Coaching Ready to Corner... fly...?

We are looking forward to exercising our ability to fly, but beware, as that faculty will have become diminished, warns **David Cockburn**, PCS Head of Training...

espite the rolling out of Covid-19 vaccines, it seems all we can do is to keep looking ahead hopefully to a summer of more enjoyable flying conditions. I expect that even those of us fortunate enough to have received our initial vaccinations will still be subject to all the precautionary measures for some time to come.

Of course, the longer the precautions remain, the less current we are going to be when we eventually are able to take advantage of the relaxation of restrictions. I have given a few words of advice over the past months about the need to take care when we get airborne again, and I do not wish to go over old ground. However, while we wait for the opportunity to practise for ourselves, I recommend that we all have a read through the advice which the CAA and GASCo have made available on their websites.

To back these up, I also recommend reading AAIB reports and CHIRP feedbacks, and strongly advise that every pilot, whether or not they believe themselves to be fit to fly, use the services of a Coach or other Instructor to refresh their skills at the earliest possible opportunity.

Some advice I do wish to repeat is that we should spend some time studying the instructions for our electronic devices and, if possible, practice their use on the ground. There is little point in fitting or carrying a new navigation or collision warning aid if we are not able to interpret it properly.

Once we do go flying again, we will have to concentrate more on the basics, and if we understand and use our equipment properly, we will have more time available to consider possible threats to our safety. However, once we are fortunate enough to be able to fly, we should not experiment in the air unless someone else is in control and looking out!

Coping with winter weather

Yes, it's still winter! Even if the temperature has started to warm up a little, the hazards remain. It's the time of year when long-suffering batteries decide they've finally had enough, and that's very inconvenient if we're trying to take advantage of the only decent forecast for weeks. Even a battery in good condition may well struggle to turn the engine over, and the end of winter is a classic time for dampness to show itself.

Over most of the UK the ground has been soaked badly over the past months. Wet grass and boggy



Above The pilot is so preoccupied with looking at the screen that he hasn't noticed the engine is operating at higher than max permissible speed. Don't get pre-occupied, make sure the basics are sound. ground will play havoc with take-off performance, so do you remember how to calculate the take-off distance required? Perhaps that's something else to brush up on while we are still stuck on the ground. Even if we haven't got a handbook with figures, have a look at the CAA's SafetySense leaflet 7, *Aeroplane Performance* or AIC 127/2006 *Take-off, Climb and Landing Performance of Light Aeroplanes* from the AIS website (Google will bring them up), and you will be surprised at the difference wet grass and soft ground make to your take-off and landing performance over perfect conditions. And taxying on a boggy surface can generate ruts which may remain for the rest of the year, as well as clog up spats – you might want to remove them in muddy conditions.

March is notorious as a windy month, part of this

may well be a consequence of the air warming up and producing convection. Thermals generate more mixing between the surface flow and the gradient wind, which is likely to be stronger anyway. Gusts on the approach can challenge our skills, which are likely to already be reduced by lack of recency, but gusts can also produce taxying accidents, especially with taildraggers. Gusts can also be produced by prop wash, so be considerate of the aircraft behind when using high power for checks (or to get out of a rut – taildraggers beware the risk of nosing over, better to shut down and drag it out!).

In cold weather, birds and small animals can be expected to seek out relatively warm places in which to make nests, or perhaps just to store food. Aircraft, including those in hangars, can provide accommodation for these creatures, which can enter and leave through surprisingly small holes. Evidence of this is often found during routine maintenance, but for most of us, our main protection against potential damage, or even control restriction, is to carry out thorough pre-flight checks, including, I suggest, listening carefully for unusual sounds.

We are not alone!

During the periods of Covid restrictions in which we were able to fly, most of us took whatever opportunities we could to fly, which meant that a considerable number of aircraft were in the air at once. We can expect a similar situation once recreational flying is permitted again.

While I would hope that many of us have taken the opportunity to invest in collision avoidance devices, and to take advantage of the government support to do so, these are not the answer to everything. They can only detect aircraft which are actually announcing their presence electronically, and even those may be hidden in 'blind spots' resulting from, for example, aerial positioning. 'See-and-avoid' has considerable limitations but is still the primary means of providing safety from collision.

An efficient and practical lookout scan is essential, and we must not let our eyes linger inside the cockpit for more than a few seconds at a time. Of course, passengers can contribute, and if possible, should be encouraged to do so, but if they are not used to the environment should not be relied upon.

Looking out constantly is tiring, but if we understand where the most likely threats are, we can concentrate our scan accordingly. For example, if we are following, and flying just outside, the boundary of controlled airspace, other aircraft are likely to be doing the same, so the greatest threat is coming towards us from ahead. If crossing a major line feature, such as a river or motorway, we might expect to meet other pilots following it (keeping it on their left we hope), so left and right are the threat areas. We should of course help ourselves even more by obtaining a radar service if we can, although in the current situation ATC is short of manpower, so may not be able to help. An electronic device, if available, is therefore liable to be more useful than ever.

The greatest concentration of aircraft will be in and around aerodrome traffic patterns. Even strips are likely to be busy, and we cannot guarantee that we will be able to see every aircraft in the circuit, all the time, but the Rules of the Air set out established procedures which should reduce the risk of collision. It is never sensible to cut things short and try to nip in front of others, but this spring it will be even less sensible.

Aircraft fly at different speeds and pilots fly circuits of different dimensions, so we all need to make the right radio calls ourselves and use our ears as well as eyes to keep track of the aircraft in front. Collision warning devices may not be as useful here, though, we can't afford to look inside for more than a second or two. And expect the other pilots to be even more out of practice than you – that aircraft you lost sight of may not now be where it ought to be. If in doubt, we should get out of the circuit and start again.

Give people space, and don't be afraid to goaround when you seem to be getting close to the aircraft ahead; an out-of-practice pilot isn't likely to vacate the runway quickly.

As I said earlier, warning devices can only detect aircraft which are actually announcing their presence electronically. Whether or not we own a collision warning device, if our aircraft is equipped with a transponder, we should make sure it tells others where we are. It should be on, with altitude transmission (Mode C or ALT) all the time we are airborne, unless an air traffic controller has instructed us otherwise. The same applies to all devices which can be detected by others.

Medical declarations

It seems that Covid regulations have restricted the number of Class 1 and Class 2 Certificates which Aviation Medical Examiners have been able to issue. However, private pilots are currently able to fly any non-PART 21 (Annex 1) G-registered aircraft below 5700kg, and with a maximum of four people on board, in UK airspace without a PART-MED certificate if they have made a Medical Declaration to the CAA. Such a Declaration can only be signed if the pilot's health fulfils several conditions, which can be read on the CAA's website (*https://tinyurl.com/1bqpcetp*), which should have been updated by publication date.

Differing standards apply to PART-FCL and UK licences, and one fact which may have slipped people's minds is that such a Declaration is only valid until the pilot's 70th birthday; it must then be renewed every three years.

And finally

As has undoubtedly been mentioned elsewhere in the magazine, the CAA has announced that with effect from 20 May 2021, the UK will revert to the previous rules for VFR flight in Class D airspace. This means that if an aeroplane is cruising below 140kt at or below 3,000ft amsl, or below 1,000ft above ground, whichever is higher, it may be regarded as complying with the VFR minima if it remains clear of cloud, with an inflight visibility of at least 5,000 metres and with the surface in sight. However, we are reminded that these Visual Flight Rules place the responsibility on the pilot to see and avoid other aircraft, regardless of the fact that we have been granted a clearance into or through that airspace.

It is also important to realise that while this alleviation applies in Class D airspace, it does not apply in Class E airspace, where we still need to avoid cloud by 1,000ft vertically and 1,500 metres horizontally.