Civil Aviation Authority

The PPL Review

A review of private and recreational flight training in the UK

Available information, costs, regulatory requirements and associated hurdles

CAP 1216

Contents

Foreword

As part of the General Aviation Red Tape Challenge, the CAA employed Edward Bellamy, the author of this report, to conduct some research into the process an individual is required to undertake to obtain a Private Pilot's Licence (PPL) or other similar qualification for recreational or private flying in the UK.

Particular focus was given to:

- Availability of information, including the ease of understanding
- Costs of training, both within training schools and those imposed by the regulator
- Regulatory requirements
- Any other associated hurdles

The work commenced in May 2014 and these findings are based on engaging with a variety of areas of the CAA, various instructors and, through email and the *Flyer* forum, the views of qualified and student pilots.

While issues relating to the regulation and administrative procedures of flight training establishments were highly relevant in this context, the exercise was intended to be primarily from the point of view of the prospective PPL rather than flight schools. Some issues considered, particularly in the area of cost, were strategic in nature and considered to impact on the overall health of the flight training industry as opposed to directly impacting on the process of obtaining a private or recreational flying qualification.

This report contains findings, some external feedback and recommendations as a result of the work. In some subject areas general comment has been made without an explicit recommendation – these are typically areas in which further discussion and engagement between the CAA and stakeholders would be helpful in the future.

Key findings

Broadly, the process of learning to fly was not found to be overly burdened by ‘unnecessary bureaucracy’ or ‘disproportionate regulation’ that is directly imposed by the CAA or EASA, although the Approved Training Organisation (ATO) approval and conversion process for establishments offering EASA licences has been a frequent complaint in the current period. It is not clear to what extent this has impacted on the individual who wishes to learn to fly; for the most part they will not likely notice any significant difference in the training environment or process at establishments that are currently in place. However, the long-term impact on the market for flight training could be negative in terms of cost and choice as the approval process may represent a barrier to entry in the market for flight training.

The current process is essentially ‘fit for purpose’. From the point of view of the student, the quality of the training experience is primarily defined by the interaction between their time and money, the quality of the instruction and the impact of the weather. The quality of the training establishment or instructor used is a very important determining factor for the experience and it is difficult for the CAA to impact on that beyond the regulatory oversight it already conducts, which, as will be discussed, is of dubious necessity already. Consequently it is considered that the CAA’s best approach would be to make prospective students aware of the issues to be considered and what questions to ask when selecting a school in order that they can make informed choices about their training.

The issue of the syllabus, both practical and theoretical, continues to be under consideration at the CAA. This report does conclude that the nature and role of theoretical knowledge, mostly for EASA regulated training, should be further reviewed to ensure that it plays an effective role in ensuring pilots have the most appropriate knowledge for the post training environment. Theoretical knowledge and the associated exams featured extensively in the external feedback and therefore this area deserves special attention in the future.

The area of cost was also investigated; findings conclude that while CAA fees are a frequent complaint, in the context of private flight training itself, the direct charges on a prospective licence holder are not excessive. The main components of an hour’s flight training continue to be fuel, maintenance and the fixed costs associated with running a training establishment.

Addressing the following issues would likely improve the long term viability and health of flight training:

- Costs and regulations relating to initial airworthiness of aircraft – improvements in this area could encourage the development of better, cheaper and more efficient models
- Costs and regulations relating to continuing airworthiness and maintenance – these impact on the cost of aircraft ownership and therefore the cost of maintaining a fleet on training organisations

Recommendations

Recommendation 1
The CAA should consider some of the following options relating to information on learning to fly: Option 1: Do nothing, leave information as it is and rely on flying schools and industry organisations and publications to produce guidance as the industry sees fit. Option 2: Coordinate and rationalise the CAA's 'learning to fly' guidance, include links to relevant organisations such as BGA, BMAA etc and make the available guidance easier to understand. Option 3: Comprehensively review the information provided by the CAA and produce a new set of guidance which covers the process and the different training options and strategies available. In the short it is strongly recommended that option 2 is adopted and option 3 in the longer term.
Recommendation 2
In the context of future EASA consideration for GA regulation the CAA should continue to support a proportionate solution to organisational approvals for private flight training and support the removal of the requirement for ATO status in its current format.
Recommendation 3
The CAA should review the interpretation of competent authority oversight requirements which results in a UK prohibition on international training flights without prior agreements covering competent authority oversight. Practice in Europe should be taken into account.
Recommendation 4
The CAA should continue to influence and support EASA towards developing certification processes for LSA and CS-23 aircraft that reduce cost and disproportionate requirements in bringing newer and more efficient models to the market.
Recommendation 5
The CAA should seek international agreements relating to the mutual recognition of standards for the initial airworthiness of Annex II aeroplanes and microlights.
Recommendation 6
For licensing purposes, consider all conventional three axis control system aircraft above a certain weight (lower than the current threshold) as being in a single class, therefore allowing the PPL or LAPL to be gained at lower cost on aircraft that can currently only be used towards NPPL(M) training.
Recommendation 7
The CAA should review the effectiveness of requiring permission for flight training in non-EASA registered

aircraft as an oversight mechanism and consider allowing ATOs to be accountable for the decision to use non-EASA registered aircraft, in the same way they are for any other aircraft they may wish to use.
Recommendation 8
While this process has provided limited opportunity to investigate the quality instruction at the private level, it is an important aspect of the learning experience and the CAA should ensure that instructor training remains of a high standard and reflects the latest understanding of instructional techniques.
Recommendation 9
The CAA should support recent proposals at EASA that could allow examiners to have conducted some of the applicant's training for an EASA licence.
Recommendation 10
The CAA should review the fees and processes that examiners are subject to for initial and continuing certification of their privileges.
Recommendation 11
In future an in-depth review of the should be undertaken, covering role of theoretical knowledge in learning to fly, how effective it is in the overall process and how effective the current system of written exams is in the context of preparing PPLs for the post training environment.
Recommendation 12
The written exams and the relevant content should be constructed in such a way that encourages theoretical knowledge material to follow a more logical and contextual structure so that they will be of greater use for future reference, especially in the case of air law, flight planning and operational procedures.
Recommendation 13
The CAA should review the 'test notification' procedure to determine whether it is an effective oversight mechanism and whether or not such a mechanism is required. If notification 'in arrears' is satisfactory then simply adopt that as the standard mechanism or remove the requirement completely.
Recommendation 14
The CAA should review the licensing application forms to ensure that they only ask for relevant information and that the guidance for these forms is clearer and easier to understand.
Recommendation 15
The system that processes a licence application should automatically check all the relevant parameters needed to verify that a licence or rating can be granted rather than the use of manual checking of various systems. This should also allow applicants to track their applications online.
Recommendation 16
Temporary certificates which allow the applicant to exercise the privileges of a licence on successful completion of a skills test should be issued.

Recommendation 17
The CAA should continue to undertake investigations into the appropriate level of medical requirements for private flying.
Recommendation 18
While it is difficult for the CAA to compete with other European competent authorities that have different levels of public funding, it should consider reducing fees in areas (such as flight crew licensing) in which individuals have a choice of competent authority to attract more non-UK applicants.
Recommendation 19
In the context of recommendation 2 the CAA should review where the more labour intensive, and therefore costly, areas of the approval process are and mitigate them appropriately so that administrative complexity does not become a 'barrier to entry' in the flight training market.
Recommendation 20
The CAA should continue to work with EASA towards a proportionate continuing airworthiness regime that reduces the cost of maintaining aircraft.
Recommendation 21
The Government should implement the recommendations of the General Aviation Challenge Panel Final Report and continue to support the UK's flight training industry.

CAA response

The CAA welcomes this report on the process of obtaining a Private Pilots Licence and the recommendations contained within it. While it is good to hear that the process of attaining such a licence is not overly burdened by bureaucracy, we are not complacent and there are recommendations within the report that the CAA has been, can and will take forward in pursuit of improving the environment for General Aviation in the UK. Some of the recommendations already form part of the General Aviation programme but some of the other points raised will require a longer term strategy and collaboration with our international partners such as EASA and other EU member states.

A few of the recommendations, such as improving the information presented on the CAA's website and making CAP 804 (Flight Crew Licensing) a more user friendly document, are already underway and we have already commissioned other work to take these recommendations forward, with the support of the report's author and we will periodically update readers on our progress against this report.

First steps to commencing training

Developing the interest

People develop an interest in learning to fly from a variety of sources; it may be that a long standing interest from childhood[1], a friend or family connection or simply as one of a number of hobbies that someone chooses to spend their disposable income on. Living near an airfield, visiting an air show or simply looking up at the sky and seeing a light aircraft may spark off the interest. A significant number may have had experience of flying through youth organisations such as the Air Cadets or University Air Squadron and come back to flying later in the life.

People will likely have some perceptions and expectations of what learning to fly will involve and what the opportunities are once they have a licence – in order to match those perceptions to reality the prospective flight student will likely have to do some research into the subject.

A 'trial lesson', sometimes as a gift, is quite a common first step towards getting a recreational licence and this will probably inform the prospective flight student whether or not flying is 'for them'. This may come at the outset of developing the interest, or come later on in the process after some research has been conducted. Most flight schools recommend this as the best 'first step' towards completing a licence.

Some people seeking private licenses, especially an EASA PPL, may have aspirations to commercial aviation but this is considered outside the scope of this document.

Choosing a training path

> *'Particular focus will be given to the availability of information including the ease of understanding'*

Researching the options

The amount of research and consideration will vary between individuals, as with any decision that involves committing time and money. It is likely that some individuals will be restrained by time, money and geographical considerations that will limit the available options and therefore the number of options to consider.

There are several viable strategies available for conducting training that the prospective student may take depending on time and cost restraints:

[1] The 2004 Pilot's Survey element of the General Aviation Small Aerodrome Research Study (GASAR) suggests this is the most common motivation despite the average age of PPL qualifying being in the mid-thirties.

- Set aside time, for example six weeks, and complete training abroad
- Set aside time and conduct training continuously either locally or travel elsewhere in UK
- 'Fit around' one's normal routine and train as and when possible, for example once a week
- Some combination of the above depending on personal circumstances

It may be that there is only one local airfield available[2] and that travel to other areas for a period is not possible due to time. This would automatically answer or reduce to a small number of possible answers any further questions of cost, licence type or aircraft type for training. The individual may already be familiar with the local airfield and may simply go there without researching other options; for example they may choose to undertake a trial lesson at the local airfield and simply continue training there if that is the only convenient option.

If, within geographical or time convenience, the prospective PPL has some choice between training establishments and/or types of flying available it may take some further research to answer questions as to which of the various options to pursue.

Visiting local training establishments will almost certainly form part of the research, even if the prospective student chooses the first one visited. The organisation will be able to provide comprehensive information on the type of flying they conduct but is unlikely to provide a broader overview of the different options available – naturally a training establishment will have knowledge of the product they provide whether that is microlights, group A aircraft, helicopters or whatever it happens to be.

Some of the key issues and questions for the prospective student will likely be:

- Overall cost and funding options
- What is convenient geographically?
- Impression of different convenient training establishments, their facilities and equipment
- What timescale and commitment is realistic?
- What sort of licence/course of training to undertake?
- What will my licence enable me to do?

[2] According to the GASAR about 40% of private pilots only have one suitable airfield within reasonable travelling distance and that 95% of private pilots live within fifty miles or approximately an hour's drive from the airfield that they principally fly from which other than some areas of the South East practically reduces the available options to typically two or three establishments, although many larger airfields have multiple training establishments.

Guidance material

Between local training establishments, the internet and magazines, there is a wealth of information available, although not in a co-ordinated fashion. The most comprehensive and easy to understand information that details all of the different flying disciplines comes from 'learn to fly' magazine supplements produced annually by *Pilot* and *Flyer* which typically cover practical issues such as time, cost and the structure and content of the training. They also include a directory of schools by region and explain the details of all the different flying disciplines in one publication. They are not currently available in electronic format but there may be future plans for that to be available.

There are a number of books on learning to fly aimed at the US market, which obviously contain a lot of relevant guidance and advice on the process but refer to FAA requirements, differing slightly from the UK and European ones. The author is not aware of any single up-to-date and comprehensive book on the subject of learning to fly that reflects the current training environment and focuses on guidance for the process rather than being a book on the flying exercises themselves.

Most web-based material tends to relate to a particular area of flying; whether that is gliding, micro lighting or 'group A' powered flight. Detailed explanation of the different licence options is sometimes patchy although that is partly down to the amount of time taken to update websites and other material to reflect changes to the licensing system; for example many websites still refer to the NPPL(SSEA) but not the LAPL. Some information is available on the websites of the various flying associations such as the LAA, AOPA and others but unless familiar with the aviation world a prospective flight student is unlikely to consult these since it would not be obvious which of them are relevant.

Current CAA information

Entering "private pilot's licence" returns the CAA website at or near the top of most web search engines. There is some explanatory material on the CAA's website about licence choice but is not very accessible without prior knowledge of the licensing system – for example it includes a link to CAP 804 which even qualified private pilots often struggle to understand. The information focuses mainly on the licensing requirements rather than more general considerations when learning.

In Section 2 of CAP 804 there is some general guidance on licence selection, finding a flying school and also information on protecting oneself financially when paying for flying lessons (although it is aimed more towards commercial training). There are also some 'flow charts' which illustrate the types of licence available depending on the desired flying; they are not very clear though and the uninitiated would probably not understand them.

There would be merit in the CAA providing more web-based or print information on the overview of different options to consider for learning to fly since there is not currently a web-based equivalent to the published 'learn to fly' guides that has comprehensive information in one place.

Recommendation 1
The CAA should consider some of the following options relating to information on learning to fly: Option 1: Do nothing, leave information as it is and rely on flying schools and industry organisations and publications to produce guidance as the industry sees fit. Option 2: Coordinate and rationalise the CAA's 'learning to fly' guidance, include links to relevant organisations such as BGA, BMAA etc and make the available guidance easier to understand. Option 3: Comprehensively review the information provided by the CAA and produce a new set of guidance which covers the process and the different training options and strategies available. In the short it is strongly recommended that option 2 is adopted and option 3 in the longer term.

International comparison – authority disseminated information

FAA *– some information on the practicalities of learning to fly, not prominent on the website but includes a FAQ on the process that covers basic questions that someone of little aviation knowledge might find useful*[3]

Transport Canada *– not prominent on the website but includes a guide to choosing a flight school starting with questions such as aircraft type, prospective aviation goals, and issues to consider when choosing the school*[4]

CASA *– the most comprehensive information of all the NAA websites – within a few links a 'learning to fly' guide, comprehensively covering both recreational and commercial qualifications can be found*[5]

Regulatory and training structure

> *'Particular focus will be given to…regulatory requirements and any associated hurdles'*

Once the prospective flight student has committed to a particular training path the structure followed is fundamentally a 'regulated' one insofar as there are minimum flying hours and standards specified and the individuals and organisations conducting the training likely have to be certified by relevant authorities and organisations to conduct training.

[3] http://www.faa.gov/training_testing/training/pilot_schools/ http://www.faa.gov/pilots/become/

[4] https://www.tc.gc.ca/eng/civilaviation/standards/general-flttrain-selectftu-menu-3410.htm

[5] http://www.casa.gov.au/scripts/nc.dll?WCMS:STANDARD::pc=PC_90018

Organisational, equipment and individual approval

Organisational approval

It is assumed that the reader will be familiar with the introduction of the requirement to formally regulate, under EASA, training establishments teaching at PPL level. This does not signifcantly change the process that the student has to follow since the approval requirement does not modify the training structure. It does, however, potentially impact on it in some of the following ways:

- The requirement to formally regulate training establishments imposes cost insofar as the organisation has to commit resource towards ensuring it maintains the technical requirements of that approval, however there is little evidence that on an *ongoing* basis this adds much to the cost of flying lessons.
- The prospective student has to generally arrange lessons through the ATO and therefore be subject to their aircraft and instructor availability, although it is possible for independent instructors to obtain ATO status.
- The requirement to become an ATO may represent a 'barrier to entry' to the market that reduces the long term competitiveness of the recreational flight training industry.

It is worth considering that in the USA all that is required to conduct training is an instructor and a suitable aircraft in the appropriate class. Similarly the previous RTF arrangement and the arrangements for microlight establishments involved little formal oversight of the organisation itself and many RTFs were in fact sole instructors. Becoming an ATO is not an insurmountable barrier to smaller organisations but it is a significant burden with an unclear safety benefit. There may also be less formalised ways of delivering that oversight of training and the promotion of safety and quality in the training environment.

Recommendation 2
In the context of future EASA consideration for GA regulation the CAA should continue to support a proportionate solution to organisational approvals for private flight training and support the removal of the requirement for ATO status in its current format.

International training flights

There is currently a theoretical CAA prohibition on training flights that cross international borders counting towards the issue of a PPL (and presumably other ratings) without agreements between national authorities on oversight arrangements. This is an interpretation of Parts ARA and ORA that requires agreements when the activity of organisations approved by national authorities crosses different national authority jurisdictions. While it is not a major impediment to conducting PPL training it nonetheless is a restriction that has no evidence based rational for existing.

Recommendation 3
The CAA should review the interpretation of competent authority oversight requirements which results in a UK prohibition on international training flights without prior agreements covering competent authority oversight. Practice in Europe should be taken into account.

Suitable aircraft

The regulations surrounding the use of aircraft for training are not considered overly burdensome in of themselves. An ATO must have access to suitable aircraft in the correct class for the training offered but other than holding the appropriate airworthiness certifications there are no other significant requirements.

There are however a number of issues related to training aircraft in general that have an indirect impact on the cost and flexibility of training, especially in terms of aircraft choice.

The use of permit to fly aeroplanes for paid instruction is currently under review by the CAA's GA Unit and this could have a positive impact on flight training both in terms of cost and the availability of different aircraft types. Because this is currently being reviewed this report will not comment in more detail at this stage.

Certification of new training aircraft (EASA)

For a variety of reasons, partly relating to certification, new aircraft in the Europe are very expensive and certification is slow to achieve for many models, both European and from other states. Ironically many producers of European LSA (light sport aircraft) category aircraft have achieved more success with certification of their aircraft under the FAA than they have under EASA. It was claimed by the Czech LAA at Aero Friedrichshafen in April 2014 that EASA certification of LSA category aircraft typically costs more than double that of FAA certification and can be in excess of €500,000 once the cost of organisational design approval has been accounted for. This is significant since it is a cost that clearly needs to be passed onto the buyer, leading to old and inefficient aircraft continuing in service that would otherwise be replaced. It is no doubt essential to the long term future of GA that this situation is rectified – it directly relates to the long term viability of recreational flight training.

Recommendation 4
The CAA should continue to influence and support EASA towards developing certification processes for LSA and CS-23 aircraft that reduce cost and disproportionate requirements in bringing newer and more efficient models to the market.

Mutual recognition of airworthiness (annex II aircraft)

The cost of obtaining a microlight permit to fly for a type that may well have an equivalent permit in another country is a barrier to flight schools choosing their aircraft insofar as it

costs a substantial amount to achieve a UK permit and some manufactures may not bother to embark on the process – reducing competition in the market for training aircraft.

Recommendation 5
The CAA should seek international agreements relating to the mutual recognition of standards for the airworthiness of Annex II aeroplanes and microlights.

Distinction between three axis microlights and aeroplanes for training

There is a somewhat perverse situation at the moment in which for example someone can train for an NPPL(M) in a three axis microlight that is only slightly lighter, and does not have significantly different flight characteristics to an LSA category aircraft for which a LAPL(A) or PPL(A) is required. Since microlight training is often cheaper than that of group A aircraft, a more cost-effective way to achieve a recreational licence may be to complete the majority of training on microlights and then convert onto heavier group A aircraft at a later date if so desired. Currently however there is little credit given over towards a LAPL(A) or PPL(A) from an NPPL(M).

The 'class rating' system for SEPs relies on a certain amount of good judgement to be applied by pilots and instructors when moving between different makes and models of aircraft and training accordingly. This principle could be extended to converting between microlights and SEPs.

Recommendation 6
For licensing purposes consider all conventional three axis control system aircraft above a certain weight (lower than the current threshold) as being in a single class, therefore allowing the PPL or LAPL to be gained at lower cost on aircraft that can currently only be used towards NPPL(M) training.

Use of foreign registered aircraft

It is a requirement of the CAA that the operator of an aircraft registered outside the European Economic Area wishing to use it for aerial work, including flight training, apply for permission for that use in the UK. Normally this is not denied by the CAA to individuals or group owned aircraft. However it is CAA policy not to allow such aircraft to be regularly used in the UK by flight schools. Flight school aircraft must be on the registry of an EASA state and therefore have either EASA or CAA certification. Considering how costly it appears to be to obtain European certification it may help the UK flight training industry if it were able to purchase aircraft certified in other countries that are recognised to effective certification processes.

Recommendation 7
The CAA should review the effectiveness of requiring permission for flight training in non-EASA registered aircraft as an oversight mechanism and consider allowing ATOs to be accountable for the decision to use non-EASA registered aircraft, in the same way they are for any other aircraft they may wish to use.

Instructors

Paid instruction on a PPL for training towards a PPL or LAPL is now permitted which is a significant step towards encouraging experienced PPLs to pass on their knowledge and skills; in the case of LAPL the requirement for CPL knowledge has also been removed. Beyond that the instructor qualification arrangements remain essentially unchanged from JAR.

It is normally the role of the ATO to assign instructors. Sometimes instructor continuity can be an issue for students who have limited time to conduct flight training; this is not an issue that the regulator can effectively address beyond advising prospective flight students that continuity is desirable and the ability of the flight school to deliver that continuity is a significant factor to consider when selecting a flying school.

Recommendation 8
While this process has provided limited opportunity to investigate the quality instruction at the private level it is an important aspect of the learning experience and the CAA should ensure that instructor training remains of a high standard and reflects the latest understanding of instructional techniques.

Examiners

For examiners the only requirement is that they hold the appropriate examiner rating and have not conducted any of the student's training – there was a suggestion in the drafting of the EASA regulations in this area that a certain percentage of the training could be conducted by the examiner but this was ultimately rejected by the EASA committee. Under JAR examiners were permitted to fly early in the student's training for a small number of flights and this was helpful in small and remote areas where the number the examiners might be low. A proposal at EASA has now emerged that could revert the requirement to the JAR situation.

EASA rules did substantially reduce the number hours required to be an examiner and the introduction of the Aircrew Regulation has led to an increase in the number of people applying to become PPL examiners which is quite a long and costly process. While there is not a shortage of PPL level examiners in most areas, it is debatable whether or not the process to become a PPL examiner is really proportionate, especially in terms of fees, and whether the mechanism of ensuring the continuing standards of examiners is as effective as it could be.

Recommendation 9
The CAA should support recent proposals at EASA that could allow examiners to have conducted some of the applicant's training for an EASA licence.
Recommendation 10
The CAA should review the fees and processes that examiners are subject to for initial and continuing certification of their privileges.

Regulatory requirements and hurdles during the process

Fundamentally the process of obtaining a PPL is defined by a combination of the syllabus structure and the amount of time and money the student pilot possesses on an ongoing basis.

The practical syllabus

The way people are taught to fly has not changed significantly since the very early days of flying. Training is normally conducted on a light aircraft to teach basic handling skills until the student can proficiently control the aircraft using outside visual references. Navigation techniques are then introduced later in the course and finally the student is examined by conducting a flight to the specified standard. This broad training structure is similar for most of the major flying disciplines with varying degrees of complexity although gliding has traditionally used a more 'stepping stone' or 'modular' training structure in which the student builds levels of proficiency as they progress through the qualification structure.

The CAA is currently in the process of updating the PPL syllabus and will be submitting an alternative MC (alternative Means of Compliance) to EASA to cover the introduction of this. It will not change the basic structure of the training process though and focuses mainly on updating navigation techniques.

There may be future questions about how, more fundamentally, people could be taught to fly. Some of the ideas that have been encountered include:

- Greater use and credit for the use of simulators, this could reduce cost and make flight training less weather dependent.
- Move to a less 'hours based' and more 'competence based' training concept in which competencies are achieved and then signed off, rather than specifying minimum requirements such as '10 hrs solo'.
- Allow privileges to be obtained gradually in a 'modular' fashion as opposed to simply having the skills test at the end of the process.
- A combined PPL/IR qualification that would focus on instrument flying from an early stage of training – this may be more attractive to some people who are interested in touring and reduce the dependency of training on the weather.

In the longer term the CAA should, in co-operation with other NAAs and aeronautical institutions, conduct research into best practice in pilot training and use that to inform syllabus reviews, teaching methods and tools as appropriate. This, combined with any relevant evidence from safety reviews of the general aviation sector may be able to better inform private and recreational flight training practice.

The theoretical knowledge syllabus (EASA LAPL & PPL)

The introduction of EASA regulations has introduced the concept of a maximum number of 'sittings' for PPL level theoretical knowledge, a maximum period of 18 months in which the

exams must be completed and an expiry period of 24 months from the completion of the exams in which to complete the practical training. This requirement does restrict the amount of time that an individual can practically undertake the PPL for since once an exam has been taken the 'clock is ticking' towards the end of the 18 month period in which all exams must be completed. The imposition of a maximum number of six 'sittings' to pass all the exams also means that some sittings must include more than one of the nine exams. The definition of a 'sitting' has been extended to 10 days through an EASA AMC.

This is unlikely to be an insurmountable issue for most people undertaking a PPL since 18 months is not an overly restrictive amount of time. However it is a requirement that the system functioned without in the past and could be an impediment to someone who, for unforeseen circumstances, has to take a break in training or simply fails to complete the training in the allotted time.

Most flight schools keep a set of papers that the CAA periodically update and reissue – the introduction of electronic exams would improve the ability of the CAA to administer the exams and also potentially allow students to take exams at 'test centres' on a computer. It is worth noting the FAA exams have been computer based for many years.

The provision of theoretical knowledge material has been the preserve of commercial providers and there is a selection of publications available – usually the flight school recommends a particular type.

Under the FAA system the candidate for a PPL, as well as having to pass a single computer based exam has to pass an oral test with the examiner prior to conducting the practical skills test. While examiners in Europe usually conduct some oral questioning in a similar style, it is typically less extensive and for the PPL the only area that the examiner is actually required to cover is a brief on weather, NOTAMS, mass and balance and performance calculations. While the examiner will likely come away from a skills test with an overall sense of the candidates skills and knowledge there is no doubt that a period of deeper probing would reveal to what extent a candidate had simply learnt by rote the theoretical knowledge syllabus without actually understanding the material.

When reviewing the current exam questions consideration should be given to what a pilot would practically need to conduct safe flight and they should be expected to recall for that information for the exam. For other important information, that may not be as frequently used, the emphasis should be on knowledge of where to locate it rather than recollection from memory.

The exams should also be written in a manner which encourages commercially produced books to follow an accessible structure so that they may be used by the candidate in their future flying for reference when needed. This is particularly relevant in the areas of air law, operational procedures and flight planning.

Recommendation 11
In future an in-depth review of the should be undertaken, covering role of theoretical knowledge in learning to fly, how effective it is in the overall process and how effective the current system of written exams is in the context of preparing PPLs for the post training environment.
Recommendation 12
The written exams and the relevant content should be constructed in such a way that encourages theoretical knowledge material to follow a more logical and contextual structure so that they will be of greater use for future reference, especially in the case of air law, flight planning and operational procedures.

Miscellaneous requirements and administrative procedures

In addition to the basic requirements set by the practical syllabus of flight training there are also a number of administrative procedures and requirements that must be followed during the process; while they have rarely been welcome these administrative requirements have not been found to be a major hurdle either for students or flight schools.

Skills test notification

EASA regulations require that national authorities have procedures for the designation of examiners and develop an oversight programme for the monitoring of examiners. The CAA interprets this as requiring notification for every PPL skills test, which is similar to most other competent authorities. There is an 'alternative procedure' available for ATOs doing a large number of tests which allows them to submit notifications 'in arrears'. This seems illogical since if the alternative procedure is sufficient then it might as well be made the standard way of administering the process.

The presence of the test notifications requirement has in practice added another component to the licence application process that needs to be checked, adding time and potential delays to the licence application process. Flight schools often forget to notify and/or notifications fail to be recorded correctly by the CAA. Several ATOs that had opted for the 'alternative procedure' were unaware that they had to inform the CAA that they had not in fact hosted any tests and that the absence of any reports was not sufficient to indicate this, simply adding to further confusion about the requirements.

Even the alternative procedure merely amounts to duplication anyway – there is no reason why the submission of a skills test report, which included the recommending ATO's details, would deliver the same information.

Recommendation 13
The CAA should review the 'test notification' procedure to determine whether it is an effective oversight mechanism and whether or not such a mechanism is required. If notification 'in arrears' is satisfactory then simply adopt that as the standard mechanism or remove the requirement completely.

Licence application and issue

One of the most enduring complaints about the process of applying for a licence or rating is the complexity of the CAA forms. To an extent this is inevitable considering the

complexity of the underlying licensing requirements. However, it is somewhat telling that such a high proportion of applications, estimated in April 2014 by the Hub to be approximately 20% for paper applications and 30% for online applications, have an issue that either delays processing or requires further submission of missing components of the application pack. This is especially relevant now that the CAA has a large contingent of individuals, for whom they are the competent authority, but are not UK resident and/or do not have English as a first language. It is apparently becoming increasingly common for foreign pilots and examiners to submit applications to the CAA without knowledge of the documents required.

The recently launched online application process has not delivered a significant saving in time for either the applicant or the processing of the application at the CAA. Uptake of the process has been slow, likely due to the complexity of the system and the lack of time saving. It takes longer for an online submission to be processed and the number of errors and omissions is typically higher than that for paper submissions. It is currently just another mechanism for delivering the same information to the licensing officer in a more error prone manner.

The CAA has recently improved application processing times after a period of poor performance last year. Nonetheless it still remains a frustration that in order to exercise the privileges of the licence the licence has to be in the physical possession of the individual. It would be preferable if a temporary certificate could be issued on completion of a skills test that allowed the privileges of the licence to be exercised – this would place an onus on the examiner to ensure that the applicant met the requirements for licence issue but this would be a small price to pay for the significantly improved convenience for the applicant.

Recommendation 14
The CAA should review the licensing application forms to ensure that they only ask for relevant information and that the guidance for these forms is clearer and easier to understand.
Recommendation 15
The system that processes a licence application should automatically check all the relevant parameters needed to verify that a licence or rating can be granted rather than the use of manual checking of various systems. This should also allow applicants to track their applications online.
Recommendation 16
Temporary certificates which allow the applicant to exercise the privileges of a licence on successful completion of a skills test should be issued.

Medical requirements

Broadly speaking, aero-medical development has surmounted a large number of medical conditions that would previously, even for recreational flying, been a barrier to learning to fly. Today, for the majority of applicants, the Class Two medical is not a disproportionate standard to meet and the lower standard required for the LAPL largely captures most other applicants who cannot meet the Class Two standard.

The process of obtaining a LAPL declaration from a GP has apparently been introduced successfully with few reported issues. It would appear that the number of GPs registering to conduct the process is roughly in line with the number of declarations received – suggesting that most people are seeking out their GP and successfully completing the process. The LAPL does however remain a relatively new licence so issues may emerge in the future and the CAA should work to mitigate and simplify the process of GP declaration as much as possible.

There may be merit in further reducing the medical standard required for private flight to be met from the current LGV standard to the standard driving licence and this is to be investigated by a working group of suitable experts.

Recommendation 17
The CAA should continue to undertake investigations into the appropriate level of medical requirements for private flying.

Costs

> *"Particular focus will be given to…the costs of training both within training schools and those imposed by the regulator…"*

Fees for the student (EASA PPL & LAPL)

See appendix A for fees

Assuming a PPL(A) costs in the region of £8,000, the total cost of regulatory fees, partly dependent on the variable fees such as the skills test and the medical, is approximately 6% of that total cost. While the CAA do not have direct control over them, apart from the application fee, it is still not an insignificant sum.

The personnel licensing scheme of charges 'breaks even', although the assignment of fees within it according to resource is not necessary accurate; many are more a product of historical fee levels and have not been comprehensively reviewed recently. It is apparently difficult to attribute exact resource expenditure for different tasks within the scheme because the CAA does not accurately monitor that resource allocation.

Although there is no evidence that the licence application fee is disproportionate, it is worth considering that applicants can choose their competent authority relatively easily and it would be unfortunate if the CAA lost 'potential customers' due to fee levels, especially considering the good reputation of the CAA as a competent authority that is used by many non-UK citizens.

Recommendation 18
While it is difficult for the CAA to compete with other European competent authorities that have different levels of public funding, it should consider reducing fees in areas (such as flight crew licensing) in which individuals have a choice of competent authority to attract more non-UK applicants.

Regulatory fees for training organisations

On an *ongoing* basis the fees for ATOs would not significantly impact on the cost of learning to fly. More significant is the potential time and cost of conversion from RTF (Registered Training Facility) to ATO and the initial ATO application that represents a 'barrier to entry' insofar that it is a time consuming and potentially costly process. It may in the long run reduce competition in the market for flight training.

Recommendation 19
In the context of recommendation 2 the CAA should review where the more labour intensive, and therefore costly, areas of the approval process are and mitigate them appropriately so that administrative complexity does not become a 'barrier to entry' in the flight training market.

Costs within training schools

It is well known that the average advertised price of obtaining a PPL in the UK for example has increased by approximately 30% in the last 10-15 years[6] whereas in the USA it has remained relatively stable in real terms for almost 20 years.

Fuel, especially Avgas, remains the largest single cost of a flight training hour (typically 20-30% for a PA28 or similar) with maintenance (typically 15-20%) coming in as a high proportion of the total cost. Fuel is a larger proportion of hourly costs now than it was 15 years ago with Avgas having increased in real price terms by nearly 50% over a 15 year period[7]. Other than ensuring that proportionate maintenance and certification regimes for new technology are in place, there is little the CAA can do to address these fundamental costs.

VAT on flight training has been raised in almost every review of General Aviation that has been conducted either in the CAA or Government context and this report again urges the issue to be considered.

Many of the recommendations listed in the General Aviation Challenge Panel Final Report cover the general steps the Government could take to reduce the burden on the flight training industry.

Additionally, the UK should use the provisions of EU Directive 2003/96/EC,that states that only aviation fuel used for 'private-pleasure' purposes should be taxed, to allow fuel used for flight training in a commercial organisation to qualify for fuel duty relief as is the situation in a number of other EU states.

Recommendation 20
The CAA should continue to work with EASA towards a proportionate continuing airworthiness regime that reduces the cost of maintaining aircraft.
Recommendation 21
The Government should implement the recommendations of the General Aviation Challenge Panel Final Report and continue to support the UK's flight training industry.

[6] https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/315329/flight-training-cost-10.csv/preview

[7] Based on the 1998 Avgas price in the South of England

Further work

CAA website

It has already been agreed that modifications will be made to the CAA website that covers the subject of learning to fly. This will likely cover basic considerations like time and cost with the focus being on advising the sorts of questions that prospective students should ask both of themselves and the training establishments they are considering learning with rather than prescriptive guidance. It may also include links to the relevant associations that cover all the different recreational flying disciplines and information about relevant publications.

Beyond the PPL

It is a common observation that after a period of a few years a large proportion of PPL holders lapse to a level in which they are, at best, only just maintaining legal currency or cease flying completely. This could be as great of a threat to the long-term viability of recreational flying as the fall in the number of private and recreational licences issued overall.

There are likely to be a variety of reasons for this – private flying like any activity will have a natural attrition rate as personal circumstances change or other interest areas supersede it. Some of the reasons associated with flying's attrition rate often cited include cost, loss of interest and lack of confidence in conducting more extensive trips. The '£100 hamburger' has become an enduring stereotype in aviation and the conventional wisdom suggests that people quickly get bored of that variety of flying.

Those who do persist at flying typically undertake additional training soon after completing their basic qualification and this clearly helps maintain the interest in the flying and development of confidence and airmanship. Ways in which to encourage more uptake of further training could be considered as part of future work. The review of GA accidents, both in the UK and other major GA states, may also inform future thinking on recreational and private flight training.

Appendix A – Direct regulatory fees

Regulatory Fees on Applicants

Referenced to the CAA Personnel Licensing Scheme of Charges

Section 3 Flight Crew Licences

3.5 Initial grant of National UK or EASA Flight Crew Licences

Table 4

- PPL **£185**
- LAPL **£153**

3.13.1.2(.1) Pilot licence/ratings and other flight tests

Table 12

- PPL skills test **£195**

Section 10 Medical Examinations for Personnel Licences

10.1 Medical examinations for personnel licences

Table 54

- EASA initial class 2 **£216** (typical AME fee is **£150-200**, including **£8** admin charge)

Regulatory Fees on ATOs

Referenced to Personnel Licence Scheme of Charges

Section 7 Approval of Pilot Training Organisations

7.1.1 Conversion of RTF to ATOs

Table 30

- Existing RTF to ATO **£100** (if using CAA template)

7.1.2 Initial application for approval as an ATO for PPL/LAPL (not previously an RF prior to Sept 2012)

Table 31

- Initial application **£516** (if using CAA template) with additional charges of **£172 per hour** up to a maximum of **£2,500**

7.1.4 Annual continuation charge relating to all ATOs teaching PPL/LAPL

Table 33

- Annual continuation charge **£430**

7.2.3 Additional training course approvals

Table 36

- All additional courses (PPL, LAPL, SPL etc) **£172 per application for additional courses**

Appendix B – External feedback summary

Theoretical knowledge

This was undoubtedly the most common theme to come out of external response – numerous respondents commented that the material was too abstract and that the structure and the wording of exams are not conducive to learning relevant information.

Specific comments and suggestions included:

- There is too much irrelevant information in the TK syllabus, particularly Air Law.
- The PPL(H) exams are not focused suitably on helicopters and retain an aeroplane focus.
- Nine individual exams are too many.
- The CAA should produce an air law guide that consolidates all the relevant material that a private pilot would need to know. By updating it regularly the CAA would also produce a useful document for current pilots to stay up to date with the latest requirements.
- The CAA should publish sample PPL exam questions for practice.
- Frustration at the 'sittings' requirement that was introduced under EASA.
- Exams on computer.

Quality of practical instruction

A lot of respondents commented that the quality of practical instruction was generally good. There were some respondents however who did comment that the practical syllabus was in need of overhaul or that the quality of practical instruction could be improved.

One respondent in particular was concerned at the quality of some instructors and that there was a tendency for PPL instruction to be used as an 'hour building' exercise for those wishing to enter commercial aviation and therefore lacking the skills and experience necessary to prepare people for the 'GA environment'.

It is a consistent observation that private and recreational flight training is lacking experienced 'GA pilots' to pass on their knowledge and experience as instructors.

Transfer of training records

One respondent commented on the difficulty of extracting training records when changing schools – suggesting that students should be given more control of their training records so that a school transfer could take place more easily. For example stamping the trainee's logbook with theoretical knowledge exam results and allowing the student to hold the

lesson records, suitably duplicated by the school to prevent fraud, so they could be presented to the new school and continue training without delay. The duplicate records retained by the previous school could then be checked at a later date to verify the ones in the trainee's possession.

Understanding of the flight crew licensing system

There was some comment that the system of licensing and privileges was difficult to understand – the degree to which this bothers trainees seems to vary – some appeared to accept this as part of the process whereas others questioned the complex nature of it. This issue is likely related to air law theoretical knowledge and the general feeling that it is difficult to understand.

Specific comments and suggestions included:

- Some sort of 'PPL handbook' that simply explained the essentials of being a private pilot would be helpful

- CAP 804 is difficult to understand

Cost

Naturally there was the frustration at the general cost of flying and that it seemed out of proportion with what the activity actually involved.

Specific comments and suggestions included:

- Tax relief on fuel used for flight training[8]
- CAA fees and charges are too high

[8] Some European states do not impose fuel duty on flight training in accordance with EU Directive 2003/96/EC