

SAILPLANE & GLIDING

VOL. 70 NO.4



**THERMALLING:
FEEL OR THEORY?**

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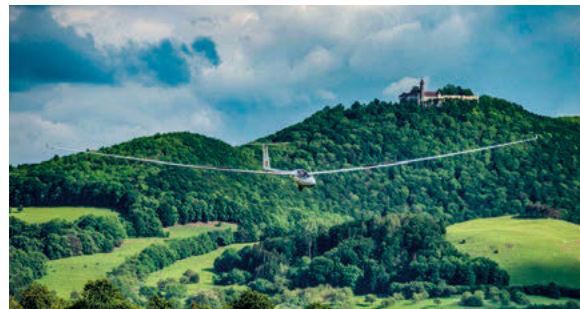
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COVER STORY
Hahnweide busier than approach to Heathrow without the need for Air Traffic Control. Team GB's Standard Class juniors competed as part of their preparation for the Worlds. See feature on pp38-41 to find out how they got on.
(Max Kirschner)

DEADLINES

Oct/Nov 2019
Articles, Letters, Club News: 5 Oct
Display advertisements: 21 Aug
Classifieds: 6 Sept

Dec 19/Jan 20
Articles, Letters, Club News: 4 Oct
Display advertisements: 21 Oct
Classifieds: 6 Nov

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› DG Flugzeugbau is installing the FES system in its DG-1001 family. Prototype manufacture is due to begin late this summer, with the first flight of the DG-1001E expected to take place in spring 2020. DG says that, in combination with a new battery generation, it expects a similar performance to that shown by FES single-seaters, such as the LS8-e neo.

› Congratulations to new UK Club Class champion, Tim Fletcher, flying a Std Libelle. Congratulations also to Mike Armstrong, who won Competition Enterprise flying his Ventus 2CT.

› Schempp-Hirth has delivered Arcus serial number 300 to Bitterwasser, Namibia.

› Ed Downham now holds the speed record for the UK Open Class 750km out-and-return. His flight in EB28 '13 on 12 May, 2019, was at a speed of 93.60km/h over 751.7km from Dunstable.

› As this issue goes to press, the British Gliding Team is competing in the Europeans at Prievidza, Slovakia. Task 3 for Club Class saw a day win for Tom Arscott, with G Dale in second place.

› Dates have been announced for the 2020 nationals: the 15m, Standard and Open Class will all be held at Hus Bos, 13-21 June; Club Class, Nympsfield, 4-12 July; 18m/20m Multi-Seat Class, Lasham, 8-16 July; and the Juniors, Aston Down, 22-30 August.

› The All Party Parliamentary Group on GA (APPG GA) has published the Lord Kirkhope lower airspace inquiry report, which makes a number of powerful and observations and recommendations. The report is at <https://members.glidering.co.uk/library/airspace/lord-kirkhope-lower-airspace-inquiry-report/>

› The BGA comps committee is on the lookout for new recruits. If you would like to help improve the UK competition scene, email compscommittee@gliding.co.uk including a little about yourself, your gliding history and what you could bring to the committee. Alan Langlands is now comp committee chairman.

› Are you prepared for a field landing? The BGA website has training videos describing all aspects of field landing, sponsored by the Ted Lysakowski Memorial Trust. See <https://members.glidering.co.uk/pilot-resources-flying-training/field-landing/>

› The BGA's *Laws and Rules* webpage has been updated to highlight applicable EASA rules and supporting information. See <https://members.glidering.co.uk/laws-rules/>

› S&G has been asked to highlight that the radio frequency used by Lincolnshire Gliding Club is 129.980, not 122.305 as used by the Strubby aviation group.



Willy and Debb Hackett with their Vintage Soaring Association Journalism Award (inset)

Accolade for vintage series

CONGRATULATIONS to Willy and Debb Hackett, who have been awarded the Vintage Sailplane Association's Journalism Award for their 'vintage gliding in the USA' series in S&G.

The award, created in 2013, recognises an article written by a member that

can be on history, restoration, an event, or anything else on gliding, published anywhere around the world.

Willy and Debb's S&G series, published in 2016 and 2017, followed Willy's quest to fly as many Schweizer types as possible in the USA.



World title for Tilo Holighaus

SCHEMP-HIRTH's Tilo Holighaus (left) is the new Sailplane Grand Prix Champion. Tilo flew to first place in a Ventus 3T at the SGP finals in La Cerdanya. Poland's Sebastian Kawa took Silver in a JS3, while French pilot Louis Boudier took Bronze, also in a JS3. The UK's Jon Gatfield and Mike Young came 11th and 12th respectively.

DATES

NATIONALS, REGIONALS AND OTHERS

Junior Worlds	Szeged, Hungary	28/7-10/8/19
Standard Class Nationals	Lasham	3-11/8/19
15m Class Nationals	Lasham	3-11/8/19
Open Class Nationals	Lasham	3-11/8/19
Junior Nationals	Nympsfield	17-25/8/19
Two-seater comp	Pocklington	18-25/8/19
UK Mountain Soaring Champs	Aboyne	1-7/9/19
Women's Worlds	Australia	3-17/1/20
Glider aerobatic competitions		
World Championships	Romania	18-27/7/19
Aerobatic Nationals	Lasham	12-15/9/19

BICESTER REGIONALS

20-27/7/19

HUS BOS CHALLENGE CUP

3-11/8/19

INTER-SERVICES REGIONALS

3-11/8/19

LASHAM REGIONALS

3-11/8/19

DUNSTABLE REGIONALS

17-25/8/19

- **BGA Club Management Conference, Sunday 17 November 2019 at de Vere Staverton, Northampton**
- **BGA Conference and AGM, 29 February 2020 at the Belfry Hotel, Nottingham**

RAEC AWARDS GALORE FOR UK GLIDER PILOTS



Joel Hallewell (here and now photography)

IT WAS great to see a number of UK glider pilots receiving Royal Aero Club medals and awards from Aviation Minister Baroness Vere in recognition of their contribution to the sport. At a ceremony at London's RAF Club in May, the following awards were made: Claude Woodhouse and Graham Saw (Bronze medal); Jim Crocker (posthumous) and Patrick Naegeli (RAeC Diploma); Upward Bound Trust, Brian Birlison and Santiago Cervantes (Certificate of Merit); and Joel Hallewell (President's Breitling Trophy). Apologies if I have missed anyone off this list.



■ David Roberts was presented with the FAI Silver medal, awarded at the end of last year



Miñiques volcano (5,910m)

It's the stuff of legends

WOULD you like to be one of the first glider pilots to fly over Chile's legendary volcanoes of Atacama? Jean-Marie Clément is inviting pilots to join him for a gliding expedition in the Chilean Andes, using Chilean gliders, a Stemme and, probably, an Arcus M and/or Nimbus 4DM.

From November to mid-December, the base would be in Calama (1,200km north of Santiago) allowing thermal and wave flights above the volcanoes of Atacama. It would be the first time that gliders would overfly these mythical volcanoes, which reach up to 6,000m (19,685ft) and whose cumulus bases rise up to 2,000m (6,562ft) above the peaks.

From the end of December to the end of January, plans are to make long wave flights from Lake General Carrera, 1,500km south of Santiago, named lake Buenos Aires by the Argentineans, flying on the Argentinean waves in the lee of the Cordillera.

■ To find out more, including costs and coaching opportunities, see www.topfly.aero

Don't miss this valuable event

HAVE you got this year's BGA Club Management Conference in your diary? It is being held at a new venue, the de Vere Staverton, Northampton, on Sunday 17 November. Four strands will include: chairmen, secretaries and managers; treasurers' forum; CFI forum; and Junior gliding conference. A separate session for club technical officers will be run by BGA CTO Gordon MacDonald.



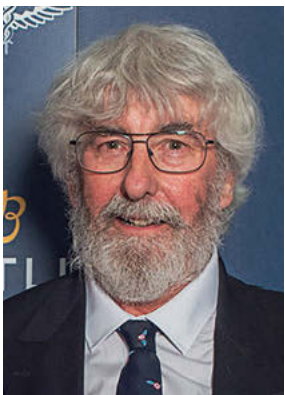
Claude Woodhouse



Graham Saw



Patrick Naegeli



Michael Clark (UBT)



Brian Birlison



Santiago Cervantes

One of our gliders is missing!

DFS 108-49 Grunau Baby IIB, Werke nummer 030795, was built by Flugzeugbau Petera GmbH at Hohenelbe, in what was then occupied Czechoslovakia in 1944. Post-war, it was used by gliding schools at Fairoaks, Martlesham Heath and Horsham St Faith before being sold to the RAF Gliding and Soaring Association, to be rebuilt as RAFGSA 226 (VT921).

Struck off charge in January 1957, it was later acquired from Southern Sailplanes by the newly-formed Midland Aircraft Preservation Society (MAPS) in March 1969, with plans to restore it in German markings. However, in 1974, the Society was contacted by the Air Training Corps unit at Thetford Grammar School with a view to putting it back into the air for use by the cadets. On making enquiries, it seemed that it may have been at nearby RAF Honington but, when the Society attempted to discover what was happening to their glider, it was nowhere to be found and the school/ATC Squadron could not shed any light on it.

In 2017, the Midland Aircraft Preservation Society and the air museum it established in Coventry celebrated its 50th anniversary and work is under way on a detailed history of half a century of aviation heritage activity. If any reader of S&G can shed any light on the mystery of the disappearing Grunau Baby, do please pass it on to the editor.

John Berkeley OBE,
MAPS Founders Group

SAFETY MESSAGE IS GETTING THROUGH

I'D LIKE to thank Tim Freearge and the BGA safety team for the thought-provoking article on the perils of distraction during rigging – and, by association, pre-flight checks (*The perils of distraction*, pp34-35, April/May 19). I'm pleased to report the message is getting out there; I've noticed a progressive change in habits at my own club and those undertaking these critical activities are typically left alone. I've even had a club member apologise after he started a conversation, but then realised I was partway through such an activity. The article links to the recent EASA Safety Information Bulletin 2019-07 issued on 30 April 19, entitled *Sailplane Rigging - Procedures, Inspections and Training*, indicating that these issues are relevant to all operators across Europe.

I have a Service aircraft engineering background and in this environment a safety critical task will be subject to an independent check. Similarly, the practice of carrying out independent checks has long been established in the RAFGSA with the Association glider logbooks requiring a signature for rig, an independent check post rig and, of course, the DI. A number of the Association clubs have moved from the RAFGSA Logbook to the BGA DI book and Sailplane Logbook. Whilst the BGA Logbook system is excellent and, in my personal opinion, a real improvement on the now rather dated RAFGSA Logbook system, there is nowhere to specifically record a rig or an independent check.

As reported in the recent BGA Safety Briefing '*Is your glider fit for flight*', in a

44-year period there have been 11 fatalities and eight serious injuries relating to an insecure wing or unconnected wing, tail or flying control surface. Avoiding just one such instance in the future would be priceless. Human factors creep into any activity involving a human machine interface, whoever we are and however we've been trained. We need to do more to protect ourselves from the random failings that we are all subject to. This might be inconvenient, but so is an accident or incident. Carrying out an independent check adds an additional barrier to an event occurring – it blocks a hole in the Swiss cheese model of accident causation. I'd suggest the BGA considers a recommended practice be raised for an independent check of control connections, tail pins, wing rigging and the positive control checks. A signature box could added to the DI line of the DI book to record such a check. Whilst the benefit of such an independent check is obvious, asking someone to put their initials or signature against carrying out such a task also reinforces what they're signing for – do they know what they are doing, have they done it correctly, are they happy to be the 'last chance check' before flight? I can't think of a genuine reason not to do this.

Carl Peters, Bannerdown GC (RAFGSA)

Tim Freearge, BGA Safety Committee Chairman, responds: *Carl underlines an important point; we are only human and any of us can get it wrong. Rigging a glider and making the control connections becomes a routine, which can be helpful but can also lead to problems if part of the routine is overlooked through distraction. Independent checks, by someone who has had no involvement in, but is familiar with, the task are a key element of aircraft maintenance and, if done correctly, mitigate for human error.*

Modern gliders are often sufficiently similar that differences and rigging idiosyncrasies are a surprise. Older glider mechanisms can be very unintuitive. Manufacturers rarely draw attention to potential rigging pitfalls. Sadly, several accidents have occurred from not

Article touches on neglected area

I THOROUGHLY enjoyed Polly Whitehead's article *It's grounds for success* in the April/May 19 issue (pp64-66). The desirable combination of avid young learners and veteran pilots, brought together on an organised ground school course, touched on a much neglected area. For those using the winch regularly, this will be doubly

obvious. Even with a rostered duty pilot, launch point efficiency can often be problematic.

May I be forgiven for quoting from a book, very much out of fashion today: "Towards ourselves we should be insatiable in learning, and towards others tireless in teaching." – Mao Tse Tung
Peter Holloway, Southdown GC

understanding a rigging mechanism or the errors to which it is susceptible. It is important that rigging is carried out or directed by someone experienced on the type and in accordance with the flight manual.

The same is true of the person double-checking the rigging, but this isn't always as straightforward as it might sound. Beyond the club hangar, eg at the trailer line, pilots can find themselves rigging alone apart from a passing mate, who helps lift the wings into place, or a group of pilots who can't resist chatting about the day ahead. It can be hard to find someone familiar with the task who knows what to look for. A strategy that works for some is to come back to the glider, a short period after completing the rigging, to recheck everything carefully and quietly as

part of the daily inspection.

We'll certainly review our rigging guidance as published in 'Managing Flying Risk'* to ensure that the issue Carl raises is addressed in some form. There is, of course, nothing to stop any gliding club establishing a process of independent checks for its own fleet.

*Some years ago, recommended practices and other bits of advice were pulled together in a single BGA publication titled 'Managing Flying Risk', which is available on the BGA members' website. The BGA safety leaflet 'Is your glider fit for flight?' is available at <https://members.gliding.co.uk/library/safety-briefings/is-your-glider-fit-for-flight/>; the EASA safety bulletin to which Carl refers is available at https://ad.easa.europa.eu/blob/EASA_SIB_2019_07.pdf/SIB_2019-07_1

WHICH WAY UP IS AN 'OLD CHESTNUT'

I REFER to John McWilliam's letter on page 7 of June/July's S&G, where he seems to advocate exclusively using Track Up on a moving map display. In my opinion it is not that simple, and he also makes some comparisons with which I disagree. It is, of course, an "old chestnut" upon which there will probably never be agreement!

I maintain that there is a fundamental difference between using a paper map as in his career in the RAF, and an electronic moving map. For the former, one is having to work out one's position by comparing map and ground features. For this I can accept that, often, Track or Heading Up is best. However, when using a moving map, one does not have to work out one's position as the electronics do that themselves.

The disadvantages for Track Up with a moving map are:

- Whirling confusion on the map when circling. At least use the "North Up when circling" option!
- Difficulty orientating oneself to a reference point, eg when wanting to report position relative to a feature. Which way is north/south, etc?
- Whilst Track or Heading Up might be better for short range orientation, for the big picture North Up is best. You get to see the general direction of travel at a glance,

and I suspect most people's mental model of the country's geography is North Up.

For these reasons I use North Up nearly all the time, including on my car satnav as I dislike constant rotating of the map. Yes, airline displays are almost always used Track Up in Sector Mode, because they fly in straight lines and are only interested in the direction of travel to the next IFR waypoint. Not really comparable with glider flying. Our helicopters also had Plan Mode with North Up, for orientation during SAR operations.

So I would advocate North Up most of the time. If the moving map fails and you have to revert to paper map, I would advocate orientating the paper map Heading Up and, of course, reading from ground to map if now lost. Track Up in wave with 60kts crosswind can be pretty disorientating. And remember to practise reading text upside down when flying south!

Nick Norman, Cairngorm GC

Please send letters (marked 'for publication') to the editor at editor@sailplaneandgliding.co.uk or the address on p3, including your full contact details.

The deadline for the next issue is 5 August

SAILPLANE & GLIDING



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Vintage gliding

S&G is privileged to be able to call on the advice of some of gliding's leading experts. If you have a question for our experts on any of the subjects listed above, contact the editor (details p3).

EXPERT ADVISERS

'TIS THE SEASON TO BE GLIDING...

BGA Chairman **Andy Perkins** waxes lyrical about a time of year when the most important things to worry about are fully-charged batteries, downloaded NOTAMs and a full water bottle...



A

UGUST -

what a great time of year! I appreciate that is subjective, however, in my eyes August is so good because it is typically when I am at my most gliding current during the UK soaring year. Rigging seems to be less hassle, I forget less of the things I need to go cross-country, with less of the numerous trips from the car to the cockpit prior to the flight and, importantly, everything handling wise seems second nature.

Across the country the harvest is in full flow, increasing landout options. The drier, browning countryside means that when the atmosphere gets going the air mass tends to have that continental feel with the sky feeling drier, giving those thinner cumulus

that stretch into the distance for miles. The continental style of thermals tend to be strong, but with pulses and the higher cloudbase mean you can often be running well below base with the sun beating down on you, with the vent fully open to keep you cool. Progress seems to be great, but you have to watch for falling out of the convective layer at lower levels later in the afternoon (that has caught me out more than a few times) to ensure you don't need that end of the day combine harvester generated thermal to get you home....

August is also when most of the country has a load of time off or, more importantly, it is when people think everyone is on holiday! As a result, the paperwork side of life tends to reduce slightly and there is time to enjoy. Hopefully you can use that to your advantage and, if the weather plays ball, get away with that sly day 'working from home' or 'in meeting' diary entry between 11:00 and 17:00.

Are there challenges ahead and things on the go? In short, yes, there is a lot going on and plenty of behind the scenes preparation to ensure that all of us can enjoy the sport we love when several key decisions regarding airspace, regulation and government policy come to fruition.

But it is August! The main things to worry about are ensuring the batteries are charged, NOTAMs downloaded, the water bottle is full, you don't rush and damage anything towing out and that you have the excuse of why you will be home late ready to rock... However you manage it, if you can escape for a cheeky extra bit of gliding - enjoy!



Andy Perkins
Chairman
British Gliding Association
July 2019



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Artwork by kind permission of Antoine Crespin



BGA initiative for acquiring and improving soaring and cross-country skills



#7 FIND THE RIGHT THERMALLING SPEED

Tony Cronshaw talks to Aim Higher's lead coach, Kevin Atkinson, about why feel and theory are two sides of the same coin

EXPERIENCED pilots instinctively choose thermalling speeds (and bank angle) to maximise climb rate for whatever flavour of thermal they are working, whether narrow or wide, weak or booming. Tony Cronshaw talks to Aim Higher's lead coach, Kevin Atkinson, about the role of "feel" and how theory can help to guide our choices.

TONY: *When learning to thermal in wooden gliders, I was taught to use feel and hence "dig the wing in" and "thermal just above the stall buffet in the turn".*

KEVIN: Oddly enough, I still use that technique today in any glider! This works perfectly because you are flying slowly (to minimise the size of circle), and flying on/near the min sink for the turning glider. But, to be fair, it can be difficult to feel the stall buffet in modern glass gliders. The feel can also change significantly with flaps and especially flying with water

to "dig the wing in", how tightly to turn, and how to interpret the vario (see also [1], [2]). The 30-sec vario average will confirm if these decisions were correct, but only in hindsight.

Mathematically, angle of bank (AoB), airspeed and circle radius are related, as shown in Table 1 (facing page, top left), subject to the limits of the glider's flight envelope (stall limits).

TONY: *The table shows how a small change in airspeed, or bank angle, makes a surprisingly big difference to circle size. Starting from any box in the middle of table, 5kts faster than intended means a 20 per cent bigger circle. Flying with just 5° less bank than intended means the circle is 20 per cent bigger, or a staggering 40 per cent bigger with 10° less bank.*

KEVIN: There are numerous combinations of AoB and airspeed that produce a circle that's too big and needlessly inefficient. We fly around the core and we don't climb efficiently. On the other hand, a circle that's very tight (but still within the glider's envelope) may be counterproductive. The glider's sink rate will be much higher when steeply banked and, depending on the thermal, this may outstrip the better lift in the core.

TONY: *To help find a good compromise, could we use a rule such as: "Thermal at 45kts with 45° bank" [1]?*

KEVIN: That could be a good starting point for an average thermal although many modern gliders need 50kts at 45° bank for efficient thermalling and responsive handling. A turbulent thermal will, of course, need a few kts extra for safety. Note that different gliders perform differently at the slow end. For example, a glider with flaps may have a "slower slow end", or a glider with a "high speed wing" may have a "faster slow end". The value of the min sink airspeed, as shown on the glider's polar, will reflect this.

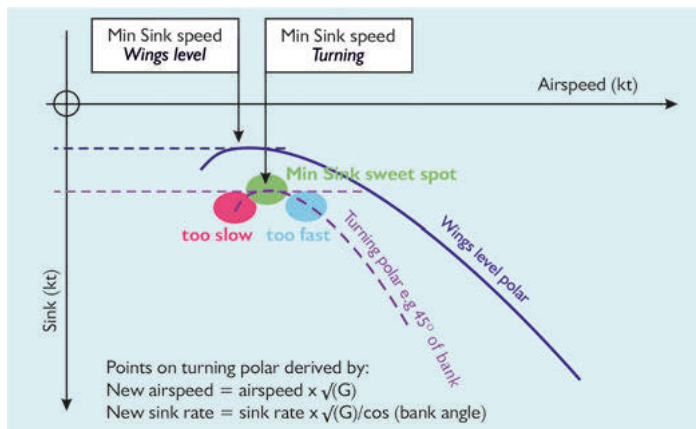


Figure 1: Min Sink "sweet spot" (Steve Longland)

ballast. It can lead to people, who have yet to develop a feel for their particular glider, either flying too slowly, or too fast, in relation to their glider's min sink "sweet spot" in the turn (see figure 1, left).

TONY: *In practice, what size of circle are we aiming for?*

KEVIN: Experience tells us that a medium strength thermal (in UK/Europe) typically requires a thermalling radius of less than around 100m in order to exploit the thermal and climb, and sometimes a tighter radius than this is more efficient and we climb more quickly. An experienced pilot uses feel (especially of vertical surges) to know when

■ Aim Higher courses are held at clubs by arrangement, run either by Kevin or by club coaches briefed on the training materials and S&G articles developed by Kevin and Tony.

Please contact kratkinson@yahoo.com if you, or your club, would like to participate in future Aim Higher courses.

Table 1 Circle radius (m) for given bank angle and speeds

		Airspeed →					
		40kt	45kt	50kt	55kt	60kt	65kt
Bank angle ↑	30°	75	95	117	142	168	197
	35°	62	78	96	117	139	163
	40°	52	65	80	97	116	136
	45°	43	55	68	82	97	114
	50°	36	46	57	69	82	96
	55°	30	38	47	57	68	80

Too fast and/or insufficient bank = inefficient climb

Too slow and/or too much bank = inefficient climb or glider stalls

Table 2 Speed to thermal for min sink in turn
Example glider with wings level, min sink of 44kt

Bank angle	G	Speed to thermal = Min Sink airspeed x \sqrt{G}
30°	1.15	44 x 1.07 = 47kt
35°	1.22	44 x 1.10 = 49kt
40°	1.31	44 x 1.14 = 50kt
45°	1.41	44 x 1.19 = 52kt
50°	1.56	44 x 1.25 = 55kt
60°	2.00	44 x 1.41 = 62kt

TONY: *Could we be more precise and predict the “sweet spot” thermalling speed by examining the glider’s turning polar?*

KEVIN: We can calculate the min sink airspeed for a particular bank angle by applying the mathematics shown in Table 2, top right (also indicated by the green line in Table 1). As for water ballast polars [3], the airspeed is scaled by the square root of the changed wing loading (in this case by pulling G in the turn). Meanwhile the sink rate is scaled as explained in figure 1.

TONY: *Hence the sweet spot speed at 45° AoB would be the glider’s min sink airspeed (wings level) multiplied by 1.19. But how would we validate this theoretical prediction?*

KEVIN: You could circle at 45° AoB (use the diagonal instrument screws [1]) and try to feel that you’re safely above the buffet. Also check that the controls are responsive otherwise you’re thermalling too slowly. By the way, it’s very worthwhile checking that you’re using the correct min sink airspeed in your calculation. Remember that the polar (and the value shown in the glider’s manual) may not reflect your actual glider due to its AUW and condition. I suggest making a test flight (wings level in still air) and analysing a video of the panel to find the min sink airspeed and the true polar.

TONY: *By the way, I was also taught a third mantra about how to thermal: “Don’t let the thermal throw you out”.*

KEVIN: Good point! Thermals generate gust outflows which are seen on the ASI (and may be felt and heard). Gusts may try to push the glider away from the core (perhaps a wing tries to lift) whilst the yaw string might blow sideways (blows away from the core). We need prompt handling skills to oppose this

and maintain the glider’s AoB and circling path. It MUST BE YOU that decides when to shift the circle, NOT the thermal.

TONY: *Re-centring is a topic that we will revisit in the future.*

KEVIN: Thermalling with constant attitude IN TRIM also makes it easy to fly with “head out of the cockpit”, not gazing at the ASI or at the vario/computer. This is really important for good look-out, referencing the horizon, and observing cloud features in the current thermal, as well as clouds in the distance that might be your next target. This is fundamental to flying by feel.

In the end, thermalling by feel should optimise the speed and AoB as predicted by theory. Ultimately, feel and theory are two sides of the same coin.

[1] *Banking on a fast climb, S&G, Aug/Sept 2018, pp10-11*

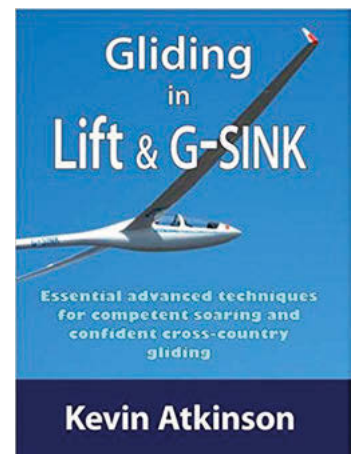
[2] *Feel the way to the core, S&G, Dec 2018/Jan 2019, pp8-9*

[3] *Get up to speed with ballast, S&G, Apr/May 2018, pp12-14*



■ Scan this QR code to read the full article *Get up to speed with ballast* from *S&G* April/May 2018, or visit www.sailplaneandgliding.co.uk/current-issue

THIS IS REALLY IMPORTANT FOR GOOD LOOK-OUT, REFERENCING THE HORIZON, AND OBSERVING CLOUD FEATURES IN THE CURRENT THERMAL, AS WELL AS CLOUDS IN THE DISTANCE THAT MIGHT BE YOUR NEXT TARGET



■ Kevin’s book *Gliding in Lift and G-SINK* is available at www.bgashop.co.uk or direct from kratkinson@yahoo.com



Garry Coppin reports from a very wet comp in Poland, where he and Steve Jones won Silver medals in the 20m Class

THIS was my third international competition as Team 66 with Steve Jones. We were off to Turbia in Poland, roughly 1,000 miles from Lasham. No, we hadn't heard of it either! Slightly concerning as we have been 2nd to the 20m Polish team in the past two internationals – is someone trying to rub it in?!

After two days of driving, we arrived safely and managed to fly three of the practice days. This showed us the area; a large forested terrain running east and west of the airfield, where good convergence lines seem to run up and down.

The forecasts mainly showed that the weather was going to be unpredictable at best; day 1 looked OK, but maybe some 'rest days' after that! Thankfully we made a solid start with a third place, which kept our spirits high while we looked at the rain for the next few days. Tricky AAT days followed, then finally a racing task! A 303km task was set, but the forecast showed thunderstorms for late afternoon. Once we'd launched we could see the thunderstorms might be a problem sooner than predicted – so much so that the organisers scrubbed the 18m and Open classes in the air – but our startline had already opened. No choice, so off we went!

The first leg was good and second leg was going well until we were adjacent to the airfield, which we could see was engulfed in a thunderstorm. This was going to be a one-way trip, with little chance of landing back where we started! We pressed on with the goal of making minimum distance. We wanted a scoring day, especially after the last competition day was declared non-scoring due to no one making the new 120km distance (it was 100km last year)... we would have been in the top three had it been scored.

We now have a new goal – to make a 120km. Eventually, at 148km, a land-out loomed. We sparked up the engine and turned for home. We could see heavy rain on our track so decided to play it safe and land. Fields in Poland are extremely short, but fairly wide! Having circled the field twice, we landed in the rain. Thanks to Google Translate and an iPhone we were invited to the farmer's house to meet the family

TEAM 66



and were offered vodka... for the shock of crash landing, in their eyes! We settled for coffee and cake, which was just as well as upon returning to the glider we were met by two of the local constabulary with big guns, six firemen, two fire engines and an ambulance. After breath tests (thankfully no vodka!) and the taking of our particulars, they were satisfied we were legal and hadn't crashed. Thanks to the real cavalry, who arrived en-masse from the airfield with the trailer and the news that we had won day. This moved us up into third place, behind our Polish rivals. A celebratory vodka was in order after all.

Following our day win, Arcus 66 remained in the trailer for the next five days. The weather was so atrocious that the government used Mobile Broadcast Messaging to warn people to stay indoors and not go near flooded areas and rivers that were

bursting their banks. The Team GB camp on the airfield flooded, with Pete Harvey having to dig a trench and hire a pump!

The forecast was not looking good, but our hopes were pinned on the very last day. The competition director didn't share our optimism. Fortunately, the final Saturday dawned and looked as though optimism had won, despite the airfield being very soggy. However, some 'gamemanship' (allegedly!) arose when organisers stated that the 20m Class was banned from carrying water ballast. This put Steve and me at a distinct disadvantage to the self-launchers in our class. We checked the rules, appealed and it was upheld. Another racing task set, 355km, game on!

The inevitable start line gaggle of week-long grounded pilots with one last task ensued. Tactics were going to have to play a big part if we were to improve on our

(Above) Team 66 – the UK's 20m pilots Steve Jones and Garry Coppin in Arcus T (photos by Max Kirschner)



Steve Jones (left) and Garry Coppin won Silver medals

WINS SILVER

RESULTS OF 20TH FAI EUROPEANS TURBIA, POLAND 11-25 MAY 2019

Open Class

- 1 Petr Tichy, Czech Republic, EB 29R
- 2 Riccardo Briigliadori, Italy, JS1c-21
- 3 Markus Frank, Germany, EB 29,
- 6 Russell Cheetham, UK, EB 29DR
- 13 Tim Jenkinson, UK, JS1c-21

18m Class

- 1 Sebastian Kawa, Poland, Diana 3
- 2 Karol Staryszak, Poland, ASG 29E
- 3 Wolfgang Janowitsch, Austria, Ventus 3T
- 5 Peter Harvey, UK, Ventus 3T
- 8 Phil Jones, UK, Ventus 3T

20m Multi-Seat Class

- 1 Tomasz Rubaj and Christoph Matkowski, Poland, ASG 32Mi
- 2 Steve Jones and Garry Coppin, UK, Arcus T
- 3 Uli Gmelin and Christine Grote, Germany, Arcus T

Team Cup

- 1 France
- 2 Poland
- 3 UK

■ <https://egc2019.pl>

■ www.britishglidingteam.co.uk



✂ current Bronze medal position. Optimal start time was crucial, but not necessarily related to the weather. We knew what we needed to do and we had a plan.

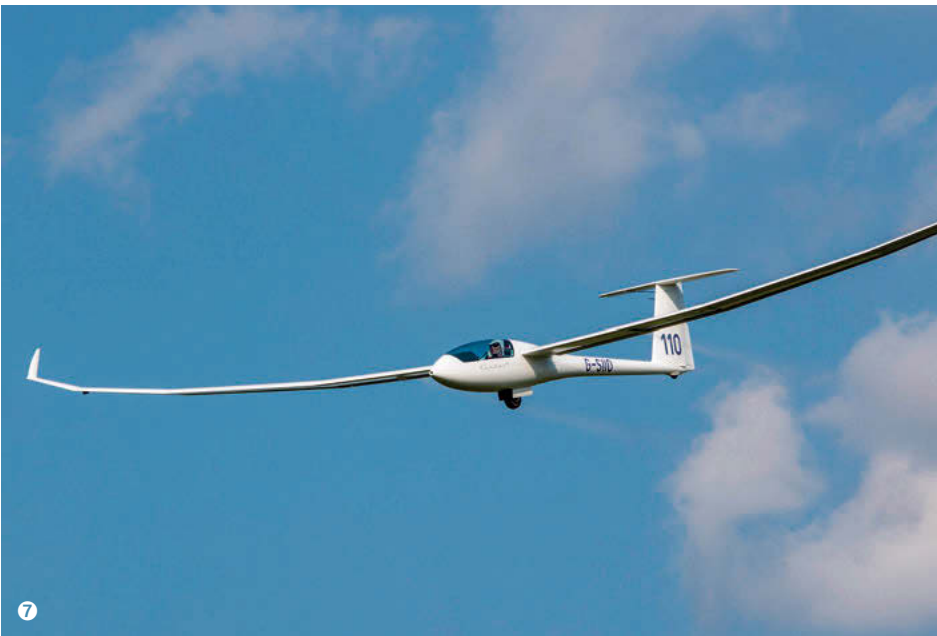
The Finns sent off an hour before us; we knew it was the best time of day to go, but tactically we had to stay with our nearest rivals. Eventually everyone bar the Poles cracked and departed. As is quite normal for this type of day we were pretty much out of time to complete the task. With the longitude we were at, the soaring day is rapidly declining by 17:00 local, so with 355km to do and two hours 35 minutes to do it, we knew there could be no more hanging around. We had to start the task and did so with the Polish team just behind us at 14:25.

To avoid a heavy defeat by the Finns,

every thermal had to be centered within a turn – two at the most, but preferably straight into the core. Every decision to leave for the next had to be decisive, with no extra turns for luck, and a plan for the route out of every thermal made long before leaving. Every route under every cloud had to be at least as good as the locals and preferably better. This was definitely a two-person job.

Bit by bit we pulled away from the Polish guys and then bit by bit they crawled back the deficit. After two hours all the gliders we started near were pretty much a distant memory behind, all we had to do was get home and hope the Finns hadn't performed a miracle with their earlier start time and the Silver medal would be ours.

With the clock ticking down we turned



- ❶ Russell Cheetham flying the EB 29Dr in the Open Class
- ❷ PZL 130 Orlik Polish turboprop, single-engine, two-seat trainer aircraft at the opening ceremony
- ❸ Duckies enjoy a scrub day (Werner Stroud)
- ❹ Sebastian Kawa secures yet another Gold, flying the Diana 3 in the 18m Class
- ❺ Pete Harvey digs a trench and hires a pump after Team GB's camp floods (Werner Stroud)
- ❻ Team GB: captain, pilots and crew
- ❼ Pete Harvey in Ventus 3T (Photos by Max Kirschner)

the last turning point at 16:40. One last run down one last cloudstreet, and 75km home without turning, would see us home just after 17:00.

It didn't work and cloud after cloud gave nothing. We diverted off the street to another, and again nothing. We came back to the first street and eventually stopped in 4kts (a far cry from the 6-7kts we'd had most of the rest of the afternoon). From here we were home with a race to finish against the Polish, a bit slower than we would have liked, but home.

We averaged over 125km/h, with only the Finnish guys to worry about. It was a good flight overall and if the Finns had beaten us then they well deserved wherever they ended up.

We were third on the day, almost equal with the Polish guys, but the Finns disappointingly winning by a few km/h. We guessed they didn't have to stop on the run home and, when we looked at the trace, that is exactly what happened. A straight run home from the last turn.

We paid the inevitable penalty for a late start and would now have to wait and see if the Finns had done enough. We had beaten them overall in every competition before and, after a short wait, we discovered that we had again. It was enough to move us up to Silver medal position.

Difficult weather conditions made for challenging flying, but great teamwork overall resulted in a Bronze medal for Team GB.



Garry Coppin soloed at Lasham in 1992. He has 5,000 hours gliding and 500 hours PPL. Current 20m national champion, Garry has three international Silver medals and last year flew a UK 1,000km



Two Hotspur gliders from No 3 Glider Training School, Weston-on-the-Green, in flight over the Oxfordshire countryside (IWM)

As we celebrate the 75th anniversary of D-Day, Dr David Pasley reflects on the role of glider pilots in key turning points of WW2



A jeep being loaded onto a Horsa Mark I in May 1944 (IWM)

IT WAS early morning on 10 May 1940 when those stationed at the Belgian fort, Eben Emael, received reports of German troop movements at the border. Garrisoned with up to 1,200 men and heavily armed, the reinforced concrete fort was thought to be impenetrable. Its guns faced the Albert Canal, capable of firing on the major crossings and delaying, if not stopping, any advancing army.

Men were posted to the fort's artillery and anti-aircraft guns on what they thought was a drill. However, on hearing the sound of gunfire in the distance, some were removed from their posts to prepare for a potential ground assault. At 05:00 reports came from one of the bridges crossing the canal that aircraft had been spotted overhead, but that no engines could be heard. It was not long before aircraft were visible to the anti-aircraft gunners at the fort, but they held back until they could make a definitive recognition of what these aircraft were. By the time the defenders realised what was happening, it was too late.

These aircraft were German and the lack

of engine noise was due to the fact that they were gliders. Nine of these DFS 230 gliders, carrying a force of fewer than 80 men, landed on top of the fortress. Within a matter of minutes the fort's guns were disabled using explosives and flamethrowers. Those inside the fort were pinned down until German ground forces arrived. It was a swift, decisive action which paved the way for the German advance into the Low Countries.

The effectiveness with which the Germans had used airborne forces prompted Winston Churchill to call for the creation of a British airborne force consisting of 5,000 parachute troops and "a comparable complement" of glider troops. Progress was slow, particularly for the development of the glider element. This, in part, was due to arguments over whether it would be RAF pilots or Army soldiers who would pilot the gliders.

Air Marshal Sir Arthur Harris issued a scathing statement regarding the selection of glider pilots from the Army: "The idea that semi-skilled, unpicked personnel (infantry corporals have, I believe, even been suggested) could with the maximum

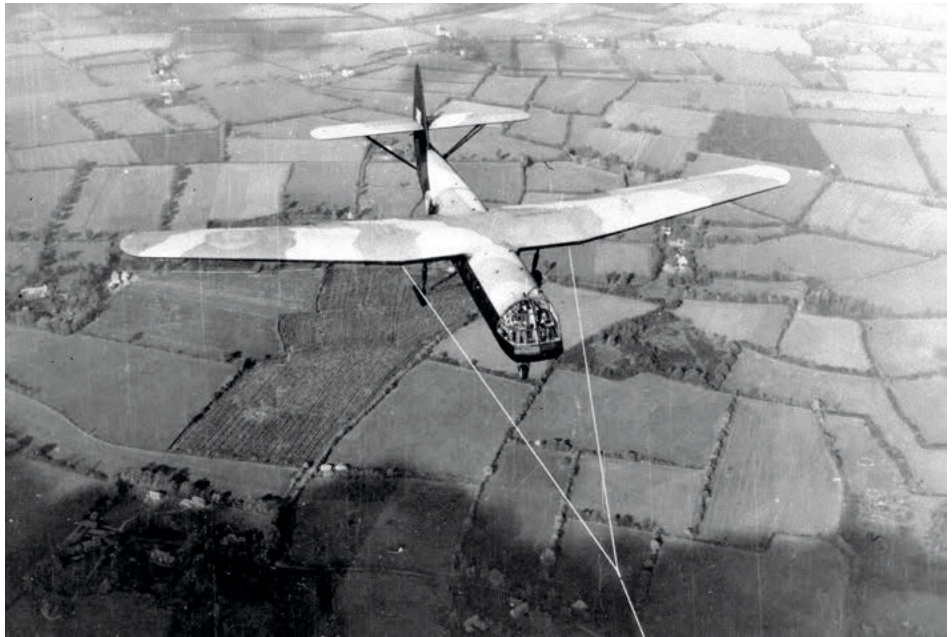
of training be entrusted with the piloting of these troop carriers is fantastic. The operation is the equivalent to forced landing the largest sized aircraft without engine aid – than which there is no higher test of piloting skill.”

While he was quite right about the skills required, his misgivings about Army soldiers not being up to the task were to be proven wrong. In February 1942 the Army's Glider Pilot Regiment was formed and over time it began to gather momentum. It was recognised that the pilots of these gliders would not only have to fly, but would also end up landing behind enemy lines and having to engage in fighting. Therefore, a rather comprehensive training regime was required involving both Army and RAF.

Any serving soldier could apply for the Regiment. Being accepted was another matter. Those who volunteered first had to go through similar aircrew selection boards as were used for the RAF. Most who applied were refused. Those who were accepted were then sent to the Glider Pilot Depot on Salisbury Plain for around six weeks, which many of the veterans described as “hell”. Here they were put through their paces, enduring tough physical exercise. On the parade ground they had to be immaculate. Anyone who did not make the high standards of fitness or presentation was “put on a charge” and sent packing. This happened frequently.

The ones who survived this regime went on to flying training at RAF Elementary Flying Training Schools. Here they learned to fly powered aircraft such as de Havilland Tiger Moths or Miles Magisters. After around 10 hours of dual instruction they went solo and had to complete various exercises and aerobatics.

After successful completion of this course, a volunteer finally got sight of a glider at



Glider Training School. The Hotspur glider was used for training and was similar in capacity to the German gliders which had been used to great effect. With a wingspan of 14 metres and constructed out of wood, it took two pilots, who sat in tandem, and six passengers in the back. Over 1,000 of these were built during the war, but British tactics meant they were never used operationally. While the glider pilots earned the coveted Army Flying Badge (their wings) after completing their training on the Hotspur, they would then have to convert to operational gliders.

The main operational glider used by British Forces was the Horsa. Designed by Airspeed Ltd, it was primarily built from plywood and canvas and constructed in furniture factories. However, it was of solid construction. Its 27-metre wingspan and 20-metre length meant it was of a comparable size with any bomber of its

The Horsa gliders, comparable in size with any bomber of its day, were towed into the air by RAF bombers and Dakota transport aircraft (IWM)

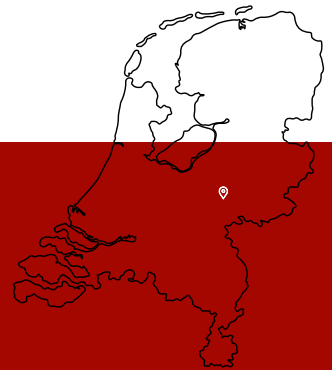
THOSE WHO WERE ACCEPTED WERE SENT TO THE GLIDER PILOT DEPOT ON SALISBURY PLAIN FOR AROUND SIX WEEKS, WHICH MANY OF THE VETERANS DESCRIBED AS 'HELL'



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Poster in the Corporals' Mess in 1944 (Frank Ashleigh)

THESE INCREDIBLE PILOT SOLDIERS HAVE FALLEN INTO OBSCURITY IN THE MINDS OF THE GENERAL PUBLIC

■ Dr David Pasley is secretary of the Glider Pilot Regiment Society

■ For more information about the Society, email info@gliderpilotregiment.org.uk

■ Or visit www.gliderpilotregiment.org.uk

day. Its two pilots sat side by side, while in the back it could carry 26 troops, or a jeep, anti-tank gun and gun crew. In reality, during operations, extra troops and equipment were frequently squeezed in and the combined weight of the glider and load often exceeded seven tonnes. The other British-built glider was the Hamilcar. This even larger glider, though also of wooden construction, could carry a light tank.

The gliders were towed into the air by RAF bombers and Dakota transport aircraft. Unlike the early German operations, the gliders were typically released within relatively close proximity to their intended landing zones and often in large numbers. With the roar of the tug aircrafts' engines, silence was not the objective, but rather speed and surprise. The Horsa was fitted with large "barn door" flaps, which meant it could descend rapidly. Within a matter of minutes, hundreds of troops could be landed with their equipment on unprepared landing zones, accurately and in concentrated numbers.

The role of the British glider pilots was not



A Horsa Mark I coming in to land, with "barn door" flaps down, at Portreath, Cornwall, in 1943



Hamilcar glider after landing in Germany in Operation Varsity, 24 March, 1945. In the foreground is one of the vehicles which could be carried in the Hamilcar (IWM)

limited to flying. They had come from Army backgrounds and received additional training in Battle Schools once they had qualified as pilots. After landing, they formed up into fighting units and fought side by side with the soldiers who they brought into battle. Their breadth of their skillset earned them the title of "Total Soldiers".

The Regiment took part in some of the key turning points of WW2, including D-Day, the Battle of Arnhem and the Rhine Crossing. Yet, as military gliders were largely made redundant with advances in jet aircraft and helicopters, these incredible pilot soldiers have fallen into obscurity in the minds of the general public.

The Glider Pilot Regiment Society was formed a little over two years ago by relatives and friends of these incredible men, with the aim of getting recognition for their brave actions. In this, the 75th anniversary of seven of the Regiment's operations, the Society is particularly active and would welcome anyone who wants to learn more about the Regiment to get in touch.

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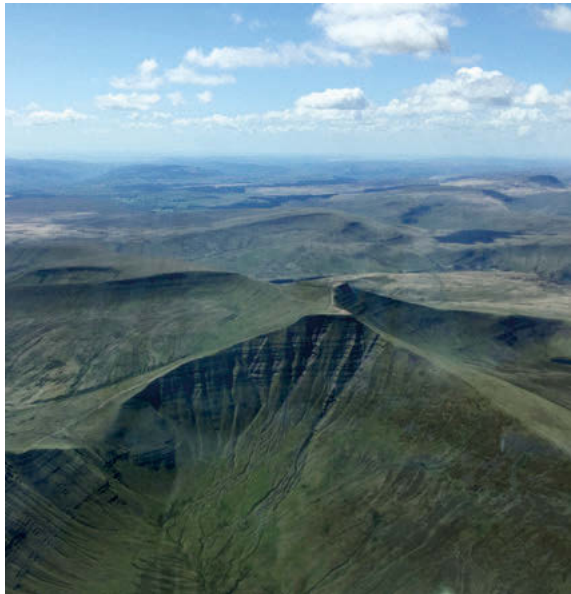
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MORE THAN THE PERFECT FLIGHT

Martin Roberts wasn't prepared for the emotions felt when completing a much dreamt of 750km, covering three national parks



Pen-y-Fan looking west

AN AMBITIOUS CONCEPT, BUT GLIDING IS ALL ABOUT TURNING SOMETHING IMAGINABLE INTO REALITY, ISN'T IT?

HOW do you describe a dream? Imagine a flight where everything goes right: right weather, which you have called correctly, right task, and then flying that goes right, resulting in success on a really big task. You might think that would be the *perfect* flight, right? Not quite... For me, this flight was rather more than that; it was the culmination of 30 years of reflection on our great sport. It was made through the landscapes of younger years, across the Southdowns, the Cotswolds, Forest of Dean, the Brecon Beacons, mid-Wales and Snowdonia, joining up the beautiful landscapes of three national parks.

In 1990, flying from Southdown GC, I gained all three Diamonds in Club Class aircraft, completing the 500km at my first attempt in a DG-300 club. Nice! I knew that I could probably complete a 750km flight if I just had a high-performance aircraft. Sadly, a 750km machine was never likely on a primary schoolteacher's salary. It wasn't a question of the '750 always eluding me – I just simply couldn't afford the kit. I could afford only cheap Club Class gliders. Then I had a 10-year lay-off. Readers can make the assumption, nevertheless, that I have been thinking about the 750km flight for all that time.

In 2016, I bought a DG-800B outright – an 18m ship with outstanding performance. Finally, I had an aircraft capable of taking me on this 750km adventure that I had spent half a lifetime daydreaming about.

As a pilot with a Southdown background, for years I imagined a 750km flight starting on the ridge *if* a certain set of circumstances lined up: a 20kt+ wind of north or north-north-east at sunrise, some thermal activity from about 9am, soarable to 2,500-3,000ft at Midhurst at 10am, conditions good in

Wales *if* you can get there, work up through mid-Wales into wind, then float home. An ambitious concept, but gliding is all about turning something imaginable into reality, isn't it?

The meteorology leading into Saturday 4 May suggested that all the necessary factors would come together, but with showers in the Midlands and south later.

My first go at a 750km in 2018 had ended at Brackley after 625km. Flying 600km+ anytime is hardly a failure, and I learned several crucial lessons from that experience: prepare much more carefully next time, leave as early as possible, rest fully before the flight. For this second attempt, the trip I had in mind was by far the most challenging flight I had ever declared: Start Lasham, Eastbourne (ENW), Brecon South West (BSW), Bala (BAL), finish Lasham, for 758km. It seems strange to me now – but I had no doubts.

Grey sky

The early morning was not promising; I stepped out of my front door into puddles under a grey sky, but in a howling northerly which made the telephone wires outside my house hum.

It was blue, but still windy, at Lasham as I sat with the engine running on runway 09 at 07:58. The 25kt northerly crosswind made for a very tricky launch with half-water. I survived that, climbed to start height and, at 08:10, set off for my first turn point at Eastbourne. And so, the big adventure began.

I know the Southdown ridge and conditions – every fence post, every water trough. I knew the ridge would be working well, and it was. My only slight concern was that the windsock at Lasham showed a slight westerly component in the north wind, which might make the run into Eastbourne 'interesting', as the wind really needs to be just east of north. Even so, thermals were forecast, with wind veering by 09:00, and I expected to arrive there around then. That's how it turned out. The run in to and out of ENW was quite easy in ridge lift/broken

thermals. I rounded Eastbourne at 09:05.

Hammered back west along the ridge. By now, good looking cloud streets were forming. My plan was to be climbing away in a thermal from the Cocking-Harting area around about 09:45-10:00. All I had to do was wait until I ran into strong lift. The plan worked and I was able to climb in a solid 4kts to 3,200ft at 09:55. Now in the good streets, I passed Lasham at 10:30 and 3,000ft and observed a long and packed grid. One national park down, two to go. So far, so good.

The long crosswind/into wind leg towards Brecon featured slow progress and a couple of low points. However, I felt good and on top of my game. By Swindon, cloudbase was about 3,700ft and rising.

Calming effect

I was quite secure as I crossed the Cotswolds with its hills and stiles of my childhood. I passed south of Nympsfield at about 12:00. So far, the trip had been a bit frenetic, but flying here again, heading over the magnificent River Severn and Forest of Dean, somehow had a calming effect. The mood changed from electro-pop to ballad as I approached the Brecon Beacons National Park.

The last time I flew here was to Abergavenny from Aston Down in 1993 in my 17.7m Cirrus, a flight steeped in personal mystique. Now, here I was again. The valley of the River Usk leading into the mountains looked rather like a dragon's mouth, formidable and daunting. Welcome to Wales!

I needed to get high enough to tame the beast, and help was offered in the form of a 5-6kt thermal coming off of Abergavenny. As I climbed up alongside Blorenge mountain, a familiar Lasham Nimbus ran in underneath me.

The scenery was beginning to be quite stunning. As a teenager, I used to play in these hills and valleys; I know them intimately. Now, more than 45 years since I first walked up Pen-y-Fan (Brecon Beacon), I was here again – this time at 4,500ft. I can't describe how I felt, but the word that comes closest is *awe*. Sometimes, this sport is just so beautiful. It was magnificent to be flying in these mountains that I love so much. The place and occasion got to me, and tears were rolling down my cheeks.

I had to drag myself away to the turn at Brecon SW at 13:25. I was up on my schedule; 400km completed in five hours 15 minutes. Any other day I would have been quite happy with that and I'd be closing the



trailer and going home. But this wasn't any other day...

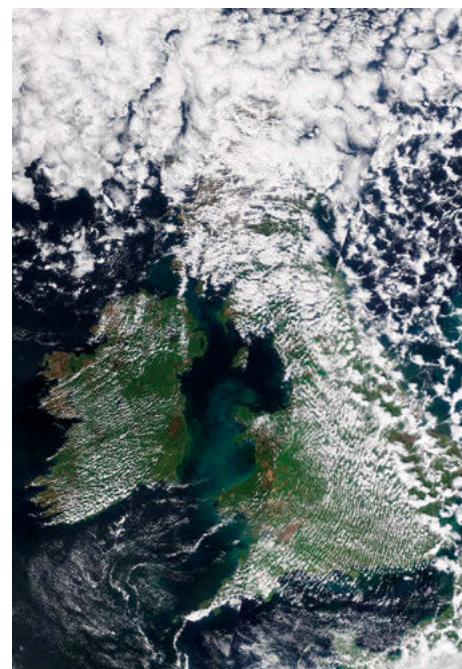
Running north, the sky looked nice. My goodness – I was a long way from home! It was going well and I was playing it carefully. I was looking at a 15/18kt headwind on the vario, but fortunately I was also getting 5-6kt averages to 5,000ft+. It was a labour of love now, and I had to work hard for that love. I needed to stay high and follow the energy. I've never flown over the surface of the moon, but it must be like Wales!

Eventually I approached Lake Bala. The Snowdonia National Park. My favourite one. I've spent six years living and working here. What a wonderful view! Sometimes I can be sloppy at turns. I was determined not to be today – but I still took some photos.

I turned Bala at 15:15. I had made the last turn. Once I make a final turn point, I always reckon the rest is on me to really use every trick in the book to get home. I'd spent most of the day patiently working my way into wind. Now that wind was going to be my best friend. When you're 260km from home in the UK, you need all the friends you can get.

Looking back, turning Bala marked the beginning of another phase in the

Martin Robert's 750km flight on 4 May 2019 (Illustration Steve Longland)



The satpic at 12:00

I WASN'T GOING TO GIVE UP WITHOUT A FIGHT. THE VARIO FELL SILENT. ON I WENT INTO THE GREY UNKNOWN

✈ flight. I'd waged my war with the Welsh wind 200km from home, and won! I relaxed. The wind was behind me now. The pulse of the flight duly changed, without me even noticing.

The next thing I remember, I was closing in on Gloucester and thinking: "oh, that's Gloucester". No, I hadn't fallen asleep. I passed the Gloucester South turn point at 16:35. Where had I been for the past hour

and a half? In the zone, perhaps.

I remember being startled at the time. Jeez – I'm over half way home! More concerning – I was aware of big showers on my left and up ahead. Specifically, on my track near Swindon, which was blotted completely by a huge shower. Ooo er... Time to change gear and focus...

Suddenly, I was not that high. Up ahead, I thought I could see a forming cumulus over Aston Down, but I looked down and saw that I was actually over AD! The cumulus was, in fact, near Lyneham and miles away. It was a *looong* way away.

I set off. There was one massive storm cell south of Swindon now. Mmm...

I was really reaching for that cumulus. I needed a climb, and I needed it now. I dumped the water as I ran in and was down to 1,600ft as I finally connected with first 2kts then 4kts, as I climbed to 4,500ft. I had plenty of time to look at the dire situation ahead; in the Hungerford-Rivar area there was that vast shower, with what looked like snow coming out of it, blocking my route. It was drifting fast on that wind too. Soon it was going to close off my route home. Bloody hell!

No justice

It seemed to me that there was no justice. Thirty years – and to be so close now! It looked like I might get shot down by rain right at the end. I had no option but to glide on into the gloom under this cumulonimbus, and hope to reach round it or even through it. There was some vague drab sun on the ground on the downwind side, which might just be feeding it – so it wasn't over. But I wasn't going to give up without a fight. The vario fell silent. On I went into the grey unknown.

Now 45km to go, but down to 2,800ft approaching Thruxton airfield. I ran on under a high canopy of very dark cloud with no clue as to whether there would be any lift. If there was nothing, then I'd be out of options, as I couldn't see anything I could reach. It would be all over. The silence matched the gloomy sky.

Nothing happened. There was *nothing*. I ran into rain instead.

Down to 2,600ft now, I began eyeing up Thruxton. The rain stopped, but it looked like my adventure was coming to an end.

....Beep beep beep... The silence was broken. My vario showed lift! Adventure at an end? Maybe not...

I made a broad circle in 1kt and felt a



Bala Lake looking south-west, with Cader Idris on the extreme left

push, which I moved towards next time around to make it 2kts; 2kts was enough. I made sure not to try anything fancy. Gradually, oh so gradually, I began to climb away. Now I could take the game deep.

But I was still confronted with a wall of water between me and Lasham. It was a sort of curtain. An absolutely terrible sight. I did not want to fly through it.

As I climbed past 3,500ft, I noticed that a sort of parting was forming in the curtain; a gap. At 3,800ft, the vario said I had a glide home, but I knew from hard experience that meant nothing in these conditions. There is often vast sink running for miles around the sides of these big showers. I did not dare to continue climbing into the cloud either. The curtains were opening... I had to go through. It was now or never. So, I took a deep breath, straightened up and aimed for the centre of the gap...

To my amazement, the vario remained beeping up; 3kts now right in the gap. I continued to run on track for home, climbing through 4,000ft along the way. Wow! I passed through the curtain and then got plastered with even heavier rain and sleet for about a minute, but I still had 3kts up wings-level. Then, at 4,200ft, the vario went silent. I was expecting huge sink to kick in and rob me – but it never came. *Relief!*

I'd had to work very hard, and the past hour had been completely buttock clenching.

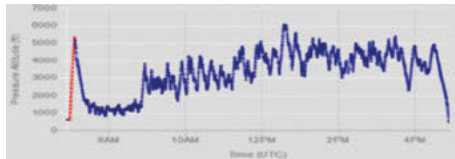
Just 35km to run now on an easy final glide to Lasham for 750km. I suppressed satisfaction and cruised quietly along. I didn't feel tired, but then understood that I certainly had to be after 9½ hours in the



cockpit. As I approached home, I told myself not to do anything stupid, and triple-checked every decision and action.

As I sat there, in the peace and quiet, I had plenty of time to think. I reflected that years of desire had not prepared me for this feeling. Quite a feeling!

I came through the finish and turned back west for the circuit onto the 09-grass strip. The sun, which I hadn't seen for nearly an hour, dazzled and startled me, but didn't put me off my approach. I brought the aircraft in perfectly. I rolled to a stop, and sat for a while with my eyes tightly closed.



■ There is an audio visual of this flight at: www.youtube.com/watch?v=Z1QP97vBYIc

Martin confronts a wall of rain between himself and Lasham



Martin Roberts currently flies a DG-800b '44'. He has 1100 hours plus the Diamond badge. He started gliding at Essex GC at North Weald in 1987. Martin spent many years at Southdown GC, then had a 10-year lay-off, but has been settled at Lasham since 2012.

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CHANNELING FRUSTRATION

A triple Channel crossing is the subject of our latest 'landout from heaven or hell', as Mike Pope explains

ON 1 AUGUST 1976, Mike Carlton, Justin Wills and I each crossed the Channel. I believe that only 12 pilots have crossed the Channel in pure gliders although some, including Justin, have done the crossing twice.

Justin started at North Hill and after a nine-and-a-half-hour flight landed his Libelle at Trier, near the German border. His retrieve was simply a long aerotow back to England.

Mike Carlton, in his Calif, started at Booker and initially landed at Long Marston from where he got another tow to the better weather to the west. His first attempt almost ended in disaster when he got down to 300ft, but he then contacted strong lift and climbed to 6,000ft from which he made the crossing.

After a nine-and-a-half hour flight, he landed just short of Luxembourg. Mike delegated the retrieve to Chris Rollings and Bill Scull (see *Mon Dieu! The longest day*, pp18-19, April/May 19, S&G).

I also started at Booker, in a Nimbus 2 belonging to Mike Carlton, having had a crash in my Kestrel during the National Championships. I was towed to the northwest with a target of Cosford. My idea was to start from that area in order for cloudbase to be high enough at the Channel area to make the crossing. Unfortunately, the forecast was wrong and the weather got worse so I released near Stratford and got down to about 500ft over Long Marston.

My tug did not have a radio working so I couldn't request another tow from Long Marston; it was climb away or end at Long Marston. After a long struggle, I managed to get back to a height from where I could glide towards the coast.

The Gatwick TMA was a major obstacle, so I flew to a point near Petersfield from where I could make my way towards the Channel. This proved far from easy, but I finally reached Ashford, where I climbed to 6,000ft and reached the coast at 5,500ft. France looked a very long way away, with a lot of water to cross, so I retreated to my last thermal area and again climbed to 6,000ft. I was back down to 5,500ft at the coast, but decided to carry on regardless! Having reached France I got down to about 1,000ft before finding strong lift. I carried on and flew over Brussels at a height of about 6,000ft. After almost 11 hours in the sky I landed near the town of Yves-Gomezze in southern Belgium.

The farmer, on whose land I had landed, was very kind. He arranged for the English teacher from the local school to translate. Unfortunately, her efforts were not great and I then admitted that I could speak French, having been at an English school in Switzerland. I was a bit rusty as it was some 20 years since I had left school! I tried to get an aerotow retrieve, but there was a



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problem with some restricted airspace near my landing place. I stayed with the family for several nights. Their six-year-old daughter was lovely and very amusing. We would walk to the glider and I would put her in the seat and close the canopy. She loved it!

I finally took a train to Brussels from where I flew back to London. Now for the retrieve. I had called Mike Carlton, who said that if I came to his house he would get somebody to help with the retrieve. When I arrived at his home he said he would help providing I "left my crappy car behind" and we could go in his car.

So, we unhitched the trailer from my Audi Coupe and attached it to his Rolls-Royce!

"You drive," says Mike and off we went. On arrival at Customs I was asked how much money I was carrying. I think it was £28, but the customs officer told me that the limit was £25. "Daddy, you are so naughty," says Mike!

On boarding the ship, we made our way to the cafeteria for dinner. Mike then complains that I have been given three sausages whilst he has been given two. The response was classic: "We always do something extra for class." I should add that I was wearing a jacket and tie whilst he was in some sort of denim jacket, which was very scruffy, and his black beard did not add much to his appearance!

Thick fog

On arrival at our port there was quite a thick fog. "I am not driving in bloody fog," says Mike. So we book in to an hotel for a few hours. I do not think either of us got much sleep so it was a waste of time and money. On arrival at the glider, I gave presents to the farmer's children and a bottle of whisky to the farmer. We derigged the glider and started for home.

It was then that our problems started. After relatively few miles we got a flat tyre on the trailer. There was no spare and no jack. Mike flagged down a British caravan and



Cartoons by Ross Martin

borrowed their kit. He then went with them to the nearest garage, where the tyre was repaired. After flagging down another British caravan he returned to the trailer, put the wheel on and we resumed our journey.

My problem was that I was due to fly to Malta that night and, if I stayed with Mike and drove to Calais, then I would miss my flight. So Mike took me to the Hoverport from where I crossed over to England. The train to London was desperately slow and stopped at every station. On arrival in London there was a very long queue for taxis. I began running and finally managed to get on a bus bound for Kensington. When I saw an empty taxi, I jumped off the bus whilst it was still moving and almost broke my neck!

On arrival at my house in Kensington, my girlfriend was waiting with the bags packed. We then carried on to Heathrow where we arrived about 35 minutes before the aeroplane was scheduled to depart. To my amazement and relief we caught the flight, but I think that I fell asleep as the aeroplane took off!

On my return to England, I called Mike to find out how his journey had been. He told me that he had parked alongside the ferry and a booming voice from the bridge said: "Is that you, Carlton?" Mike had been at school with the captain and he was well entertained during the crossing, so was very happy with the trip.

The triple Channel crossing was voted "Flight of the year" for 1976.

■ Do you have a landout story - from heaven or hell - that S&G could include in this series of retrieve tales? Please send it to editor@sailplaneandgliding.co.uk

I TRIED TO GET AN AEROTOW RETRIEVE, BUT THERE WAS A PROBLEM WITH SOME RESTRICTED AIRSPACE NEAR MY LANDING PLACE. I STAYED WITH THE FAMILY FOR SEVERAL NIGHTS





This page, clockwise from top left:

K-18 launch viewed from retrieve winch with reflected horizon (Patrick Rowney)

K-21 HTV with mammatus clouds at Gransden Lodge on 18 March 2019 (Michael Samuels)

Late evening landing for K-21 at Keevil in April 2019 (Patrick Rowney)

Facing page, clockwise from top:

Liam Bennett took this on 17 March 2019, flying EB28 '13' with Steve Lynn

Justin Wills photographed this granite spire in the Bugaboos during long flights deep into Canada's Rockies in May 2019

Rod MacDonald flies his Vega out of Warner Springs, California. He says Warner Springs should be on everyone's list of soaring places... year-round thermals, ridge, wave and convergence lift

Kev Atkinson is captured beautifully by Sophie Mahieu during this year's Aim Higher training in Sisteron

■ If you would like your previously-unpublished photographs to be considered for inclusion in Gliding Gallery, send them to: editor@sailplaneandgliding.co.uk or upload to: www.sailplaneandgliding.co.uk/dropbox





ADVISORY 12: TENUOUSLY TOWING TROUBLE

Ebenezer Grimshaw uncovers yet another area of murky gliding horror for newbies

IT WAS dusk. We had recently de-rigged two gliders of historical interest at a nearby museum open day and were dutifully and carefully returning them. One of my club Venerables had just pulled in to the BP station on the main road back to the airfield. I did not need fuel myself, but

thought I ought perhaps to follow in support as we had been a sort of double act.

As we came to a halt by the pumps my worst instincts were confirmed by the sight of a large Police Range Rover lurking in an I'm-Not-Going-Anywhere-Just-Yet sort-of position. A much more powerful instinct told me to just drive straight on through and leave my esteemed colleague to his fate because we were both towing gliders. Very old gliders. In very old trailers. But I hung grimly on in a determined show of loyalty and companionship. Eventually the inevitable happened and there was tapping at my window. It was a large uniformed figure.

"Is this your trailer, Sir?"

"Me? Ah... trailer? Oh er... that one? well... no, not really... no."

"So whose trailer is it, if you don't mind my asking?"

"You know, I'm not entirely sure. It either belongs to a venerable fellow called Guillam or it's owned by the Vintage Glider Club... I'm just helping out you here you see. Out of the goodness of my heart and so on. We've been displaying these splendid flying machines at a certain well-known museum and are now taking them home to bed."

"I see, Sir. Well do you mind if we take a look? We've been staring at your trailers and certain questions have clouded our troubled minds..." So out I get.

"I know, I know... officer. You're worried if it's a 'single indivisible load' as defined by the EEC Conduct Of Procedures For Type Approval Category O 4 Section 5.10?" (I was very proud I'd memorised this).

"No, Sir. I'm more concerned with this bit

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of string. Is this supposed to be a breakaway cable or a secondary coupling?"

"Um..."

"Only it doesn't look very strong to me... what do you think?" I immediately agree, cursing Guillam under my breath for it was, without doubt, his. Fortunately, I had some sturdy nylon tape in my car and explain that this has about a two-ton breaking strain. I instantly replace Guillam's tatty old piece of polypropylene twine and finish with a flat figure-of-eight knot as a grand flourish. Hooray for the Boy Scouts... they taught me so much... before they got PC'd! "There... that should fix it!"

"But what about the brake? It doesn't appear to have one..."

"Um..."

"What's the weight of this trailer, Sir?"

"Er..."

"What's inside it?"

"Ah... now that I can tell you. It's a K-6CR made by Alexander Schleicher of Poppenhausen and designed by the famous Rudolph Kaiser... hence the 'K' you see... Schleichers always do that... put the designer's initials into the model number. Or they did until very recently..."

"Yes that's as may be, Sir, but what I want to know is how much it weighs... How much does the glider weigh and how much does the trailer weigh?"

"A K-6? Well it won't be that much... five... six hundred pounds maybe. Plus acorns."

"Acorns, Sir?"

"Yes, it appears to have been used as winter storage by an industrious squirrel family and it's almost impossible to get the acorns out of the tail... which is why we don't fly it any more. We let kids sit in it. For charitable purposes you see... we're terribly nice people. Very worried about the squirrels..."

"That's all very well, Sir, but what I want to know is the combined weight. Is it over or under 750 kilogrammes? Because if it's more than that you have to demonstrate a working brake."

"Ah. Kilogrammes you say? I've heard of them. Well I'm sure it's under. It's only a small glider."

"But what's the weight of the trailer? I can't see a data plate on it..."

"Gosh... now you're asking... sort of normal glider trailer weight I expect. We've been towing these things around since the war you know. This one pretty much since. I'm sure it's all legit. I mean it must be under 750 kilo whatsits otherwise it would have a brake on it... wouldn't it?"

The officer seemed unimpressed by the logic of my argument and a lengthy lecture ensued on the hazards of trailer towing and the fines both me and the Vintage Glider Club could be subjected to if they knowingly let me drive an unroadworthy contraption. I decided to play it in *Surprised-and-Concerned/Innocent-but-Harassed-Charity-Worker* response. "Gosh really? Good heavens!" The police officer looked doubtfully at the tyres. He poked around the axles and tried to work out if there was, indeed, a brake in there somewhere. He even borrowed my torch to do it! Then he wandered over to the other car at the pumps and behold: that trailer had four wheels with a much beefier glider and... well... a wheel-brake that definitely should have worked!

So it was an embarrassing evening and two emotionally drained and heavily lectured glider pilots woefully trundled back to their airfield, but with loads and licences intact. Subsequent to this episode I am reliably informed that ruminations took place at the Vintage Club. Drastic Decisions were made concerning their venerable collection of dodgy metalware, some of which got mercilessly scrapped!

Thus was I rudely re-awakened to the horrors of trailer towing... which happens to everyone sooner or later. The unobvious thing is, in practice, you're nearly always towing *someone else's kit!* What usually happens is this: you agree, in a weak philanthropic moment, to assist a fellow aviator. And you're in a rush... because he's in a field near Kettering with tea-time fast approaching. Then you discover that one of his trailer tyres is flat, the brakes are half-seized, a sidelight doesn't work and, if you are brave enough to peer underneath, you find it needs welding in three places! These alarms cause you to forget the One Crucially Important Thing... you clean forgot to put your number plate on the back! Or: he's lent you his car for the retrieve, but you can't find his spare plate. So here's a thought... have *you* got a spare number plate for *your* car? Most new pilots won't have thought of this unless they're caravan owners and I bet no-one ever warned you about *that* in your cross-country lectures!

Trailers tend to sit quietly rotting away in obscure corners of the airfield. Until ☹



"Or it could be Arkwright... haven't seen him for ages either..."

IT WAS AN EMBARRASSING EVENING AND TWO EMOTIONALLY DRAINED AND HEAVILY LECTURED GLIDER PILOTS WOEFULLY TRUNDLED BACK TO THEIR AIRFIELD, BUT WITH LOADS AND LICENCES INTACT

IT'S NOT ENOUGH TO KNOW HOW TO FLY GLIDERS. YOU ALSO HAVE TO KNOW HOW TO TAKE THEM APART. AND GET ALL THE BITS BACK WITHOUT ATTRACTING ATTENTION FROM ANYONE IN UNIFORM!

☞ suddenly one day... panic... Protheroe has landed out! "Who the heck's Protheroe?" "No idea... but we must get him back!" (When you do finally return... lo... someone has pinched his trailer space!)

So folks, here we have yet another dark source of unlabelled horror at the heart of gliding. It's not enough to know how to fly gliders. You also have to know how to take them apart. And get all the bits back without attracting attention from anyone in uniform!

Now far be it for Grimshaw to suddenly pose as an expert on the towing of trailers. Or as an expert on anything at all really. But it has become obvious even to me that most of us need to bone up on this stuff. I rushed first to my nice crisp un-thumbed BGA *Laws And Rules* book, but no... nothing about trailers in edition 17. The BGA website proved more helpful. I was directed to a special section of five pages explaining the basics... hooray!

● The intimidating business of *Maximum Authorised Mass, Gross Vehicle Weight, Maximum Technically Permitted Laden Mass, Vehicle Unladen Weight, Kerb Weight, Maximum Train Weight, and Maximum Combined Weight* is briefly explained. GOOD LUCK!

● None of this tells you what to do if your

trailer is so old it doesn't have a data plate!

● There were, however, things in the BGA info I hadn't thought of: You should DI the trailer just as you DI the glider! Did anyone ever tell you that? The two could be a mile apart!

● A trailer may not be covered in your car insurance..... especially someone else's... you need to check!

● Most trailer, caravan and motorhome tyres degrade from UV long before they wear out from the road. Watch for cracking on the sides. So those ridiculous-looking plastic covers actually make perfect sense!

● Advice from the Caravan Club: You need between five and seven per cent of your trailer's laden weight pressing down on the hitch as 'noseweight' when static. This helps to prevent snaking.

● <https://www.gov.uk/towing-with-car/> should also be perused.

I must stress: we are not talking about those swanky spotless £16,000 flip-top extravaganzae you see proudly housing the latest Nimbus or Arcus. They will pass any test you care to throw at them! We're talking about the normal *I-Can-Only-Just-Afford-This-Lark* type of trailer... especially the ancient 'tunnel' type camouflaged into



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the remotest corner of the airfield by bog weed, boscage and bramble. The one that hasn't been moved for ages. It probably goes with an ancient hangar'd craft... owned by a shadowy syndicate welcoming newbies... and the impecunious. In other words: my kind of trailer! Road legality is just the beginning. When was the last time you inspected more than the tyres? Do you even know where it is? Has it got all the rigging aids in it? Or did some get moved to the hangar? Do you know how to use and stow them?

Tomorrow... before undergrowth gets worse... scrounge a poky power strimmer and a pair of cutters and attempt to separate your trailer, if you can, from Mother Nature. Use heavy gloves! Then scrounge a jet washer with a patio cleaner head and some very long lengths of hosepipe. You'll need a chair, wellies, waterproofs and overtrousers. Plus a very long power lead. Give the whole horrible contraption a really good jet scrub. See if anything is left when all the mould is removed. Don't wear your best suit. Look underneath... the trailer I mean. I bet it needs welding in three places! See if you can actually move it. One tyre will be flat, the brake will have seized and the lights won't

all work. But you could spray paint it a jazzy colour... just to show people you care *really*. No-one ever does this... why not stand out from the herd! Make sure you know what the relevant weights are. Grimshaw's advice is to make a careful inspection when towing kit belonging to someone else... as is usual! Whose car are you using? Have they left you any fuel? Are you insured on their cover or are they insured under yours?

Don't forget: the tattier a trailer looks the more likely it is to be stopped by a tall uniformed person asking awkward questions. And you need *three* number plates or you really *will* get stopped!

And a final thought: Do peer inside before you start retrieving someone... especially from around Kettering. *Make sure your clubmate's trailer isn't already full of another glider.* Someone else could have borrowed it and... well... it *has* happened!

Strange, but true... as always...

*Ebenezer
Grimshaw*



■ All cartoons by Ross Martin

■ **NEXT TIME:**
A dash of colour!

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An ITV crew filmed Women Glide UK participants during a cross-country weekend at Hus Bos (Max Kirschner)

Liz Sparrow gives an update on women's coaching, plus Kelly Teagle's thoughts on a recent weekend filmed by ITV

BRITISH Team members Liz Sparrow, Ayala Truelove and Claudia Hill, along with other pundits, have been out and about delivering the Women Coaching Programme, supported by Launchpoint. The programme is helping women pilots from clubs all round the country improve their cross-country racing skills – many of us struggle with confidence, or just developing the skills to move to the next level, and the coaching team are there to help.

Hot on the heels of the successful

planning weekend at The Gliding Centre in March came our mini-comp, aka Compy McCompface, at Lasham over 4-6 May. As usual the weather conspired against us, but our most excellent tasksetter found a window suitable for all competitors.

Some might argue that the retrieve stories were more epic than the actual flights, but hey! We shared top tips on flight planning, prep and racing before we flew, and trace analysis when we got back. Whilst there wasn't classic racing, everyone learnt something during the weekend and stretched their wings a little.

On to the cross-country long weekend at The Gliding Centre from 14-17 June. A group of keen cross-country pilots brought their gliders along; with the British Team and pundit Alison Mulder, we had two Duos and a coach in a single-seater ready to do some coaching. Sadly, the appalling 'summer' weather prevented much racing, but we covered key racing and soaring topics and flew in psychologist Christina Griffiths to give us a mind-bending session on sports psychology and tools for improving your flying confidence. We flew on the final day

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Photo: Alastair Mackenzie

when conditions were 'testing'* – when our publicity machine organised an ITV film crew to film all participants and help us tell other women out there about our great sport.

*'testing' = largely testing turbos, FES and the Hus Bos tug fleet with varios resolutely stuck in sink.

■ Coming up next: coaching and mentoring alongside the Bicester Regionals from 20-28 July and the Hus Bos Challenge Cup from 3-12 August. We support solo comp entries and also have some two-seater spaces for keen women who don't yet have their Silver. Just to up the ante somewhat, the Challenge Cup is our first 'test run' for the Women's Worlds in 2021 and so we'll be testing out some of our plans for WWGC2021.

We invite all women pilots to drop by, even if you can't make it for the whole week; meet other like-minded women and join in the fun. We'd love to see you there!

■ You can sponsor the team at: www.gofundme.com/BritishWomenGliding-WWGC-funding

Women Glide cross-country long weekend at Hus Bos

I WAS excited to learn that Women Glide UK was continuing with its coaching programme in 2019, writes *Kelly Teagle*. So when the dates came out, I booked to join them at Hus Bos in mid-June.

As luck would have it, the weekend was fairly wet, so most of the coaching was conducted indoors.

I unfortunately had to miss Day 1, but the others told me that they'd covered general cross-country flying tactics, planned a real task from a 2018 competition and then "maggot-raced" a set of logger traces from that comp task. I was sorry to have missed that!

On Day 2, glider pilot and psychologist Christina Griffiths provided an extremely insightful session on sports psychology,

which we all enjoyed. In fact, we were so engrossed in the subject that a whole day passed covering that one topic!

Day 3 was wet and blustery again, so we tackled subjects including our goals for the year, flight computers and software, and field landings. We had a couple of distinct groups of pilots: those using Oudies, and those using XC Soar, and a new one to most of us; TopHat. We split the group into two so that we could concentrate on the features of our respective devices.

I'm in the Oudie user group, and the hour was well spent. I thought I knew the Oudie well, but I learned several new things about it, which will come in handy this comp season!

On the final day, the weather gods finally smiled on us. Zephyrus brought us a moderate south-westerly wind, and Zeus kept the rain at bay, despite dark skies in places. ITV turned up to film us flying for the regional news bulletins. Each of us did a short Q&A piece to camera, and then we hopped into a DG-505 and Duo for some air-to-air filming. Liz and Ayala did a fair job of pretending that it was soarable, for the sake of TV, but we were on the ground again within half an hour!

We decided that it was lunch time and, an hour later, the sun came out and the clouds parted a little. Rebecca Bryan took a launch in her new Shark FES, and reported tricky conditions. Nora van Genugten went soaring in Duo 620 with Tim Robson, and Liz and Ayala flew again in the DG-505 and Duo HB1. All in all, a good end to a great weekend!

I THOUGHT I KNEW THE OUDIE WELL, BUT I LEARNED SEVERAL NEW THINGS ABOUT IT, WHICH WILL COME IN HANDY THIS COMP SEASON!



Top: Liz Sparrow (second left) and Claudia Hill (centre) share top tips on key racing and soaring topics
Above: the weather gods finally smiled, allowing flying on the last day (Max Kirschner)

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Above left: Over the ski lifts at Cairngorm (Above right) Heading for Kinloch Rannoch the flight computer announced final glide

LS8 HELPS GO THE DISTANCE

Adrian Loening reflects on achieving his Diamond distance, with the help of his LS8 and long-suffering syndicate partner

I HAD seen the forecast for Sunday 12 May coming for some time. Others thought that the Saturday would be better, but it turned out to overdevelop.

I had planned a 500km with turn points at Aberfoyle and Lochearnhead. RASP showed that there would be a strong sea breeze around almost all coasts and that there would be blue conditions north of the Great Glen. So, discussion with the locals and we agreed a task from Feshie to Callander on the upper reaches of the Forth Valley up to Dufftown in the lower parts of Glen Fiddich (of whisky fame). From there, right back across the Cairngorm to Glen Falloch, which

is effectively the valley leading down to Loch Lomond and, finally, home to Feshie.

I was angry that my flight on Saturday did not even make the first turn point of a declared 300km triangle. Sunday morning dawned clear and cold. There was ice on the glider covers when I unwrapped it at 8.30am. A 500km was going to need some speed although the forecast wind was light. So I loaded water into the wings, filling just 35kg into each wing partly because I was aware that there was a risk of freezing, but mostly because I could not be bothered to drag more water across the airfield.

I launched at 10.45am, just the third launch of the day, behind Pete in the Shark Jet, who was on the same task and Pete in the Vega 17, which was on a 300km task. Straight into a fairly strong thermal, I dashed to the start line and then headed south joining the Vega and the Shark at the top of Glen Feshie. We thermalled together for a while in good, but not strong, lift. It was early in the day so I made a decision to try and keep as high as I could, climbing each thermal nearly to cloudbase. We all headed roughly south to the A9 and Blair Atholl.

A few thermals and I had the measure of the day, setting the MacCready to 2.5 and 40 per cent ballast, which gave a best glide of around 70kts. Having had a few thermals to play with I set some rules: if low then stick with it; if less than 3kts average in the first



Escape route to Feshie (all photographs by Adrian Loening)

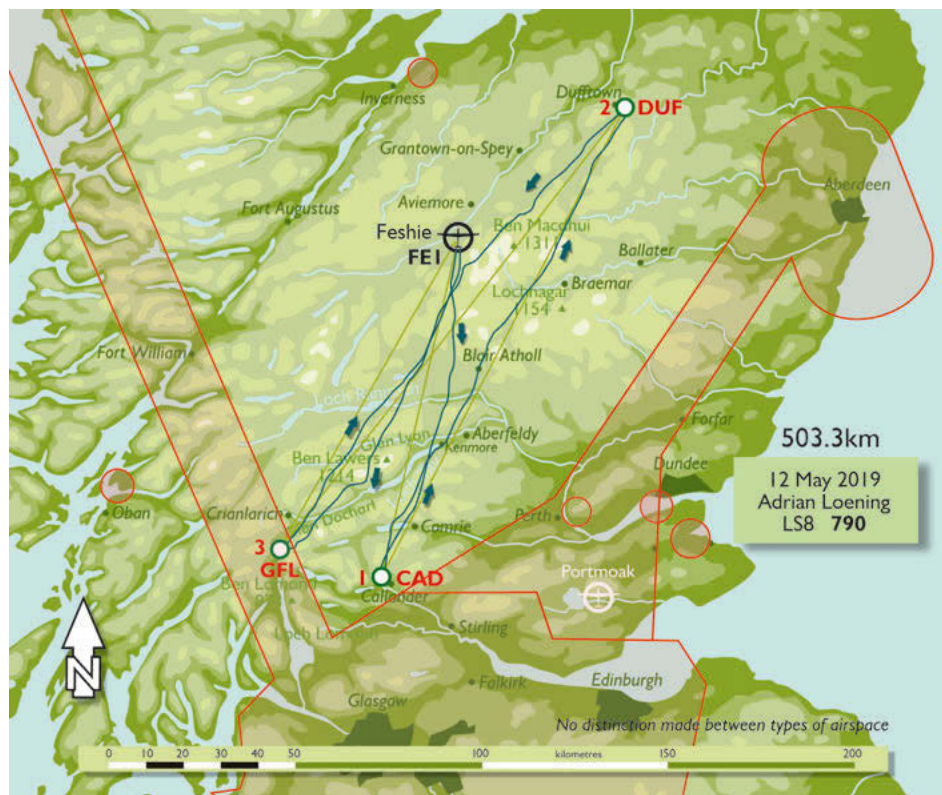
turn then leave for the next one; if more than 5kts average then ride all the way to cloudbase.

Soon I was crossing the A9 at Blair Atholl 4,500ft above launch. The Vega was long gone, but I spotted the Shark below me. He seemed low, but that is often deceptive from height and it turned out to be the last I was to see of him. Now feeling high I crossed Loch Tummel and picked up a couple of cores to the south of the water. I was beginning to realise that the wind was stronger than forecast and I was heading straight into it. However, those thermals took me straight to Loch Tay and Kenmore. From there I could see Callander, although the GPS said it was still 40km away. What puzzled me was that the moving map kept telling me to go further west and then the sudden realisation that I was looking at Comrie and not Callander! A course correction took me to the hills to the north east of Callander where there were strong thermals.

Another glider, probably from Portmoak, joined below me and radioed his mate to see if it was him above. I did not reply. The sky above Callander was entirely blue, with sea air coming up the Forth Valley and killing the cumulus. The turn point was still 10km away, but the lift was good and I figured that with enough height I could push into the sea air, turn Callander and return to the same thermal source without much risk. That worked well and I got back to the ridge losing just 1,000ft. The GPS showed a daunting 150km run to Dufftown, but I could see that the clouds inland looked strong and with a higher base than previously.

Strong lift

The planned track heading north east crossed the Cairngorm massif just to the west of Braemar. But the lift was strong and, with 10km steps between each thermal, a few turns and I was back at Pitlochry. Now there is a stretch of land with no roads and really no landout options. I flew up the valleys behind Pitlochry in increasing thermal strengths looking east to the Cairnwell and the valley running down to Braemar. The wind was behind me and my ground speed, as well as altitude, was increasing. It was the middle of the day; this really was the easiest part of the flight and with gaps of 12km between thermals it seemed to take no time to cross the Cairngorms and get a view of Dufftown. There was a great sea breeze front about 15km past Dufftown all the way along the coast to Fraserburgh. If I had not been on



a mission I would have continued to explore. Soon I had turned and was pointing back into wind. This was one of the highest parts of the flight, topping out at cloudbase nearly 7,000ft above sea level.

I was heading back to the Cairngorm itself, but now the wind had strengthened. The wind estimator gave 17km/h south west and the route took me over the very highest and snow-capped part of the mountains. I had to keep the airspeed up to make progress so did my best to stay high and push forward, finding myself over the ski lifts at Cairngorm. Now the first big mistake as I flew up Glen Eanaich, which is a steep walled glen pointing north east and with the highest cliffs to the south west end. The air was pouring down the Glen and I was trying to fly up it. I eyeballed the ridge directly in front of me, which included the Munro Carn Bán Mór at over 3,300ft, wondering if I could cross the ridge. But I did have the option of heading west to lower ridges and a dive into Feshie airstrip, so it was not too scary.

As it happens, I got across Carn Bán Mór with 1,000ft to spare and dropped into the south end of Glen Feshie and slopes that were into sun and wind. A strong climb averaging 6-7kts soon had me back over the high ground where I started with the other two gliders and heading in a more westerly direction for Glen Falloch, 90km to the

Adrian Loening's 500km flight on 12 May 2019 (Illustration Steve Longland)

■ If you have had a memorable flight, whatever the distance, please consider sharing it with S&G - editor

THE TURN POINT WAS STILL 10KM AWAY, BUT THE LIFT WAS GOOD AND I FIGURED THAT WITH ENOUGH HEIGHT I COULD PUSH INTO THE SEA AIR, TURN CALLANDER AND RETURN TO THE SAME THERMAL SOURCE WITHOUT MUCH RISK



Adrian Loening started flying with Warwick University Gliding Club and soloed at the Gliding Centre in 1983; a Bronze C followed in 1986. Adrian also flew hanggliders and then there was a long gap (the usual things with money, kids, work, etc). He completed Silver C in 1996. Adrian took a PPL(A) in 1989 at Edinburgh Flying Club and joined a syndicate with a Jantar Standard 2 at SGU at the same time. He joined Borders Gliding Club in 2011 and a Gold C followed in 2017, with Diamond height and goal the next year during which he also became a tug pilot, converting to tail draggers. Adrian has around 600 hours gliding, 400 hours power flying and 500 hours hanggliding. Clearly lacking talent, it took the acquisition of an LS8-18 and a long-suffering syndicate partner to achieve the final Diamond with the flight here. It is mostly the aircraft not the pilot!

↪ turn point and 200km to home.

The clouds were getting thinner, but there was a great street pretty much lined up with my route. Flying at 70-80kts with the occasional stop in only the very strongest lift, I crossed Kinloch Rannoch, the Munros forming the north side of Glen Lyon and then into Glen Dochart and the mountains above Crianlarich. That is where the clouds ended and, with a sinking heart, I saw that the sea air had beaten me to the turn point, which was still 16km distant. Glen Dochart offers a few landable fields, particularly to the eastern end. I figured that at least I could turn Glen Falloch and hightail it into Glen Dochart for a landing. There is absolutely nowhere to land in Glen Falloch!

The turn point was much further down Glen Falloch than I expected, the wind was still 15km/h and I had a little wobble heading out and nearly turned around. But I spotted the smallest wisp of a remaining thermal, which seemed to be directly over the turn point. Spurred on by this I raced into the turn point, thought I felt some lift so took a couple of orbits, decided there was nothing working and turned back to Glen Dochart. I pulled the lever to dump the water, but it felt very stiff. However, I figured I could hear the water running out and gave it little thought. The flight, I thought, was over.

But now in front of me was the conical snow-capped face of Ben Lyon and I forced myself to deviate from the quickest route to landing and fly up the ridges leading to the summit. These ridges were in full sunlight and largely facing into wind. It was hard to leave the centre of the Glen, but I had been there many years ago on a hang glider and knew I could get round the corner in an LS8. I was rewarded with a slow climb of 2.5kts

and soon crossed the top of the mountain, over Glen Dochart and on to the now blue skies of the hills above Crianlarich.

A blue, but strong, thermal lifted me back to over 6,200ft and I could see the remains of the streets heading back to Feshie. Left street or right street? A moment of indecision lost a few hundred feet and I realised I was getting tired now, five and a half hours into the flight. I opted right to some clouds apparently being generated by Ben Lawers, off track but more visible lift. Stuffing water and a biscuit into my mouth, I got a screaming climb to over 7,200ft. The wind behind me, the ballast dumped and with lots of height, I straightlined it for the A9. Back over Kinloch Rannoch the flight computer announced 'final glide'. But I eyeballed the distant snow-covered Cairngorms more than 50km away and decided a racing finish was not for me. Better finish slow than not at all!

Finish line

I had to tell myself to slow down, trust the glide angle, trust the wind behind me, take a few turns in good lift and wait. Over the A9 and increasingly above the glide slope, but I still could not resist a good thermal core which took me back to 6,000ft. Finally, with the Feshie ridge in sight, I let the airspeed climb to 100kts and dived over the finish line still 3,500ft above sea level.

I throw all the sandwich wrappers and rubbish behind the seat, drop the undercarriage and check the dump valves again. A few turns with the air brakes open and I entered the circuit to land into the south-west wind. Touching down, the left wing of the glider dropped and I had to use full aileron deflection to keep the glider level and avoid the Puchacz parked at the side. I rolled off the landing strip and the left wing touched down. Glug, glug, glug... I climbed out and found water draining from the tanks and a huge block of ice hanging under the wing. The dump valves must have been dripping slightly and the water running under the wing froze in place. Good thing I did not fill the tanks full!

The task was 503.3km, but I later found out that I had declared 'barrel' sectors so this knocked the distance down to 500.3km, although I did turn all sectors to FAI rules – Diamond distance, just! Later it was confirmed that the declaration of barrels did not matter and, as I had turned all points, the distance was 503.3km. Also I found out that Pete in the Vega 17 completed his 300km for a Gold badge.



Left: Water drains after landing and, right, the block of ice fell off (Adrian Loening)



Barnsley students grow in confidence taking part in The Air League's Soaring to Success programme (photographs courtesy of The Air League)

ENGAGING YOUTH

Rachel Edwards reports on successful Air League programme

GLIDING clubs across Yorkshire are working together to help create aspirations and strengthen life skills of hundreds of school and college students in an ambitious aviation and aerospace project.

Young people are flying high and taking the glider controls during air experience flights at Burn, York, Yorkshire and Wolds gliding clubs as part of The Air League's pioneering Soaring to Success programme in collaboration with Barnsley Metropolitan Borough Council.

Ishpreet Sundal from The Air League says: "The Soaring to Success programme is an inspiring initiative that, for many, is a completely new and exciting challenge.

"Upon arrival to the gliding taster day sessions, the students typically felt nervous about taking to the skies, but the look of achievement and excitement that filled their faces after flights was truly priceless."

The project has also received the backing of 'I Know I Can', a youth scheme in Barnsley which is about building confidence, creating dreams, raising qualification levels and developing a real I Know I Can attitude.

For many of the young people, gliding provides the perfect environment to enhance their employability through developing transferrable personal skills for life, including communication, teambuilding and leadership skills.

Gliding is also an ideal springboard for a career in aviation or aerospace whether as a

pilot, engineer or other professional within Science, Technology, Engineering or Maths (STEM).

The Wolds Gliding Club based at Pocklington is looking forward to being involved in similar initiatives in the future.

"We have really enjoyed flying the students from Barnsley," said Craig Scott from Wolds Gliding Club. "They were engaged, engaging and impeccably behaved. It's been a privilege to introduce them to the world of gliding."



Of the 200 students experiencing a gliding taster day, 20 were selected to attend an immersive gliding course

■ Dave Latimer, chair of both the BGA Development Committee and Yorkshire Gliding Club, said: "I was asked by BGA Chairman Andy Perkins to see what Yorkshire clubs could do to help fly around 200 young people from schools and colleges in the Barnsley region with help from The Air League.

"This seemed a great fit for the clubs, who all wish to engage with young people. We are all very aware that learning to glide can be the first step for many leading to careers in aerospace. Following a meeting at Rufforth, we divided the load between Sutton Bank, Rufforth and Pocklington. Burn then also got on board for some of the later people.

"Having the youngsters on site was great. As can be imagined, the average on-site age probably halved! We are now in discussion with Barnsley Council and The Air League on how we can turn this into a regular activity to introduce young people to aviation and the associated STEM subjects."

■ Rachel Edwards is the BGA Marketing Officer

TEAM GB'S STANDARD CLASS JUNIOR H A H N N W

Uli Schwenk and Keith Gateley
flew an eta to second place in the
Open Class (Max Kirschner)

JUNIORS TAKE ON HAHNWEIDE



Peter Carter reports from Germany, where he came third in the Standard Class, won by Matthew Scutter

MEMBERS of the Junior British Team have been in Germany at Hahnweide, as part of their preparations for the upcoming Junior Worlds in Hungary. Hahnweide is an annual competition run from the foot of the Swabian Alb, an expansive area of high ground south of Stuttgart. Famed for its great convergence lines and accompanying high task speeds; the fastest completed task of the week at this year's Hahnweide was over 400km at almost 130km/h!

The Standard Class half of the Junior team (Simon Brown and myself), along with our team captain Matthew Scutter, descended on Hahnweide at the end of May looking forward to nine days of competition flying. We were accompanied by 14 other

RESULTS OF 53RD HAHNWEIDE, GERMANY 25 MAY - 1 JUNE 2019

Standard Class

- 1 Matthew Scutter, Australia, Discus 2ax
- 2 Franz Poch, Germany, Discus 2T
- 3 Peter Carter, UK, LS8/15m
- 11 Simon Brown, UK, LS8a

Open Class

- 1 Felipe Leven, Germany, EB 29R
- 2 Uli Schwenk, Germany/Keith Gateley, Australia, eta
- 3 Sylvain Gerbaud, France, JS1c 21m

15m Class

- 1 Steffen Schwarzer, Germany, ASW 27,
- 2 David Bauder, Germany, Ventus 2a
- 3 Stefanie Mühl, Germany, Ventus 2ax

18m Class

- 1 Reinhard Schramme, Germany, Ventus 3T/18m
- 2 Mario Kiessling, Germany, Ventus 3T/18m
- 3 Andy Davis, UK, JS1c 18m,

20m Multi-Seat Class

- 1 Norbert Summer, Germany, Arcus M
- 2 Martin Theisinger, Germany, Arcus M
- 3 Sebastian Beule, Germany, Arcus M

- www.wettbewerb.wolf-hirth.de
- www.britishglidingteam.co.uk



Peter Carter, 24, started gliding in 2008 and has around 800 hours. He learnt to fly at Norfolk Gliding Club and now flies at Lasham



Peter Carter on tow in LS8a during the Hahnweide competition (Max Kirschner)

✍ British pilots and many international entries.

The focus of the week was working on our team flying, as well as developing our skills in Standard Class gliders. We were lucky to have seven days of very varied flying, from challenging overcast days, to booming racing days with 8,000ft cloudbases. The long competition allowed us to really develop our skills; we were pushed by all the other pilots, and daily debriefs by competition winner Matthew Scutter allowed us to learn from our mistakes.

Simon Brown says his biggest lesson of the week was learning the importance of sticking with your teammate. It's easy for one pilot to end up slightly above the other and you soon become separated. In certain situations, it may be worth the higher pilot staying slightly longer at the top of a climb than they normally would, allowing the lower pilot to catch up. We learnt our lesson here by getting separated coming into an area of deteriorating conditions. Whilst it would have initially been slower for the top pilot to wait a couple of turns at the top, overall the pair is faster than individuals in this situation, where finding climbs is tricky, and you may save yourselves a landout you would have otherwise had.

On the other hand, I would say that the biggest lesson I learnt is about workrate. It's easy to sit under a convergence, or cloud street, and not be working hard enough.

When soaring itself is relatively low stress, it's easy to relax and stop being so analytical. Your workrate drops and not only are you no longer getting the best out of the energy under the street, slowing you down, you're not adequately assessing other options and thinking far enough ahead. I must continually remind myself to keep my work rate high, and to think in broad, external terms whilst running under energy.

The next stop for the Junior team was the overseas nationals at Issoudun at the end of June. You can follow the team's progress at the Worlds on Facebook – search for British Gliding Team, and Instagram – ReadySteadyGlide.

■ The Junior Worlds is in Szeged, Hungary, from 28 July to 10 August.



Team captain for the British Junior team, SkySight's Matthew Scutter (centre), won the Standard Class. Peter Carter (right) received the Bronze medal (Kathrin Woe)



Matthew Scutter, in Discus 2ax, won the Standard Class



Andy Davis, in JS1c, took the Bronze medal in the 18m Class
(all photographs on this page by Max Kirschner)



Above and main photo: Germany's Katrin Senne and her daughter flew an ASG 32Mi in the two-seater class



Looking down on the spectacular Grand Canyon (main photographs by Justin Wills)

Continuing the tales of Justin Wills' summer of expeditions with flights in the USA



Justin was invited to Ely by Keith Essex (pictured here with wife Deb) to share his ASG 32M

ELY lies 1,500km south of Invermere, four hours' drive from the nearest main airport at Salt Lake City. The road crosses the Bonneville Salt Flats before turning south along a valley reminiscent of the trench, but in fact well west of it. However, apart from the ridges running generally north/south, the two places are like chalk and cheese.

Ely is at 6,400ft so the surrounding 9,000ft mountains look relatively small. Originally a stage post on the transcontinental Highway 50, the town went through a mining boom when copper and gold were discovered nearby. Now the smelters have gone, but a steam railway remains as a tourist attraction. With 4,000 people servicing passing trade and local ranchers, the town has four casinos and several moderate motels.

The airport is county owned, covers 5,000 acres and includes two enormous runways, a large tie-down apron, a hangar and little else. There is no local gliding club, but a

tradition has evolved whereby pilots gather from all over the US (and farther afield) during the first two weeks of July to attempt personal best flights and records. There is no central organisation, no registration, no met briefings nor task setting. Everyone does their own thing, and one-man rigging systems for even the largest gliders are standard. There would not have been a towplane until Keith Essex decided to bring his Cessna 182 to assist launching his new ASG 32 M at this altitude. Thus nearly all the other aircraft were SLMGs and most of the pilots lived in large RVs parked along the hangar wall. Apart from my wife Gillian there were only two other women, one of whom had an ASG 31 whilst her husband flew his EB 29R.

The reason for this annual event is the weather. Ely experiences the largest diurnal temperature variation in the US. In July this can range from 5°C overnight to 38°C at 3pm. Annual rainfall is only 230mm, and the relative humidity during our visit was

36 per cent. The result is strong thermals and cloudbases between 15-20,000ft with light upper winds, whilst surface winds are influenced by local convection and can be strong, especially when upper level showers form. The moisture seldom reaches the ground, but produces stripes of virga, which can, surprisingly, produce lines of strong lift if correctly interpreted, and the opposite if not.

I had been invited to Ely by Keith Essex to share his ASG 32M. Keith started gliding five years ago, but seems to have grasped the basics. He has already won a US Open Class Nationals in his JS1 C and, in February 2018, he broke the world 500km O/R speed record in his ASG 29 at Omarama (258km/h). We flew together in an Arcus M in Namibia during December 2017, supported by his extremely capable wife Deb.

Extraordinary

Despite the weather in Ely being apparently below average in 2018, the flying was extraordinary. We covered an area between the Grand Canyon in Arizona to the White Mountains in California, approximately 800km apart, and every flight exceeded 1,000km with average speeds of 135-150km/h. The ASG 32, with its higher gross weight, felt a little faster than the Arcus, but with a more restricted view forward from the rear cockpit. Both are very comfortable compared with the EB two-seaters.

Cumulus would start above the ridge lines, but would often grow into convergences with fast runs possible along their active edges. Keith was extremely good at assessing the weather both before and during the flight. He used on-board satellite pictures via cell phone technology, and tracks of other gliders using a site that showed Spot or Inreach locator systems. This enabled him to confirm the formation of these convergence lines beyond the visible horizon. He also used an app called Foreflight which provided, among many other things, in-flight NOTAMs in the form of Temporary Flight Restrictions (TFRs) that invariably related to wildfires where aerial water bombers had been summoned and became prohibited airspace.

Apart from the natural wonders of the landscapes, the most intriguing sight for me appeared 250km west of Ely in a desert area called Crescent Dunes. Initially I thought it must be a sizeable lake, but as we sped nearer I realised it was a vast array of large mirrors (over 10,000) set in a 1,600-acre circle at the centre of which was a 700ft tower with a



white tip. It was a solar energy power station, but instead of solar panels generating current while the sun shone, the mirrors were all focused on the tower which contained salt. This becomes liquid above 1,000°F and flows down into tanks where the heat is used to drive turbines producing 110MW of electricity. The brine, all 32,000 tons of it, retains its heat until it is recirculated up the tower for reheating. It is the first such plant in the world, and others are planned for South Africa and Australia.

In the evenings we ate at various restaurants in Ely and sometimes met other pilots. I began to form a theory about why the US soaring community, which is the second largest in the world, is so different from anywhere else. Fundamentally, I think it is because the US has a different ↗

Illustration by Steve Longland

APART FROM THE NATURAL WONDERS OF THE LANDSCAPES, THE MOST INTRIGUING SIGHT FOR ME APPEARED 250KM WEST OF ELY IN A DESERT AREA CALLED CRESCENT DUNES



Crescent Dunes solar power station – over 10,000 large mirrors set in a 1,600-acre circle with a 700ft tower in the centre

A BENIGN REGULATORY ENVIRONMENT FOR AVIATION AND ENORMOUS UNEXPLORED SOARING POTENTIAL

Dick Butler's home-built Concordia (below) is currently the world's highest performance sailplane



↳ perception of time: it is a scarce and therefore precious commodity, not to be wasted without tangible results. This is why the US is the home of the fast food industry, and why, compared with Europe, you see so few cafes with people gossiping or just watching. Most conversations last about four minutes regardless of the topic, there seems to be an inbuilt clock that says “Time’s up”.

The basic holiday allowance is two weeks a year and, whilst most glider pilots are outside this system, the need to ration time even for gliding has a profound effect. For example, the OLC (Online Contest) is extremely popular: the individual pilot can choose his day, his task, and submit his flight electronically for scoring. Contests are less popular: they may involve driving two

days each way so, if the weather outlook is poor, competitors from far and near simply cancel. This is very different from the UK, where pilots grimly hang on to the end of a contest despite unsoarable weather; it may be because they have already booked time off in a less flexible holiday system, whilst for some their rating is important, particularly for international team selection.

The US attitude to World Championships is also different. They understand the advantage conferred by team flying with close ground support. Given their geographical spread, US pilots have little opportunity to practise the specialised techniques involved, and they are specifically prohibited in US contests, regarded as unsporting and anti-competitive, potentially providing an entry barrier to newcomers. Thus the only way a US pilot can hope to do well in a WGC is by closely following a leading team. Many US pilots are uninterested in this and therefore regard participation in WGCs as a waste of time and money whilst involving a significant (someone estimated two per cent) collision risk. One remarked “if I wanted to compete in a peloton I would have taken up cycling.”

Therefore many US pilots focus on areas where they enjoy natural advantages: a benign regulatory environment for aviation, a large country with enormous unexplored

soaring potential, immense technical competence and enthusiasm for progress. The pattern started by the Wright brothers, who developed three-axis controls and made the world's first soaring flights, was followed in the early 1950s by Dick Johnson who, with August Raspet, explored laminar airfoils and drag suppression resulting in the RJ-5, which broke the world distance record. This was followed by Len Niemi's Sisu, which was the first sailplane to exceed 1,000km.

Currently Dick Butler's home-built Concordia is the world's highest performance sailplane, whilst Einar Enevoldson's Perlan (and its associated incredible tug) has secured for the US the World Altitude Record of 76,000ft for the indefinite future. Meanwhile, George Moffat articulated the analytical approach to effective contest flying and Dave Ellis' Cambridge Instruments produced the first gliding computers allied to GPS technology.

In future, the US version of ADS-B may bring high definition internet into glider cockpits whose information could prove almost as useful as Doppler Lidars, which have been specifically banned by the SSA. It will be interesting to see how the European

community reacts to that technology (offering remote lift detection) when it becomes available, possibly ex-Japan.

In the meantime, I noticed Keith's glider, together with others, was fitted with lights. There is no regulatory problem flying a suitably-equipped glider at night in the US. Expensive, but effective, night vision goggles are available, whilst electrically heated flying suits may be necessary to keep pilots warm. Plans include taking off in the dark, flying along wave systems as far as possible before turning downwind to maximise distance. One enthusiast has four self-launch modified jet-powered Arcus positioned at suitable start points both in the US and Argentina.

The contribution, achievements and ambitions of the US soaring community command immense respect. The fact that no US pilot has won a WGC title since 1985 is an indictment of the bias in IGC rules, which favours a handful of European countries and belies the skills of the US pilots and their extraordinary abilities.

■ **Justin's summer expeditions to France/ Italy will feature in a future issue.**



(Above) Len Niemi's Sisu and (below) the Ross-Johnson RJ-5



PHILIP WILLS MEMORIAL FUND

SUPPORTING GLIDING IN THE UK



The Philip Wills Memorial Fund has cash available now to lend to gliding clubs for capital projects. Key features of the loans are:

- **Negotiable as to length and amount of loan**
- **Requirement for a "business case" to be presented to trustees**
- **Security usually taken on asset bought + personal guarantees**
- **LOW interest rates – lower than you would pay to a bank**
- **Early repayment not a problem**
- **Minimal legal costs**
- **Easy access to lenders for discussion**

More information is available on the BGA website. If you want to just discuss informally, please email Steve Lynn at Stephen@srlynn.co.uk, or please just download the application forms at <http://www.gliding.co.uk/forms/clubmanagement/PhilipWillsMemorialFund-ApplicationForm.pdf>

We look forward to hearing from you.

In conjunction with the



POWER PILOT'S PERSPECTIVE

Committed power pilot Nigel Everett experiences some of the differences between power flying and gliding



Nigel Everett enjoys flying the Super Dimona

IF YOU GET STUCK IN TO THE VARIOUS GROUND HANDLING TASKS YOU WILL SOON FIND YOURSELF ABSORBED IN ALL THIS ACTIVITY FOR ITS OWN SAKE

SINCE my first solo in a Piston Provost 'a hundred years ago' I have been a committed power pilot. The end of my National Service and coming to terms with having to pay rather than be paid to fly caused something of a gap in the proceedings. However, by 1970 I was flying again and have done so continually since.

For all of my time as a PPL I have been attracted to gliding, but I quickly realised that its time demands militated against gliding unless I was willing to give up either going to work or being part of a family. A power pilot waits for suitable weather, books the 'plane, flies it and is often back home again within about three hours. A glider pilot is unlikely to think in terms of less than a day up at the airfield and would probably prefer a whole week if things are looking good.

I have been particularly fortunate in having a spouse who, while not especially interested in aviation, was perfectly happy to go touring provided that the destinations were interesting and that some time was spent exploring them at ground level. I was also blessed in being involved in work where travel by light aircraft was useful and, consequently, getting an instrument rating became a natural progression.

With my inclination towards gliding I was always easily seduced by glossy brochures produced by makers of motor gliders. The classic message was: Start her up, cruise to wherever the lift is kicking off today, shut down the motor, feather the prop and enjoy some quality gliding. Over the years that led me to acquiring shares in a Fournier RF5B, then a Grob 109B, then a Super Dimona and, finally, last year to complete the full circle, another RF5B.

All made delightful two-seater VFR touring aeroplanes, but when it came to the engine off bit I found that you really required the sort of strong and dependable lift offered by the mountain ranges of Wales, Scotland

or preferably the Alps. To the thermalling limitations of the typical touring motor glider, add a pilot who fondly imagined that reading a few books by the likes of Derek Piggott would soon reveal the techniques needed to soar away engine off. You will readily appreciate that, in the event, my inept attempts at thermalling in motor gliders in the difficult soaring conditions of the South West of England have usually been in a downward direction.

Time passed and eventually I found myself in the happy position of being able to take whole days off to go gliding (but not at weekends, my pass stated). Thus did I report to Devon & Somerset Gliding Club (open Wednesdays and Thursdays, as well as weekends) with a view to embarking on a new career as a proper glider pilot rather than an engine-assisted one. Learning to fly gliders properly was a great adventure, but readers will either be currently doing just that or did it long ago and I shall therefore offer instead some observations on the differences between power flying and gliding as they revealed themselves to me.

A communal activity

As we all know, it takes a whole team to get a glider launched. If something like five or more trained and experienced participants are not present it's not worth opening the hangar doors. A crew of at least that size, but preferably a good deal larger, needs to be on site all the time that operations are continuing. They all need to know not only what they should be doing but also what their colleagues should be doing as well so that, whenever necessary, anyone has the right and the duty to shout 'Stop' before any harm is done. So even if you spend all day on the field and only get two or three short flights, you need to keep engaged with whatever is happening all the time if you are to play a proper part in the proceedings.

If you are disinclined to participate in all the ground work necessary for launching and recovery you are probably pursuing

the wrong activity. How about chess? Or maybe solo navigation of the oceans? On the other hand, if you get stuck in to the various ground handling tasks you will soon find yourself absorbed in all this activity for its own sake. In other words, going gliding, especially at the pre-Bronze stage, is a multiple choice activity involving occasional flights and a host of other activities as well.

The inevitable consequence of your becoming one of a team is that you will get to know your team mates as they will get to know you. In this way you will probably discover one of gliding's advantages over power flying, which is that it provides a whole social milieu as well as a leisure activity. Contrast that with power flying. If you rent you are probably acquainted with the office staff and one or two of the instructors. You turn up, book out, fly, book in, pay, maybe grab a coffee and a desultory chat with whoever is about and go home. If you want more extensive human contact you may do better in the waiting room of your local surgery. If you own an aircraft outright you may see no one either side of your flight, or you may scrape a few words with your engineer. If you own a share in an aircraft there will be some contact with the other owners, but this will be mostly by phone or email. I have, in the past, found myself in face-to-face conversation with a fellow owner of a particular aircraft and it has taken me some time to grasp who exactly he was, or just what it was that we had in common. So gliding is very much a communal activity and power flying is often solitary.

Always something to strive for

There is a sort of career structure in gliding: you might call it a never-ending climb onwards and upwards. In power flying people strive, usually over a two-year stretch from scratch, to get their PPL. Many then heave a mighty sigh of relief and personal satisfaction, possibly con a nervous neighbour into joining them in the cost of a local flight over their housing estate and then somehow drift away from it all. The fallout rate post-PPL is phenomenal in power flying. The continuing cost, the lack of any obvious next challenge, the general indifference of instructors for whom you have ceased to be a customer (power instructors are paid – very little – but even that is better than nothing at all) all these conspire to the drifting away of the newbie PPL.

The great thing about gliding, however, is that you never achieve the ultimate goal



because there isn't one. Whatever gongs you may collect, there will always be others that you have not yet collected. If you get to be world champion then you still have to get it again next year and the year after if you are not to become a mere ex-world champion. There is no real watershed in gliding like the PPL in power flying; instead there are never-ending progressions up various ladders. So that always leaves the glider pilot with a further carrot dangling just in front of their nose.

To me it all seems much like being back at school. At the moment I see myself as being in the fifth form, looking down on the minions in the fourth and the third, but standing well aside when the sixth-formers and the godlike prefects pass by. The Cleese/Barker/Corbett sketch: *I look down on him, but I look up to him* seems relevant. Always having something to strive for is an excellent thing and while power flying has introduced various initiatives in this direction nothing seems to have caught on.

Safety

As the editor (until very recently) of GASC's *Flight Safety* magazine and the monthly digital *Flight Safety Extra*, the safety culture of any organisation is always a matter of interest to me. I should add that the thoughts expressed here are personal and I am not speaking for the Council. A lot of my previous working life was spent alongside the world of building and, over 30 years, ✈

Nigel Everett experiences gliding at Devon & Somerset Gliding Club

THAT ALWAYS LEAVES THE GLIDER PILOT WITH A FURTHER CARROT DANGLING JUST IN FRONT OF THEIR NOSE



Nigel Everett having completed a sponsored climb in a Druine Turbulent to 10,000ft. Not very difficult with an engine, but draughty in an open cockpit



Nigel Everett was a National Service pilot in the 1950s, training on Piston Provosts and Vampire T11s and FB5s. He became a private pilot during the 1970s and kept a single engine instrument rating current until 2017. A founder member of PPL IR Europe, Nigel edited the original version of its magazine. A published author on advanced flying training, he had a regular column in *Pilot*. In 2001 Nigel became editor of *GASCo Flight Safety magazine*. Nigel took up gliding in 2010 with Devon & Somerset GC. In 2016 the Air Pilots gave him the Award for Aviation Journalism. In early 2018 Nigel suffered a mild heart attack and has now ceased to fly and to write about aviation.

✍ I witnessed an industry turn itself around from being distinctly dangerous to being relatively safe. During that time there was, and still is to a limited extent, a backlash of macho types pouring scorn on Elf and Safety, but the better managements have made sure that every rule is sensibly based and have then enforced compliance.

Tree surgery, of which I know a little, has achieved a similar transformation, but on the other hand agriculture has not. This stems from the remorseless shedding of agricultural workers over the years and their replacement by ever more capable machines. These machines are not in themselves less safe than their simpler predecessors, but the problem arises from their mostly being operated by one person. Back in the day, teams of men would work the farms together, but today it is often just one person and a sophisticated machine doing the job. When a short cut ignoring safety provisions offers itself – the traverse of too steep a slope or the freeing of a blockage in the machinery without first shutting it all down – the likelihood of the lone operator taking a chance to save a bit of time and effort is much greater if there is no one else about to witness this foolhardiness.

Worse, if anything goes wrong there is no one else about to get help. So in farming the carnage continues and I wonder whether the solitary nature of power flying offers a parallel.

As I think I mentioned, launching and recovering gliders is very much a team activity and this is a powerful safety feature. If a gliding CFI decrees that no launch may take place without an “Air Brakes Locked?” challenge and response, team players will remind each other by example and the change will be rapidly adopted. If the CFI of a power flying club decides that a last minute “Canopy Locked?” check be made before opening the throttle for take-off, they will have great difficulty in getting the solo renters and the private owners to comply because there will never be anyone there to remind them.

Whenever I do something stupid on a gliding airfield, I can confidently expect that someone will be having a word at an early opportunity. If I do something stupid on a power flying field it is unlikely that anyone will show any interest at all unless I have put someone else in danger or have interfered with the operation of the airfield. Where there is an Air Traffic Service, a controller may want to discuss an occurrence or may refer the matter to a relevant school or club, but controllers are not usually pilots let alone instructors and their concerns are mostly limited to proper compliance with air traffic instructions and procedures.

The supervision of licensed power pilots’ operations is a rather sketchy affair. They may or may not be members of a flying club, which may or may not take some interest in their operating safely; more so if the aircraft involved belongs to the club. Beyond a two-yearly flight with an instructor and denial of the right to carry passengers if the pilot has not done three landings in the past 90 days, there are no binding defined requirements about currency, weather, fitness or the demands of any particular sortie. These matters are largely at the discretion of the PPL and, while most manage not to fly when it is not sensible to do so, a few find themselves from time to time in seriously hazardous circumstances that should have been shunned. Consequently there is a small, but seemingly never-ending incidence of power pilots pressing on to their deaths in unsuitable weather. If they had been required to obtain authorisation for the flight, as would most glider pilots, they would never have taken off.

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While I have no experience of microlighting or paragliding practices, I am confident that the mainstream private power flying world is generally much less overseen than is gliding. It is interesting to observe that, since the 1940s, gliding in the UK has been mostly self-governing while power flying has been far more subject to the Ministry of Aviation, then the CAA, then the JAA and now EASA. Two very different safety cultures have emerged and it is interesting that it is the largely self-governing culture that has proved the more prescriptive. No doubt this is partly because rules are more enforceable in the team-based gliding operation, but I suspect that if you leave a large, experienced and responsible body to decide what is needed to keep its members safe it will make better decisions than will a bureaucracy operating at one remove.

The winch launching initiative

An area where the British Gliding Association has really shone forth is the winch launch initiative. A decade or so ago some wise people at the BGA statistically identified the phases of flight where accidents were most prevalent and then considered which of these would be most susceptible to an initiative to improve matters. This brought them to winch launches and there has been a sustained campaign ever since to improve pilots' winch launching techniques and their appropriate reactions to winch launching threats. The statistical results are undeniably impressive and the BGA has received a well-deserved award to mark its achievement.

Meanwhile in power flying, loss of control



at circuit height or less has been the obvious area for similar treatment, accounting as it does for over 60 per cent of fatal and serious injury accidents. Engine failures on take-off or go around pose a very similar state of affairs to a cable break on a glider; the pilot's natural reaction, what with Startle Effect and Ground Rush, can be to pull back on the yoke or column regardless of training, with disastrous consequences. Few would deny that a loss of control initiative similar to that so successfully conducted by the BGA would probably meet with similar success, but beyond that there is no concurrence as to who should be doing it or who should be paying for it. So power pilots continue to die unnecessarily in low-level loss of control catastrophes and I am left wondering whether UK power flying might not be safer if it also was mostly self-regulated.

Gliding is a lot more social than power flying (Nigel Everett)

TWO VERY DIFFERENT SAFETY CULTURES HAVE EMERGED AND IT IS INTERESTING THAT IT IS THE LARGELY SELF-GOVERNING CULTURE THAT HAS PROVED THE MORE PRESCRIPTIVE

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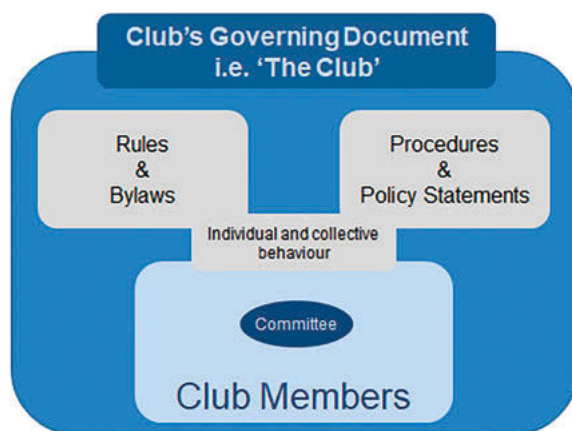
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DEMYSTIFYING

EACH organisation is unique and will vary according to its type, and whether it has a CASC or charitable structure overlay, but all governing documents have a basic anatomy:

- Name
- The objects
- Power of the committee or board
- Criteria for membership and voting rights
- Procedures for electing the governing body and holding meetings
- Financial matters
- Amendment procedures
- Dissolution procedures.

All members of an organisation should read its governing document. As you read it, you'll notice that the sections cross-reference and are interlinked. It'll help you to understand what goes on at your club, and how you can join in. You are a club member and your voice matters.



Club governance: schematic diagram showing the components of a gliding club, with the club's governing document as the wrapper

Alison Randle
BGA Development Officer
alison@gliding.co.uk

WHEN IT'S TIME TO VOICE OPINIONS

AS THE days shorten, so the gliding year rolls on towards its more introverted phase and the time when maintenance and club management activity picks up. At some point over the next few months your club will hold its AGM, an important event which hopefully matters to you personally because your club's management (board or committee) needs your support for all the work it does to run your club on your behalf.

Your club is a successful and remarkable organisation, a space where so much happens, yet it is run by just a handful of volunteers. Why is that? Well, imagine the chaos if all the club members were all trying to run it, all at the same time. To avoid this sort of mess, the club members gather together at the annual general meeting (AGM) to nominate a few of their number to run the club for the next year *on their behalf* (crucially). The other purpose of the AGM is to brief the committee on what the club membership collectively would like the committee to do during its tenure. Occasionally during the year, if the committee needs to take further advice from the membership, it will call an Extraordinary General Meeting (EGM). An EGM is not just for urgent situations and can also be called by the membership.

This brings two forms of responsibility for the remaining club members to fulfil: attending the AGM to join in the discussions and endorse the new committee and; supporting the committee during the year by listening and engaging with its communications as it executes the instructions it was given at the AGM. Actually, there is also a third responsibility – supporting the committee to fly as much as possible and ensuring that the cockpit and glider rigging area remain committee-free environments. Got a question for committee members when you see them? It is much kinder to make a note and drop them an email instead.

How does anyone know how to behave in a volunteer-run organisation? Some of the rules governing our behaviour are not written down, and there is a culture which persists over time, making our clubs 'institutions', but there are also written rules which govern our behaviour. There are policies and procedures, rules and bylaws, and surrounding and encasing it all is the club's governing document, which is the club's instruction manual. In it you will find instructions and guidance on all sorts of matters. It will describe what powers the committee has, and which powers remain with the membership. It will also provide guidance for electing the governing body, ie the Board or Committee, calling meetings and how decisions are to be taken, how the information is to be communicated and so on.

'Governance' is the general term to describe the legal, managerial and moral responsibilities arising from committee management of a voluntary organisation. Ideally, this is transparent so that the members of that organisation can see on what basis, and how, decisions have been made.

How about your responsibilities? If you aren't sure what is going on, or why, you are entitled to ask questions. The AGM, both during the meeting and just before, in response to the papers that will be circulated ahead of the meeting, is the perfect time to have a discussion about what is being planned and why. The decision will be taken formally at the AGM, and then it is your responsibility to help the committee bring decisions to fruition. You can do this by reading committee minutes and other communications and responding to committee requests. These are volunteers, who are working hard on your behalf, but they won't always get it right – to err is human. We know from our collective approach to flight safety that mistakes happen, but these allowable errors nearly always provide opportunities for learning. The mainly invisible voluntary club management work is no different – healthy volunteering is a collective responsibility.

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This page:

❶ Tim Li and Alastair MacKenzie enjoying a great day doing loops in Burn's K-13

❷ Toby Runyard is sent solo at Wyvern on his 14th Birthday by instructor Gerry Sturgess

❸ Shobdon juniors, left to right: George Haddock, Max Griffiths, Andreas Jelden (definitely not a junior) and Peter Spencer (Bobbie Jones)

❹ High and free over Llandegla Forest, North Wales

❺ 100-year-old Harry Lloyd enjoying his birthday celebrations at Stratford on Avon with instructor Mike Coffee (Nick Jaffrey)

❻ BWND's Mark Hawkins at Portmoak

Facing page:

❶ Don, a guest over from the US, with Alex Harris. Don's father served at Ridgewell as a gunner with the 381st Bomb Group in a B17 called 'Century Note' – the aircraft we have honoured with the nose art on this K-13 (Dave Jones)

❷ Katie Stokes successfully passing her Bronze test at Lasham in May 2019 (Jordan Bridge)

❸ + ❹ Dorset chairman Nick Barnes presents BGA Diplomas for services to gliding to Garry Shaw (left) and Barry Thomas

❺ Young people from DYS Space visit North Hill

❻ Dartmoor's David Westcott reaches 5,000ft for the first time and gets his Silver height during this flight

❼ Looking at Blackmill Airstrip, Cairngorm Gliding Club, from over Loch Insh

❽ Descending from FL194 on a summer's evening above Denbigh (Chris Gill)

■ Our thanks to all the photographers and to our *Club News* contributors for sending these in.





CLUB NEWS

AGC WYVERN (UPAVON)
WWW.WYVERNGLIDINGCLUB.CO.UK
511712N 0014700W

THIS spring has seen six solos: Lucy Kenny (16), Ben Briscoe (14), Ben Wilton (17), Suzie Forbes, Jamie Knowles, and special mention to Toby Runyard, who soloed on his 14th birthday. Chris Pullen has soloed in the TMG and Sam Prin has successfully negotiated the tortuous path to Ass Cat, with Dan Palmer now qualified as BI. Well done to all. Since March we've had three five-day Basic Gliding courses for Army Servicemen. The next course is Air League-sponsored for wounded and injured servicemen. Despite all that activity, Wyvern pilots and gliders supported the two-week joint Service adventure training expedition to Sisteron in May. AGC(W) continues to host Portsmouth Navy GC to the mutual benefit of all, whilst PNGC searches for a new location.

Paul Jessop

BANBURY (HINTON IN THE HEDGES)
WWW.BANBURYGLIDING.COM
5204355N 00118784W

THE club has enjoyed a significant increase in flying recently. Simon Ducker and Paul Waghorne have completed Cross-Country Endorsements and several Silver legs have been achieved. We are now planning to hold soaring weeks in August and have created a soaring group, where members can arrange to undertake mid-week flying when the conditions are promising. Chris Scutt has taken over our website from Piotr. Our many thanks go to Piotr for all the work he did in keeping things going during a difficult period. David Sibthorp, our previous chairman, has now moved on and is planning to spend more time flying his motor glider out of Enstone. On behalf of the club, I offer our many thanks for all the work he put in.

Peter Fincham

BANNERDOWN (RAF KEEVIL)
WWW.BANNERDOWN.CO.UK
511858N 0020631W

CONGRATULATIONS to Kevin Constable, who completed his Silver with a 50km flight and landout at Membury, and to Theo Nellis, who converted to the K-18. We had a great 'Longest Day' with flying starting in time to see the sunrise and partying still going well after sunset. Over 57 hours were flown from 87 launches. Thanks to Ian Harris for organising the flying day and Jo Geraghty for

an amazing BBQ. On a sad note we said our goodbyes to club stalwarts Burt Desmond and his lovely wife, Cynthia, who both passed away.

Alison Arnold

BATH, WILTS & NORTH DORSET (THE PARK)
WWW.BWND.CO.UK
510742N 0021445W

OUR safety evening and AGM have come and gone, both being informative and useful! What is becoming our annual pilgrimage to Portmoak has also taken place, where 18 members enjoyed a varied week with weather spoiling some days, but soaring happily on others. Alastair MacGregor cracked 1,600ft, Mike Thorne put 27 hours in the air and I have heard mention of wine and jollity, but not in combination with flying. We have enjoyed a good flying week when the weather was kind, but our Open Day was not good as it happened to be the one awful day between two not-too-bad ones. Dan Weston has distinguished himself aerobically again at Buckminster and got five hours in flying week, and Greg Clark-Ward went solo.

Chris Basham

BICESTER (BICESTER)
WWW.BICESTERGLIDING.COM
515458N 0010756W

EVERYONE is busy flying now that the weather has improved. There have been some great cross-country flights; Ollie Wheeler did 500km at 72km/h in an Astir. Half term saw the cadets out in force, camping overnight and generally making the club feel a bit more family like. Some had their sights set on their 5-hour flights, but the weather didn't play ball. Tom Williams went solo though, making it five cadet solos this year. We are looking forward to the Bicester Regionals starting 20 July.

Rod Connors

BIDFORD (BIDFORD)
WWW.BIDFORDGLIDINGANDFLYING
CLUB.CO.UK 520803N 0015103W

OUR Wings & Wheels event was a great success with a record number of classic cars attending. We raised over £2,400 to be divided between the Midlands Air Ambulance and our Junior Pilots Fund. Both Emma Lees and Ben Eakins have completed their Bronze C exams.

Mike Pope

BLACK MOUNTAINS (TALGARTH)
WWW.BLACKMOUNTAINSGLIDING.CO.UK
515848N 0031215W

AFTER an unfortunate incident, our Pawnee tug was damaged and grounded us as we have no winch capability. Efforts to borrow a replacement tow plane came to nothing. However, a brilliant piece of forward thinking by our committee allowed us to buy the Pawnee from the Vale of Neath Club. A lot of work was done to allow the tug (Daisy) to be put on line at short notice and amazing efforts by club members under the watchful eye of Keith Richards and Martin Brockington got her up and running at lightning speed. Come and have a tow behind Daisy to explore our ridge, wave and thermals in the Brecon Beacons.

Robbie Robertson

BOOKER (WYCOMBE AIR PARK)
WWW.BOOKERGLIDING.CO.UK
513642N 0004830W

THE 16th International Easter Egg Cup Aerobatics Cup took place before Easter, just for a change. The weather was less than ideal, but the contestants put in creditable performances. The winner was cadet Maddi Roberts, with Paul Field in 2nd place and CFI Richard Crockett 3rd. The comp was followed by our instructor training week, a busy and enjoyable opportunity for instructors to brush up their skills and gain new ratings. Mike Fox from the BGA came to see what we do and signed Booker off to run the full instructor course (modules A to D).

Jane Moore

BORDERS (MILFIELD)
WWW.BORDERSGLIDING.CO.UK
553514N 0020510W

CONGRATULATIONS to Adrian Loening, who flew a remarkable Diamond distance flight (503.3 km) over the Scottish Highlands from Feshie on 12 May (see pp34-36). As this was Adrian's third Diamond, he has now joined the select few proud owners of the coveted Diamond badge. Well done also to Dave McCormick, who went solo on 30 April.

Stuart Black

BOWLAND FOREST (CHIPPING)
WWW.BFGC.CO.UK
535301N 0023714W

CONGRATULATIONS to Mike Cursons, our first solo of the year. Thanks to all members who helped at our stands at Pendle Powerfest and Myerscough Country fete (having a

(First solos for, left to right): Suzie Forbes with **AGC (Wyvern)** instructor Paul Jessop; Ben Wilton with **AGC (Wyvern)** instructor Tony World; Greg Clark Ward is congratulated by **BWND** CFI Mike Jenks; **Buckminster** experiences a late evening thermal at the end of its 25 runway



rigged glider always draws the crowds). Both events generate a number of visitor enquiries and it is always good to keep involved in the community and meet the neighbours. Current members have enjoyed trips north of the border to Feshie and Portmoak, where old friends were met and the hospitality flowed. Our recent task week was somewhat thwarted by the weather, but a great opportunity to pick Paul Myers' brain on all things cross-country before he relocates to Scotland later in the year. Wednesday evening flying is now in full swing, as are our visitor group evenings.

Richard Turpin

BRISTOL & GLOS (NYMPSFIELD)

WWW.BGGC.CO.UK
514251N 0021701W

A BELATED prize-giving saw many established names receiving trophies (Trevor Stuart, Andy Davis, Tim Macfadyen and Steve Eyles) along with some new ones: Henry Mo (most improved pilot, first flight to solo 420km effort in 10 months) and Oli Summerall (most meritorious flight in a club glider (first 300km). The individual instructor prize went to the whole instructor corps in recognition of their special efforts. Andy Davis completed a great XC masterclass, with lectures and a number of flying days. The first dedicated learning weeks provided opportunity for all skills to be improved. The club continues an evaluation of the suitability of the EuroFOX as a long-term aerotowing solution. Preparation for the Junior Nationals and next year's Club Class competition progresses.

Greg O'Hagan

BUCKMINSTER (SALTBY)

WWW.BUCKMINSTERGC.CO.UK
524912N 04228W

WE have experienced some great weather, with Les Merritt, Andrew Cluskey and Phil Sturley completing 300km. Luke Walker, Emma Burns and Greg Zak have all completed their Bronzes with Lyn Ferguson-Dalling's help. The LSUGC held a flying camp with lots of great progress made by many. In July, LSUGC is hosting the inter-university competition. We had an interesting late evening thermal at the end of our 25 runway. There was a huge fire, which burnt hundreds of straw bales. There were a number of calls worrying about a crash, but it was nothing to do with us. There were four fire engines in attendance, but they seemed to just let it burn out.

Danny Lamb

BURN (BURN)

WWW.BURNGLIDINGCLUB.CO.UK
534445N 0010504W

TWO ex-RAF pilots, Neil Bale (66) and Alastair Mair (65), have successfully gone solo, but on this rare occasion did it on the same day. Neil, who only joined the club last May, is a retired RAF Group Captain; he went solo after his check flight with instructor Dave Peters. Then later in the afternoon Ex-BA Captain Alastair, who started in February, was also sent solo by CFI Dave Bell. They have since purchased a Single Astir and formed a syndicate at the club. Tim Li from Hong Kong, who is currently studying Engineering at Leeds University, enjoyed some aerobatics in our K-13. My own flying is progressing, gaining my Silver Height in April.

Russell Walsh

CAIRNGORM (FESHIEBRIDGE)

WWW.GLIDING.ORG
570613N 0035330W

MAYFEST at Feshie began with snow, of course! Once that cleared, a fully-booked festival commenced. There was great flying weather and many tasks set daily. We had a 300km completed by Nick Norman and visitor Peter Hadfield, as well as a 500km from visitor Adrian Loening (see pp34-36). Well done guys! Walking on Air visitors also had a successful week. There was a packed clubhouse every evening for food and drinks. Thanks to all club members for making it happen and visitors for visiting.

Jordan Thomson

CAMBRIDGE (GRANSDEN LODGE)

WWW.CAMGLIDING.UK
521041N 0000653W

IT'S a great pleasure to welcome Stephen Rae, who has joined us as an additional professional instructor for the summer. The new cross-country training scheme we're running as a consequence has got off to an excellent start. It's also a pleasure to congratulate Phil Jeffery on capturing the National Open Class 100km speed record at 181.72km/h in South Africa on 21 December 2018; Leran Dai and Dennis Bendall, who soloed recently; and Lucy Cotton on the award of the 2019 Neville Anderson bursary. Our annual open day was held in May. We had over 100 visitors, flew 59 trial flights and demonstrated the sport to numerous others on our simulator.

Chris Davis

COTSWOLD (ASTON DOWN)

WWW.COTSWOLDGLIDING.CO.UK
514228N 0020750W

AS I write, the Club Class Nationals are just ending at Aston Down with mixed weather. Congratulations to winner, Tim Fletcher, and Tim Milner and John Roberts, second and third respectively. Thanks to all the members who helped, particularly Jacqui Huband and her team, who organised the excellent catering, and all the tug pilots. Particular thanks to University of W England members and the Air Scouts tasked with launching and general duties. Better weather next year when we host the Juniors I trust? UWE members have also achieved five solos so far this year, an excellent performance. Finally, congratulations to Ken Lloyd, our oldest member and regular cross-country pilot in his ASH 25E, who celebrated his 90th birthday in May.

Frank Birlison

CRANWELL (RAF CRANWELL)

WWW.CRANWELLGC.CO.UK
530231N 0002936W

WE are now well into our soaring season with some members having flown Sистерon in the French Alps and others the Chilean Andes. One of our members experienced a mere 27kts of lift – not bad, eh?! We mere mortals are happy with, shall we say, a lesser amount. Congratulations go to Luke Dale and Will Amour on completing their full ratings, and Ian Campbell becomes Deputy CFI. No doubt their talents will be put to good use by the CFI. Membership is also steadily growing with especially some of the younger up-and-coming pilots seeming very keen. We continue to enjoy the freedoms this sport gives us! But why is the best weather always during the week?

Zeb Zamo

DARTMOOR (BRENTOR)

WWW.DARTMOORGLIDING.CO.UK
503517N 0040850W

OUR club members are progressing well this year, with newly-qualified Basic Instructors (well done Roger Green and Richard Roberts); Silver heights (well done David Westcott); good cross-countries of 300km and more; and duration flights all completed. The SW ICL has started, and the club is being represented in regional competitions once again. Our club members' only flying weekend on the Bank Holiday earlier in the year was a great



(Left to right): Alastair Mair 65 (right) is sent solo by Burn CFI Dave Bell (John Beevers); Dartmoor's David Westcott achieved Silver height in cherry red K-6cr (Ed Borlase); Devon & Somerset's Mark Worsfold, now solo, uses a mirror to lipread the instructor; Dorset's Ian Simmons is sent solo by Nick Barnes



success and will now become an annual occurrence.

Richard Roberts

DEESIDE (ABOYNE)

WWW.DEESIDEGLIDINGCLUB.CO.UK
570430N 0025005W

OUR resident instructor, Jakub, did two 500kms on consecutive days in thermals in May; both times over to the west coast of Scotland. We are now flying seven days a week until the end of October.

Glen Douglas

DENBIGH (LLEWENI PARC)

WWW.DENBIGHGLIDING.CO.UK
531239N 0032312W

NO doubt we have had a good season by the time this goes out. Our wave season is soon here, so get yourselves booked in! Contact the office, all details on our website.

Chris Gill

DERBY & LANCS (CAMPHILL)

WWW.DLGC.ORG.UK
531818N 0014353W

WE were greatly shocked to hear of the death of Nigel Howes in a gliding accident in North Wales, (see obituary on p70). Peter Harris has stepped down as chairman, with Liz Martin taking up the baton. Thanks to Peter, and to Liz for continuing. Congratulations to Rob Harman and one of our juniors, Ellis Brennan, for solo, and to Simon Stannard for Cross-Country Endorsement, Silver duration and 100km Diploma (Part 1). Mike Armstrong completed our first 300km this year, in March. The early season was good for wave up to 14,000ft. We welcome Alan Jolly as our summer resident instructor and Nigel Aldred as winch driver. The simulator has been extensively updated, with a view to integrate it more into training.

Dave Salmon

DEVON AND SOMERSET (NORTH HILL)

WWW.DSGC.CO.UK
505107N 0031639W

OUR Open Day was successful, with 66 people enjoying a taster of gliding. Some new members and course bookings have followed. We held a special day for 20 young people from the Hive in Exmouth and the Tiverton Youth Centre, both run by the charity Devon Youth Service (DYS) Space. The young people braved the heights raising funds for their youth centres, or as a reward

for their volunteering. Congratulations to Mark Worsfold on his first solo flight; Mark is profoundly deaf and has shown great determination and commitment to learning the skills needed to fly solo. Several days in May have given us good cross-country weather enabling flights, including two-seater coaching, into Cornwall and Hampshire.

Jill Harmer

DORSET (EYRES FIELD)

WWW.DORSETGLIDINGCLUB.CO.UK/DGC
504233N 0021310W

IAN Simmons went solo and Ray Huntley resoloed after a long lapse from gliding. With the publicity in the *Dorset Echo* of James Peace achieving his first solo at the age of 14, we now have three new junior members aiming to do likewise. At an Easter gathering at the club, Barry Thomas and Garry Shaw were presented with their BGA Diplomas. With the recent good weather, both Andy Grant and James Peace achieved their two-hour solo flights as part of their Bronze. Also, Richard Skuse achieved his Silver height. The funeral for Colin Weyman took place on 9 May, 2019. Colin was a popular, long standing member of the club and will be greatly missed. (He was a favourite among the S&G team, too.)

Allan Powell

DUMFRIES & DISTRICT (FALGUNZEON)
WWW.DUMFRIESANDDISTRICTGLIDINGCLUB.CO.UK 545638N 0034424W

APRIL saw us up at Portmoak followed by the ICL round one; we look forward to round two at Easterton. May has been busy with a glider on display at the science fair on the university campus. Well done to Ian and David for getting so many into the cockpit, we have already gained one new member from it. The RAF helicopter training group from Leeming came to us for a day in May to use the airfield for training; Chinooks, a Puma and a Wildcat landed. Reports indicated that it was a successful day, we look forward to them coming again. www.facebook.com/groups/127345634077187/videos May has seen the addition of some new members, Duncan and Hayley Gell, we welcome them.

Andrew Crowson

EDENSOARING (SKELLING FARM)

WWW.EDENSOARING.CO.UK
544152N 0023506W

OUR new (to us) IS28 is in high demand

and providing a better image to visitors and the opportunity for more adventurous club flights in both thermal and wave. We have plans for local promotions. We are also working to improve our infrastructure when we are not flying! We really do welcome club expeditions, groups and individual visitors. Come and share our fabulous ridge and soar the Lake District; It's easily accessible from our Skelling Farm airfield. Bookings for 2019 expeditions are strong from both previous and new visitors. We have even taken a return booking for 2020. Are you coming this year?

John Castle

ESSEX (RIDGEWELL)

WWW.ESSEXGLIDING.COM
520253N 0003330E

THE summer is going well so far! More new members to welcome, training room coming on nicely (thanks again to members responsible) and, at last, some warm days! In May we had the privilege of flying a gentleman from the States, whose father was a B17 gunner with the 381st Bomb Group at Ridgewell. The B17 he served in was called 'Century Note', the very same aircraft which we have honoured with the nose art on our K-13. Congratulations to Will Burry and Bernard Parry for achieving their Bronze badges. We have three flying weeks coming up during which we hope to have some more achievements and some fun flying.

Cathy Dellar

ESSEX & SUFFOLK (WORMINGFORD)

WWW.ESGC.CO.UK
515630N 0004723E

WHAT a great start to the season! Our SZD Perkoz has taken its first flights and has had good feedback. Mark Butcher has completed his aerobatic instructor course, meaning he is now ready to push the Perkoz and some members to the limit. The club has also purchased an SF-27 from one of our members; this has been inspected and now has an ARC ready for the season. New Dyneema has been installed on our German winch. Our juniors have had some amazing accomplishments: George White flew his first 300km; Jake Gazzard managed his first 200km of the year; Bailey Elliot has completed his aerobatic certificate; and Edward Smith has completed his Bronze, Cross-Country Endorsement and Silver.

Edward Smith

(Left to right): Hayley Gell's first flight with **Dumfries & District's** Iain McIver; resolo at **Herefordshire** for Nigel Collins, left (Dewi Edwards) and solo for Sheridan Chaffey (Ian Orpe); busy day for **Lasham** promoting gliding to young and old alike at Goodwood (Val Phillips)



HEREFORDSHIRE (SHOBDON)
WWW.SHOBDONGLIDING.CO.UK
521429N 0025253W

WE have had lots of flying over the past two months. Visitors from Kenley, Long Mynd and Talgarth have enjoyed themselves; well done to Andrew Woolley on his Gold distance. Congratulations also to our own members: Nigel Collins (resolo after many years layoff), Sheridan Chaffey (first solo) and Will Walker (Silver distance). Andreas Jelden is leading a junior scholarship scheme, starting with four very enthusiastic junior members, including Ben Rutherford who has converted to the Junior. Our hangar is progressing, with the main structure complete and the concrete floor laid and polished to a smooth surface. The walls and doors will be fitted at the end of June and we expect to move in immediately after.

Diana King

HIGHLAND (EASTERTON)
WWW.HIGHGLIDE.CO.UK
573508N 0031841W

CONGRATULATIONS to Adrian Morgan on going solo and to Colin Conti for his resolo after several years. We have had some super spring soaring, with "off the clock" thermals and wave flights to over 10,000ft; also Mike Black and Tony Mountain completed 300km flights. We took an LS7 to a local fete and it proved to be a great success, especially with the many dozens of young ones who were able to sit in a glider and get a free BGA sticker. Ellen Packham successfully completed another instructors course module in May, leaving only one more to finish the training. Unfortunately, the next suitable date for this module is not until September and is, again, many hundreds of miles down south.

John Thomson

KENT (CHALLOCK)
WWW.KENT-GLIDING-CLUB.CO.UK
51123N 0004950E

THE very hot and sunny 1 June helped us forget the rather average May and lead to hopes of a brilliant summer with the kind of visibility enabling us to see Essex and France at the same time. May did have its highlights, including a notable flight of over 400km by Dave Crimmins. Our weekday courses are booking well and our bookable training programme is moving our new pilots forward successfully. Thanks to Dave Beams, Tim Bartsch and others, who are doing a great job keeping our gliders and equipment

in excellent order. We are pleased to see Karen back in the cafe. We have changed our radio operation to ensure better separation from other radio traffic. Our field and local operational frequency is 118.865.

Mike Bowyer

LASHAM (LASHAM)
WWW.LASHAMGLIDING.CO.UK
511112N 0010155W

SPRING has delivered plenty of good weather allowing for numerous achievements, with multiple badge flights and new qualifications gained. One notable 600km+ flight on 4 May saw Ed Foxon and David Masson crossing the Bristol Channel after turning a point in mid-Wales to reach a turn-point in mid-Devon – a water crossing of nearly 40km! Congratulations to Kevin Burns and Allan Melmore, who join us as Ass Cats after converting from the Air Cadets. Success in Poland with Steve Jones and Garry Coppin getting a Silver medal for Great Britain in the 20m Championships in the Arcus (see pp12-15). Finally, a successful day was had exhibiting at the Goodwood Aerodrome Open Event, with many people young and old alike inspired to go gliding.

Jordan Bridge

LONDON (DUNSTABLE)
WWW.LONDONGLIDINGCLUB.CO.UK
515200N 0003254W

CONGRATULATIONS to Rolph Overvliet (solo) and Stephen Kingham (BGA Aerobatic badge). Cadets Dan Comerford and Eddie Newland-Smith achieved Silver distances and heights on the same day! The volume of cross-country activity is well ahead of 2018 although our soaring course, led by Andrew Roch, consisted of more time in lectures. By the time you read this we will have completed our task week and our racing week. As always, visiting pilots are very welcome at the Dunstable Regionals (17-25 August). We have been busy with repairs and redecorating, with our most significant project this year being the replacement of the sewage system. In September we have a two-week expedition to Llanbedr, followed by a visit to Talgarth.

Andrew Sampson

MENDIP (HALESLAND)
WWW.MENDIPGLIDINGCLUB.CO.UK
511544N 0024356W

OUR CFI, Simon Withey, led a successful expedition to Husbands Bosworth. Rob Grady

and Ben Person converted from Mendip wood to Hus Bos glass during the week. Both Ben and Rob were also signed off for navigation and field selection in the Falke. Inclement weather forced us to cancel our hosting of the Inter-club League. Hopefully better weather will prevail for the next round at Upavon. We are grateful to Gavin McMullen and Guy Jarvis for bolstering our instructor numbers. A correction to our last newsletter: it was Max Hurlow, who went solo, not Max Hannabuss, but I'm sure that the other Max will follow soon. We are working our way through our waiting list of potential members.

Barry Hogarth

NENE VALLEY (UPWOOD)
WWW.NVGC.ORG.UK
522612N 0000836W

WE'RE enjoying excellent flying. There was an expedition to Edensoaring at the beginning of May with several members taking aircraft. Unfortunately, the weather was rather less than kind. John Young went to the Lake District the following week and logged over 13 hours. Roger Gate has achieved his BI rating – well done. Fifteen-year-old Ben Deacon went solo in April and is on the sponsored Bronze Scheme. By the time this is published, the six successful candidates for this year's gliding scholarship awards will have been made and their training started. Hopefully our Twin-Astir will be flying shortly after a long maintenance period caused by the fatigue fracture of the undercarriage casting.

Peter Valentine

NORFOLK (TIBENHAM)
WWW.NORFOLKGLIDINGCLUB.COM
522724N 0010915E

WE held a successful instructors' course D module in May. Our task week at the end of May, held over two weeks, saw lift to 5,500ft on several days. Over the Bank Holiday weekend we hosted the ICL, with NGC winning the Saturday. We have again had the film company using our runways, filming some scenes for a programme to be shown sometime in the near future. Community day on 1 June saw 53 flights, our fleet being augmented by a T-21, courtesy of Mark and Will, also a Grob 103 courtesy of Tim Dews and Sidney Charles Insurance. Not long now before the VGC Rally. Numbers continue to mount and, given good weather, it should be a great event.

Adrian and Barbara Prime



(Left to right): Mendip's Ben Person (left) and Rob Grady convert to Hus Bos glass (Rod Coombs); successful completion of a D module instructor course at Norfolk; YAK 12 provides shade to PSGC resident Topsy Nipper; Paul Ogram is congratulated by Rattlesden instructor Richard Goodchild after resolo



NORTH WALES (LLANTYSILIO)
WWW.NWGC.ORG.UK
530239N 0031315W

LIKE all good governments, at our AGM we had a cabinet, sorry, committee reshuffle. Our chair, who works for a living and is progressing through the instructor modules, decided that he had to concentrate on his instructor training and exams so, after many years as chair, stood down, to become vice chair. He handed over the reins of chair to Brian Williams. Like all clubs, a large proportion of our funds comes from experience flights and we have juggled for several years with flying visitors, whilst not impacting members flying. Hence why, last year, we purchased a second K-13 to add to our K-13 and PW6 two-seater trainer fleet.
Ian Masson

OXFORD (RAF WESTON ON THE GREEN)
WWW.OXFORD-GLIDING-CLUB.CO.UK
515249N 0011311W

AS THOUGHTS turn to 'Longest Day' gliding events and summer BBQs we can reflect on some good flying already this year. Highlights include flying the flag for gliding at the Abingdon Air & Country Show, where a lucky visitor won a trial flight with OGC in a raffle held on behalf of Thames Valley Air Ambulance, and an excellent start of season party – thanks Liisi and helpers. Congratulations to Lucas Grzadziewski, who has recently soloed, and whilst some of the club are enjoying all that the Alps has to offer, others are getting ready for our open day.
Norman G Nome

PETERBOROUGH & SPALDING (CROWLAND)
WWW.PSGC.CO.UK
524233N 0000834W

THE clubhouse is finished and the team is now looking for its next project to complete (hint, toilet and showers). Meanwhile, a group of members has recently purchased a new aircraft from Poland complete with tow hook; it's not a EuroFOX, but a YAK 12 that sounds superb (9-cylinder radial) and by all accounts is a Pawnee on steroids. Look out for it around the comp scene! Manny Williamson has completed his 510km Diamond distance in a Kestrel 22, congratulations. The club dinner was well attended, the food being awesome – thanks Graham and Carolyn, and all the others that made it happen.
Roland Pitch

RATTLESDEN (RATTLESDEN)
WWW.RATTLESDENGLIDING.COM
521001N 0005216E

CONGRATULATIONS to Paul Ogram (resoloed after nearly 40 years) and to Colin Ashman, who has restarted his instructor rating. Our K-13 was airborne on 1 May after a three-year rebuild, thanks to Richard Walker for overseeing and doing the lion's share of the work and to all the members who helped. Also in May we welcomed Peter Hibbard with a group of juniors for a weekend's flying. They brought their Bocian 2 and a couple of single-seaters. The weather on the Sunday enabled some cross-country flying with one landout. We have swapped our Skyrope for Dyneema on our Skylaunch winch so are hoping for some good, high winch launches this season.
Gary Western

SCOTTISH GLIDING CENTRE (PORTMOAK)
WWW.SCOTTISHGLIDINGCENTRE.CO.UK
561121N 0031945W

CONGRATULATIONS to our spring crop of first solos: Margaret Issa, Jamie Middleton (on his 14th birthday), Chris Sangal, Nigel Ward, Robyn Smith and Samuel Tabor. Our visitor season has got off to a good start, assisted by summer tug pilot Ashley Capes, who is departing to continue his commercial pilot training; we also welcome Lewis Bricknell to carry on the good work. A group of GA flying instructors from Tayside Aviation came for a day of proper flying. To celebrate our 81st year the club is holding an open day on 23 June for families and friends.
Chris Robinson

SEAHAWK (RNAS CULDROSE)
WWW.SEAHAWKGLIDING.CO.UK
500509N 051520W

MARCH saw better weather and a successful expedition to Talgarth. Easter brought our first Fleet Air Arm Aviation Trust course. Then the first May Bank Holiday saw the best cross-country conditions we have seen in ages. Lawson Tickell completed his Silver 50km and a 100km out-and-return to Bodmin, the best flight from Culdrose for a long time. Finally, congratulations to Harry Callaghan on passing his Bronze and Cross-Country Endorsement. Unfortunately, the planned refinish of our Puchacz is taking a longer and our DG-505 was away for three weekends in Sisteron, but Heron GC rescued us with the loan of one of its Puchacz.
Chris Bryning

SHALBOURNE (RIVAR HILL)
WWW.SHALBOURNEGLIDING.CO.UK
512014N 0013239W

WE'VE all made the most of the summer. The Oxford ICL was held at Bicester in May and our keenest put in a fantastic performance on their first year competing. The final results were Bicester 16pts, Shalbourne 14pts and Oxford 2pts. A big thanks to Laurie, who captained and organised our team, and to everyone else who organised the competition at Bicester. SUGC held a successful training day in June, enjoyed by all who attended. Thanks to all who made the day possible. Congratulations to Charles for his Silver height; Bob S for Silver duration; and Steve G for Silver distance. Many thanks to everyone whose work keeps our club running.
Claire Willson

SHENINGTON (EDGEHILL)
WWW.SHENINGTON-GLIDING.CO.UK
520507N 0012828W

CONGRATULATIONS to Rob Felton (Bronze) and Bob King (RAeC Bronze medal for services to parachuting). The competition team is hard at work sorting out the final details of the Shenington Regionals. We have a full schedule of entertainment and expect lots of visitors. We are back to operating seven days a week. We have a number of expeditions planned, with a group from Loughborough University due soon. We also have a task week planned for 5-9 August, coinciding with an expedition from Kent GC. We enjoy visitors, expeditions very welcome. If you want to join us, get in touch with Carole in the office. If you're passing, pop in to say hello. You can keep up to date with our activities via the website.
Tess Whiting

SOUTHDOWN (PARHAM)
WWW.SOUTHDOWNGLIDING.CO.UK
505532N 0002828W

SPRING brought us a welcome supply of northerly winds which, even when light, triggered thermals off the Downs. On one occasion we had 40 gliders airborne and, happily, the ridge discipline was exemplary. Veteran tug pilot Chris Foss took the Oly 2b up on a less than promising afternoon to find wave, reminding us all to maintain a divergent approach when searching for lift. One hot tip on a cross-country flying lecture is worth repeating: having picked a field, he who

(Left to right): Robyn Smith (15) after first solo at **Portmoak**; Terry Hagerty is sent solo by **Surrey Hills** CFI Richard Fitch; Omani visitors pictured with **Wrekin** instructor Nigel Readman; with Moelfre in the background, **Wrekin's** R22 returns to Llanbedr with Will Dean and Ian Gallacher



continues to hesitate is not only lost, but probably miles away from the next suitable opportunity. Finally, a huge thank you to Maggie Clews and her team for so many years of excellent catering service to the club.

Peter J Holloway

SOUTH WALES (USK)
WWW.USKGC.CO.UK
514306N 0025101W

THE coming of spring and its better weather has enabled our experienced pilots to enjoy some good cross-country flights of 300km or more, as well as exploration of the ridges of the Black Mountains and beyond. We continue to attract enthusiastic new members and our pre- and early-solo pilots are making good progress with launches from our SkyLaunch winch, as well as our Pawnee tug. Everyone is appreciating the comfort and convenience of our newly-converted bus at the launch point. We have also provided a particularly large number of trial flights this year and, although only a few of these guests become members, we hope we show what a warm welcome they receive and what wonderful experiences they can enjoy from the world of gliding.

Stuart Edinborough

STAFFORDSHIRE (SEIGHFORD)
WWW.STAFFORDSHIREGLIDING.CO.UK
524940N 0021212W

JUST as we were beginning to think the rain would never stop, the sun came out... and so did all our aircraft! What an exciting final week in June we had. Congrats to Alison Walton Smith for her 5-hour duration flight on 22 June and, on the same day, young Dorian Bury achieved his Silver height. The very next day Simon Davenport went solo and Graham Stanford achieved his instructor rating. We ended the month with our annual friends and family day event, with demonstrations from local aero modellers, entertainment from the 'Silver Sax' band, a bouncy castle and a BBQ. Oh... and we also managed to fly 62 invited members' guests!

Steve Channon

STRATFORD ON AVON (SNITTERFIELD)
WWW.STRATFORDGLIDING.CO.UK
521406N 0014310W

AS part of his 100th birthday celebrations we were visited by Harry Lloyd, a former WW2 RAF veteran. Harry was a flight engineer, captured in Burma and spent more than three

years as a POW. His experiences can be read about in *The Colours of the Day* by P A Chapman. Mike Coffee gave him three flights, which he thoroughly enjoyed! Our annual expedition to Sutton Bank was a great success, plenty of flying and achievements. Thank you, YGC, see you in October. We have a great group of juniors and who, spurred on by friendly competition, are progressing well. To keep up to date, please visit our website and Facebook page.

Peter Capron

SURREY HILLS (KENLEY)
WWW.SURREYHILLSGLIDING.CO.UK
511820N 0000537W

CLUB members have got the season off to a great start. First, Terry Hagerty was sent solo by CFI Richard Fitch and then Andrew Woolley, on a Surrey Hills trip to Shobdon, did 300km to get his Gold distance. This was followed by Jason Barton, who flew from Kenley to Challock to get his 50km and therefore complete his Silver. On top of that Shayan Hassanbigi, 17, who went solo last year at Kenley, got to go solo on power with the Air Cadets in Dundee. We have also recently welcomed a number of new members to the club, all of whom are looking forward to going solo soon.

Chris Leggett

WOLDS (POCKLINGTON)
WWW.WOLDS-GLIDING.COM
535532N 0004740W

CONGRATULATIONS to our two new Basic Instructors Craig Scott and Graeme Cooksey; and also, to Jim Roberts, who recently completed his Silver badge. The club now celebrates the initial flights being undertaken in our newly-built 120hp EuroFOX. Thank you to our chairman, Steve Wilkinson, and to everyone who had their part to play in getting it built. Finally, we congratulate the naming of our club President Eddie Room, during our recent AGM, for his several years of service to our club.

Jonathon Richardson

WREKIN (RAF COSFORD)
WWW.WREKINGLIDINGCLUB.CO.UK
523824N 0021820W

WITH powered flying in full swing at the weekends, we are back on the Friday flying schedule. We are also entering the summer evening schedule that sees individuals and groups of RAF Cosford trainees join us

after work. Some will also take advantage of bursaries from the RAF Charitable Trust Scheme. Four members were able to fly with the RAFGSA expedition to Sisteron alongside pilots from the Royal Navy and Army. The location makes unique demands on flying skills, airmanship and personal courage of pilots. It is a fantastic opportunity for service personnel to fly in the French Alps and enjoy the challenge of some of the most demanding gliding, on a par with anywhere else in the world.

Geoff Catling

YORK (RUFFORTH)
WWW.YORKGLIDINGCENTRE.CO.UK
5357100N 00111332W

THE soaring season is in full swing, but our hopes for a successful Inter-club League competition were dashed by inclement weather. We even had blizzards at Sutton Bank on the Saturday morning! Despite relocating the competition to Rufforth to combat the NW winds, conditions were no better and we may look to reschedule for later in the year. In the meantime, our Wednesday evening winching has restarted, and we are also looking forward to our Millfield expedition in July. We've recently updated our website to make it more user friendly.

Andy Carden

YORKSHIRE (SUTTON BANK)
WWW.YGC.CO.UK
541338N 0011249W

DESPITE only three non-flying days, April was a disappointing month for country flying. Soaring was mostly local and only a couple of wave days. Nevertheless, light evenings saw the return of the popular Tuesday Club evening flying training. Mid-May brought some great cross-country opportunities exploited belatedly by cross-country course trainees. Congratulations to Nora van Genugten and Simona Latimer for achieving their Silver distances. May ended with a well-attended Vintage Glider Club rally having some quite sporting conditions to deal with. These were exploited by Mike Armstrong (Olympia 463) and Richard Moyes (Sky) reaching 13,000ft and 11,100ft respectively. Lively flying was accompanied by equally lively social events for this celebration of our soaring history.

Ken Arkley

S&G's thanks as usual to Debb Evans for editing Club News – Susan Newby, editor

■ More than 100 vintage gliders, with around 400 pilots and crew from all over Europe and as far as Australia, are taking part in this year's VGC International Rally at Tibenham, 27 July - 3 August.

"Our 60th anniversary year looks like being a momentous one for the club," said NGC chairman Mike Hoy. "We have a thriving junior section and with all the events we have planned - and given a good flying summer - it should be a year for the club to remember."

> CLUB FOCUS

NORFOLK

AT A GLANCE

Membership:

Full: £396 pa

Launch type:

Aerotow: (2,000ft) £33 (single), £35 (two-seater)
Winch: £9 (two-seater) £8 (single); plus (per minute): club two-seater 50p; club single 35p (NB: Badge claims capped at 60 mins)

Club fleet:

K-21, Puchacz, Grob 103, Astir CS, Club Astir, Grob 109 MG, Robin DR400 tug

Private gliders:

26

Powered aircraft:

27

Instructors/Members:

15/152

Types of lift:

Thermal

Operates:

Weds, Thurs, Sat, Sun

Contact:

Clubhouse: 01379-677207
Chairman: Mike Hoy email: mhoy@papermule.com
www.norfolkglidingclub.com

Long and Lat:

522724N 0010915E

NORFOLK Gliding Club, based at Tibenham airfield, was founded in February 1959 and its diamond anniversary is being marked by events throughout the year.

As well as its ever-popular open days, the club was chosen to host this year's prestigious Vintage Glider Club International Rally - for the third time! - and a book to mark the 75th anniversary of the disastrous Kassel raid will be published later in the year.

The club also expects the usual annual visit by families of American airmen stationed at Tibenham during the war. More than 80 members, past and present, attended a "60th" celebration dinner in February.

Club historian Eric Ratcliffe has put the finishing touches to a new account of the most disastrous WW2 bombing raid launched from Tibenham. The raid, to hit engineering works in Kassel, Germany, saw just four of the 38 Liberators return. It is hoped the book will be available in the autumn. A portion of the sale price will go towards the upkeep of the 1940s runways.

The club, which was one of the

wartime homes of Hollywood legend James Stewart, flies from one of the country's largest private airfields. The three-runway airfield was built in 1942 and used by American bomber squadrons flying Liberators. We fly four days a week during the winter and up to seven days in the summer, including every weekend throughout the year.

Our club fleet, including a K-21 adapted for disabled pilots and a Grob 109 motorglider, is now housed in a new 11-place 'roll-in, roll-out' hangar.

The club originally rented the former RAF base from the Air Ministry and started to buy parts of the airfield in the late 1980s. In 1990, the rest of the site went up for sale and NGC grabbed the opportunity. The traditional 'A' layout of Tarmac runways still includes all three runways, with the main strip a mile long. NGC operates a Supercat winch and a 180hp Robin DR400 for launching. With an RE, SRE, Examiner and an enthusiastic team of aerobatic instructors in the membership, the club is able to offer everything from glider ab-initio to power NPPL.

Andy Vidion

The BGA Team and General Information



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George Metcalfe

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Flying Operations

Peter Moorehead

CAA SLMG Instructors and Examiners

A number of CAA authorised SLMG examiners are appointed via the BGA to support SLMG activity under the management of the BGA SRE SLMG. Contact details are at <https://members.gliding.co.uk/examiners>

Gliding Examiners

BGA gliding examiners are appointed regionally and directed by Senior Regional Examiners. Coaching and tests can be arranged via SRE's who are listed at <https://members.gliding.co.uk/pilot-resources-flying-training/examiners/>

Safety Guidance

There is extensive safety guidance including a toolkit for club safety officers at <https://members.gliding.co.uk/safety>

Airworthiness Inspectors

There are a number of BGA inspectors across the UK. A proportion of them are approved to issue an ARC and are listed by region at <https://members.gliding.co.uk/arc-signatories> Regional Technical Officers can be contacted via the BGA office.

Airworthiness Guidance

Extensive guidance for owners of non-EASA and EASA aircraft is at <https://members.gliding.co.uk/airworthiness>

Other Information

Courses and Seminars

BGA courses and seminars information is at <https://members.gliding.co.uk/courses/>

Fees

BGA fees are detailed at <https://members.gliding.co.uk/fees-and-charges/>



BGA Office Contact Details

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SUTTON BANK STYLE



Phil Lazenby brings Oly 463, BYE, in for a perfect landing and, inset left to right: Garry Pullen helps rig the Foka 4 of Miro Lewandowski (right), with Graham Hayes, centre; John Castle's SB5b was impressive, but seemed to need a de-rigging committee; typical Bank Holiday weather

Descendants of Fred Slingsby and challenging weather made the national rally one to remember, reports Andrew Jarvis



The barometer says it all

THE rally started quietly on Saturday 25 May. Overcast, with a very light westerly wind. There was a soaring window in the afternoon and, for a while, four vintage gliders were aloft: two Skylark 4s, one of which belongs to Andrew Wilson and was making its first flight since 2012. It did have a new CofA, but nothing was needed apart from the odd drop of oil. Fred Slingsby would have been proud. The other Skylark 4 was David Weekes' trusty 303. Richard Moyes completed the trio of Slingsby types in his Sky. They gradually, and sensibly, dropped in to land, leaving me and Oly 463, BYE, patrolling the ridge like a lonely sentry until rain and dusk called a halt.

The official opening of this VGC event was on the Sunday morning. Traditional English Bank Holiday weather had by now arrived, with low pressure and a series of fronts awaiting the moment to strike. But this was the ideal time for one of Phil Lazenby's inimitable Sutton Bank welcomes. When formalities were over, Phil showed us some lovely slides of gliders from bygone years, a few of which we couldn't even name.

But still better was to come. We had actual descendants of Fred Slingsby with us: Peter

and Toria Walker; the latter is the great-niece. Peter played us a recording of his great uncle – yes, that is the actual Mr Slingsby – recounting a life-changing experience during the Great War. Briefly, Fred was flying as an air gunner in 1916, and they were attacked by two German fighters. The aircraft started flying erratically and Slingsby then realised that his pilot was stone dead! After a few moments' terror, Fred calmly 'screwed the spare joystick into its socket', cut the engine, and steered west. He steadily glided down from 8,000ft to crash land, unhurt, on a snow-covered field near Ypres. So how's that for an introduction to gliding and one's first field landing? And how's that for a 'briefing'? It can only be a Sutton Bank Vintage Rally!

At first, the Sunday looked like being non-flyable due to 30kt winds, but how wrong could one be? By midday, brave souls were rigging and even launching. First off was Mike Armstrong, the Camphill vintage maestro, who, almost unnoticed, had got airborne in his Oly 463. Soon after that, the wind became so strong that even rigging an old glider was risky. Despite that, five vintage gliders were launched, or almost catapulted, on the winch and all had memorable flights in strong ridge

lift which merged into wave. Steve Codd was in his K-18; Richard Moyses in his Sky, David Weekes in his Skylark 4. When accounts were compared, Richard had done superbly in the Sky, reaching 10,000ft, but the unchallenged winner was Mike Armstrong, who had reached 13,000ft (QNH). The many left on the ground 'felt themselves accursed they were down there' (misquoting *Henry V*), but maybe also relieved to be in one piece.

Overnight the wind was fierce and I felt compelled to check my trailer was secure. It was, and the breaking dawn sky on Bank Holiday Monday was woven with lenticulars. However, it was a relief when the wind dropped and maybe gliding would not once more be a test of manliness. In fact, it still wasn't easy.

Gary Pullen was first to launch, in the GHC's orange Foka 4. Gary battled on in the Cold War hot rod, but the lift was too weak – although ideal for an Oly 463! The skies were full of clouds of all shapes and sizes as the unstable air churned in alternate ridge, thermal and broken wave. One by one the gliders were forced down: what looked like a brief see-through shower set in for the afternoon. My charity shop barometer was spot on.

Tuesday allowed for just a little evening flying, but Paul Dickson arrived from Australia and also Miro Lewandowski with his yellow Foka 4 – so we now had an international rally!

Wednesday promised a slight pre-frontal ridge of pressure, theoretically offering the gentle conditions we vintage folk always enjoy. Well, that was the theory, but practice diverged somewhat and, in plain English, it was a pretty

cloudy day! Undeterred, we had all had a really happy day. Launching was all aerotow, on runway 02, which allows wonderfully short tow-outs from the trailers and a generally sociable atmosphere.

Conditions proved quite deceptive: many pilots climbed away happily in 4kt thermals, only to find the lift suddenly wasn't there any more. Corny (Dave Cornelius) came the closest ever to a landout, catching a bubble of lift while well below the nearby treetops, and scraped back. My own hedge-hopping return to the site earned me a remarkably courteous debrief from the duty instructor. There were two landouts. In the afternoon, the approaching warm front looked a hopeful source of wave, but instead it offered just drizzle. Despite this, soaring continued till 5pm.

Thursday was a very windy, overcast day. It ended with the Yorkshire Evening, in aid of the Yorkshire Air Ambulance. Halfway through this, a glider landed. It was Steve Codd in his K-18, who had been up for four hours on the overcast ridge.

I had to leave on the Friday morning, but the national rally continued right through the weekend. The rally was closed by chairman Chris Whittaker. I also would like to express our gratitude to the whole organising team, especially Phil Lazenby, Gerry and Margo Henderson-Newton, CFI Andy Parish and countless others. The 30 VGC pilots attending had a super week.

■ **The national rally featured on ITV regional news.**
See www.youtube.com/watch?v=yWzWQtES-bQ



Gary Pullen brought the GHC's 'futuristic' Foka 4

DATES FOR 2019:

- **47th VGC International Rally, Tibenham, 27 July - 3 August**
- **Gluebirds Rally, Channel GC, 7-8 September**
- **Whispering Wardrobes Rally, Booker, 22-23 September**

■ www.vintagegliderclub.org

An advertisement for a gliding holiday in Saint-Auban. The background is a scenic aerial view of a valley with a lake and mountains. A glider is shown in flight against a blue sky. The text is white and yellow. In the top right corner, there is a logo consisting of a star and the letters 'NV' in a stylized font.

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WHY IT IS GOOD TO THINK AHEAD

Continuing a new series from the BGA safety team, with a focus on some of the human factors that can lead to a stall/spin accident

WE'VE lost 35 pilots through inadvertent stall/spin accidents to gliders in the past 46 years, and another 11 through loss of control of tugs and motor-gliders. Our files record over 200 further accidents in which stalling or spinning led to serious injury or damage – and all these figures exclude winch launch accidents. Most of them happened to experienced, competent pilots, who showed no sign of lacking spin recovery skills; and a lot occurred when field landing [1] or trying to stretch the glide back to the airfield [2].

There are many good things we can do to reduce the risk of a stall/spin accident. We can maintain familiarity with spins and their recovery [3]; ensure that the C of G is within limits to avoid longitudinal instability;



position the ASI where it's easily visible, and orient it to be 'needle up' at manoeuvring speed; practise handling in the landing configuration, especially in flapped gliders; and fit a stall warning device. But these aren't the topic of this article – because a feature of over 80 per cent of the major stall/spin accidents was high pilot workload, stress or potential distraction: 'human factors' that involve the soft, squishy bit between the ears.

A senior pilot told of a cross-country flight when he had to choose between turning home early and pressing on into obviously poor conditions around the final turning point. Electing to complete the task, he thought about how the poorer conditions and greater workload and stress would affect his flying. "I know my speed control deteriorates," he said, "So I deliberately added a bit to my thermalling and manoeuvring speeds." It's a good example of forethought, self-knowledge and preparation. "But what worried me in hindsight," he continued, "was that this was the first time I'd thought about things this way – and I'd already been CFI here for 15 years!"

Psychologists refer to the stages of this process as perceive, comprehend and project; the RAF labels them What? So what? Now what? It's how we learn by reflecting upon past events, but it can also be applied ahead of time as 'threat and error management'.

1 Spot stressful situations ahead

Workload and worry can cause as much stress as physical challenges. Difficult soaring, turbulence or rotor, poor visibility, getting low or a marginal glide, having to navigate tricky airspace or deal with ATC will all use up our mental capacity – as will hunger, dehydration, a full bladder, or concern



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about getting home in time. Some situations might be foreseeable at the flight planning stage; others might be flagged en route by deteriorating conditions, making a decision to press on, needing to start the engine or land out, or encountering circuit traffic or landing area obstructions.

2 Identify how stress could affect you

The pilot above isn't alone in finding his speed control affected by workload: with our attention demanded by other activities, we've less to dedicate to accurate flying. It's also thought that, just as drivers have been found to slow down unthinkingly when making a phone call, pilots might subconsciously reduce speed to compensate for increased workload [4]. Unfortunately, the tactic is less helpful in the air.

However superhuman our abilities as red-blooded glider pilots, there is for all of us a level of stress or workload that will affect our flying, and it's helpful to know how we each respond to it [5]. Mental and visual attention, physical sensitivity and coordination could all be affected. For example, you might find that your speed control and handling precision deteriorate; that you're more ham-fisted, tense on the controls or less sensitive to what the glider is doing; that you find the glide computer more frustrating to program and your analytical ability decreased; or that concentrating upon the landing area reduces your awareness of speed, balance and attitude. You might find decision-making more difficult, or the inevitable harder to accept [6].

It's also useful to know whether your glider is particularly sensitive to mishandling

or misconfiguration, and whether this changes with flaps or ballast for landing, or when the engine is extended.

3 Take mitigating action

If we know that we're approaching a stressful situation, and we know how the stress could affect us, then we can do something about it – ideally before we reach the situation itself.

Firstly, we can reduce unnecessary distractions: set the instruments, prepare radio frequencies, check wind direction; stow articles, eat or drink something, take a leak. We might even get ready early for landing by adjusting the seat or pedals, dumping ballast, checking our straps and lowering the undercarriage.

Secondly, we can consciously adapt our flying to make it less susceptible to our reduced performance: decide to fly a bit faster, manoeuvre more gently, or increase our margins in some way.

Thirdly, we can prepare mentally: we should expect a hard time and some tough decisions. We might decide in advance what the criteria for those decisions will be – and give some thought to field landing options.

Finally, we can try to concentrate upon key safety aspects. It's easy to spin from a plausible attitude in an unbalanced turn; and, at low level, geography can deprive us of an accurate horizon, while wind gradients and turbulence can be more marked. Speed and balance therefore require enhanced attention: above all, the first priority is to aviate.

In the airline world, this would be crew resource management – CRM. Its principles still apply even when there's only one of us.

Tim Freearge and the BGA safety team

IF WE KNOW HOW STRESS COULD AFFECT US, WE CAN DO SOMETHING ABOUT IT

■ For more information about some of these aspects of human factors, a good starting point is the CAA's CAP 737 [5].

[1] AAIB Bulletin 4/2010
<https://tinyurl.com/flyright1915>

[2] AAIB Bulletin 2/2013
<https://tinyurl.com/flyright1916>

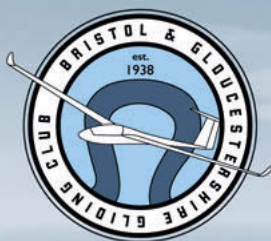
[3] BGA Instructor Manual, sections 1819
<https://tinyurl.com/flyright1917>

[4] Forced Landings, GASCo Flight Safety, pp59 (Summer 2016)

<https://tinyurl.com/flyright1918>
[5] CAA, Flight-crew human factors handbook, CAP 737 (2016)

<https://tinyurl.com/flyright1919>
[6] K Ballantyne, *The Fatal Five*, Flight Safety Australia (2015) <https://tinyurl.com/flyright1920>

■ Clubs can obtain printed copies of Safety Briefings from the BGA Office.



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Pete Stratten takes a look at new sailplane air operations rules

ONE SIZE DOES NOT FIT ALL...

WOAH! Please don't flip past this article just because you spotted the word 'rules'. If you fly gliders, motor gliders or tugs, this short article is relevant to you.

By the time you read this, the new Sailplane Air Operations (SAO) rules will have come into force. They apply to all EASA sailplanes, including powered sailplanes, which includes Touring Motor Gliders (TMGs). This article provides the background, makes a few observations, and points at useful guidance.

Operations rulebook

As you'll be aware, we've always had rules about how we operate aircraft. In gliding,

that's been a mix of self-regulation and rules imposed by the CAA. And, to be fair, the operations rulebook has always been reasonably slim.

When EASA took on the task of regulating operations of aircraft (aircraft = everything that flies with people on board), the end result was a bulging publication which is incredibly difficult to navigate, and particularly so when you just need to pick out a few bits that apply to operating a glider or a motor glider. And even within the 'Non-Commercial Operations' section, which is applicable to most of General Aviation, there's a bit of 'one size fits all' going on, which really doesn't work for gliding.

Following proactive and effective engagement by the European Gliding Union (EGU), EASA agreed to revisit the operations rules applicable to sailplanes. EASA also agreed to revisit the sailplane flight crew licensing (FCL) rules. The overall aim is to produce proportionate and simpler rules for sailplanes.

The EASA working groups reviewing this stuff deliberately included gliding experts from around Europe, as well as a member of the EASA team who is an active gliding instructor. There was, of course, a consultation process which involved more glider pilots, including from the UK, who provided valuable inputs.



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A reasonable reflection of the previous approach

The revised sailplane flight crew licensing rules have not yet been finalised. Those are expected in a year or so. The Sailplane Air Operations (SAO) rules came into force on 8 July 2019. They apply to all EASA sailplanes, including powered sailplanes, which include Touring Motor Gliders (TMGs). As the new sailplane operations rules are a reasonable reflection of the previous approach, and in some ways an improvement, we have not identified any significant issues. It's worth noting that (as with all EASA output) the rules need to be considered along with the 'acceptable means of compliance' and 'guidance material'.

What about operations rules for EASA aeroplanes, eg tugs such as the Robin and Pawnee? As described on our 'Operations' website page, EASA 'Non-Commercial Operations' (NCO) rules apply. Those rules have been in force for a while and we're not aware of any major issues.

And what about non-EASA gliders, motor gliders and aeroplanes? As described on our operations webpage, nothing changes.

The BGA has published detailed guidance at <https://members.gliding.co.uk/operations/>

BGA accident/incident summaries

AIRCRAFT

Ref	Type	Damage	Date, time	PILOT Injury	P1 hours
11	Antares	minor	31/10/18, 13:00	none	1400
Undercarriage collapsed on landing, damaging the doors and fuselage underside. The wheel had not been retracted during the short winch launch flight so the pilot concludes that it had not been properly locked down during rigging.					
12	Discus	minor	17/10/18, 12:00	none	93
Undercarriage collapsed on landing, removing one door. The pilot reports lowering the wheel as part of his pre-landing checks.					
13	Dimona	substantial	04/10/18, 14:00	none/none	647
Heavy landing damaged the propeller as well as the undercarriage and fuselage next to the undercarriage leg mount. The pilot rounded out a little too high and too much; the tailwheel touched down first, pitching the nose down leading to a heavy landing, compressing the undercarriage legs and allowing the propeller to hit the ground.					
16	Puchacz	substantial	17/11/18, 11:45	none/none	72
Canopy came open during flight. The glider was descending during a post-maintenance test flight, the P1 set up a sideslip to the left using right rudder and then increased the rate of descent by opening the airbrakes. A few seconds later the canopy opened, damaging the perspex and frame. The pilots were able to close and secure the canopy before landing.					
18	T-61 Venture	destroyed	09/12/18, 13:35	minor	28
Engine failure shortly after take-off. The pilot applied carb heat while waiting for a landed glider to be retrieved along the active runway. After the glider cleared he heard another motorglider call downwind so he elected to line up and depart without delay, but omitted to de-select carb heat before taking off. When the engine failed at 150ft ato over the airfield boundary, the pilot tried to land in the largest available field but ended up overshooting and aiming for a gap in the vegetation at the end of the field. The TMG hit the bushes at about 10ft agl, slowed rapidly and crashed into the next field. The pilot suffered some neck strain, the aircraft wings were both severely damaged and almost detached, as well as having a broken propeller.					
20	DG-300	substantial	13/12/18, 12:10	none	249
Downwind field landing ended under wire fence, trapping the pilot in the glider. After winch launching, the pilot flew towards a nearby ridge hoping to find some lift, but he failed to fly all the way round the corner onto the windward slope. Finding only sink, he realised that he was too low to return to the airfield. He then realised that there was nowhere to land upwind and, after turning downwind, there was only one safe landing area. Too low to fly a circuit, the pilot flew a downwind landing and was unable to stop the glider rolling into the wire fence. The canopy was broken and the one wing had two deep gashes after hitting fence posts.					
23	Puchacz	minor	24/11/18, 14:10	none	86
Glider landed long and ran off the end of the runway. The early-solo pilot flew a cramped circuit, overshot the turn from base leg to final approach and re-aligned the glider with the runway before opening the airbrakes. After landing, he forgot to use the wheel brake. The glider ran into some gorse bushes which scratched the underside of the fuselage.					
24	K-13	substantial	09/12/18, 14:50	minor	59
Overshot landing ended in hitting a fence. The pilot found himself low and downwind of the airfield, having to fly at up to 80kts airspeed to make it back to the airfield in the 15-18kt crosswind. Witnesses report seeing the glider make a low turn onto final approach, little or no airbrake being used and the glider ballooning several times before touching down. The glider collided with a wooden fence at the airfield boundary, breaking the left wing and the canopy. The pilot had been driving the winch for most of the day before the flight.					
25	Discus	minor	19/12/18, 14:00	none	222
Heavy landing damaged an undercarriage door and possibly cracked the undercarriage frame. The pilot was blinded by the low sun on final approach to runway 22 and misjudged the round out.					
29	K-13	destroyed	17/01/19, 15:00	none/minor	1366
Glider crashed nose first into a field outside the airfield. As the wind died and the ridge lift reduced, the pilots returned to the airfield and set up a circuit to the runway that had been in use for most of the day. The P1 noted that after turning onto final the glider was a little high, but he expected the handling P2 to cope. Later on, he realised they might overshoot the relatively short runway so took control and added a sideslip to the full airbrake approach. Approaching the airfield boundary he felt that they were still too high and made a snap decision to make an orbit so turned sharply to the left. However, he left the airbrakes out and the glider lost more height than expected. The pilot tried to level the wings to land in the undershoot field but one wing caught in the trees, yawing the glider and pitching it nose down into the field. The front seat P2 was initially trapped in the crumpled nose of the glider, but suffered only minor cuts and bruises. The glider fuselage was extensively damaged, as well as the port wing. One witness reports that the wind had also veered and there was a tailwind component to their approach to the shortest runway on the airfield.					

continued on page 68

BGA accident/incident summaries *continued*

AIRCRAFT				PILOT	
Ref	Type	Damage	Date, time	Injury	P1 hours
30	DG-808	substantial	20/01/19, 13:55	serious	538
<p>Glider crashed on hillside after emerging from cloud. The pilot self-launched and climbed to 4,000ft heading towards some nearby hills. After stowing the engine he noticed that his navigation device had shut down, but he continued his glide towards where he thought the clouds marked some lift. When the sink rate increased he fell into the tops of the clouds; when he emerged from the bottom he saw the hill directly ahead of him. Too low and slow to turn around, the pilot pulled back on the stick and the glider mushed onto the slope. After the crash the pilot could not open the canopy, but was able to phone the gliding club which then alerted the emergency services. The CFI stresses that the pilot should have turned away from the high ground as soon as he entered cloud. The safety officer points out that the pilot was not only lucky to survive the crash, but also lucky to have mobile reception in a remote area. He suggests that making a Mayday call on 121.5 MHz and selecting 7700 on the transponder may have aided the emergency services. The temperature fell to -5°C overnight so the pilot was fortunate to be found before sunset. He fractured his sternum and a couple of vertebrae. The glider had damage to the forward fuselage and both wings.</p>					
32	HpH Shark	destroyed	02/02/19, 13:00	none	887
<p>Crash into trees while ridge soaring. Having crossed a large gap, the pilot reached the next section of ridge at ridge-top height and gained 100-200ft in some lift. He flew on at 60+kts, but, as he approached the spur on the north western side of the bowl, he experienced strong sink and a sudden loss of airspeed. Too low to recover, the glider stalled into the trees about 80ft below the top of the ridge and stuck in the trees at 100ft agl. The fuselage boom broke in the impact, breaking the radio antenna, so the pilot's attempts to call for help were unsuccessful. Other pilots were able to raise the alert and the pilot was rescued by helicopter winch. The wind was reported as 18kts from 340°, the bowl the the pilot was crossing faced NNE. The CFI's report suggests that some combination of curlover, rotor or thermal turbulence may have led to the sudden loss of airspeed, although he points out that at least 15 other gliders had flown the same route during the day without trouble.</p>					
38	Grob Acro	minor	02/03/19, 10:45	none/none	152
<p>Heavy landing damaged the structure around the nose and main wheels. Late into the round out, at about 10ft agl, the P2 pushed the stick forward and although the P1 took control he was unable to prevent a hard landing.</p>					
Incidents					
9	DG-202	minor	17/10/18, 18:50	-	-
<p>Wing fell off trestle while being de-rigged. The glider was being de-rigged at dusk, having been delayed by a parked car blocking trailer access. The trestle had not been properly placed, allowing the wing to fall off as the other wing was removed. The end of the spar damaged the inside of the fuselage.</p>					
10	EuroFOX	-	28/10/18, 14:15	-	152
<p>Tow rope snagged telephone wires on approach, breaking the weak link. The glider had released after getting out of position during the ground run, the tug pilot continued the take-off and flew a low circuit. He thinks that he may have assumed that he had released the tow rope before making a low approach.</p>					
14	K-21	-	11/11/18, 10:15	-	-
<p>Aileron L'Hotellier locking pin found to be incorrectly fitted. The glider had been DI'd several times since last being rigged over two months earlier. The connector had been properly fastened, but the safety locking pin had been inserted into the slot in the bottom of the push-to-unlock slide instead of the appropriate hole on the top.</p>					
15	Astir	none	15/11/18, 11:00	-	3456
<p>Airbrakes came open during winch launch. The pilot believes that he did not properly lock the airbrakes after opening the canopy again to clear some condensation after completing his pre-flight checks.</p>					
17	ASW 19	none	17/11/18, -	-	-
<p>Tow rope broke at the tug end during rough aerotow through wave rotor. The glider pilot reports a large bow developing and the rope breaking as it came tight. The rope then flew back over the glider wing and remained there until just before touchdown when it back released.</p>					
19	Ventus	none	18/11/18, 12:00	none	507
<p>Aerotow take-off with the tail dolly still attached. After towing the glider to the launchpoint, the pilot interrupted his usual procedure to discuss the challenging launch conditions with the tug pilot. Then one of the launchpoint helpers set off to retrieve a glider, leaving a single person to help launch the Ventus. A member returning to the launchpoint was able to give a warning on the radio just after the glider took off. The pilot released and was able to land ahead, the tug flew a circuit. The safety officer stresses the importance of an ABCD check before getting into the glider.</p>					

BGA accident/incident summaries *continued*

AIRCRAFT				PILOT	
Ref	Type	Damage	Date, time	Injury	P1 hours
21	-	none	16/12/18, -	-	-
<p>Winch strop fell into an adjacent business after a weak link failure. The club had three weak link failures on a gusty day, only two were found until a few days later when a neighbour reported a strop on their premises. The wind had been straight down the runway with no sideways drift as the cable descended under parachute after launching.</p>					
22	K-13	none	28/10/18, 11:30	none/none	3335
<p>Uncommanded aerotow rope release just as the glider took off. After debriefing back at the launchpoint, the instructor was informed that the same thing had happened two days earlier so the instructor grounded the glider. An engineer's inspection revealed that an unauthorised modification to the release had displaced a plastic shroud protecting the cable, preventing the release from closing properly.</p>					
26	EuroFOX	none	30/12/18, 10:40	minor	-
<p>The tug pilot raised the elevator to ease access to the end of the retracted tow rope at the same time that the launchpoint helper was bending down to reach for the rope. The elevator trim tab horn hit the member in the face close to an eye, cutting and bruising the member's face.</p>					
27	Perkoz	none	12/01/19, 14:00	none/none	1300
<p>Canopy came open during winch launch. The P1 explained the new CBSIFTBEC checks to the student and then, while waiting for the cable, went through the eventualities check in some detail. Having finished going through eventualities the P1 assumed that the checks were complete so accepted the cable. He reports the first half of the launch was a bit noisy, but ignored it until the canopy came open.</p>					
28	Astir	none	15/01/19, 11:50	none	72
<p>Canopy came open during winch launch. The pilot let go of the release to hold the canopy shut, but in doing so knocked the airbrake lever, unlocking the brakes which then came open. Towards the top of the launch he let go of the control column to pull the release, he then locked the canopy before closing and locking the airbrakes.</p>					
31	Puchacz	none	11/01/19, -	-	-
<p>Battery came loose during aerobatics. A bungee cord retaining hook had straightened slightly, allowing the bungee to slip off.</p>					
33	Grob Acro	-	10/02/19, 12:30	-	-
<p>Loose object found in fuselage. While doing their pre-flight checks the pilots heard a rattling noise when the airbrakes were closed. Investigation found an old metal aircraft ID plate in the bottom of the fuselage.</p>					
34	K-18	minor	16/12/18, 11:30	-	-
<p>Retrieve buggy reversed into tow dolly, pushing it into the glider and damaging the rudder. The buggy driver's foot had jammed between the pedals. The report suggests that gliders should be pulled up to the tow vehicle rather than have vehicles reversing towards the glider.</p>					
35	T-61 Venture	none	03/02/19, 14:30	none/none	1002
<p>TMG veered left off the runway after landing and the propeller struck a fence post. The handling pilot tried to use the rudder to keep the TMG on the runway, but couldn't move the pedal. His foot had been on the right-hand edge of the left seat right rudder pedal and the the left side of the right seat left rudder pedal at the same time.</p>					
36	Perkoz	-	10/02/19, -	-	-
<p>Incorrectly fitted wing drag pin found when the glider was de-rigged for servicing. As the pin had not been fully inserted into the socket the safety tabs had not released to lock the pin in place. The CFI recommends training members to use a torch to inspect the pins during the DI after rigging.</p>					
37	Grob Acro	none	23/02/19, 15:00	none	-
<p>Full forward trim needed during aerotow and also to maintain approach speed in the circuit. The solo pilot was flying near the aft CofG limit, but other pilots reported being surprised by the amount of forward trim needed when flying the glider. The fabric tape covering the tailplane elevator gap had come unstuck at its forward edge and curled up in the airflow across a substantial width of the tailplane.</p>					

During BGA Club Safety Officer seminars it was proposed that, to further encourage reporting, it would be a good idea to remove site names from summaries. This has been reflected in the summaries on these pages. Edward Lockhart continues to provide a little extra detail, where available, in these listings. We would also like to publish (anonymously) your stories of particular flights that have taught you a valuable flying lesson. Please send details to editor@sailplaneandgliding.co.uk or by post to the address on p3.

BGA BADGES

No.	Pilot	Club (place of flight)	Date
FAI 1000km Diploma			
30	Damian le Roux	Southdown (New Tempe)	22/01/2019
FAI 750km Diploma			
127	Martin Roberts	Southdown (Lasham)	04/05/2019
Diamond Badge			
846	Adrian Loening	Borders	12/05/2019
Diamond Distance			
1-1293	Adrian Loening	Borders (Cairngorm)	12/05/2019
Diamond Goal			
2-2620	Andrew Mayer	Bicester	12/05/2019
2-2621	Terry Dunford	Lasham	21/05/2019
Diamond Height			
3-1859	Timothy Highton	Norfolk (Minden, USA)	07/04/2019
3-1860	Mark Lench	North Wales/ York (Lleweni Parc)	26/05/2019
3-1861	Robert Vaughan	Denbigh	30/05/2019
Gold Badge			
Timothy Highton	Norfolk (Minden, USA)	07/04/2019	
Robert Vaughan	Denbigh	04/05/2019	
Stuart North	Bath, Wilts & N Dorset	04/05/2019	
Gold Distance			
John Woolley	Surrey Hills (Shobdon)	12/05/2019	
Robert Vaughan	Denbigh	04/05/2019	
Andrew Mayer	Bicester	12/05/2019	
Peter Hadfield	SGU (Feshiebridge)	12/05/2019	
Terry Dunford	Lasham	21/05/2019	
Gold Height			
Timothy Highton	Norfolk (Minden, USA)	07/04/2019	
Stuart North	Bath, Wilts & N Dorset (Portmoak)	04/05/2019	
Morag Saunders	Lasham (Santa Cilia, Spain)	03/05/2019	
Silver Badge			
Martyn Oliver	Lasham	13/04/2019	
Carles Borrnat	Ulster	04/05/2019	
Thomas O'Connell	Southdown	06/05/2019	
Noortje Genugten	Yorkshire	12/05/2019	
Frank Friend	North Wales	30/05/2019	
David Morgan	London	12/05/2019	
Theodoros Messinezis	Lasham	21/04/2019	
Terry Dunford	Lasham	21/05/2019	
Simona Latimer	Yorkshire	12/05/2019	
Silver Badge			
James Roberts	Wolds	12/05/2019	
Jason Barton	Surrey Hills	21/05/2019	

NIGEL JOHN HOWES (1955-2019)



understand, to round Snowdon. At the time of writing, little is known of the circumstances.

He had been a member at Camphill for about 35 years, a long-serving FR instructor, served on committee as aircraft officer, and was a very keen cross-country pilot. Nigel won the Open Class in the Northern Regionals in 1996 and flew in several 15-metre regionals and nationals. He flew a Javelot, Olympia 463, ASW 20, and the LS7. Nigel had just joined a Ventus 2CT syndicate to extend his cross-country flying. He also shared a DG-500, in which he introduced many pilots to cross-country flying.

He had a degree in mathematics, but chose to establish a business as a self-employed builder, not wanting to be working in an office. He retired recently, after building a new home for Pat and himself. The club and many members can testify to the quality of his workmanship. In his younger days Nigel had played hockey and cricket, and tried surfing and hang gliding, before coming to gliding, and he was a keen squash player. He also loved music and had played both the flute and piano.

Nigel leaves his partner Pat, his mother and sister, and Bobby, his latest Springer Spaniel. Nigel and Bobby were a regular feature at Camphill and will be sorely missed. The funeral service was held in Macclesfield on 28 May, attended by a great number of Nigel's family and friends.

David Salmon, Derby & Lancs GC

TRISH WILLIAMS (1943-2019)



TRISH passed away suddenly at her home around midday on Wednesday 24 April. This was a real shock because she was due to be at Lasham that day and her last glider flight was as P2 in the back seat of our ASH 25

on Friday 19 April.

Trish started gliding in 1980 when she joined the RAE Farnborough Gliding Club, where her husband Pete was already a member. Pete and Trish separated in the late 1980s, but Trish carried on as a very active member of that club, including service on the com, working on glider and tow car maintenance, etc. For a while she operated her own K-8 there. When the RAEGC moved to Odiham in 1995, Trish had already purchased a share in a Lasham-based Libelle and joined Lasham as a full member. She had a share in a K-7 for a while for some social flying, having by then completed her Silver C and obtained a passenger carrying rating.

Trish gave up flying as P1 after her Libelle was written off following a (non-fatal) mid-air collision while on loan to a competition pilot. She still continued flying as P2 and purchased a share in the Lasham-based ASH 25 BB. Trish was still an active member of that syndicate when she died. This is the same ASH 25 that Michael Bird had a share in at Lasham.

Since moving to Lasham, Trish helped run the comps start/finish line tower. She also worked as launch point controller for the summer evening and winter daytime Friday groups, followed by being the administrator for the Friday evening air experience flights. Trish was notorious for keeping neat and accurate logs and was known to voice her displeasure when circumstances would necessitate an alteration to the log sheet. She was also notorious for her addiction to cigarettes and Capstan full-strength ones in particular!

Trish was quite well known in the gliding community. She had been to lots of gliding sites at home and abroad while on club expeditions, either flying as P1 or P2, and crewing or flying as P2 in Competition Enterprise.

Trish was a competent and conscientious pilot and I don't think she ever had an accident.

She loved doing things like violent fairground rides and also flying aerobatics as a passenger. She once had a ride in a Pitts special as a birthday treat that she asked for and got the full programme, which did not make her sick, but left her with a big smile and bruised ears from her head bashing against the fuselage sides.

In December 2014 Trish had a bleed on the brain that took nine days to be

diagnosed. In the five years since then, you could see that she had been damaged; there was a lot of confusion about times and dates, she had lost motivation, lost her appetite, lost her confidence and lacked energy. She was suffering a lot with crippling back pain. It was very sad to see, but difficult finding a solution. Now her suffering has ended, but we really will miss her.

Mick Wells, Lasham Gliding Society

PAUL SOUTER (1948-2019)



PAUL's gliding career started as a 16-year-old at Firle Beacon, the former home of the Southdown Gliding Club. The launch method was both bungee and winch. He went

solo in a Tutor, but flew many a vintage glider. He continued to fly until he went to college, returning after his children grew up. In 1988 he rejoined Southdown Gliding Club, who were now flying at Parham Airfield, and joined an Olympia 460 syndicate with Tim Brewer and Dennis Ratcliff, completing his Silver.

Paul continued to fly and later became a popular instructor. Always a joy to fly with, he encouraged many a beginner to join the club and aspire to greater things. There are a number of instructors at Southdown Gliding Club who can give thanks to Paul because of his enthusiasm and motivation. In recent years Paul flew his DG-300 for fun and would soar it beautifully. At Southdown for many years Paul was the 'Winch Master'. Paul was a gliding purist and was at home driving the winch and he played an important part in encouraging the members, especially the Junior pilots, to use the winch as an excellent launch method.

Flying was not all that Paul did, however. He was an accomplished engineer and skier. He joined many of the winter Southdown Sliders ski trips and showed many of the younger skiers how to navigate the black runs. He was also an enthusiastic motorcyclist and would visit the club on his Moto Guzzi Polizia motorcycle.

Above all, it is his great personality and presence and his wonderful sense of humour that we will remember. He will be sadly missed by us all.

Gez Smith, Southdown Gliding Club

BGA BADGES

No.	Pilot	Club (place of flight)	Date
Silver Distance			
	Simon Harding	Kent	30/04/2019
	Benjamin Payne	Bristol & Glos	04/05/2019
	Carles Borronat	Ulster	04/05/2019
	Simon Stannard	Derby & Lancs (Talgarth)	04/05/2019
	Noortje Genugten	Yorkshire	12/05/2019
	William Walker	Herefordshire	12/05/2019
	Theodoros Messinezis	Lasham	21/04/2019
	Joshua Rees	Chilterns	12/05/2019
	Lawson Tickell	Seahawk	05/05/2019
	Simona Latimer	Yorkshire	12/05/2019
	James Roberts	Wolds	12/05/2019
	Jason Barton	Surrey Hills	21/05/2019
Silver Duration			
	Christopher Booth	Cranwell	12/05/2019
	Nicola Beretta	Seahawk (Talgarth)	26/03/2019
	Peter Gill	Black Mountains	03/05/2019
	Martyn Oliver	Lasham	13/04/2019
	Robert Symons	Shalbourne	12/05/2019
	Terry Dunford	Lasham	21/05/2019
	Daniel Weston	Heron (The Park)	21/05/2019
	Stephen Kingham	London	25/05/2019
	James Roberts	Wolds	12/05/2019
Silver Height			
	Nikolas Merveldt	Booker (Lleweni Parc)	26/03/2019
	Colm Wickham	SGU	30/03/2019
	Russell Walsh	Burn	12/04/2019
	Richard Skuse	Dorset	20/04/2019
	Paul Merridan	Lasham	22/04/2019
	Benjamin Payne	Bristol & Glos	04/05/2019
	Robin Sutton	Lasham	05/05/2019
	Theodore Nellis	Bannerdown	13/04/2019
	Thomas O'Connell	Southdown	06/05/2019
	Harry Bloxham	Bristol & Glos	21/06/2018
	Chia-Man Hung	Bicester	15/07/2018
	Frank Friend	North Wales (Lleweni Parc)	30/05/2019
	David Morgan	London	12/05/2019
	Nicolas Cosmos	East Sussex	05/05/2019
	Martin Capps	South Wales	12/05/2019
	Lawson Tickell	Seahawk	05/05/2019
	Jonathan Edge	Oxford	12/05/2019
	James Roberts	Wolds	12/05/2019
	Christopher Welch	Lasham	21/05/2019
100k Diploma Part 1			
	Simon Harding	Kent (Lasham)	30/04/2019
	Jeffrey Gale	Stratford On Avon	12/05/2019
	Simon Stannard	Derby & Lancs	16/05/2019
	David Morgan	London	12/05/2019
	Joshua Rees	Chilterns	12/05/2019
	Philip Challans	Stratford On Avon (Sutton Bank)	21/05/2019
100k Diploma Part 2			
	Jeffrey Gale	Stratford On Avon	12/05/2019

Cross Country Endorsement

Barnaby Wainwright	Portsmouth/Seahawk	18/04/2019
John Borland	Devon & Somerset	18/04/2019
Robin Sutton	Lasham	17/04/2019
Paul Capitain	Nene Valley	14/04/2019
Peter Gill	Black Mountains	26/04/2019
Thomas Stepleton	London	21/04/2019
Tiago Oliveira	Staffordshire	20/04/2019
Mark Clayton	Staffordshire	20/04/2019
Allan Wales	Dumfries & District	22/04/2019
John Connor	Mendip	27/04/2019
William Walker	Herefordshire	21/04/2019
Gilad Myerson	London	28/04/2019
Hans Ostervall	Lasham	18/04/2019
Daniel Werf	Cotswold	21/04/2019
Christopher Godding	Cotswold	04/05/2019
Paul Roberts	Lasham	01/05/2019
Nicholas Squirrel	Lasham	01/05/2019
Marc Galler	Bicester	12/05/2019
Philip Harvey	Buckminster	14/05/2019
Paul Waghorne	Banbury	14/05/2019
Alasdair Mackenzie	Deeside	26/05/2019
Anthony Foord	Southdown	15/05/2019
Harry Bloxham	Bristol & Glos	10/05/2019
Edward Smith	Essex & Suffolk	15/05/2019
Matthew Beckett	Shalbourne	12/05/2019
Julius Carter	Essex & Suffolk	18/05/2019
Simon Ducker	Banbury	14/05/2019
Mateusz Borkowski	Lasham	22/05/2019
William Prince	Bath, Wilts & N Dorset	20/05/2019
John Poley	Cambridge	10/05/2019
Nigel Blatchford	Kent	22/05/2019

INSTRUCTOR RATINGS

Basic

Kristina Samuels	Trent Valley	18/04/2019
Alan Gate	Nene Valley	18/04/2019
Michael Worthington	Kent	10/05/2019
Edmund Hellawell	Cambridge	10/05/2019
David Walsh	Gliding Centre	10/05/2019
Mark Wakem	Midland	10/05/2019
William Veitch	Buckminster	28/05/2019
Richard Roberts	Dartmoor	06/06/2019
Joe Middleton	East Sussex	06/06/2019
Roger Green	Dartmoor	06/06/2019

Assistant

Samuel Prin	Wyvern	03/05/2019
Kevin Burns	Lasham	09/05/2019
David Plumb	Trent Valley	20/05/2019

Full

Alan McNamara	Bicester	20/05/2019
Johannes Brouwer	Chilterns	06/06/2019
Paul Field	Booker	03/05/2019
Matthew Page	Cotswold	17/05/2019
Peter Hibbard	Anglia	17/05/2019

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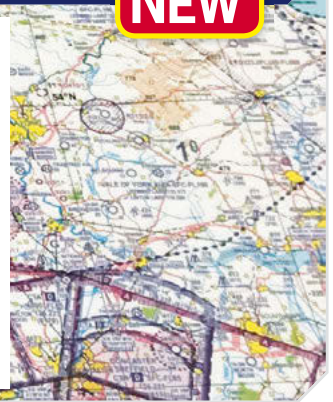
Chart	Edition	Release date	Next edition date
1:500,000 series			
1:500,000 Southern England & Wales	44	29/03/2018	
1:500,000 Northern England & Northern Ireland	42	25/04/2019	
1:500,000 Scotland	33	20/06/2019	
1:250,000 series			
1:250,000 Sheet 1 Northern Scotland West	10	16/08/2018	13/08/2020
1:250,000 Sheet 2 Northern Scotland East	10	19/07/2018	16/07/2020
1:250,000 Sheet 3 Northern Ireland	10	20/07/2017	12/09/2019
1:250,000 Sheet 4 The Borders	11	21/06/2018	18/06/2020
1:250,000 Sheet 5 Central England & Wales	12	22/06/2017	15/08/2019
1:250,000 Sheet 6 England East	13	25/05/2017	18/07/2019
1:250,000 Sheet 7 The West & South Wales	11	17/08/2017	10/10/2019
1:250,000 Sheet 8 England South	23	23/05/2019	

Note: Charts in bold are new for 2019

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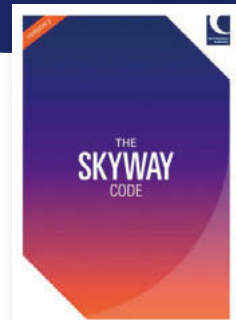
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Includes:

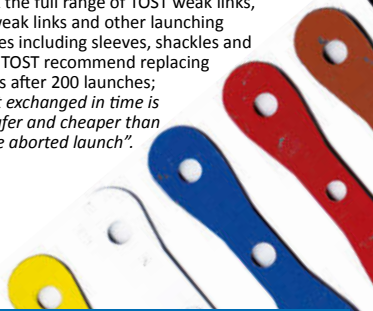
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