

EFC NEWS



June/July 2010

Editor's Notes

In this issue I would like to begin by congratulating two of our students on completing their qualifying cross-country. Well done to Robert Menzies and Fraser McKay and good luck when your test date finally arrives.

This issue contains the second part of Alastair and Gordon's US trip and another Safety Matters from Tom Ward, as well as a feature on grass strip operations.

Also in this issue is a profile of Alastair Kennedy, one of our instructors, who as well as his regular role as an instructor with the Club, frequently fills in to cover gaps when other instructors are on holiday. Alastair is a former police officer who learned to fly at White Waltham and joined the club in 1978. For a time he flew a locally based corporate jet. His total time on light aircraft is 2500 hours and he has 800 hours as an instructor. Can you spy Alastair in the two pictures of the C310?

By now you will all be aware that there have been some necessary changes to operations at the Club. Bob now works Fri/Sat/Sun and Jack and Tom man the other four days. This means that Mon to Thurs only two dual slots are available, 10.30 and 13.30, though solo slots are possible. Currently bookings are made either directly or by telephone and confirmed by an instructor. There is a new on-line booking system being trialled at the moment and it is hoped this will be up and running soon.

Member Profile

Name: Alastair Kennedy

Age: 5?

Job: Pilot and flying instructor

Flying Training: I learned to fly in 1978, having been awarded a Royal Air Force Special Flying Award, which consisted of 30 hours flying training at a civilian flying school. The aircraft

used was a Piper Cherokee 140, basically a slightly smaller warrior. The school also had a DH chipmunk, which was used for spin training, as spinning was part of the syllabus in those days. The RAF insisted that a GFT was conducted at the end of the course, which counted as my PPL GFT. By paying for an additional 5 hours training to cover the navigation and cross countries (at £20per/hr) I obtained my PPL (yes it was only 35 hours in those days!!)



How little I knew.....

Joining Edinburgh Flying Club, I was checked out in a Cessna 152 by a youthful AFI called Stuart Hill, who is now rather more qualified, and I slowly accumulated hours.

Eventually a night rating and IMC rating followed until in the mid 1990's I was eligible to attempt to become a flying instructor.

The late John Easson was instrumental in getting me started towards the ATPL exams, which I managed to pass after months of home study. The next step was what was called the Basic Commercial Pilots Licence (BCPL). This was a 15-hour course of flying at Dundee, culminating in a CPL flight test with a CAA Examiner. Somehow I managed to pass this first time.

I was now ready to begin the FI course. I did my training for this at Perth. Some 28 hours flight training, and a lot of ground school over many months, with numerous drives to Perth to be weathered off.

Once more another flight-test with an Examiner, who kindly decided I was suitable to impart my limited knowledge to potential pilots and I became a Flying Instructor.



Back at Edinburgh, Bob in his wisdom, let me loose with real students and I was actually paid to fly!

About a year later I treated myself to a multi engine rating, once more at Perth, where after spending lots more money and yet another flight-test with yet another Examiner, I was the proud holder of a multi engine piston class rating.

Of course there are always hurdles to cross, and with the arrival of JAR FCL there was a bombshell in the small print. If I were not issued with an Instrument rating by June 2002, I would lose my ATPL theory exam credits. Having worked so hard I was not giving them up, so digging deep into the piggy bank and taking all my annual leave/days off due at once I trekked off back to Perth for a month to attempt the dreaded IR.

Back in the Seneca at £300/hr I flogged it up and down the airways to Aberdeen/Glasgow/Edinburgh flying approaches with one or other of the engines simulated failed for about 20 hours. Then it was still possible to sit the IR with 'training as required' and generally about 20 hours saw most people ready for test. Finally the big day with Dai Heather Hayes, and off we went to Glasgow, to be pulled off the first approach because of some airliner closing fast behind, and vectored around for a simultaneous localiser and glide slope capture on the next approach (Hey thanks Glasgow ATC!!!!) before back to Perth for the non precision bits and pieces.

But eventually it was all over and with considerably less money than when I started, by

default I realised I had joined the ranks of those holders of a CPL/IR (frozen ATPL)

And all because I wanted to be a Flying Instructor!

As luck would have it, at that time the Flying Club was sharing premises with the old Edinburgh Air Centre shortly to become Air Charter Scotland. The owner offered me some flying on the Cessna 310's, flying from Glasgow for radio Clyde 'Eye in the Sky' and freight runs from Glasgow to Belfast.

This introduced me to commercial all weather operations and I spent many happy hours flying through wet dark skies to Belfast and back. I even had the pleasure of flying single pilot into Heathrow on an organ transfer flight.

Air Charter was taken over and the new owner offered me a full time job on his Citation jet flying ad hoc charters around Europe, which was a lot of fun but did involve many nights spent in hotel rooms all over Europe.

This experience gained allowed me to move onto a Company owned Hawker 800 based in Edinburgh where I would still be today if it was not for a certain Dutch and Danish consortium buying the Company from under us and mothballing the aircraft.

But, whilst flying the Hawker, I did manage to arrange my ATPL flight-test which I did one very windy afternoon flying several approaches into Prestwick in what my Examiner called 'sporting conditions'.

By sporting he meant the crosswind was in excess of the aircraft limits, but as we were not landing just continually doing go- arounds from DH/MDH it was okay.

So, my redundancy was preceded by the issue of my ATPL licence, well at least I got it.

Ian has asked what was my best flight? Flying a Piper Cub through the Swiss Alps springs to mind, when I learned a lot about mountain flying and saw some spectacular sights. Or maybe, flying over the barren landscapes of Siberia heading into the unknown, or the first time into Heathrow after flying over a brilliantly lit London at night before seeing that famous view of the parallel runways out of the ice covered window.

Worst, well thankfully these only happen in the simulator!

Grass Strip Check Out - Kingsmuir

Now that the summer has arrived a number of members have taken the opportunity to have a check out at the grass strip at Kingsmuir. It seems that a quiet afternoon going round the circuit at the airfield in Fife with no one to bother you is very appealing. The detail usually starts off with a ground briefing regarding the performance of the aircraft on grass, and the techniques for short field landing and take off. This is followed by a short flight to the airfield for a few circuits. For those who would like to try it, read on.

The first thing is to consult a Flight Guide describing the characteristics of the airfield. This will tell you that it is a grass runway, 620m long and is 387' amsl. Next thing to look at is the POH for performance figures to ensure that you can get in. Consulting the PA38 POH and using typical figures for a summer day i.e. temperature 20°C and wind 5kts we find from the landing roll graph that we need about 203m. Add on the performance factors (1.5) for the short dry grass, gives us 305m then the additional safety factor of 1.43 gives a required landing roll of 436m! A margin of 184m. So if you are happy that the performance figures add up, how about actually flying into the airfield and what technique is best? Again refer to the POH. To get in, the POH recommends that the aircraft should be trimmed on initial approach for about 70kts, with a final approach speed of 67kts and flaps fully extended. For a short landing it recommends the use of full flaps and enough power to maintain a safe airspeed. Reduce the airspeed whilst in the flare and touchdown with the stall warner chirping away. To reduce the ground run and maximise the braking, raise the flaps and apply backpressure to the column, doing this puts most of the aircraft weight on the main wheels.

Sometimes determining the wind direction from the overhead can be deceiving. So when on final approach have another look at the windsock to make sure you are not approaching with a tailwind. If it is, then the landing roll would increase to 282m, add on 141m for the short dry grass and 182m for a safety factor, you then require 605m! Always be prepared for a go-around on your first approach.

Now that you are in, can you get out? So it's back to the POH to calculate the required take off run. Using the above temperature and wind velocity, the graph

indicates a take off run of 254m, added to that is the factor of 1.2 for short grass, and the additional safety factor of 1.33 means you need approximately 406m.

For a short field take off it advises to use 1st stage flap, hold the aircraft on the brakes and apply full power, check T&PS, release the brakes and accelerate to 53kts at which point ease back on the control column just sufficient to rotate, hold it and accelerate in ground effect to 70kts then climb away and retract flaps when climbing out. A 5kt tailwind on this airfield under these conditions would require about 578m of runway!

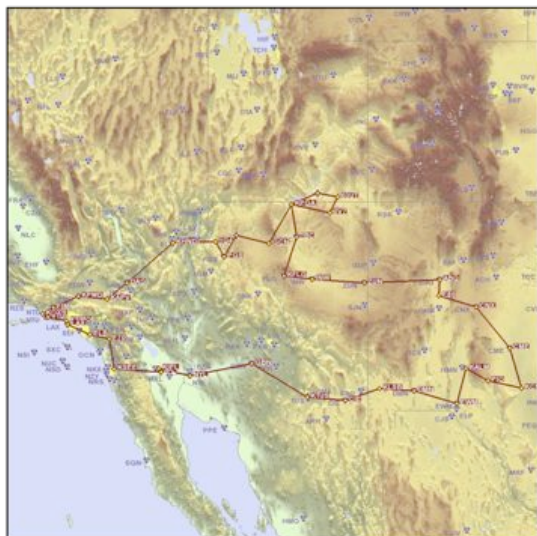
There are a bunch of trees on the climb out from runway 25, and as this may be regarded as an obstacle, it will require a slightly different technique. You now have to think about short field take off with obstacle clearance. As before, lower 1st stage of flap, hold the aircraft with the brakes on and apply full power. Release the brakes and accelerate to 53kts then ease the column back slightly and hold the aircraft in ground effect until you reach the best angle of climb speed which is 61kts then climb past the trees. Once past, lower the nose for the best rate of climb speed, which is 70kts, climb away and raise the flaps.

Just a couple of points - the distances quoted above are for the take off and landing runs and not to the 50' screen height. Also, Flight Guides etc give the runway distances in metres, whilst the POH gives the take off distance in feet!!!

Hey Bloggs! Did you get your metres and feet mixed up again?



Tom Ward



Saturday 18

We got to airport at 7am in heavy rain to find the 'plane back and ready to go but needing fuel. I fuelled while Gordon relearned how to get the briefing and filed a flight plan to Imperial - he is flying this first leg. The rain stopped at 8:30am so we waited until there looked like enough holes in the cloud to climb up and eventually left at 9:45. Gordon climbed to 9500 feet into VFR on top over the cloud. We got to Plaster City and the desert side of the coastal mountains over an almost solid cloud cover where we eventually spotted a hole and descended for the run in to Imperial. He did a normal 45-degree join to right downwind for runway 11 only to find someone in a warbird in the circuit on left base when we were on right base. As the foreigners we gave way and went round again before a rather heavy landing. (Nice to see that Gordon has the same problem as me switching from the AA5). After refuelling and a comfort stop I called for a briefing and to file the flight plan. At least the weather sounds OK for Tucson.

The next leg was mine so we got airborne at 12 noon and headed for the Imperial VOR, Bard then Gila Bend. We started at 5500 feet but climbed to 7500 to avoid turbulence. It was rough over the mountains so up I went to 9500 with 50 miles to run to Tucson.

I was doing the radio and got nice handovers from LA Centre to Albuquerque to Yuma approach then to Tucson. Cleared down first to 8500 then 7500 and finally given a straight in approach for 11L with a 20 mile final. Tucson has a massive runway so kept some power on for a greaser just to annoy Gordon.

We taxied in to Premier where they took over the plane and parked it for us. Premier arranged a car rental for us with the car arriving in less than 10 minutes. Impressive! There was no parking fee with fuel purchase – just like the UK... not! It was the first time ever of having to adjust my watch after a GA flight – Pacific Time to Mountain Time.

Back to hotel we had a look at tomorrow's weather. Not looking good for El Paso or Carlsbad so we may have to reconsider the route in the morning.

Sunday 19

Weather this morning is fine in Tucson but still raining with low cloud at El Paso and eastward. Forecast is for improving conditions later so we decided to go to Lordsburg as planned and then check weather before making a final decision. There was no mechanic at Tucson so unable to get idle speed adjusted – it was 900rpm and really a bit high for comfort for anywhere tight.



Gordon had a look under the cowl and thought he had turned the screw $\frac{1}{4}$ turn but couldn't see any great change in idle speed.



It was my turn to fly again so I went through clearance delivery, ground then tower at Tucson and took off from runway 11L again. Cleared direct on track climbing to 7500 initially but we soon went up to 9500 when Gordon complained about the turbulence.

I routed Cochise, San Simon VOR then direct to Lordsburg. 120nm and, with a stonking tailwind of about 30 knots, only 1 hour.

I landed at Lordsburg a bit short for comfort - virtually on the threshold - and stopped in the first third of the runway. So much for worrying about the airfield altitude of 4000 feet and runway length. Gordon refilled to the top for the next,

longer, leg and any possible diversion then borrowed the loaner car - a 1974 Chrysler Town car - for a look about. The car was a bit of a wreck with separate starter switch hand-wired in, drivers window jammed up, no A/C and generally that "really, really past its best" look. Still not bad for nothing and it did move - all part of the character of Lordsburg and no surprise due to the useful pilot notes on Airnav. We drove up and down the main street with me driving - about a mile in total - then headed round to check out the Shakespeare ghost town a couple of miles to the north. The Guidebook had a note that it was only open a few days a month so we didn't have great hopes of getting in.



A police cruiser appeared in the mirror rapidly followed by "whoop whoop" and flashing lights. Oh dear! I pulled over and got out to a greeting of "What's all the hurry sir?" Apparently 25 mph speed limit in front of school *does* apply on Sunday morning too. I was let off with a stern warning and lots of question as to who owned the car and where I came from / was going to. Gordon thought it was funny and wanted to take pictures but, luckily, didn't.

We headed up to Shakespeare to find gates closed and sign saying it was open on the 2nd Sunday of each month - this is the 3rd. I suggested we have a look from the air on departure but it doesn't look to be a lot to see - leaflet attached to the gates does make it sound interesting though.

We went back to Lordsburg to do the flight planning. I tried filing the flight plan electronically using mobile phone, DUATS and the free Golden Eagle software on my notebook PC. Seemed to work but we'll find out when we try to open it.

Gordon is doing this leg so I started taking some video of the take off and didn't pay too much attention to what he was doing. After we get off Gordon realises he didn't lean for max power despite the elevation of 4278 feet so that, and full fuel, explained the rather leisurely take off! Good thing runway is 6000 feet. We buzz around the ghost town but there's not much to see from the air.

I was doing the radio again so opened the flight plan with Albuquerque radio and asked them for the local Centre frequency. Switching to El Paso I asked for and got VFR flight following. Gordon routed first via the Denning VOR and went up to 9500 then 11500 and finally 12800 to keep us above the nice, white, puffy clouds. [All VFR with greater than 2000 feet horizontal separation from cloud of course.] North of El Paso we were able to drop down from nosebleed altitudes to 7500 before routing up toward Alamogordo to see the White Sands National Monument. El Paso approach gave us a list of the restricted areas that were inactive - considerably lowering our stress levels in not having to keep to the 2-mile wide corridor between them. After being switched to Albuquerque Centre I checked the status of the remaining restricted area with them and got an "inactive" status so asked Gordon to head further west than planned so we could go directly over the national monument area. A few minutes later a rather stern Albuquerque controller pointed out that R2107B was, in fact, active and certain people at the missile base would like us to leave, now! So much for the quips about remembering intercept procedures a few minute earlier. I must have miscopied one of the long lists of inactive areas from El Paso. Anyway Gordon was P1 at this point... Luckily the US air force seems to have Sundays off.

We continued back on the original course to Alamogordo then, after checking twice that the area was not active, routed south of the stunning mountains at 9500 to keep below the still rather thick cloud base. There was no traffic at all at Cavern City airport in Carlsbad despite four huge runways. I made all the calls with no replies and Gordon put us down on 14L with a nice landing. We taxied into the FBO and found... no one. The FBO was shut and, indeed, the whole terminal building deserted but open with radio playing and coffee made. It was the Marie Celeste all over again. At least there were no local law enforcement officers /FBI / FAA waiting for us either. We tied down 75U with chains on the

parking area, called the hotel and then the local taxi service. It turned out the hotel was at the other end of town – 5 miles or so out – so much for my hotel picking skills.



Carlsbad was cold at +3 deg C and a biting 10-knot wind. I thought this area was warm in February but Gordon pointed out that south Texas currently had freezing rain so perhaps the area's weather isn't quite the normal at the moment.

I must call the flying school in the morning to see if FAA has called for us ☺

The weather looks good for tomorrow and probably for the rest of the week. The plan is to do the Caverns in morning then head off to Alexander (203nm) in the afternoon. I'm really looking forward to the big sights – Flagstaff, Monument Valley and the Grand Canyon.

Safety Matters

Emergency Procedures.

**Engine Inoperative Procedures.
Referring to Section 3 of the PA-38-112
POH.**

Engine power loss during takeoff (not airborne).
Sufficient runway remaining:
Throttle Close immediately
Brakes Apply as required

Stop straight ahead.

Insufficient runway remaining:

Throttle	Close immediately
Brakes	Apply as required
Mixture	ICO
Fuel Selector	Off
Master Switch	Off
Magnetos	Off

Maintain directional control and manoeuvre to avoid obstacles.

[Engine power loss during takeoff \(if airborne\)](#)

Sufficient runway remaining:

Airspeed	Maintain above stall
Directional control	Maintain

Land straight ahead

Insufficient runway remaining:

Airspeed	Maintain above stall
Throttle	Close
Mixture	ICO
Fuel selector	Off
Master switch	Off
Magnetos	Off
Flaps	As situation requires
Directional control	Maintain and make only shallow turns to avoid obstacles

If sufficient altitude has been gained to attempt a restart:

Airspeed	Maintain above the stall
Fuel selector	Switch to other tank
Electric fuel pump	On
Mixture	Rich
Carb Heat	On

If power not regained proceed with power off landing.

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