Australian Government
Civil Aviation Safety Authority

CAAP 5.14-1(0)

Civil Aviation Advisory Publication

December 2007

Instrument Rating Renewals Using an Overseas Flight Simulator Training Provider

This publication is only advisory but it gives a CASA preferred-method for complying with the Civil Aviation Regulations (CARs) 1988.

It is not the only method, but experience has shown that if you follow this method you will comply with the Civil Aviation Regulations.

Always read this advice in conjunction with the appropriate regulations.

Contents

The relevant regulations and other references

- Civil Aviation Regulation 1988 (CAR) 5.14
- Civil Aviation Regulation 1988 (CAR) 5.19
- Civil Aviation Order (CAO) 40.2.1 (specifically Section 12A)
- Civil Aviation Safety Regulations 1998 (CASR) Part 60
- Advisory Circular (AC) 60-2
- Manual of Standards (MOS) Part 60
- Civil Aviation (Fees) Regulations 1995

Who this CAAP applies to

- Australian flight crew licence holders who choose to renew their instrument rating overseas through an overseas flight simulator training provider
- Overseas flight simulator training providers
- Training and checking organisations
- Approved Testing Officers (ATOs)
- CASA staff

Why this CAAP was written

This Civil Aviation Advisory Publication (CAAP) provides advice and guidance on complying with Section 12A of CAO 40.2.1. This Section of the CAO permits the use of an overseas flight simulator training provider to renew an instrument rating.

Users are encouraged to read this CAAP in order to meet the requirements contained in Section 12A of CAO 40.2.1.

Status of this CAAP

This is the first CAAP to be written on this subject.

For further information

Telephone the CASA Office closest to you on 131 757.

1. Abbreviations

AC	Advisory Circular
AIP	Aeronautical Information Publication
ATC	Air Traffic Control
ATO	Approved Testing Officer
ATPL	Air Transport Pilot Licence
CAAP	Civil Aviation Advisory Publication
CAO	Civil Aviation Order
CAR	Civil Aviation Regulation 1988
CASA	Civil Aviation Safety Authority
CASR	Civil Aviation Safety Regulation 1998
CIR	Command Instrument Rating
CofV	Certificate of Validation
CPL	Commercial Pilot Licence
CTR	Control Zone
DME	Distance Measuring Equipment
FAA	Federal Aviation Administration (of the USA)
FAR	Federal Aviation Regulation (of the FAA)
FOI	Flying Operations Inspector
GAAP	General Aviation Aerodrome Procedures
GNSS	Global Navigation Satellite System
GPS	Global Positioning System
ICAO	International Civil Aviation Organization
IFR	Instrument Flight Rules
ILS	Instrument Landing System
IMC	Instrument Meteorological Conditions
LLS	Localiser
LSALT	Lowest Safe Altitude
MCQFS	Manual of Criteria for the Qualification of Flight Simulators (ICAO)
M/E	Multi-engine
MOS	Manual of Standards
NAA	National Airworthiness Authority
NDB	Non-directional Beacon
OCTA	Outside Control Area
PAL	Pilot Activated Lighting
PPL	Private Pilot Licence
RNAV	Area Navigation
S/E	Single-engine
SID	Standard Instrument Departure
STARs	Standard Terminal Arrival Routes
TCE	Training Center Evaluator (of the FAA)
USA	United States of America

VLJ	Very Light Jet
VOR	UHF Omni Range

2. Definitions

Contracting State: A foreign country that is party to the Chicago Convention.

Oral test: An oral aeronautical knowledge test relevant to the instrument rating to be renewed.

Overseas flight simulator training provider: An organisation certified by their relevant over-sighting National Airworthiness Authority (NAA) for the purpose of training flight crew members in a qualified flight simulator.

Qualified flight simulator: A flight simulator that is qualified under Part 60 of the CASRs, or in the case of a foreign flight simulator, one that is qualified by their relevant over-sighting NAA. Foreign flight simulators that are recognised by CASA are outlined in AC 60-2.

3. Introduction

3.1 Why does CASA permit this method of instrument rating renewal?

3.1.1 The Civil Aviation Safety Authority (CASA) recognises the superior safety benefits of using sophisticated flight simulators as a training and checking tool.

3.1.2 Both commercial and private operators of complex aircraft such as very light jets (VLJs) and corporate aircraft often conduct competency checks in a sophisticated flight simulator. Unfortunately, these simulators are usually only found overseas.

3.1.3 The experience and safety benefits gained from using modern simulators and training packages is accepted worldwide as unparalleled. Therefore, it is considered appropriate that the instrument rating should be able to be renewed as part of a competency check with a certified overseas flight simulator training provider.

3.1.4 Simulator technology is such that the training provides true realism and mitigates the risk of conducting an instrument rating renewal in sophisticated aircraft by not exposing the flight crew and the aircraft to the increased hazards that go with simulated failures on the runway and in the air. In the aircraft, at the time of the instrument rating test, it is almost impossible to operate in the range of realistic weather scenarios that can be reproduced in a simulator.

In addition to this, these simulators offer the added advantage of checking the handling of emergencies in actual (albeit in the simulator) instrument meteorological conditions (IMC) as opposed to in an aircraft 'under the hood'. A more comprehensive and challenging instrument rating renewal check is therefore available in these modern simulators.

3.1.5 Particularly for a one-off aircraft type, it is often difficult to get the first Approved Testing Officer (ATO) approved, as CASA does not have the expertise or resources to undertake the approval or training process. If a CASA Flying Operations Inspector (FOI) does undergo any such training, the FOI qualifies with an endorsement only, which is the bare minimum.

This does not make him/her an experienced type specialist and certainly doesn't qualify him/her to undertake any check flying from a control seat in order to approve an ATO on type in an aircraft.

3.1.6 ATOs who are qualified on these sophisticated, one-off 'orphan' aircraft types are often not available, and this results in the crew of these aircraft completing their instrument renewal on another type of light twin-engine aircraft simply to comply with the legislation. From a safety viewpoint this is considered undesirable.

3.2 Why you should read this CAAP

3.2.1 CASA permits the use of an overseas flight simulator training provider to renew an Australian flight crew licence holder's instrument rating. Section 12A of Civil Aviation Order (CAO) 40.2.1 sets out the requirements for instrument rating renewals in this manner.

3.2.2 This Civil Aviation Advisory Publication (CAAP) provides administrative and procedural guidance on the conduct and application for an instrument rating renewal when an applicant chooses to renew his or her instrument rating using an overseas flight simulator training provider.

3.2.3 It is the applicant's responsibility to ensure that they comply with the requirements contained in the CAO. This CAAP can help the applicant to comply with the requirements.

3.3 Steps involved in this method of instrument rating renewal

3.3.1 Since this method of instrument rating renewal differs from the normal process (i.e. the instrument flight check is conducted outside of the Australian system), a number of specific requirements exist. These requirements exist to ensure the competency of those applying for renewal is equal to that demonstrated in the normal manner of renewal. The renewal process makes provision for certain delegates of CASA to perform certain tasks as each case requires.

3.3.2 The unique requirements relevant to this method of renewal include:

(a) ten days prior notice to be given to CASA;
(b) specific requirements over who the training provider and the checker conducting the check can be;
(c) specific requirements over the flight simulator to be used;
(d) an oral aeronautical knowledge test conducted by an Australian ATO (in addition to the simulator check);
(e) certain restrictions over who may re-issue the rating; and
(f) certain administrative procedures.

3.3.3 This CAAP explains, step-by-step, the recommended processes an applicant could go through to take advantage of this method of instrument rating renewal.

4. The Notice to CASA

4.1 Notice of intent to conduct an instrument rating renewal in an overseas flight simulator

4.1.1 An applicant who wishes to renew their instrument rating using an overseas flight simulator training provider is required, by subparagraph 12A.2 of CAO 40.2.1, to give CASA ten (10) working day's prior notice of their intent to conduct an instrument rating renewal in an overseas simulator.

4.1.2 The notice should be provided to the applicant's nearest CASA office, or over-sighting CASA office (in the case of Civil Aviation Regulation (CAR) 217 training and checking operation).

4.1.3 To ensure the application is recorded and documented properly, a written notice is recommended. A template for this notice is provided at Appendix A of this CAAP.

4.1.4 The notice should include the name of the training provider, details of the flight simulator (such as its type, serial number and International Civil Aviation Organization (ICAO) certified level), and the date of the proposed check. If only a block of dates is known (for example, between February 18 and 22) CASA will accept this.

4.1.5 An applicant may also be asked by CASA who the intended ATO or FOI conducting the oral examination is (see Section 8 of this CAAP). If it is known, it should be included in the notice.

4.1.6 Once the notice has been processed, CASA will issue the applicant with a Flight Test Number. This number should be included on the documentation sent to CASA.

4.2 Flight simulator user approval

4.2.1 Under Civil Aviation Safety Regulation (CASR) 60.055, a person who intends to use a flight simulator for checking purposes, must apply to CASA for approval to do so. CASA has issued an Exemption for applicants conducting an instrument proficiency check in an overseas simulator. For this Exemption to be applicable, the applicant must provide at least ten working days prior notice to CASA of their intent to conduct an instrument rating renewal in an overseas simulator.

5. The Training Provider and Checker

5.1 The overseas flight simulator training provider

5.1.1 Naturally, CASA could not allow just any training provider to be permitted to conduct an instrument flight check. To be eligible, a training provider needs to be in a Contracting State whose flight simulator qualification certificates are recognised by CASA. A list of these States is contained in Advisory Circular (AC) 60-2 and include (at the time of publication of this CAAP): Canada, Hong Kong (Special Administrative Region of China), New Zealand, the United States of America, Belgium, the Czech Republic, Denmark, Finland, France, Germany, Ireland, Italy, the Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

5.1.2 The training provider needs to be certified by the relevant over-sighting National Airworthiness Authority (NAA) to undertake operating crew training and checking of which instrument proficiency checks in the simulator are an approved part.

This certification varies from State to State. For example, in the USA a training provider must be certified under Federal Aviation Regulation (FAR) Part 142, and approved to conduct instrument proficiency checks under FAR 61.57(d).

Note: A copy of the training provider's certificate is required to be supplied at the time of renewal (see Section 9 of this CAAP).

5.2 The overseas checker

5.2.1 As with an organisation's certification, certain requirements over the person conducting the checks are laid out in CAO 40.2.1.

5.2.2 The checker must be certified to a standard equivalent to that of an Australian ATO approved to conduct instrument renewals/proficiency checks.

The checker must also be an employee of the certified training provider. Using the example for the USA above, the checker would be a Training Center Evaluator (TCE) approved under FAR 142.55, with a FAR 61.57(d) authority.

Note: A copy of the checker's certificate (setting out their approval to conduct instrument proficiency checks) is required to be supplied at the time of renewal (see Section 9 of this CAAP).

6. The Flight Simulator

6.1 Qualified flight simulators

6.1.1 The ICAO Manual of Criteria for the Qualification of Flight Simulators (MCQFS) – Document 9625-AN/938 – establishes an international standard for aeroplane flight simulators. MCQFS was intended to provide the means for the NAAs of other States to accept the qualifications granted by the State which conducted the initial and recurrent evaluation of an aeroplane flight simulator, without repetitive evaluations, when considering approval for the use of that aeroplane flight simulator by applicants from their own State. Australia's aeroplane flight simulator standards, detailed in Manual of Standards (MOS) Part 60, are consistent with the MCQFS.

6.1.2 CASA recognises aeroplane and helicopter flight simulator qualifications granted by other States when their:

(a) Flight Simulator Standards are consistent with MOS Part 60; and
(b) NAA has an acceptable level of oversight of the operation of the flight simulator.

6.1.3 As noted in paragraph 5.1.1, CASA currently recognises the flight simulator qualification certificates issued

by the following States: Canada, Hong Kong (Special Administrative Region of China), New Zealand, the United States of America, Belgium, the Czech Republic, Denmark, Finland, France, Germany, Ireland, Italy, the Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom. These States, and the process of how they become recognised by CASA, are outlined in AC 60-2.

6.2 Flight simulator user approval

6.2.1 Under CASR 60.055, a person who intends to use a flight simulator must apply to CASA for approval to do so. As mentioned in paragraph 4.2.1, an Exemption will apply to the applicant once the notice of intent to conduct a renewal in an overseas simulator is received by CASA.

7. The Instrument Flight Check

7.1 Australian rating – Australian procedures

7.1.1 As specified in subparagraph 12A.3(e) of CAO 40.2.1, the checks undertaken in the simulator must conform to Australian instrument procedures and comply in all respects with the Australian instrument rating renewal requirements in Appendix I of the Order.

For example, the Australian instrument rating renewal requirements in Appendix I include a requirement for the holder to satisfactorily demonstrate a circling approach. This and other requirements contained in the Appendix may differ from the requirements of the State where the check is being conducted. The applicant should emphasise to the overseas checker that the Australian requirements must be checked. The check flight should also be conducted in a continuous manner from take-off to landing, and not over several isolated sessions.

7.1.2 It is recommended that the checks undertaken are simulated at an Australian aerodrome so, subsequently, the flight simulator used should have an Australian aerodrome and navigation aids database. The applicant should confirm that the simulator(s) used by the flight simulator training provider does have current Australian aerodromes and navigation aids database when they make a booking. If the flight simulator used by the applicant does not have a current Australian database, the applicant should be familiar with Jeppesen-style instrument procedure charts, as international procedures will only be depicted on these types of charts.

7.1.3 The person being tested must successfully complete all of the checks relevant to the grade of instrument rating being renewed. It is recommended that CASA Form 645 – Application for an Instrument Rating – is used throughout the check to ensure all applicable items for the grade of rating being renewed are checked. All of the competencies outlined on it applicable to the renewal of the rating, and what is required in Appendix I of CAO 40.2.1, need to be checked, demonstrated successfully and recorded. An example of how the Form can be used is attached at Appendix B of this CAAP.

Note: A written statement of the checks successfully completed in the simulator is required to be submitted at the time of renewal (see Section 9 of this CAAP).

8. The Oral Aeronautical Knowledge Test

8.1 Australian rating – Australian aeronautical knowledge

8.1.1 Subparagraph 12A.1(b) of CAO 40.2.1, requires that an oral aeronautical knowledge test, in addition to the simulator check, be conducted by either an Australian ATO, CAR 217 chief pilot or approved check pilot, or a CASA FOI (as the case requires).

This is to ensure that the applicant has sufficient knowledge of Australian procedures and regulations (General Aviation Aerodrome Procedures [GAAP], for example – a check that an overseas checker may not be fully capable of assessing). The person conducting the oral test must be approved to conduct renewals for the grade of instrument rating applied for.

8.1.2 This oral test would essentially be similar to that an applicant would go through prior to a standard instrument renewal flight test and would be based on the matters mentioned in subclause 1.1 of Appendix I of CAO 40.2.1.

8.1.3 An applicant not employed in a CAR 217 organisation must conduct an oral test with an Australian ATO, or CASA FOI, who is approved to conduct renewals for the grade of instrument rating being applied for. If the applicant chooses to conduct the oral test with a CASA FOI, the applicant may be charged a fee based on Item 5.19 of the *Civil Aviation (Fees) Regulations 1995*.

8.1.4 A pilot who is subject to a CAR 217 training and checking organisation is able to conduct the oral test with the organisation's chief pilot who must be approved (approved to conduct renewals for the grade of instrument rating being applied for) or an approved check pilot (who must be approved to conduct renewals for the grade of instrument rating being applied for).

8.1.5 Written evidence of the successful completion of the oral test is required to be submitted to CASA at the time of renewal. A template, which can be used as evidence that the oral test has been conducted, can be found at Appendix C of this CAAP. This template includes a number of topics which may be checked to fulfil this requirement.

9. The Renewal Process

9.1 Different processes for different people

9.1.1 The instrument rating renewal process (if this method is used) can differ between a pilot who is a member of a CAR 217 organisation and a private operator. This section of the CAAP outlines the different processes an applicant can go through depending on their situation.

9.2 The private operator

9.2.1 Once the applicant has successfully completed the instrument check (described in Section 7 of this CAAP), and the oral test (described in Section 8) the applicant's instrument rating can be renewed.

9.2.2 The instrument rating must only be renewed by an appropriate CASA officer who holds a CAR 5.14(2) delegation. This is considered necessary at this stage as, if the applicant undertook the simulator check independently with an overseas checker, CASA wishes to retain ultimate authority to renew the rating following the assessment of the documents and evidence presented in support of the application.

9.2.3 If a private operator conducts the simulator check independently with an overseas checker and then conducts an oral test with an ATO, he or she must apply to CASA for renewal. This should be through the Flight Crew Licensing section in Canberra:

Flight Crew Licensing
Civil Aviation Safety Authority
GPO Box 2005
Canberra ACT 2601

9.2.4 However, it is also possible for the applicant to visit a CASA field office for renewal.

9.2.5 The applicant should submit:

(a) a copy of the training provider's approval certificate for undertaking training and checking, including instrument proficiency checks;

(b) a copy of the checker's approval and delegation for conducting instrument proficiency checks;

(c) CASA Form 645, or a statement (such as a 'Record of Training') signed by the checker outlining the successful checks undertaken (this must include all items required to be checked on CASA Form 645 for a renewal). The statement should include the grade of instrument rating being applied for;

(d) written confirmation from the FOI or ATO who conducted the oral test that the applicant has successfully completed test; and

(e) his or her logbook.

Note: The documents mentioned in (a) and (b) above may be submitted to CASA or the relevant delegate by electronic means.

9.2.6 The CASA officer will verify that the flight simulator used was one that is recognised by CASA, and is to the level required in Appendix II of CAO 40.2.1 for the renewal of an instrument rating.

Note: The instrument rating is not renewed until entered into the applicant's logbook.

9.2.7 If the application is sent to the Flight Crew Licensing section of CASA, it generally takes a CASA officer three to five days to process the renewal of the instrument rating. The applicant will be charged the standard fee of $50 (or as specified in Item 5.23 of the *Civil Aviation (Fees) Regulations 1995*) for the renewal.

9.2.8 Provision is made in subparagraph 12A.10(b) of CAO 40.2.1 for an appropriately qualified ATO (with a CAR 5.14(2) delegation) to renew the instrument rating only if that ATO observed the check flight in the simulator and conducts the oral examination. This may be useful where a number of pilots (including a delegated ATO) conduct proficiency checks at the same time at the certified training provider. Once the ATO is satisfied that the rating can be renewed, he or she should issue the rating (via the applicant's logbook) and submit all the required documentation mentioned in paragraph 9.2.5 to the CASA office they would usually use for a standard instrument rating renewal.

9.3 Member of a CAR 217 organisation

9.3.1 For a member of a CAR 217 organisation operating crew, following the oral test, and upon receipt of the documents mentioned in paragraph 9.2.5 above, a chief pilot or approved check pilot (who holds a CAR 5.14(2) delegation) is permitted to renew the instrument rating. The delegate should then submit the documentation to their over-sighting CASA office as they would do under normal circumstances.

9.3.2 However, for a chief pilot or approved check pilot to be able to renew the rating, the particulars of the oral test and renewal process must be specifically documented in the CAR 217 organisation's operations manual. The operations manual should include details of:

(a) The process for overseas instrument rating renewal, especially:

(i) management over-sight;

(ii) the method to advise CASA of activation;

(iii) copies of appropriate forms;

(iv) simulator checking syllabus;

(v) oral test syllabus;

(vi) delegate sign off following successful completion; and

(vii) the process to follow to advise CASA.

(b) The audit program of the overseas provider to ensure ongoing standards and compliance.

Greg Hood
Group General Manager
Personnel Licensing, Education and Training

APPENDIX A TO CAAP 5.14-1(0)

NOTICE OF INTENT TO CONDUCT AN INSTRUMENT RATING RENEWAL IN AN OVERSEAS FLIGHT SIMULATOR

SECTION A: PERSONAL & LICENCE DETAILS

Tick the appropriate box (✓)

Family Name	Given Names	Title	Date of Birth

Postal Address	Licence Number

Licence Type	Aircraft Category
CofV ☐ PPL ☐ CPL ☐ ATPL ☐	Aeroplane ☐ Helicopter ☐

Grade of Instrument Rating	Navigation Aids Endorsed
CIR S/E ☐ CIR M/E ☐ Co-pilot ☐	NDB ☐ VOR ☐ ILS ☐ LLZ ☐ GNSS/RNAV ☐ GPS/DME ARRIVAL ☐

SECTION B: OVERSEAS FLIGHT SIMULATOR TRAINING PROVIDER

Overseas Training Organisation	Training Provider Address	
Proposed Check Date(s)	Overseas Checker's Name (if known)	Training Provider Telephone Number
Flight Simulator (Aircraft) Type	Simulator Serial Number (if known)	ICAO Simulator Level

SECTION C: ORAL AERONAUTICAL KNOWLEDGE TEST

Name of Proposed Oral Testing Officer (if known)	Officer's Licence Number (if known)

SECTION D: APPLICANT'S DECLARATION

I declare that the particulars given above are, to the best of my knowledge, true in every respect. I understand the requirements of CAO 40.2.1 Section 12A and acknowledge the specific requirements applicable to this method of instrument rating renewal.	
Signature of Applicant	Date

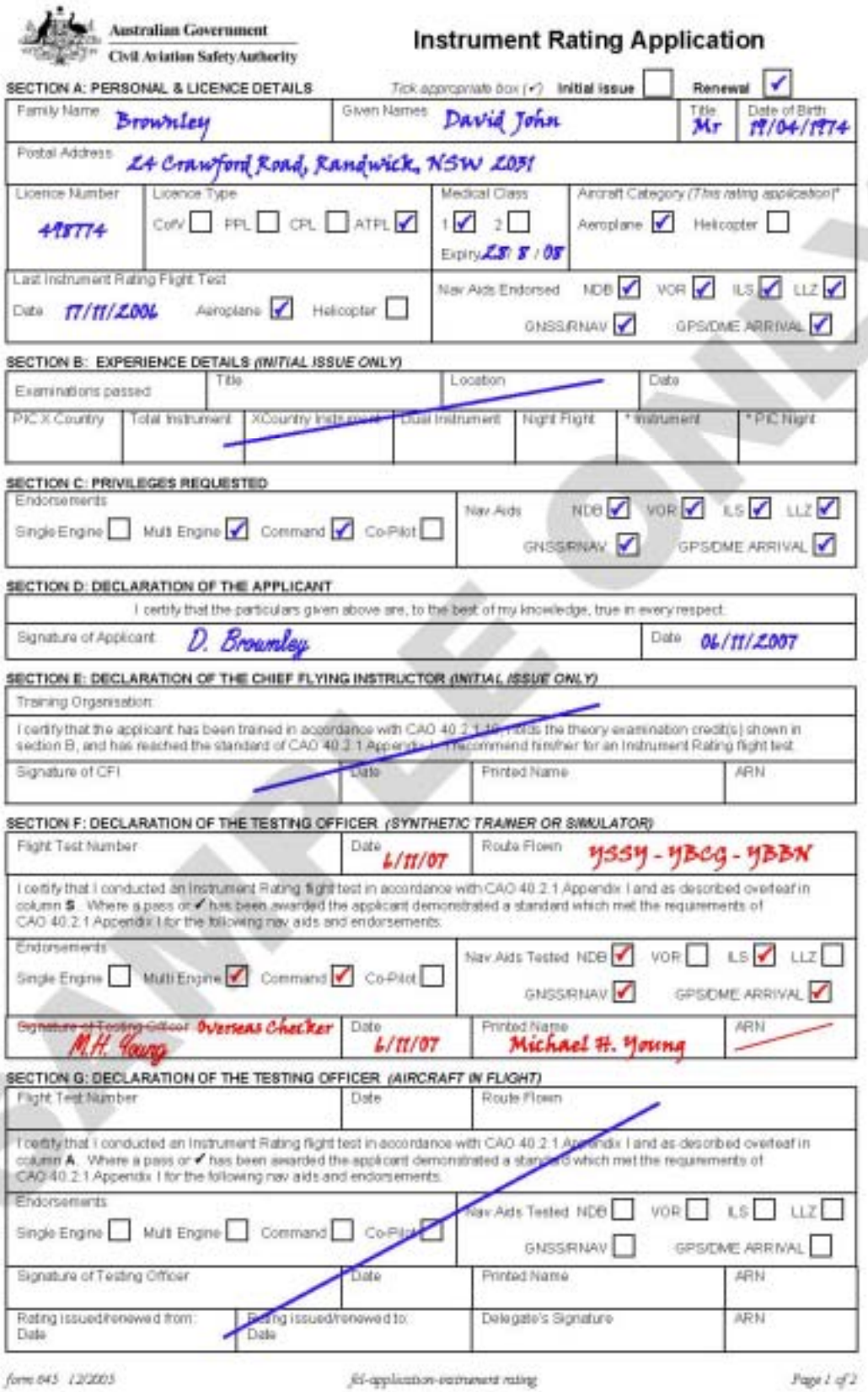
OFFICE USE ONLY

Date Received	Flight Test Number

INTENTIONALLY LEFT BLANK

APPENDIX B TO CAAP 5.14-1(0)

SAMPLE CASA FORM 645 FOR USE DURING SIMULATOR INSTRUMENT CHECK



Australian Government
Civil Aviation Safety Authority

Instrument Rating Application

SECTION A: PERSONAL & LICENCE DETAILS — Tick appropriate box (✓) Initial issue ☐ Renewal ☑

Family Name	Given Names	Title	Date of Birth
Brownley	David John	Mr	19/04/1974

Postal Address: 24 Crawford Road, Randwick, NSW 2031

Licence Number	Licence Type	Medical Class	Aircraft Category (This rating application)*
498774	CoPV ☐ PPL ☐ CPL ☐ ATPL ☑	1 ☑ 2 ☐ Expiry 28/8/08	Aeroplane ☑ Helicopter ☐

Last Instrument Rating Flight Test: Date 17/11/2006 Aeroplane ☑ Helicopter ☐

Nav Aids Endorsed: NDB ☑ VOR ☑ ILS ☑ LLZ ☑ GNSS/RNAV ☑ GPS/DME ARRIVAL ☑

SECTION B: EXPERIENCE DETAILS *(INITIAL ISSUE ONLY)*

Examinations passed	Title	Location	Date

PIC X Country	Total Instrument	XCountry Instrument	Dual Instrument	Night Flight	* Instrument	* PIC Night

SECTION C: PRIVILEGES REQUESTED

Endorsements: Single Engine ☐ Multi Engine ☑ Command ☑ Co-Pilot ☐

Nav Aids: NDB ☑ VOR ☑ ILS ☑ LLZ ☑ GNSS/RNAV ☑ GPS/DME ARRIVAL ☑

SECTION D: DECLARATION OF THE APPLICANT

I certify that the particulars given above are, to the best of my knowledge, true in every respect.

Signature of Applicant: D. Brownley Date: 06/11/2007

SECTION E: DECLARATION OF THE CHIEF FLYING INSTRUCTOR *(INITIAL ISSUE ONLY)*

Training Organisation:

I certify that the applicant has been trained in accordance with CAO 40.2.1 [illegible] holds the theory examination credit(s) shown in section B, and has reached the standard of CAO 40.2.1 Appendix I. I recommend him/her for an Instrument Rating flight test.

Signature of CFI	Date	Printed Name	ARN

SECTION F: DECLARATION OF THE TESTING OFFICER *(SYNTHETIC TRAINER OR SIMULATOR)*

Flight Test Number	Date	Route Flown
	6/11/07	YSSY - YBCG - YBBN

I certify that I conducted an Instrument Rating flight test in accordance with CAO 40.2.1 Appendix I and as described overleaf in column **S**. Where a pass or ✓ has been awarded the applicant demonstrated a standard which met the requirements of CAO 40.2.1 Appendix I for the following nav aids and endorsements.

Endorsements: Single Engine ☐ Multi Engine ☑ Command ☑ Co-Pilot ☐

Nav Aids Tested: NDB ☑ VOR ☐ ILS ☑ LLZ ☐ GNSS/RNAV ☑ GPS/DME ARRIVAL ☑

Signature of Testing Officer	Date	Printed Name	ARN
~~Signature of Testing Officer~~ Overseas Checker M.H. Young	6/11/07	Michael H. Young	

SECTION G: DECLARATION OF THE TESTING OFFICER *(AIRCRAFT IN FLIGHT)*

Flight Test Number	Date	Route Flown

I certify that I conducted an Instrument Rating flight test in accordance with CAO 40.2.1 Appendix I and as described overleaf in column **A**. Where a pass or ✓ has been awarded the applicant demonstrated a standard which met the requirements of CAO 40.2.1 Appendix I for the following nav aids and endorsements.

Endorsements: Single Engine ☐ Multi Engine ☐ Command ☐ Co-Pilot ☐

Nav Aids Tested: NDB ☐ VOR ☐ ILS ☐ LLZ ☐ GNSS/RNAV ☐ GPS/DME ARRIVAL ☐

Signature of Testing Officer	Date	Printed Name	ARN

Rating issued/renewed from: Date	Rating issued/renewed to: Date	Delegate's Signature	ARN

INTRODUCTION

The aim of this test is to demonstrate the applicant's ability to safely operate under the IFR to the standard specified in CAO 40.2.1 Appendix I. For renewal, items as specified in subsection 4 need not be tested.

The issue of the rating is dependent on a pass in the pre-flight aeronautical knowledge, general instrument flight and the use of at least the NDB or the VOR as a navigation and approach aid. An unsatisfactory final performance of any test item or procedure in any of these areas will result in an overall fail assessment for the instrument flight test. Failure in attempts to use other aids need not disqualify the candidate in respect of the basic rating.

The test may be discontinued at any point where an overall fail assessment is made. In this event, at the discretion of the testing officer, the candidate may be credited with a pass assessment in those test items successfully completed.

These credits need not be tested again if the instrument rating flight test is satisfactorily completed in all other aspects within 28 days. An applicant for the initial issue must demonstrate adequate knowledge of all items listed on the Knowledge Deficiency Report provided with the IREX result advice slip (attach copy).

For an initial issue, or a renewal of a lapsed rating, questions are to be asked on all items in the Pre-flight Examination section. Knowledge of DME arc and arrival procedures* should be checked on every test.

Simulated engine failures should be introduced at random times in an effort to make the simulated emergency and associated actions more difficult to predict. The simulation need not involve the feathering of a propeller.

S - *Simulator or synthetic trainer* A - *Aircraft in flight*

✓ Satisfactory X Unsatisfactory N Not Tested

INSTRUMENT RATING FLIGHT TEST REPORT

Pre-flight Examination

	Sequence	S	A
1	All Knowledge Deficiency Report items checked		
2	Knew privileges and limitations of rating		
3	Knew IFR and approach recency requirements		
4	Knew IFR flight and duty time limits (CPL & higher)		
5	Knew aircraft equipment limits and requirements		
6	Obtained & understood current operational information		
7	Correctly interpreted meteorological information		
8	Understood application of take off minima		
9	Determined alternate / holding requirements		
10	Knew IFR procedures for all airspace categories		
11	Correctly interpreted DAPs (*incl DME arcs & arrivals)		
12	Knew rules for operation below LSALT/MSA day/night		
13	Understood requirements for circling approaches		
14	Understood ERSA normal and emergency procedures		
15	Flight plan accurate and complete		
16	Publications amended and complete		

In-flight Examination

17	Aircraft fully serviceable for IFR flight	N	
18	Flight instruments & navaids checked before take off	✓	
19	Take off briefing covered abnormal actions & plan	✓	
20	Correct IFR airways procedures applied	✓	
21	Traffic information sought and used as appropriate	✓	
22	Accepted navigation procedures used	✓	
23	Tracks maintained within ± 5° or 1/2 scale deflection	✓	
24	Altitudes maintained within ± 100'; minima + 100 - 0'	✓	
25	Headings maintained within ± 5°; init 20° asymmetric	✓	
26	Airspeeds maintained within ± 10 knots	✓	
27	Turbulence penetration demonstrated or described	✓	
28	Steep turns solely by reference to instruments	✓	
29	Normal flight–no primary attitude indicator ± 5°; ± 200'	✓	
30	Unusual attitude recovery–no primary attitude indicator	✓	

Comments:

	Sequence	S	A
31	**NDB** - entry and holding pattern correctly flown ± 100'	✓	
32	- tracking within ± 5 degrees	✓	
33	- altitude +100 - 0' at minima	✓	
34	- ident monitored during approach	✓	
35	**VOR** - entry and holding pattern correctly flown ± 100'	N	
36	- tracking within 1/2 scale deflection	N	
37	- altitude +100 - 0' at minima	N	
38	**LLZ** - entry and holding pattern correctly flown + 100'	N	
39	- tracking within 1/2 scale deflection	N	
40	- altitude checked against marker beacon/DME	N	
41	- altitude +100 - 0' at minima	N	
42	**ILS** - entry and holding pattern correctly flown ± 100'	✓	
43	- tracking within 1/2 scale deflection	✓	
44	- altitude checked against marker beacon/DME	✓	
45	- altitude +100 - 0' at minima / able to land	✓	
46	**GNSS/RNAV**–entry / holding pattern correctly flown ±	✓	
47	- approach mode activated on final	✓	
48	- tracking within 1/2 scale deflection	✓	
49	- altitude ± 100'; + 100'–0' at minima	✓	
50	- GPS integrity checked	✓	
51	**DME/GPS ARRIVAL** - descent not below steps/LSALT	✓	
52	- tracking within ± 5° or 1/2 scale deflection	✓	
53	- altitude +100'; + 100'–0' on final and at minima	✓	
54	- GPS integrity checked	✓	
55	At least one approach without Flight Director/Auto pilot	✓	
56	Circling approach flown safely from NDB approach	✓	
57	Correctly identified navigation aids	✓	
58	Engine failure during/after take off (Aeroplanes)	✓	
59	Engine out/autorotation (Helicopters)	N	
60	Engine failure prior to/during approach	✓	
61	Engine out missed approach	✓	
62	Appropriate use of cockpit resources throughout	✓	
63	Maintained safe orientation and aircraft separation	✓	
64	Demonstrated sound aircraft and engine handling	✓	
65	Demonstrated sound command judgement	✓	

PASS / FAIL	Ground Time	Simulator Time	Aircraft Flight Time	Simulator/Aircraft Type(s)	VH -
PASS	1:00	1:15		CAE FAR Level D	

The Federal Government TimeSaver initiative aims to assess the time taken to complete Government Forms. Please indicate the approximate time taken to complete this form. Hrs Mins

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APPENDIX C TO CAAP 5.14-1(0)

ORAL AERONAUTICAL KNOWLEDGE TEST – INSTRUMENT RATING RENEWAL USING AN OVERSEAS FLIGHT SIMULATOR TRAINING PROVIDER

The types of knowledge competencies below are recommended to be tested to comply with subparagraph 12A.1(b) of Civil Aviation Order (CAO) 40.2.1. The number of these topics tested is at the discretion of the delegate conducting the oral test. However, knowledge of General Aviation Aerodrome Procedures (GAAP) aerodrome operations, distance measuring equipment (DME) arc and arrival procedures (if applicable) should be tested.

- The action to obtain the necessary meteorological documentation.
- Correct interpretation of meteorological documentation.
- Pilot qualifications for Instrument Flight Rules (IFR) flight, including approach recency requirements, and flight and duty time limitations.
- The privileges and limitations of the grade of instrument rating being applied for.
- The documents required to be carried on an IFR flight.
- Aircraft certification requirements and limitations on IFR flight.
- Airways and operational requirements in all classes of airspace.
- Route selection limitations.
- Determination of lowest safe altitude (LSALT) for routes not shown in the Aeronautical Information Publication (AIP) map.
- Standard cruising levels.
- Alternate aerodrome requirements.
- Holding requirements.
- Determination of take-off criteria.
- Air Traffic Control (ATC) clearance procedures.
- Departure procedures, including standard instrument departures (SIDs), and operations outside control area (OCTA), control zone (CTR) and GAAP.
- Climb and cruise procedures, including change of level procedures.
- Approach and landing procedures, including Standard Terminal Arrival Routes (STARs), operations OCTA, CTR and GAAP, visual/circling approach procedures, operation of pilot activated lighting (PAL).
- The conditions under which an aircraft may descend below LSALT.
- The circumstances when a missed approach must be executed.
- The obstacle clearance provided by the minimum circling altitude of IFR aircraft, both day and night.

Name of Applicant	Licence Number	Flight Test Number

DECLARATION BY TESTING OFFICER

I have tested the applicant on topics relevant to the grade of instrument rating being sought. I declare the applicant possesses sufficient and adequate aeronautical knowledge for the renewal of the grade of instrument rating being applied for.	
Name of Testing Officer	Licence Number
Signature of Testing Officer	Date

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