Flightlines



Inside this edition;

Fuel Tank Security
Undeserved Reputation Part 3
Aerobatics Performed by
early 20th Century Aircraft







2 Photo's by Philip Bowes taken at the Portlaoise Scale Day.

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On the Cover: Now that's what I call an engine! The Valach 800cc fitted to the 120kg PT-17 Stearman of Frans Tanghe seen at La Ferte Alais.

The views expressed within are those of the individual contributors, and not necessarily those of the MACI Committee.

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Editorial

Have you ever stood back and looked at how much this wonderful sport of ours affects your life? I'm afraid I did, and realised that I may need some serious help! After recently purchasing yet another two planes to add to my hanger, one of which requires an

enormous amount of restoration, I decided to do a quick inventory of my collection....what a mistake.

It turns out that my collection includes seventeen fixed wing aircraft and, astonishingly for me, five helicopters. Do I fly all of these models regularly?...well, no. There tends to be a core of only three or four models that regularly take to the sky.

So, where to go from here? Well, logic dictates that some of these models should go to new homes where they would get the use for which they were designed. But that means choosing some of them to let go. That's like picking some of the children to sell....oh well, lets have a look to see what can go, but hang on, what's that on the MACI web-site buy and sell page, that looks like a real bargain......oh heavens above, here we go again.....help.

Not the best Summer again this year, but not too bad from a flying point of view with most events being run on schedule and only few postponements. Let's look forward to an extended flying season well into the Autumn.

I would like to take this opportunity to thank Eamonn Keenan for his contributions to Flightlines this year. His articles on the Bee Gee and 20th Century Aerobatics in particular have added greatly to the content and have received much positive feedback.

Congratulations to the Irish Aerobatic team for their very creditable 10th position, their highest ever, at the recent World Championships, a fine achievement.

Safe Flying

Chris Clarke

Aerobatics' Performed by Early 20th Century Aircraft - Part 3

In part 2 of this article I referred to the French flyer Adolphe Pégoud's parachute jump from his Blériot Monoplane. A reader asked what was his ultimate fate, and what became of the Bleriot when he jumped.

A footnote in 'Flying Fury' an account of five years in the Royal Flying Corps by James McCudden V.C. provided the answer to both questions. The Blériot "came down by itself and landed in a hay-rick. M. Pégoud was killed in the French Service during an air fight in 1915.

The Wright Brothers with their flyer 1, took to the air on 17th December 1903 and achieved the first powered, sustained, controlled flights in a heavier-than-air machine. By 1908 Glenn Curtiss, also an American, was with the Wright's, at the leading edge of aeronautical development with his June Bug design which pioneered an entirely new system of interconnecting triangular ailerons set in frames at the wingtips. The aileron system was much easier to operate than wing-warping and, more importantly, it permitted stronger, more rigid wing construction which in turn allowed the aircraft to achieve significantly greater speeds than were possible with the wing-warp designs.

In France, interest in flying was galvanised when Louis Blériot flew from France across the English Channel on 25th July 1909, and pioneers such as Gabriel and Charles Voisin, Henri Farman and daring pilots such as Hubert Latham and Eugéne Lefebvre gave the first aerial exhibitions of what would later be characterised as 'aerobatics'.

American pilots conscious of these demonstrations of 'aerobatics' began thinking up more exciting feats to capture their audiences interest and acclaim. Walter Brookins was among the first to start pulling in the crowds with his special dives and steep turns in 1910. Daredevils such as Ralph Johnson and Arch Hoxsey, flying Wright Brother's machines and Charles K Hamilton with Glen Curtiss machine, vied to out-perform one another. In 1911, probably the greatest daredevil of them all joined the Curtis Team, Lincoln Beachey. More about him later.

By 1911, great strides were being made in France with new models such as the Maurane Saulnier, Deperdussin and Nieuport, which now began to leave the rest of the world standing. The British, later in joining the lists, did not produce a truly successful home grown design until A. V. Roe's neat little triplane of 1909.

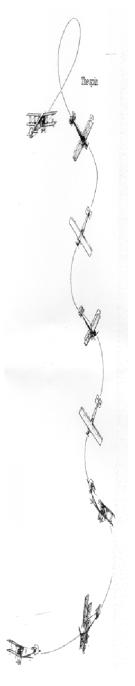
The Spin

It was the early Avro biplanes that the first successful recoveries from inadvertent spins were recorded. The term 'spin' 'spinning nose dive' did not come into general use until World War 1, se pre 1914 terminology is rather vague and generally speaks of such occurrences as a 'spiral dive' as distinct from the 'spiral descent' or 'spiral glide' which a proficient aviator might use as an approach to land in those days.

A certain Lt. W. Parke, RN, in 1912, fell into a lefthand spin in his Avro CT Cabin biplane during the military trials on Salisbury Plains. He managed to recover and most importantly, recorded his recovery actions. Here is an extract from the eyewitness account which was published in FLIGHT under the heading 'PARKE'S DIVE'. "....he drew the elevator lever hard back against his chest, and put the rudder hard over to the left, (note he was already in a left hand spin!), with his foot so as to turn the machine inwards, this latter being the principal of action that is accepted as proper in cases of incipient side-slip and therefore naturally tried in an emergency such as this.....It was his recognition of the predominating influence of the spiral motion, as distinct from the dive, that caused him to EASE OFF THE RUDDER AND FINALLY PUSH IT HARD OVER TO THE RIGHT, (my emphasis), (i.e. to turn the machine outwards from the spiral), as a last resort, when about 50 ft. from the ground...... Instantly, but without any jerkiness, the machine straightened out, came at once under control and without sinking appreciably, flew off in perfect attitude."

Strangely enough the life saving technique discovered by Parke remained a curiosity which seemed to be known only to a very few, and never featured in such flying manuals as were written during the years preceding World War 1.

Parke himself tragically died in a crash soon afterwards due to the age old predicament of attempting a turn at low altitude with a failing engine, he was then unable personally to spread the gospel that might have saved so many lives.

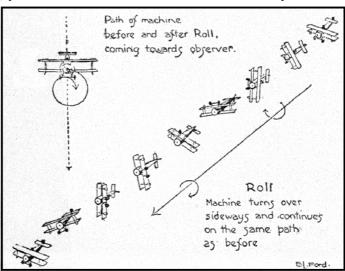


A check in my copy of 'Practical Flying' (published 1918* refers to a 'spinning nose dive' and includes advice to the pilot on how to recover from it. It is clear that Lt. Parkes' observations re his unintentional spin and subsequent recovery in 1912, had been understood and adopted. The lessons learned through aerial combat during World War 1 would have consolidated the recovery technique from a spin, intentional or otherwise.

A tail spin, sometimes performed unintentionally by inexperienced pilots, is another stunt practised by skilled aviators. Sometimes it is achieved in conjunction wit a nose dive, in which case the evolution goes by the name of the spinning nose dive or corkscrew spiral. What happens in this case is that the pilot stalls his machine, pulls back the control lever towards him and fully back. He

does this with the engine off, and then rudders in the direction in which he desires to spin. He can get out of the spin, if he has sufficient hight, by placing the controls-rudder and stick-central. whereupon the machine will take on a nose dive, when the engine can be restarted and the

flight continued



The various positions in a sideways loop or roll.

in the ordinary manner. Pupils who find themselves in a spin unintentionally must remember this. It is generally found that a pupil will get into a spinning nose dive through making a faulty spiral on certain types of machine on which the area of the stabilising tail fin is too small.

While I have concentrated on the aerobatic activities of early 20th Century aircraft, it is worth mentioning that a copy of Neil Williams book 'Aerobatics' should be in all modellers library. It is packed with detailed information on the whole spectrum of aerobatics and how to perform them in a wide variety of aircraft including, the Stamp, Zlin, Pitts and the Yak. Accompanying the account are very detailed diagrams of all the aerobatic manoeuvres one may care to contemplate.

To conclude this excursion into 20th Century aerobatics, here is a glimpse of the career of Lincoln Beachey, who many consider to be the greatest exponent of aerobatics prior to the First World War.

Lincoln Beachey

Within a month of Louis Bleriot's triumphant flight across the Channel, the ancient French city of Reims staged a 'Grande Semaine d'Aviation' from 22nd to 28th August 1909 - the worlds' first grand scale Aviation Meeting.

With 200.00 francs on offer as prize money, practically everyone in the European aviation community was either flying or spectating. There were prizes for passenger flights, altitude, speed and endurance and the high spot of the week was the eagerly awaited Coupe Internationale d'Aviation for the big speed race. A magnificent silver trophy had been donated in honour of the occasion by the flamboyant James Gordon Bennett, publisher of the Paris New York Herald, already a liberal patron of aviation and of yachting, automobile and balloon contest. (Heading South from Killcullen towards Athy in Co. Kildare, one can see a fine commemorative roadside structure marking the circuit where the Gordon Bennett race for cars was contested).

Among the original field of 38 contestants, (though not all of them started), were five biplane types, (Breguet, Curtis, Farman, Vousin and Wright), and five monoplane types, (Antoinette, REP and Bleriot's XI, XII and XIII).

Curtis, with an average speed of 47 mph , snatched the trophy from Bleriot who finished in second place.

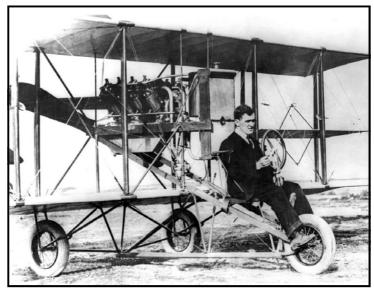
The importance of the Reims meeting can scarcely be exaggerated. The aircraft on view there represented the very latest in technological achievement both in airframe and power-plant, and no less than six different types were for sale, with prices varying between 10,000 and 30,000 francs. All at once the frontiers of mechanical flight were thrown wide open. Records were made one day and broken the next. Aviation as a sport and entertainment had well and truly arrived.

The Wrights and Curtis, returning home to America, realised that there was a vital source of income to be exploited, and wisely set about training an exhibition team.

A stunt has been defined as something which is difficult to do and not worth doing when it is done. Lincoln Beachey, who started out barnstorming with balloons and dirigibles, was a stunt flyer par excellence. He probably flew more shows in 1911/12 in his Curtis machine than any other pilot in America. Always flamboyant, he would customarily fly his routines attired in an expensively tailored business suit with a high studded collar, a 2 carat diamond stickpin in his tie, and a chequered golfing cap, worn backwards to keep it from flying away, and always seemed to have a girl in every town.

At the close of his act, Beachey would start his 'death dip' from 5000ft with the motor cut and at the last moment pull out so close to the ground that spectators rose to their feet in horror. Sometimes he would allow the aircraft to straighten out by itself, both arms flung wide as he passed the grandstand. His hair-raising low passes and short landings were known to make people swoon; he had the knack of flying in and out of the tiniest landing strips, zipping underneath telegraph wires and the branches of trees.

It was Beachey who in 1911, flew over Niagara Falls and underneath the nearby suspension bridge in front of 150,000 spectators. He was game for anything so long as it would keep the public rolling in. Of course, the greater the show put on by any individual pilot, the harder it was for others to satisfy the crowds, and there were far too many fatalities caused by pilots pushing themselves and their aeroplanes beyond their limits. (That splendid fellow "The Great Waldo Pepper" captures the spirit of these great aerial extravaganza's).



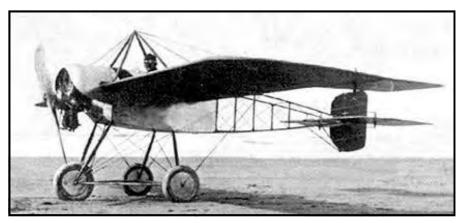
Lincoln Beachey in his business suit.

More and more feats had come to be expected - and attempted - and Beachey in particular as the greatest stunter of them all, found himself blamed for the mounting toll of deaths. Some newspapers cynically referred to 'pulling a Beachey' when there was a fatal accident. Horribly depressed by this, and the death of his friend and fellow team member Eugene Ely and the accusations of Ely's distraught widow, Beachey decided in 1912 that it was time to quit. In fact his retirement was to last less than a year; but in 1912/13 a year was a long time in aviation terms

During 1913 he re-appeared and got Glen Curtis to design a neat little biplane based on the standard Curtis biplane, but smaller and with a powerful 90/100hp Curtis OX engine, specially braced and nearly twice as strong as the Curtis D Headless model. On the 25th November 1913 he became the first to loop - the - loop in America. Perfecting a new repertoire of sensations to offer his avid public, he now set off on a second career as America's foremost exhibition pilot; within a year he was to become a legend among aviators.

At the beginning of 1914, Beachey got together with designer Warren Eaton and mechanics Art Mix and Al Hofer to construct what was probably the best high performance yet built in the USA, The famous Beachey Little Looper. It was built for quick take offs, fast climbing and speeds up to 85mph and subsequently he became the first American to fly inverted. He was also perfecting aileron rolls, (slow rolls). As king of the loopers, Beachey reigned supreme. By the end of 1914 it was reckoned that he had looped-the-loop 1,000 times before 17 million people in 126 cities. He charged by the loop, 500 dollars for the first and 200 dollars for each subsequent loop. During the busy year he became a very rich young man indeed, frequently earning up to 4,000 dollars a week. Before the year was out he had thee distinction of being the first pilot to perform an outside loop. During 1914 he perfected another extraordinary manoeuvre which was described as the TRIPPLE REVERSE, starting with a normal loop, going into a downward outside loop, and then back to horizontal for another normal loop again.

Meanwhile, Beachey and Eaton busied themselves with a new aircraft due to be unveiled in February 1915. When it was rolled out for preliminary tests, it created quite a stir, for it proved to be a sleek, racy-looking monoplane of exceedingly advanced design with tricycle undercarriage. On Sunday 14th March 1915 with the sun shining brightly, a crowd of 50,000 turned out to see Beachey display in his new machine; instead they witnessed the last tragic flight of a great performer.



The Beachey / Eaton Monoplane

After climbing to 5-6,000ft and throwing several graceful, effortless looking loops, he started with his S-dive over San Francisco Bay. All went well until he pulled down from inverted into the second half-loop, when suddenly the monoplane went into a screaming dive in which it hit a speed approaching 200mph according to estimates made at the ensuing investigation. The Vne, (velocity never to be exceeded), of the aircraft was 103 mph, and Beachey had evidently underestimated the rate of acceleration of his slippery new monoplane. He then made the fatal mistake of over-stressing the airframe by hauling back on the stick to try to pull out of the dive, and there was an al mighty crack as both the left and right wings snapped and folded upward around the fuselage. A plume of water rose as the stricken aircraft hit the Bay and was swallowed up immediately. As Beachey's body was raised and taken ashore, the crowd watched bare-headed and in stunned silence. And even to this day there are those who quietly honour his memory on the anniversary of the event by casting a wreath into the waters where he died. "The greatest aviator of them all" in the words of Orville Wright.

Eamonn Keenan

Sources; Flight Fantastic - Annette Carson

Flying Fury - James McCudden VC Practical Flying - W. Bracker

Aviation, the Pioneer Years - B. Mackworth-Praed



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Fuel Tank Security

I would like to pass on my own way of securing my fuel tanks. I find it



Fuel tank secured

very helpful and have had no throttle cuts due to a moving fuel tank. I glue a piece of hardwood across the fuselage behind the fuel tank.

I then get a piece of threaded bar cut to length and attach a clevis clip to the threaded end, which I then connect to the back of the fuel tank and use a piece of fuel tube to keep the

clevis clip closed. I then get a spare servo arm and attach connector to it. slide the bar through the connector and the secure servo arm to the hard wood. Then tighten the connector screw, the tank is now secure and held well in place with no fear of the tank moving.



Edge 540 just after mounting OS 91 four stroke engine.



Stuart with Edge 540



How I store my planes - Space Walker 2

Stuart Batt

Undeserved Reputation - Part 3

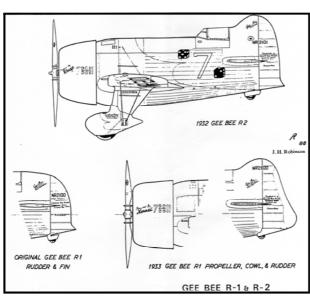
After the 1932 races, the two Super Sportsters were returned to the hangar in Springfield. One problem discussed extensively, post race, was the "floating" of the aircraft on landing. This resulted in a new wing for the R2 which would incorporate a newly designed two piece flap, and an increase in wing area from 100sq. ft. to 132sq. ft. Other refinements incorporated included a revised rudder, (more area), and the wasp engine from the R-1 was transferred to the R-2.

The proving flight was very successful and the flaps cut the landing speed from over 100mph to about 65mph.

The work on the two racers kept the Gee Bee workshops busy and the design and engineering team were busy designing a new series of aeroplane called the 'C' series.

The new models were to be low wing cabin monoplanes, built in three sizes, and were designated C-4, C-6 and the C-8. The numbers signified the number of occupants each would carry.

The Granville Co. had become famous for their record breaking racing aeroplanes, but the Co. felt that to expand their business, passenger carrying aeroplanes was where the future lay. Financial backing was sought and money



was advance from a New York consortium during 1932, allowed work to begin with the C-8. After \$15,000 had been spent on the nearly completed structure of the C-8, the blow fell. which heralded the end of the series, and the Gee Bee C. President Roosevelt closed the banks, which dried up the Company's money completely. Work on the C-8 ceased and it was the end of the 'C' series project.

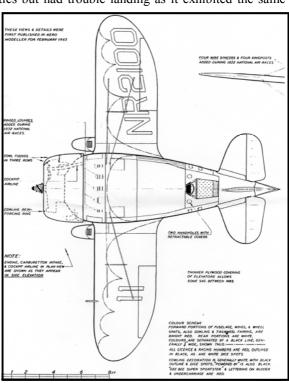
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The year 1933 had been a rough year for the Granville Company. Sadly, the R-1 and R-2 were both lost in accidents and parts of the two aircraft were combined to create a third racer which showed a great deal of promise. The new racer was called 'The Long Tail Racer', and incorporated a lengthened fuselage, (about 18" aft of the cockpit), and an increase in the fin and rudder area.

Ray Minor, an experienced racing pilot and contestant in the 1933 Thompson Trophy Race, was employed to test fly the Longtail. He was full of praise for its handling qualities but had trouble landing as it exhibited the same

'floating' as the R-1 had on landing. On his second flight he made a smoother landing but was travelling too fast and used up too much runway and ended up in a drainage ditch at the edge of the field. Both wing tips were wrecked and the front end was heavily damaged as was the propeller and engine.

The accident and drying up of finance for the 'C' series, ended the line of touring and racing aircraft designed by the Granville Co. With the depression in America now at its worst, all of the Gee Bee assets were auctioned off and dispersed; a sad end for a company which produced such legendary aircraft.



Eamonn Keenan

THE FEENEY FILES

Contact!

READER INPUT WITH GERARD FEENEY

Graham Dwyer has been in touch regarding my scribbling in the June 2011 issue of 'Flight Lines.' I wonder what others think?

"Dear Gerard,

I hope you don't mind me taking up your invitation to provide feedback, but it is with great concern I read your recent article in Flight Lines.

Personally, I tend to disregard any writing on such a specialist topic that includes personal family photos, holiday reports, or personal problems. But one thing grabbed my attention and alarm – where you mentioned non-MACI (presumably non-insured) friends of yours who are flying.

This to me sounds incredibly dangerous, as they would not be bound by any recognised safety codes. I don't know where these people are flying, but I hope they are far away from our transmitters, far away from members of the public, and remote from the obvious possibility of bringing the hobby/sport into disrepute via dangerous practices or incidents.

I hope that, as a member of MACI, you would encourage anyone you know flying uninsured to join a local club that is MACI-affiliated and to fly safely.

If you are looking for interest, visit some flying fields on their Club Days and meet the members. Anecdotal evidence would suggest some very interesting things are happening all the time.

Perhaps a Blog would be a more appropriate forum for your life writings, which I would follow with interest. But probably only the parts that involve aeroplanes!

I wish you all the best with your unbuilt projects. I would look forward to seeing any reviews of these kits, or illustrations of problems encountered.

My biggest (flying-related!) problem at present is deciding if I should put petrol engines in my F7F 'Tigercat' or play it safe and go electric!

Kindest regards,

Graham Dwyer (IRL 3543)"

Thanks for your input, Graham.

I have never actually 'Blogged' on-line, as I find it a somewhat tedious activity, and I admit I never read others' Web Blogs — on any subject. I prefer writing articles for 'hard-copy' publication. However, I will keep the Blog option in mind.

I wish I could get more feedback to know if your aversion to occasional non-aeromodelling content is shared by the entire MACI membership. Interestingly, in the past, I have been told by another MACI member that my stuff is 'the only thing worth reading.' So, it's a 50/50 split so far on the limited feedback I've got.

I have always suggested to non-MACI R/C fliers that they join the MACI and I have taught safe flying practices to those people I learned to fly in the past. Unfortunately, all have disappeared now and I don't know if they ever joined up. One can certainly advise people what to do in terms MACI membership and good flying habits; whether they follow that advice is another matter entirely.

My most consistent non-MACI R/C flying contact is a very skilled, accomplished and (so far) safe flier. As yet he has chosen not to join MACI despite my 'party-line' on the matter.

Unfortunately, as I don't (so far) drive a motor-vehicle, I am unable to easily get to the Club Days. But, I will gladly highlight club reps' reports of their activities if said people care to publicise what they get up to.

Thanks for the good wishes regarding my unbuilt projects. I'm sad to say that their 'materialisation' will not happen anytime soon! But, if and when I ever get them built, I would write about 'em – assuming I am still key-tapping, of course.

Best of luck with the Tigercat – with whatever powerplants are chosen. It looks a most impressive machine and I'd welcome some flying shots eventually.



Feline fine: Graham Dwyer's slinky Tigercat will be a spectacular sight in the air when its powerplants are eventually decided upon.

Alabama long-time R/C modeller and non-MACI member John P. Roberts had the following to say:

"I just read your article on the MACI Flight Lines Web-page and I find myself in somewhat the same fix that you are: Many plans and kits that have been acquired and put back to build later.

Here it really is 'later' and I am 88 years old and have not the gumption nor energy to go ahead and start building, even if my eyes are up to it. I started a rubber-powered Heinkel 'HE-112' a few years ago and got to the covering stage and lost interest in it because the kit provided no way to replace the rubber band after it was covered. Even the nose-hole is too small for the hook on the prop shaft to go through. I should have re-designed that part before building it.

I can't stand for any length of time nor walk very far and there is no suitable local flying site. What is the use of building a model if there is no place to fly it?

I even have a couple of ship model kits that I can't get up the energy to start. One is the plank-on-bulkhead model of a Spanish Galleon and the other is a miniature model of 'Old Ironsides' – the old warship, 'The Constitution.' It would be only about eight- or ten-inches long if completed."

I feel your modelling pain, John! It's so annoying having sundry projects in such close proximity, yet not being able to get to grips with them for one reason or another. As for the lack of a convenient flying site, at least I am in a better position (literally) here. The neighbour's field across the road serves as my 'operational base' most of the time. I sincerely hope that you can finish some models and/or get a bit of flying action ASAP.

It's a short submission this time. Any comments to: feeneyzone@eircom.net

Gerard Feeney

CONTROLLING DRAG

On a scale airplane, as control surfaces are moved off neutral, they do not deflect the air as most people think, but they change the airfoil's camber, thereby changing the lift coefficient and unfortu-nately, the induced drag. If a plane has any warps, most modelers just offset the appro-priate control surface. This causes induced trim drag, so it's much better to remove the warps. Similarly, if the plane is not lat-erally balanced (one wing is heavy), it will require aileron and rudder trim to compen-sate, and, of course, this means unwanted drag.

A very major source of drag comes from having an incorrect center of gravity-usu-ally too nose-heavy. A nose-heavy plane has to carry up-elevator trim to maintain longitudinal stability. This means that the stabilizer is lifting downward, and that cre-ates some induced trim drag. But what's worse is that the wing must now develop even more lift to maintain level flight— incurring even more drag! A little longitudi-nal stability is desirable for comfortable fly-ing, but most kits and plans are highly over-stabilized.

A bunch of extra advantages come with having a correct CG location. The amount of elevator throw necessary for any maneuver will decrease, and that will mean less control drag. There will be virtu-ally no need for downthrust, which is an inept attempt to "fix" an over-stabilized aircraft's tendency to nose up as power is increased.

Another source of induced drag comes from trying to convince the wing to roll. Every method works by differentially changing the lift of the wing panels. Standard ailerons deflect to increase the camber (and lift) on one panel and decrease it on the other. Of course, the change in lift also causes a change in induced drag. The problem is that the drag force creates a yaw in the opposite direction to the roll; this is known as "adverse yaw." Imagine a right roll, in which the right wing aileron goes up (decreasing lift and drag) and the left wing aileron goes down (increasing lift and drag), producing a right roll but a left yaw.

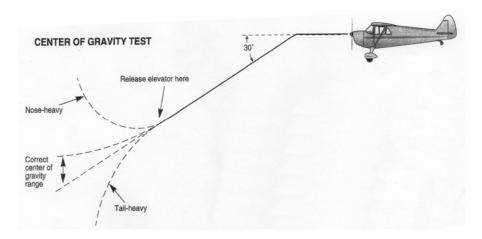
If the plane is flying fast and/or has a long fuselage or a large fin, the effect is minimal. But for a slow flying plane with large wings and a short-coupled fuselage, this adverse yaw can be strong enough to turn it in the wrong direction! Not only that, the yaw also swings the fuselage out of the flight path, causing a huge increase in drag. A vast amount of effort has gone into trying to tame this demon—using tricks such as dif-ferential aileron throw; aileron/rudder cou-pling; specially shaped ailerons that put out a drag-increasing "foot" on the up-going motion; and various spoilers and yaw flaps.

Test your plane for correct CG using the following method.....

Fly at half throttle and adjust the eleva-tor trim until the plane can maintain hands-off level flight. Check this by making sev-eral passes without changing the throttle. You should be flying at an altitude of 100 to 150 feet.

When the plane is nearing center stage, gently push it into a 30-degree dive, and hold it until the air speed has increased noticeably. At this point, take your hand off the stick and observe what happens.

If the plane pulls up sharply, it's very nose-heavy. If it continues in the dive or pulls up slightly, its CG is just right. If it tries to tuck under, it's tail-heavy.



Eamonn Keenan.

Original article by Keith Shaw taken from Model Airplane News, (www.modelairplanenews.com) February 1996, reproduced with their kind permission.

Heli F3N 3rd Round

The Cork Model Aero Club (CMAC) were set to host the 3rd round of the Heli F3N competition at their site in Brinny, Cork on Saturday the 11th of June. The weather was better than anyone could have hoped for with a warm sun, clear skies and no wind (I'm sure there were a few red faces the following day!).

There was a good entry level with 4 pilots competing in Novice and 8 pilots in F3N.

After a short delay organising judges the Novice Set Manoeuvres got off to a start with 3 of the 4 pilots entering their first competition. The F3N Set Manoeuvres quickly followed with all pilots putting in good performances and there were noticeable improvements, showing that the pilots are starting to get to grip with the manoeuvres with a lot of the higher K factors being flown. Andy Campbell was unfortunate to have a boom support come loose while flying which forced him to cut his flight short and land his heli.



F3N 1st place: - Diarmuid O'Mahony presenting prize to William Gaule

A break was then called for as the smell from the barbeque was starting to make everyone hungry. Sean and Jamie Hourigan did an excellent job cooking some very tasty sausages, burgers and pork chops, they even had fried eggs!

Once everyone was fed and the scores tallied it was time for the Freestyle rounds to begin. This was where we were going to have the only casualty of the day with Joe Burke suffering tail failure causing the heli to crash



Novice 1st Place - Diarmuid O'Mahony presenting prize to Ronan Lough

Noel Campion gave us all a surprise by flying inverted up, over and behind a bush in front of the patch and going out of site for what seemed like ages to re-appear again still in one piece.

Once all pilots had completed their freestyle round Sean (who had by now finished cooking) got roped into helping out with the score keeping and normalising the results.

I got caught being the prize giver (this was the only way I was ever going to get my hands on any trophy) and duly handed out the prizes. Unfortunately the person organising the prizes (you know who you are) got the Novice and F3N trophies mixed up so there was an embarrassing swapping of trophies later.

This concluded the 3rd round of the Heli F3N and opened the flight line for anyone who wanted to stay on, enjoy the good weather and continue flying.

I would like to thank George Ryan for stepping in as the CD for the day and all our judges for without who we wouldn't have any competition I would also like to thank the CMAC for all the preparation getting the site ready and the support of all the club members for this heli competition especially our grounds keeper Mat Quinn and our chefs Sean and Jamie Hourigan.

Diarmuid O'Mahony

MACI Helicopter Nationals 2011

Not even heavy downpours, high winds and dramatic thunder and lightning could halt proceedings on this action-packed weekend of sport.

After a bright start to the morning, things got underway at 9.30am with the pilots' briefing, followed shortly after by the Compulsory Freestyle for Sportsmen.



Round 1 Saturday on consisted Compulsory Freestyle (Eight Set Manoeuvres). Sets (Novice), Freestyle (Sportsman), Freestyle (Novice), Music Freestyle (Sportsman). Round 2 on the Sunday followed the same sequence of flights with the running order reversed

Noel Campion Winner Sportsman

T w o

sets of judges for the Novice and Sportsman categories facilitated a fast and smooth flow between flights with very little time wasted. Philip Hughes, Philip O¹Brien, Alan Gerety and David Nolan were diligent in their judging duties for Sportsman as were Max Dressel, Barry Kennedy and Andy Cambell for Novice.

One of Saturday's most spectacular displays was Barry Kennedy's flight to music. At the start of his flight, the skies darkened to Armageddon proportions before the sun behind his back lit up his Trex 600LE canopy. Then, in the most spectacular fashion, a bolt of lightning struck right behind his model.

The next display up was also memorable. Is it a bird, is it a plane ... oh no it's George Ryan flying his spanking new Velocity 90 at 200mph across the sky to Queen's 'Don't stop me now', impressing judges and spectators alike.

PJ Browne was on cooking duties for the weekend and did a great job in keeping everyone fed and entertained. However, his duties went above and beyond when he made the ultimate sacrifice by offering up spare parts from his prized Trex 700n.

Other highlights from the weekend included the amazing demos from top pilots John O'Rourke and David Nolan. John, Ireland's answer to Tareq Alsaadi flying his Align 700 nitro assisted by the V-Bar flybarless system ,showed how it was really done down low – at one point during one of his flights his craft came so low that his front skids dug into the ground while his blades took a scalp out of the grass. To everyone's amazement and amusement he kept flying for the rest of the flight as if nothing had happened. David Nolan displayed some amazing skills with his Minature Aircraft heli's every chance he got – and, when he wasn't flying, he was either judging or charging batteries.



Philip O'Brien Winner Scale

Thankfully, the crash count was low on the weekend, but Shane O'Malley showed us all that RC helicopters can actually bounce – as long as you whack them hard enough into the ground. Also, Rodney Kee displayed amazing skills by winning the novice category while not crashing his Align 600 nitro until he had just finished his freestyle on the Sunday.



M a n y thanks to Diarmuid O'Mahony who designed a new F3N scoring system in Excel-It really made totting up the scores quick and easy on both days.

The scale competition was three-horse race. but unfortunately of the none horses were Pegasus and so we didn't get to see them flv. Maybe next vear!

Rodney Kee Winner Novice

Overall, the weekend was a great success, with promising newcomers in both Novice and Sportsman and the standard of flying dramatically improving since the first competition in April this year.

Results

Novice

Pilot	Round 1	Round 2	Result
Rodney Kee	1851	1973	1973
Ronan Lough	1936	1820	1936
Eoghan O'Donoghue	1859	1902	1902
Joe Burke	1846	1729	1846
David Higgins	1791	1842	1842
Shane O'Malley	1544	1364	1544
Kieran Fitzgerald	1510	1476	1510

Sportsman

Pilot	Round 1 Total	Round 2 Total	Result
Noel Campion	2352	3000	3000
William Gaule	2981	2754	2981
Max Dressel	2812	2636	2812
Barry Kennedy	2635	2393	2635
Shane Power	2352	2083	2352
Goerge Ryan	2328	2292	2328
Andy Cambell	2267	2319	2319
Diarmuid O'Mahony	2286	2135	2286

Scale

Pilot	Result
Philip O'Brien	1st
Ritchie Price	2nd
David Higgins	3rd

Noel Campion

LEINSTER SCALE CHAMPIONSHIPS SUNDAY 26th JUNE 2011.

The weather has been less than forgiving for the months of May and June, what's new, and so it was a welcome change when the sun finally made its debut appearance at the Leinster Scale Championships held at Clondouglas, Portlaoise on Sunday the 26th June 2011. Undoubtedly the forecast of something other than showers, occasional sunny spells and more prolonged rain encouraged scale pilots to make the trip to Portlaoise, and so they did with seventeen flyers who arrived on field for the start of the all-important pilot briefing. All were truly welcome.



Pilots get ready for their first flight.

The seventeen scale pilots were divided into their respective classes, four pilots in Novice, ten pilots in Clubman and three pilots in F4C. First off the blocks was Clubman judged by the eminent and venerable Eamonn Keenan and equally worthy Walter Renno. All three rounds were completed on the day, it was a long day, but thoroughly a enjoyable one. Thank Eamonn Walter for doing the necessary and enduring some thirty separate flights from 10am to 6pm. We salute you.

The aircraft types flown in Clubman varied from the military to civilian designs. The military wing of Clubman was represented by an impressive B26 Invader with twin glow engines piloted by Melvyn Inwood and a winning Spitfire piloted by Martin Sweeney. In the civilian Hangar, the type of aircraft flown ranged from a Gypsy Moth, Sam Kirkpatrick, triplet of PC9's, Brian Foran, Kieran McEvoy and Ciaran Elster, Yak 54, Liam Butler and a Stearman by Steve Quigley. Welcome back to Liam Butler who will liven up the competition scene.



Fergus wings it with his old timer (Model by Melvyn Inwood)

The competition in Clubman is more often than not of the gladiator kind, albeit without the severed limbs, but also plain and simple good sport, never taken over seriously, just enough to make it an enjoyable and memorable. The usual challenger for first place, Kieran McEvoy CD, suffered an eye irritation from floating bog dust or other debris, a complaint well reported by another scale pilot who has made it known that repeated glow engine failures are symptomatic not of poor tuning or old methane, but the dreaded floating dust. Seemingly it's everywhere.

In the events, the accolade of first place deservedly went to Martin Sweeney who scored 3297 points, second place to Steve Quigley with 3128 points and third place to Brian Foran with 2944.50 points.

The class of F4C comprised three competitors, Dave O'Flaherty, Paul Byrne and Paul Fetherstonhaugh, and which class as with Clubman were obliged to endure the blustery conditions which prevailed in the morning rounds. This wasn't a problem for Paul Byrne with his gas powered Cap, the aircraft sliced through the stiff breeze, unlike the Cherokee and Beaver of the other two pilots, who found it bit of a struggle with strong blowback on the downwind leg. Paul Byrne topped the chart and deservedly came first, followed by Dave in second place.



Martin Sweeney takes First Prize in Clubman

The Novice class presented some interesting aircraft types, from a Cosmic Wind flown by Graham Dwyer, a Piper Cub in WW2 markings by Philip Bowes, a Pitts Python by Ger Kilbey and a Stearman by Joe O'Sullivan. The Cosmic Wind represented the only electric aircraft in the competition and which stood and endured the pace of ten manoeuvres.

The debate continues around the longevity of li-po or other cell powered aircraft, compared against the power source of glow and petrol powered aircraft. Undoubtedly some diehard members feel the only place for a cell motor is in your washing

machine with your missus at the wheel. This is a bit unfair, and those same be grudgers who are reminded of the reliability and precision of the cell motor are keen to respond with surprising alacrity such words as — "You'd never hear a bleedin Spitfire go like that mate, no smoke, no nothing, nothing at all but a whoosh. Get on with your electric nonsense".

The novice pilots are really not novice, but expert flyers who the nlunge have taken into flying, competition and categorised as such novice pilots for a two year stint and then fast tracked to Clubman. This doesn't augur well for existing Clubman pilots who will be aware some very high scoring advanced novice pilots are coming their way to claim the coveted gold, silver and bronze. The scores tell it all Joe O'Sullivan came in first place with his Stearman achieved the second highest score in the competition at 3256.50 points,



A happy Joe takes First Prize in Novice

Graham Dwyer in second place at 3065.50 points and Ger Kilbey in third place with 3021.50 points.

A special thanks to all pilots who travelled and participated in a great day of scale flying, our CD Mr Kieran McEvoy who organised and ran the event with panache and flair, Judges Eamonn Keenan, Walter Renno, Steve Quigley, Steve Elster and Martin Sweeney, Denis Lowry our excellent scorekeeper, Seamus Foy who expertly cut and prepared the runways, Aoife Elster for her traditional first class burgers, salads and finger food – the BBq aromas wafting the air are always a wonderful magnet for hungry pilots, Mick Murphy for supplies of fresh water, milk, snacks, tea and coffee, Paul Byrne for photography and video work (See our gallery at Laois for some) and to all Club members of Laois MAC who gave a hand. A very big and well earned thank you for another brilliant day.

Clubman

Pilot	Round 1	Round 2	Round 3	Total
1. Martin Sweeney	1521	1641	1656	3297
2. Steve Quigley	1512.5	1574	1553	3128
3. Brian Foran	1324	1418	1526.5	2944.5
4. Steve Elster	1422.5	1331	1510.5	2933
5. Liam Butler	1200.5	1253	1476.5	2729.5
Sam Kirkpatrick	1197	1234.5	1202	2436.5
7. Paul Fetherstonhaugh	1138.5	1183.5	667.5	2322
8. Ciaran Elster	968.5	1114	1028.5	2142.5
9. Melvyn Inwood		1193		1193

F4C

Pilot	Round 1	Round 2	Static	Total
 Paul Byrne 	1614.5	1527.5	1602	4743.5
2. Dave O'Flaherty	761		687	1448
3. Paul Fetherstonhaugh	1211.5		156	1367.5

Novice

Pilot	Round 1	Round 2	Round 3	Total
 Joe O'Sullivan 	1638	1618.5	1567.5	3256.5
2. Graham Dwyer	1550	1495.5	1515.5	3065.5
3. Ger Kilbey	1277	1485	1536.5	3021.5
4. Philip Bowes	804	1266		2070

Paul Fetherstonhaugh

Aerobatic World Championships 2011

The 27th FAI World Championships for Aerobatic Model Aircraft took place in the AMA headquarters in Muncie Indiana. It was attended by 82 fliers from 31 countries There is facilities to run all disciplines of r/c, control line and free flight model flying which included 3 full Aerobatic pattern flight lines with large separation.

The competition was run on 2 tarmac runways and the third grass line was available for practice at all times. They have a purpose built office block and a museum of flight on site also. There is also a privately run model shop on the edge of the site

The first thing that hit you when you arrive in Muncie was the wall of heat which was in the 90's F the whole time we were there. Because of high humidity it actually felt like around 115 degrees every day. We had to drink lots of water and salt and stay in the shade as much as possible. The practice site had cover thankfully and we flew in the early morning and late evening to help us acclimatise.

The official preliminary flying started on Tuesday 26th July and all 3 pilots had a good start but because of the format it is very hard to tell how one is doing until the four prelims are finished, due to flying on 2 different flight lines in front of 4 sets of judges. After these rounds Angus was in 21st overall which got him into the semi finals, Shane just missed out in 32nd place and John was in 51st.

The next day being the rain day and practice day for the 30 pilots in the semis we decided it was time to sample the night life properly for the first time. A good night was had by all I think. Sunday morning Shane did his warm up flight for the judges on line 1 and then the semi finals started at 9am. Angus was up number 6 in the morning and was second last to fly in the afternoon, flying the 'F' schedule in front of two sets of 10 judges on 2 lines. The first ten pilots would go forward to the finals the next day. Thankfully Angus managed to improve his position to 19th overall, which helped us achieve 10th place in the team completion.

The finals which included 2 USA, 2 French, 2 Japanese, 2 Liechtenstein, 1 German and 1 Austrian were held on Monday Aug 1st. The format is two 'F' schedules and two unknown schedules with manoeuvres picked by the finalists the previous night. This is a true test for the pilots. This final ended as one of the closest ever whereby both Christophe Paysant-le-Roux and Onda Tetsuo ended up with 2000 points each, the winner was then decided by which of them did better in the semi finals. Once again Christophe prevailed and was once again crowned World Champion. Onda was 2nd and Andrew Jesky of the USA 3rd. The team prize went to the USA with Japan 2nd and France 3rd.

The Irish team had their highest ever position in 10th place at a World Champs and I wish to thank the pilots and helpers for doing an excellent job. We look forward to the European Championships in France in 2012 and the World Championships in South Africa in 2013.

Paul Houlihan

MODEL AERONAUTICS COUNCIL OF IRELAND

IRISH NATIONAL CHAMPIONSHIPS SCALE

LAOIS MODEL AERO CLUB Clondouglas Portlaoise. (Location map available on MACI website.)

10th and 11th September 2011.

MACI F4C SCALE, MACI CLUBMAN & MACI NOVICE

(And static judging for MACI F4C Scale.)

Registration: 9.00 am. Pilot Briefing: 9.30 am.

CONTEST DIRECTOR: Steve Elster. 086 4061822 ASSISTANT CONTEST DIRECTOR: Kieran McEvoy. 087 2179752

Entry Fee : €20.00

Presentation

As you know, the Irish F3A had a very successful competition at the recent World F3A Championships in Muncie, Indiana. No small part was played by a member of our club, namely Angus Balfour who came 19th out of 82 flyers individually and helped the Irish team to achieve a best ever



placing of 10th out of 31 countries. Angus regularly fly's with us on a Sunday morning and has given great inspiration to the members especially those who do not have a long background in aeromodelling.



To mark his phenomenal success, the club presented Angus with a Mullingar Pewter whiskey goblet which I am sure he will enjoy using ..!!

Bill ThompsonRoyal County Aeromodelling Club





2011 MACI Competition Dates

For the most up-to-date information visit ------WWW.maci.ie

Helicopter

August 6 & 7 Heli Nationals Carron Noel Campion 087 9670668

Gliding

September 17-18 ISR Slope Fly-In Open to all Gliders Mt. Leinster, Wexford Fred@gliderireland.net

For more information visit www.gliderireland.net

Scale

Please Note

All Scale Championships, except the Scale Nationals, will be held on a Saturday. In the event of a large number of competitors or bad weather on the Saturday, then the Sunday will be utilised. Please check with the contact below, or the MACI web-site on the Friday that the competition is going ahead.

September 4 Scale Fly-In Curragh Melvin Inwood 045 433050

September 10/11 Scale Nationals + Control-Line

Paul Fetherstonhaugh 087 1331736

October 9 Scale Fly In Littleton Maurice Walsh 086 8552631

F3A Aerobatic

August 13/14 National Aerobatics Champs (Team Trial) G James 086 8269840

August 20/21 Nats/Other standby date

September 3/4 AAA (Team Trial) Cork MFC N Barrett 021 2475971

September 24/25 Leinster Champs Model County FC Brian Carolan 087 6509848

Other

Au- gust 27/28	All Models	SMFC Fly In All welcome	Clashafree, Bandon, Co Cork Flying Site Coordinates 51 ^o 44' 23.40" N 8 ^o 41' 40.15" W Contact Jackie Kelleher 021 4506757

The next MACI Council meeting will take place on Tuesday September 13th in the Killeshin Hotel, Portlaoise, at 8:00pm.



Irish team participate at Official opening ceremony World F3A Champs



Shane gets some shade from the sweltering sun at the World F3A Champs



Some of the Planes at the International Model Circus in La Ferte Alais - Article in Next Issue.