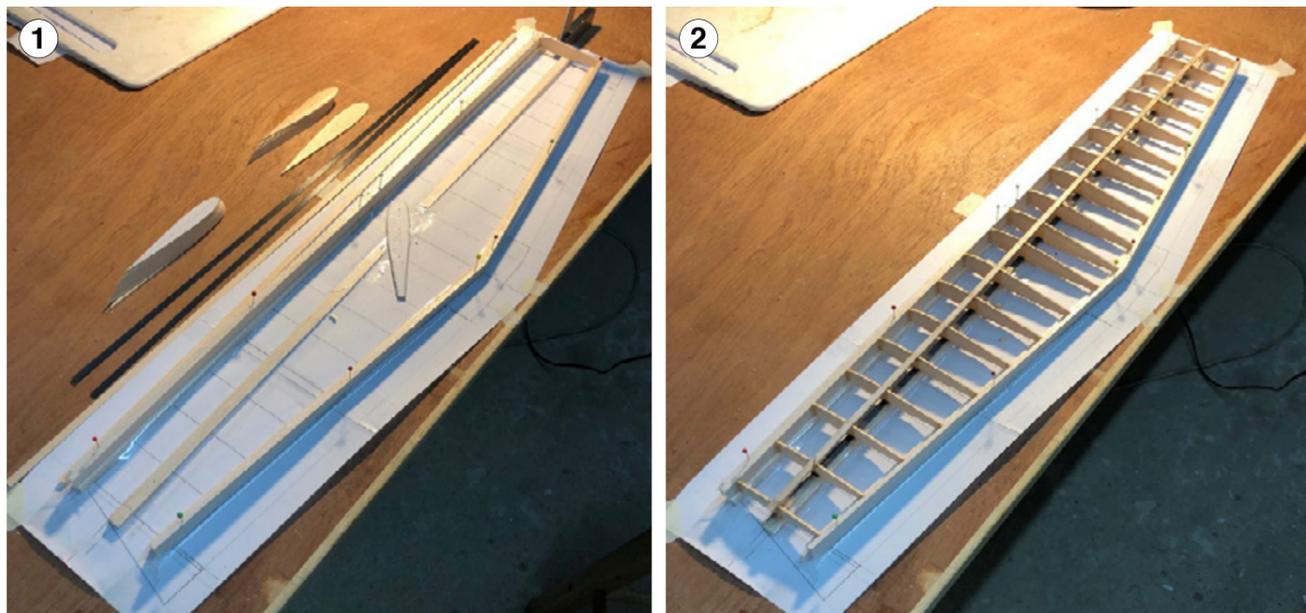
Ribs were cut from 1/16" sheet, leading edge is 3/8"x 1/4", trailing edge 1/8"x 1/4" and spars are from 0.5x4mm carbon fibre covered with 1/16" balsa (Photo 2).

Next was to cover the wing's leading section top and bottom with 1/32" balsa, add rib caps and wing tips followed by adding two aileron servo mounts (Photo 3).

The construction of the fuselage was a lot more complex than the Micro Wot 4 as it is mostly curved. Using the lead strip again wrapped around the fuselage in sections, equally spaced, one side at a time. These were again traced and reduced giving me the outline of the sections of the fuselage. They were then used to make each bulkhead from laminated 1/32" balsa to add strength. I used 1/16" balsa stringers to position and glue each bulkhead, ensuring that they all were correctly aligned. Next I started to add 1/16" planking to the top. The lower-rear section used 1/32" balsa at right angles to the fuselage to give torsional stiffness.

The lower section in front of the wing used 1/4" balsa with extra reinforcing around the wing and motor mount. To finish the fuselage off lightweight filler was used where necessary (Photo 4).

Making the tailplane and fin was also straightforward using 3/32" balsa sheet but



to reduce warping a leading-edge cross-grain section was added to both (Photo 5).

To complete the fuselage the fin, tailplane, servo tray, control rods, wing and motor mounts were added.

After moulding the canopy and air intakes and making the undercarriage from aluminum (Photo 6) it was time to cover the model. I decided to use white polyester film (Photo 7).

Last but not least was to add the decal from printable white self-adhesive vinyl (Photo 8).

After radio, ESC and motor were installed and checked for correct operation including CG position it was time to fly it.

On a day with light winds and Clive Upperton checking that I have not forgotten anything in the set-up it was time for its test flight.

With a nod from me Clive launched the Acro Wot Micro. What a handful! It looked like it had too much aileron movement so it was quickly landed, taking off its undercarriage in the process. After a quick repair and with reduced aileron throws we tried again. This time it was much better but still a bit of a handful ending with a very heavy landing.

Clive really liked the model and inquired how much would I charge for one. I decided to make him one as he has helped me so many times so got to work when I arrived home. A week later I had knocked one up and gave it to him when we next met again at Coombes.

After both of us trying different CG positions on both our models we concluded that one of the main issues was lateral stability. To improve this, I needed to add some dihedral. I took the models home and with a razor saw cut the bottom of the wings, added 3 degrees dihedral and added reinforcement to the bottom spar.

It was time to give them another test flight. We had moved the CG forward a little and with the added dihedral the Acro Wot Micros were much improved though still a bit of a handful to fly compared to the Micro Wot 4. I had great fun building and flying them.



Clive with the Acro Wot Micro John made for him as a gesture of thanks



*Size comparison:
Les Crane's ARTF
Acro Wot and John's
Acro Wot Micro
Photo: Grahame Pearson*



John Ivory with his 22" wingspan Acro Wot Micro

Workshop woes

George Evans reveals his plan for a new workshop

Hello all, this may turn out to be a long running saga, if it does, please bear with me. I have to own up to not being the tidiest worker. In fact, that's an understatement, I'm a disaster area! Added to that I'm a bit of a hoarder. My current workshop is an unheated, leaky, 1960's asbestos-roofed sectional concrete garage. Unfortunately, it's now starting to fall down around me with the reinforcing in the sections making a bid for freedom and breaking out all over the place (Photo 1). My wife has been suggesting for some time that I should replace it but I have always resisted. However, I have now weakened.

In one of the lockdowns (I cannot remember which) we ordered a log cabin for the garden. It duly arrived on the back of an articulated lorry direct from Holland (www.tuin.co.uk) (Photo 2). Over the space of a couple of weeks we painted it and then put it up (Photo 3 – see page 32). It was easy and I convinced myself that a larger version would make a good workshop.

Now the problems start, workshops are not the same size as garages hence I would need a 'custom' one, which I now understand is code for 'costs more and takes longer', but I bit the bullet and placed the order from Skinners Sheds (skidders-sheds.com) so I'm committed (or probably should be).



3



Now I have to address the elephant in the corner of the room (actually all of the room): the contents of the garage (Photo 4). The rough inventory goes like this: airframes in flyable condition, sizes various, 20 plus; airframes awaiting repair, 10 plus; airframes awaiting refurbishment, 7 or so; kits awaiting building, 14 (that I'll admit to); 1-metre yacht, 1; Marblehead yacht, 1; 24" yacht, 1; power boats, 5; Royal Enfield motorbike awaiting restoration, 1; metalwork lathe, 1; drill stand, 1; powered fret saw, 1; 9" chop saw, 1; other assorted tools, 5; numerous drawers and tool boxes (all full); A0 drawing board/building board, 1; copious amounts of assorted junk (things that will be useful at some time in the future), far too much to mention. Oh, yes, and one chest freezer and assorted fishing gear. Spare space: zero.

Today (early August) I faced the task and started. I ordered a significant number of storage boxes to cover the period while the old garage is removed and before the new workshop is built and fitted out. I then started the 'rationalisation' phase – very sadly I stripped three crashed airframes of all usable bits (yes, more hoarding). Bye bye Lancaster, Harvard and Vampire (Photo 5).

The journey to a new, clean and tidy workshop has started, the only question is will I allow myself in it?



5

Aviation Quiz

By an anonymous SRFC member

You can Google the answers but I urge you not to

Answers on page 34

1. Complete the titles of these aerobatic teams:

- ***** Jacks
- **** Diamonds
- ***** Arrows
- *** Arrows
- **** Angels
- *****birds
- ***** Tricolori
- ***** de France

2. What was the name of the WAAF who was sat on the tailplane of a Spitfire when it took off and did a circuit before landing?

What was the name of the famous WW2, Korean and Vietnam fighter ace who was married to the film star Ella Raines?

What were these people 'famous' for: Mary Ellis; Joy Lofthouse; Jacqui Cochrane; Joan Hughes; Maureen Dunlop; Diana Barnato Walker?

Name the dam in Wales used in the testing of explosive charges for the Dambusters weapon.

3. Which squadrons were the first to receive the following aircraft?

- Spitfire
- Hurricane
- Lancaster
- Halifax

4. To what aircraft/aircraft part do these nicknames refer?

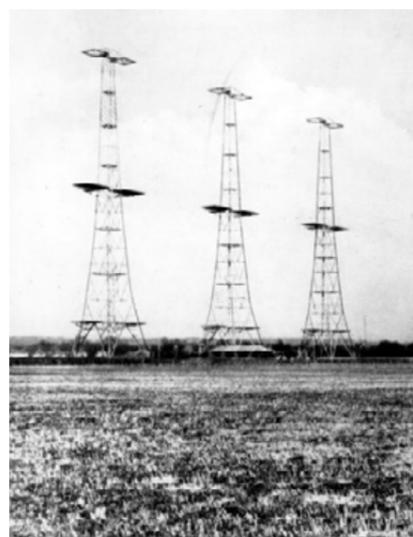
- Stringbag
- Meatbox
- Flat Iron
- Sabrinax

5. What do the following initials stand for?

- RDF
- RATO
- JATO
- FIDO
- SABS

Aviation Quiz – answers Quiz is on page 33

1. Yellow Jacks; Blue Diamonds; Black Arrows; Red Arrows; Blue Angels; Thunderbirds; Frecci Tricolori; Patrouille de France.
2. Margaret Horton; Robin Olds; All flew with the Air Transport Auxiliary; Nant-y Gro.
3. 19 Sqn; 111 Sqn; 44 Sqn; 35 Sqn.
4. Fairy Swordfish; Gloster Meteor; Gloster Javelin; Ammunition collection blisters on Hawker Hunters.
5. Radio Direction Finding (later RADAR); Rocket Assisted Take Off; Jet Assisted Take Off; Fog Investigation and Dispersal Operation; Stabilised Automatic Bomb Sight.



Freedom Day Ride Out

Something a bit different from motorcyclists Robin Strange, Clive Upperton and John Ivory

On so called 'Freedom Day' on 19th July Clive Upperton, John Ivory and Robin Strange went for a motorcycle ride with the aim of visiting two aviation museums in Kent, the first being Lashenden Air Warfare Museum at Headcorn Aerodrome (www.lashendenairwarfaremuseum.co.uk) followed by The Romney Marsh Wartime Collection (www.rmwcollection.co.uk).

As you may recall, the weather was warm on that day. Taking advantage of this, our plan was to meet up at a lay-by just off the junction of the A23 and A27 heading east. Clive and Robin live close to each other and by chance both stopped for fuel at Sainsbury's petrol station, Lyons Farm, Worthing before heading off east to meet John who was riding down from Horley.

Having met up successfully we all headed off with Clive in the lead, having a sat-nav on his bike, a 2015 BMW F700GS, with John in the middle on his 2010 Honda CB1000 and Robin as tail-end Charlie on his 1992 Triumph Trophy 900. As



On arrival at Lashenden Air Warfare Museum. Left to right: Clive, Robin and John



'Up Keep' bouncing bomb at Romney Marsh War Time Collection

things turned out our first stop was at the roadworks by the junction of the A26 and the B2192 Ringmer Road, Lewes. After a rather warm wait sitting on engines getting increasingly warm we set off on our jaunt arriving Headcorn without further ado in time for bacon butties and in one case a tuna butty washed down with tea and coffees.

As it turned out the museum at Headcorn is shut on a Monday but all was not lost as the sun was shining, aircraft were coming and going and the food and drink was good.

After a wander around we remounted our steeds and headed south in the wake of Clive for the second museum, which John and Robin saw and Clive missed as his sat-nav didn't alert him and his

view of the museum entrance was blocked by a passing lorry. We followed Clive for a short distance and then dutifully turned around and went in to the museum where John's and Robin's bikes were too heavy for the soft grass (yes, soft!) so we backed up and found an old concrete hard stand to park our bikes beside the bouncing bomb. Robin normally carries an old jam jar lid to place under the side stand of the bike which works a treat and stops the bike from sinking into soft ground with the added advantage that the lip on the lid stops the side stand sliding off the lid as the bike leans over – simple, cheap and very effective.

The Romney Marsh War Time Collection isn't a large museum and, looking at the state of the poor old Vampire sitting outside, it would be tempting to give it a miss but don't as there is a huge amount for the aviation enthusiast inside. The buildings in



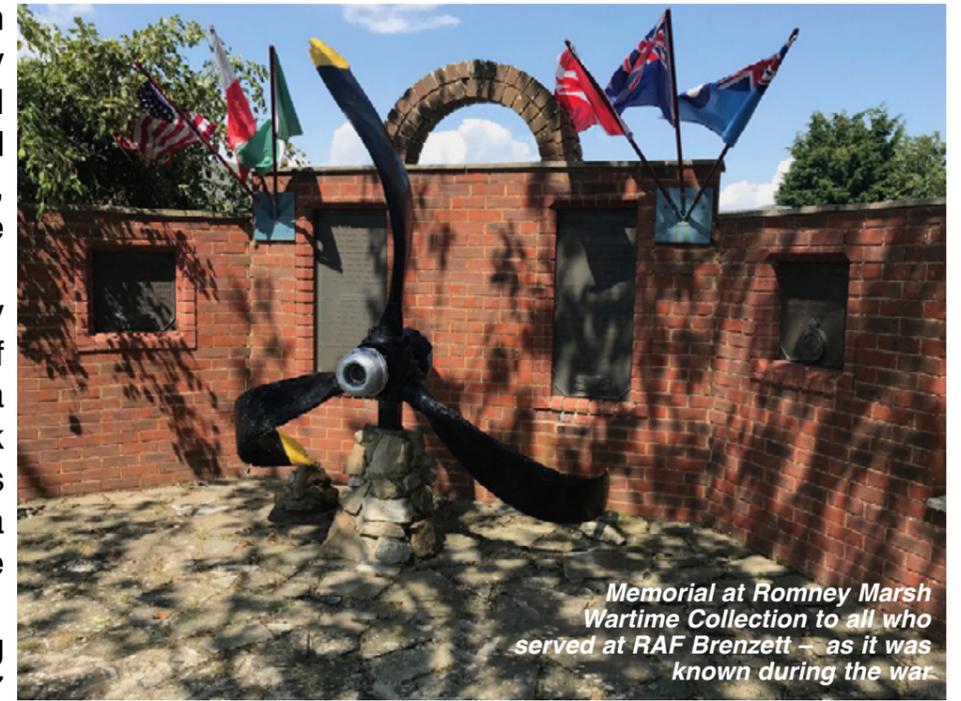
John with Romney Marsh War Time Collection's sorry looking Vampire

use for the museum were originally used by the Women's Land Army but the airfield was used by the RAF, the Polish and the United States forces.

Leaving Romney Marsh we headed off to Eastbourne's marina so John could check his boat and for all of us to have another cuppa and a bite to eat before heading home.

As we were riding west along the A27

tremendous cloud formations were building up to our north and near Mount Caburn just east of Lewes the sky looked rather dark. By the time they arrived home Clive and Robin had covered around 160 dry miles whereas John had done just over 200 miles the last of which were rather wet having been caught in a downpour heading up the A23 but a good time was had by all.



Memorial at Romney Marsh War Time Collection to all who served at RAF Brenzett – as it was known during the war



ROUTE

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Ben



George



Tom



Robin



John



Grahame

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Field Maintenance (Coombes)	VACANT*
Social Events	VACANT*
Website & Data	Ben De Vizio & Robin Strange
Safety Adviser	Dave Knott
Safety Marshall 1	Paul Gladstone
Safety Marshall 2	John Wase
Safety Marshall 3	VACANT*

**If you feel you can fill a vacant position please contact the Secretary for details*