THE GLIDING FEDERATION OF AUSTRALIA INC

Level 1/34 Somerton Road Somerton 3062
Phone: (03) 9303 7805; Fax: 9303 7960

MANUAL OF STANDARD PROCEDURES

PART 2

OPERATIONS

This issue of MOSP 2 replaces the one issued in June 2001

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FOREWORD

The Gliding Federation of Australia (GFA), operating under a Deed of Agreement with the Civil Aviation Safety Authority (CASA), is the Recreation Aviation Administration Organisation responsible for the administration of sport and recreational gliding and sailplane activities in Australia.

Among the functions performed to assist CASA to set and monitor the standards for sailplanes, powered sailplanes and power-assisted sailplanes are the following:

Compliance Functions

1. Seek to ensure that all members of the Federation operate gliders, powered sailplanes and power assisted sailplanes in accordance with CAO 95.4 and the GFA Operational Regulations and other manuals and directives of the GFA;
2. Assist CASA by monitoring standards and procedures of glider pilot certification systems, including gliding instructor, passenger flying and radiotelephone authorisations to ensure compliance;
3. Monitor the operational standards and procedures of member clubs and rectify any deficiencies detected to ensure compliance with the GFA Operational Regulations and other applicable GFA directives;
4. Liaise with glider pilots visiting Australia from overseas countries and flying foreign registered gliders to ensure those pilots comply with applicable Australian standards;
5. Examine the results of incident and accident investigations to ensure that standards have been complied with;
6. On behalf of CASA, investigate alleged breaches of CAR, CASR and the GFA Operational Regulations by pilots of sailplanes, powered sailplanes, and power assisted sailplanes;
7. Assist CASA by monitoring sailplane, powered sailplane and power assisted sailplane certification systems, including Certificates of Registration, Certificates of Airworthiness, Special Flight Permits and Airworthiness Directives to ensure compliance in accordance with the general requirements specified in CASR Parts 21, 22 and 39 of CAR;
8. Monitor the airworthiness standards and procedures of member clubs and rectify any deficiencies detected to ensure compliance with the standards specified in the GFA Manual of Standard Procedures and in accordance with the general requirements specified in CASR Parts 21, 22 and 39 of CAR; and
9. Provide quarterly statistical reporting in relation to the numbers of GFA members, aircraft, accidents, incidents, defects and fatalities.

Standards Functions

10. Assist CASA to set standards and procedures for glider pilot certification systems, including gliding instructor, passenger flying and radiotelephone authorisations;
11. Review the GFA Operational Regulations as necessary and submit amendments to those Regulations to CASA for approval;
12. Liaise with and advise CASA on developments in gliding techniques and equipment; and
13. Examine the results of incident and accident investigations to ensure that standards are appropriate.

In accordance with the general requirements specified in CASR Parts 21, 22 and 39 of the CAR:

14. Assist CASA to set the standards for sailplane, powered sailplane and power assisted sailplane certification systems, including Certificates of Registration, Certificates of Airworthiness, Special Flight Permits and Airworthiness Directives; and
15. Liaise with and advise CASA on developments in glider airworthiness;

Safety Promotion Functions

16. Conduct safety education programs for the Members;
17. Provide guidance to members in the form of advice and information to assist in the maintenance of safety in the airworthiness of sailplanes, powered sailplanes and power assisted sailplanes in accordance with the general requirements specified in CASR Parts 21, 22 and 39 of CAR; and
18. Provide guidance to members in the form of advice and information to assist in the maintenance of safety in the operation of sailplanes, powered sailplanes and power assisted sailplanes.

Regulatory Framework

Gliding in Australia is subject to the Civil Aviation Act 1988, Civil Aviation Regulations 1988, Civil Aviation Safety Regulations 1998 and other relevant Legislation as amended from time to time. Certain exemptions from the provisions of the Civil Aviation Regulations 1988 have been granted to members of the GFA by way of Civil Aviation Orders 95.4 and 95.4.1. Where exemptions exist, the practices adopted by GFA are outlined in the GFA Operational Regulations approved by CASA.

This Manual of Standard Procedures outlines the basic rules and recommendations by which gliding operations are conducted in Australia. Organisations affiliated with the GFA and individuals becoming members must agree to accept and operate within these rules.

In this document the term 'sailplane' shall include powered sailplanes and power assisted sailplanes.

Where the requirements of these Standard Procedures differ from those contained in the GFA Operational Regulations or the other Legislative documents, the GFA Operational Regulations and other Legislative documents shall take precedence.

Certification, maintenance, modification and repair of sailplanes, powered sailplanes and power-assisted sailplanes shall be carried out in accordance with MOSP Part 3 (Airworthiness).

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REVISION HISTORY

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GLOSSARY OF TERMS USED IN THIS MANUAL

A	Altitude (e.g. A100 = 10,000 feet AMSL). The vertical distance of a level, a point or an object, considered as a point, measured from mean sea level. An altimeter when set to **QNH** or **Area QNH** it will indicate **altitude.**
AEF	Air Experience Flight.
AEI	Air Experience Instructor.
ADS-B	Automatic-Dependant Surveillance-Broadcast (Air Traffic Management system).
AIP	Aeronautical Information Publication Australia.
AGL	Above Ground Level (See also QFE).
AMSL	Above Mean Sea Level (See also QNH).
Area QNH	A forecast altimeter setting which is representative of the QNH of any location within a particular area.
ASRS	ATSB Aviation Self Reporting Scheme.
AOC	Air Operator's Certificate.
ASI	Air Speed Indicator.
ATC	Air Traffic Control.
ATSB	Australian Transport Safety Bureau.
BCAR	British Civil Airworthiness Requirements, the standard of construction to which some of the older gliders (e.g. Kookaburra) were built.
CAA	Civil Aviation Act.
CAD	Chairman of the GFA Airworthiness Department.
CASA	Civil Aviation Safety Authority.
CAO	Civil Aviation Order, a functional document enabling practical use to be made of a Civil Aviation Regulation.
CAR	Civil Aviation Regulation. A statutory aviation regulation of the Commonwealth of Australia.
CASR	Civil Aviation Safety Regulation. A statutory aviation regulation of the Commonwealth of Australia.
CFI	Chief Flying Instructor (Club/Operator).
COP	Chairman of the GFA Operations Panel.
CTAF	Common Traffic Advisory Frequency.
CTO	GFA Chief Technical Officer.
CTP	Chairman of the Training Panel (Club/Operator).
DI	Daily Inspection.
ELT	Emergency Locator Transmitter.
ERC	En Route Chart - ERCs-L, ERCs-H and TACs are presented at various scales and depict airspace, air routes and radio navigation facilities.
ERSA	En-Route Supplement, Australia, a CASA document listing full information, including layout diagrams, on all licensed (and some unlicensed) aerodromes.
FAI	Federation Aeronautique Internationale.
FL	Flight Level, the height reading on an altimeter with 1013.2 HPa set on its sub-scale, used only above 10,000 feet AMSL (e.g. FL200 = 20,000 feet with 1013.2 set).
FOI	CASA Flying Operations Inspector

FROL	Flight Radiotelephone Operator's Licence issued by CASA.
GFA	Gliding Federation of Australia.
HF	High Frequency.
HPa	Hectopascal, the unit of pressure set on an altimeter sub-scale.
JAR-22	Joint Airworthiness Requirements, Section 22 (Gliders).
IAS	Indicated Air Speed.
IFR	Instrument Flight Rules.
IMC	Instrument Meteorological Conditions.
IO	Independent Operator.
Km	Kilometre.
Mode C	Another operating mode of a transponder, in which altitude-encoded information is added to the unique code already being transmitted.
MOSP	Manual of Standard Procedures (this document).
MR	Maintenance Release.
NM	Nautical Mile.
NOTAM	NOTice to AirMen, a document issued by the CASA to provide operational information to pilots which supersedes that available in other publications.
OD	Operations Directive.
PCA	Planning Chart Australia.
PLB	Personnel Locator Beacon.
PPL	Private Pilot's Licence.
QFE	Altimeter setting in which the altimeter will read zero with the glider on the ground.
QNH	Altimeter setting in which the altimeter will read the field's elevation above sea level with the glider on the ground.
REPCON	ATSB Confidential Reporting Scheme.
RTO/A	Regional Technical Officer, Airworthiness.
RTO/O	Regional Technical Officer, Operations.
SAR	Search and Rescue.
SMS	Safety Management System. The GFA SMS is the Risk Management Toolkit, which provides a structured way of identifying and analysing potential risks, and devising and implementing responses appropriate to their impact.
SSR	Secondary Surveillance Radar, a type of radar which only shows a return to an air traffic controller from an aircraft which is equipped with a transponder. A radar which will show "raw" returns from an aircraft's skin, without the need for a transponder to be fitted, is known as Primary radar.
TAC	Terminal Area Chart – show details applicable to both high and low level operations in terminal areas.
TAS	True Air Speed.
Transponder	A microwave receiver/transmitter unit fitted to an aircraft which, when interrogated by an SSR, responds with a coded reply which positively identifies the aircraft and, if mode C is selected, the altitude of the aircraft.
UHF	Ultra High frequency.
VFR	Visual Flight Rules.

VNC	Visual Navigation Chart - (scale 1:500,000) are designed for operations under the VFR. They contain an aeronautical overlay of controlled airspace over a topographical base, and contain some radio communication and other navigational data appropriate for visual navigation. Map coverage is shown on the front of each map.
VTC	Visual Terminal Chart - (scale of 1:250,000) are designed for visual operations near terminal areas. They contain some topographical detail and appropriate airspace, radio communication and navigation aid information. These charts are intended for use up to and including FL180.
VHF	Very High Frequency.
WAC	World Aeronautical Charts - (scale of 1:1,000,000) are designed for preflight planning and pilotage. They are constructed on Lambert's conformal conic projection. Australian coverage is shown on the back of each chart.

8 BASIC OPERATIONAL REQUIREMENTS

8.1 FLYING OPERATIONS

8.1.1 General

Gliders are not permitted to fly under the IFR, in cloud or at night (CAO 95.4).

8.1.2 Documents and Charts

A pilot in command must have access during flight to appropriate documents and charts. For VFR flights these are the ERC, WAC, VNC, VTC and ERSA for the route being flown (CAR 233 (1) (h)).

8.1.3 Global Positioning Systems (GPS)

Pilots operating under the VFR may use GPS to supplement map reading and other visual navigation techniques (Refer AIP GEN 1.5 Section 8.5.4.1(a)).

8.1.4 Mutual Flying

Where a two-seat sailplane is flown by two pilots, one of them must be nominated as pilot in command (CAR 224).

8.1.5 Dual instruction

Dual instruction may only be given by a person holding a valid GFA instructor rating and the type of instruction given must be within the limits of the rating held.

8.1.6 Launching of gliders

The launching cable or rope may only be attached to the glider at the express order of the pilot.

8.1.7 Taxying after landing

Sailplanes should make a straight approach and landing run parallel to the runway strip and must not taxy clear of the runway strip unless operationally required and only if no other aircraft can land alongside in the direction of taxi. Powered sailplanes may taxi under power providing it is safe to do so.

8.1.8 Permissible sites

Glider and powered sailplane operations are permitted only on sites that meet GFA requirements (Refer Sections 17.2 and 18).

8.1.9 Outlandings and Retrieves from Paddocks

If a sailplane is landed on a private property, all reasonable actions shall be taken to obtain the permission of the landowner prior to removing the sailplane.

Consent of the landowner or his/her agent must be obtained prior to an aerotow paddock retrieve.

All gates should be left in a condition as found after removing the sailplane from the property where it has landed. Care should be taken not to damage crop or disturb stock.

Care must be also taken to ensure that any ‘vehicle movement restrictions’ in force during fire danger periods are observed. Fire risk potential must be assessed and considered on all occasions. Diesel powered retrieve vehicles are preferred due to the fire risk posed by catalytic converters on petrol vehicles, which typically operate at between 375°C and 600°C.

If a ground crew is not available, an aerotow retrieve launch may be carried out without one. Agreement on hook-up and signalling procedures must be reached and fully understood by both pilots prior to commencement of the launch. Closure of the canopy must not be used as the signal to proceed with the launch.

Note: Nothing in these regulations shall be construed as conferring on the operator of a sailplane any rights as against the owner or occupier of any land on or over which the operations are conducted, or prejudice in any way the rights and remedies which a person may have in respect of any injury to persons or damage to property caused directly or indirectly by any sailplane (CAR 93).

8.1.10 Smoking

Smoking is not permitted in aircraft, near stored fuel or within 15 metres (50ft) of any refuelling operations (CAO 20.9 (4.4.3)).

8.1.11 Aerobatics

Before engaging in aerobatic manoeuvres the pilot in command of a sailplane shall ensure that:

(a) The proposed manoeuvres are permitted by the sailplane's Certificate of Airworthiness;
(b) All occupants of the sailplane are secured with correctly-adjusted safety harnesses;
(c) The safety harness of any unoccupied seat is made secure so that it does not foul any controls of the sailplane;
(d) All loose articles are removed from the sailplane or made secure in the sailplane; and
(e) The proposed manoeuvres will not bring the sailplane into close proximity with other aircraft (CAR 155(4)).

8.1.12 Rules for prevention of collision

A sailplane which is required to give way to another aircraft shall do so by passing behind it or, if passing in front or above or below that aircraft, shall keep well clear (CAR 161).

Where two or more sailplanes are approaching to land, the lowest sailplane has the right-of-way but shall not use this rule to cut in front of, or overtake, another sailplane on final approach (CAR 162 (6)).

A power-driven aircraft shall give way to a sailplane which is approaching to land (CAR 162 (7)).

Where two sailplanes are at approximately the same height and both are approaching to land, the higher-performance sailplane shall give way to the lower-performance sailplane.

A sailplane or twoing combination that is about to take-off shall not attempt to do so until there is no apparent risk of collision with other aircraft (CAR 162 (8)).

A sailplane pilot who is aware that another aircraft is compelled to land shall give way to that aircraft (CAR 162 (9)).

8.1.13 Local rules and regulations

Local rules and regulations must be displayed in a prominent position, or otherwise easily available to all pilots.

8.1.14 Reporting of defects

Pilots must report any defects, in-flight overstressing or heavy landings to the Duty Instructor before the glider is flown again. Pilots-in-command are responsible for entering such defects in the appropriate section of the glider's Maintenance Release, regardless of the availability or otherwise of the Duty Instructor.

8.1.15 In-flight structural damage or failure

In the event of severe in-flight structural damage which is obviously serious but of unknown extent, a pilot wearing a parachute is recommended to consider abandoning the glider while sufficient height remains to do so. An example of this is the onset of severe flutter which does not respond to the normal remedial action of changing speed.

If not wearing a parachute and if control of the glider is still possible, the glider should be flown carefully to an immediate landing. When doing so, the pilot must avoid excessive flight loads, close proximity to other aircraft and built-up areas. Use airbrakes and flaps with caution. Do not continue the flight if serious damage is known or suspected.

8.1.16 Keeping of records

- All clubs must compile and keep such logbooks, flight records and time sheets as will enable an accurate record of the club's flying operations to be maintained. These records must be made available to the RTO/O or the CTO on request.
- Records involving finances including flight record sheets should be kept for seven years.
- The expired maintenance release is an extension of the log book and should be filed with the aircrafts records for safe keeping. Aircrafts records must be kept until one year after the aircraft has been removed from service or ceased to exist.
- Individual pilots are responsible for maintaining their own Training Syllabus until its completion and then shall provide a copy to their CFI for record keeping.
- Individual pilots shall retain their own Medical Declaration or Medical Practitioner's Certificate, and shall provide a copy to their CFI for record keeping purposes.
- Individual Pilots shall record their flight experience on the GFA membership renewal form each year.
- CFIs shall maintain records of pilot endorsements, ratings and annual flight reviews, and will provide details to the CTO upon request (Refer Operational Regulations, Section 3.7).
- Copies of CFI records of pilot training (including any completed Training Syllabus) and pilot Medical Declaration or Medical Practitioner's Certificate are required to be forwarded to the CTO upon completion (Refer Operational Regulations, Section 3.7).

8.1.17 Sporting events, operational factors

Regardless of venue, all competitions, regattas or sporting events held in a region are the operational responsibility of the RTO/O and must comply with normal GFA requirements. This includes National and World Championship events.

The competition official with operational responsibility will be the Safety Officer who must be approved by the RTO/O (refer Section 9.2.4).

In the event of a dispute regarding an operational matter, the decision of the Safety Officer will prevail.

8.1.18 Air Display approvals

Participation by glider pilots in air displays over public gatherings requires the approval of CASA. The 'Application for Air Display' (Form 696) and 'Display Pilot Details' (Form 697) are available from the CASA website. Completed forms should be forwarded to the Regional CASA FOI. Applicants will receive a request for payment for this process. Once payment is made, CASA will consider the application and, if approved, prepare the necessary instruments.

8.1.19 Search and rescue (SAR) action

If any glider remains unaccounted for at the end of a day's operations and a message has not been received as to the whereabouts of such a glider or the safety of its crew by one hour after last light, the person responsible for the club's operation on that day (usually the Duty Instructor) must initiate SAR action by telephoning 1800 815 257.

Pilots holding a Level 2 Independent Operations authorisation (Refer Section 13.1.2) are responsible for organising and briefing their own person responsible for initiating SAR action.

For further information refer to the The National Search and Rescue Manual, which is the standard reference document for use by all Australian Search and Rescue authorities and promulgates the agreed methods of coordination through which search and rescue operations are conducted within Australia.

8.1.20 Operations in remote areas

It is recommended that pilots operating in a designated remote area shall carry an ELT and be accompanied by sufficient crew to retrieve the sailplane without outside assistance.

One of the designated crew shall be responsible for maintaining a SARWATCH and initiating search action if necessary (Refer Section 8.1.19).

SAR action shall be initiated at 2100 hours local time, and in the event of outlanding the pilot shall activate the ELT no later than that time.

Pilots not resident in Australia shall hold certification from the CFI of their home club that they are competent to fly in remote areas and are proficient in the use of the English language. If they intend to operate at a licensed aerodrome which is not a regular gliding site, or one which is within a Control Zone, they shall apply in writing to the GFA at least 8 weeks prior to arrival.

All sailplanes operating in a Designated Remote Area shall be equipped with at least VHF radio capable of operating on all applicable ATC frequencies.

Further details may be found in Section 6 of the GFA document Airways and Radio Procedures for Glider Pilots.

8.1.21 Operational Safety Audits

All clubs must be checked by RTO/O or delegated Level 3 Instructor for the quality of their operational safety at least every two years (Refer Section 9.2.5). A three month extension may be granted by the CTO or COP where auditors are unable to complete a review within the two-year timeframe due to circumstances beyond their control (e.g. inclement weather).

Note: Clubs that have not been audited within these timeframes must cease operations until a satisfactory audit has been achieved.

8.2 GLIDER EXTERNAL MARKINGS

8.2.1 Registration markings

Refer GFA Operational Regulations, Section 1.3 and CASA Advisory Circular AC 45-01 – Nationality and Registration Marks for details.

8.2.2 Foreign registration markings

Foreign registration markings are not permitted on an Australian-registered glider. However, if damage to the glider finish is likely to occur due to removal of foreign registration, temporary dispensation against its removal may be obtained, pending re-finishing of the glider. Contact the RTO/A for details.

8.3 PROTECTION OF THE PUBLIC

GFA affiliated gliding clubs must take all steps as necessary to ensure the public's safety when on or nearby the airfield. These procedures must be included in the clubs SMS documentation.

8.3.1 Warning signs

Warning signs must be provided to give clear indication of hazardous areas to members of the public who are not club members.

8.3.2 Supervision

Adequate supervision of all non-members in the vicinity of the launch/landing area must be provided.

8.3.3 Winch-driver responsibility

Winch-drivers must ensure that launching does not take place if members of the public near the winch are at risk from flying cables or ropes, taking into account the likelihood of cable-breaks.

8.3.4 Responsibility for visitors

Charter and Private passengers or visitors undertaking glider flights as temporary GFA members must receive a safety and risk awareness briefing and be accompanied onto the gliding strip by a qualified club member.

8.3.5 Video cameras

Visitors' attention must be drawn to the hazards of using video cameras in launching and landing areas, due to the changed perspective of events seen through a viewfinder rather than with the naked eye.

9 OPERATIONAL RESPONSIBILITY

Decentralisation and self-discipline are the guiding principles on which the GFA structure is based. This implies that individual gliding clubs should be allowed to do whatever they can do properly and well, with minimum interference. This principle also applies to the area of responsibility of the Regional Associations.

The self-administrative responsibility taken on by the GFA for the safe and proper conduct of gliding operations by its members requires that advice, supervision and at times some degree of control be exercised to ensure that clubs operate to GFA requirements.

In the operational area, GFA holds a number of exemptions from the Civil Aviation Regulations in order to fulfil its sporting obligations while keeping safety standards at the highest possible level. These exemptions only apply when operations are carried out in accordance with GFA requirements as laid down in the GFA Operational Regulations and this Manual of Standard Procedures.

The GFA is committed to its own Safety Management System. This SMS will be continually refined, updated and developed. Clubs are required to develop and introduce their own SMS and incorporate their SMS into their Operations Manual.

9.1 OPERATIONAL RESPONSIBILITY AT CLUB LEVEL

As well as performing its own internal management functions, a club committee is responsible to a Regional Association for ensuring that gliding operations are carried out to GFA requirements (**Note:** The Regional Association is a GFA body).

Within a club, responsibility for operational standards, safety and training is devolved to the Club Operations and Training Panels as defined in 9.1.3 and 9.1.4. The two panels may be combined at the CFI's discretion.

A club Safety Officer may also be appointed and be responsible to the Club Committee for the growth and development of the Club's Safety Management System (SMS), its implementation and continuing development.

9.1.1 Club Safety, Operational and Training Standards

Overall responsibility for a Club's safety, operational and training standards rests with the Club's Level 2 and 3 Instructors acting under the leadership of a Chief Flying Instructor (CFI).

9.1.2 The Chief Flying Instructor (CFI)

9.1.2.1 Selection of a CFI

The CFI will be an active (refer Section 11.3.1) Level 2 or 3 rated Instructor.

The quality of the CFI is critical to both the safety of the flying operations and the standard of the Club or Operator's training. Therefore, the assessment of a nominee to the position is important.

The position requires aeronautical qualifications and experience, and it follows that the more sophisticated the operation the more sophisticated the expected knowledge baseline should be. Leadership and credibility are also vital.

The CFI is elected by the level 2 and 3 Instructor members of the Club Operations Panel, and endorsed by the Club Committee.

A Club or Operator must make written application to the RTO/O of the Region for approval of the appointment of a person as Chief Flying Instructor (Refer Section 9.2.1).

9.1.2.2 Role of a CFI

The CFI's role is to ensure the Club's Instructors satisfactorily maintain operational and training standards in accordance with GFA requirements and shall:

- Keep track of training and safety within the club.
- Monitor the progress and problems of all pilots in the club.
- Monitor all aspects of club operations.
- Monitor Pilot ratings within the club.
- Supervise and provide guidance to newly trained Level 1 Instructors.
- Ensure standardisation of instruction, using the GFA Instructor's Handbook as the reference.
- Ensure adequate preparation of candidates for instructor training.
- Follow up accidents and incidents investigations and make recommendations to prevent recurrences.
- Prepare and submit the annual Active Instructor Returns to the RTO/O.
- Collate and report pilot privileges, ratings, endorsements, etc. to the GFA Office as required.
- Be the Club's point of reference for all GFA operational matters.

9.1.3 Club Operations Panel

Whenever necessary the CFI will meet with the Level 2 and 3 Instructors to discuss issues relating to safety and operational matters. The Club Operations Panel has jurisdiction on all technical matters of instruction, training and operations.

9.1.3.1 Relationship to Club Committee

The Club Operations Panel should refer to the Committee for ratification (usually a formality) those matters on which it feels obliged to make decisions but which border on the rights and functions of the Committee.

9.1.3.2 Relationship to Club Training Panel

Whenever there is a disagreement relating to operational and training standards, and/or safety, the determinations of the Club Operations Panel will prevail over the Club Training Panel.

9.1.4 Club Training Panel

Club Training Panels will comprise the club's instructors and coaches. There are two compulsory positions within the Training Panel – Chief Flying Instructor (CFI) and Chairman of the Training Panel (CTP).

The CTP may be either an instructor or a coach and will be elected by the members of the Training Panel and ratified by the Club Committee.

The CFI may also be elected to the position of CTP in order to combine the two positions. When the CFI and the CTP is not the same person, each must clearly understand and accept their roles and responsibilities, viz.:

- The CFI is responsible to the Club Committee for all matters relating to safety, operational and training standards and is the Club's Officer responsible to the GFA.
- The CTP will lead the Training Panel to develop pilot training programmes to ensure that Club members are trained in all aspects of gliding relevant to their aspirations and will report to the Club Committee on the activities of the Training Panel.

9.2 OPERATIONAL RESPONSIBILITY AT REGIONAL LEVEL

At Regional level there is a Regional Technical Officer/Operations (RTO/O), who is a voluntary officer of the GFA. The RTO/O is nominated by the Regional Committee and approved by the CTO prior to the ratification of the appointment by the GFA Board. RTO/O duties are as follows:

9.2.1 Ratification of club CFI

When a club selects a replacement CFI, it is GFA policy that the RTO/O is required to ratify the appointment of such persons (Refer Section 9.1.2.1). A Club or Operator must make written application to the RTO/O of the Region for approval of the appointment of a person as Chief Flying Instructor. The information in the application should include at least the following in relation to the nominee:

- Details of current ratings and endorsements held;
- Total flight time, total time as pilot in command, total flight time as an instructor including flight time and period of time as a Level 2 instructor (flight time should also include number of flights); and
- Supporting comments as to why the applicant is considered suitable for the role.

Subject to the information recorded in the application being sufficient to make an assessment, the RTO/O may decide to conduct an interview with the applicant (either in person or by telephone) in order to make a determination of acceptability.

If the nominee is found to be unacceptable, the application will be rejected and the applicant advised in writing.

9.2.2 Approval of instructor training/testing

Before the training of an instructor commences, an application must be made to the RTO/O on the appropriate form (APPENDIX 2 - APPLICATION FOR LEVEL 1 INSTRUCTOR TRAINING, and APPENDIX 3 - APPLICATION FOR UPGRADE FROM LEVEL 1 to LEVEL 2 INSTRUCTOR). The RTO/O will then allocate a mutually agreed Level 3 Instructor to carry out the training.

Flight tests for the issue of an Instructor rating are administered in the same way, via the RTO/O (Refer Section 11.2.1).

9.2.3 Initial Issue and Removal of Level 3 Instructor Authorisation

Individual L3 instructor ratings will be issued by the RTO/O in each GFA region consistent to the requirements of that region (Refer Section 11.4).

A Level 3 instructor authorisation may be removed by a RTO/O at any time subject to requirements contained in Section 10.10.

9.2.4 Ratification of a competition Safety Officer

A competition Safety Officer (Refer Section 8.1.17) must be a Level 2 or 3 rated Instructor and must be ratified by the RTO/O.

Accompanying this ratification process, the RTO/O and Safety Officer should review the Local Rules associated with the competition to ensure clarity and compliance with current regulations.

9.2.5 Conduct of Operational Safety Audits

All clubs in the region must be audited every two years to ensure that operational standards are being maintained (Refer Section 8.1.21). A three month tolerance at the expiration of the two years is allowed for planning considerations.

During these visits, the CFI must be checked, together with as many of the club instructors and senior pilots as possible. Student pilots should where possible be checked, to assess training standards and effectiveness.

Applicable emergency procedures must be checked during the visit, together with any emergency equipment appropriate to the launch method.

A check of club spin-training methods and standards is essential and must never be omitted. The same applies to the airmanship standards of the club, especially lookout.

A check list at APPENDIX 4 - OPERATIONAL SAFETY AUDIT is to be used by the RTO/O for the purpose of periodic checking of clubs. Completed Operational Safety Audit reports and supporting documentation must be returned to the CTO as soon as possible after the visit has been completed.

9.2.6 Approval of gliding sites

Operational approval of all regular gliding club sites in the region is the responsibility of the RTO/O, in conjunction with the regional Airfields and Airspace Officer. In considering such approvals, due account must be taken of aerodrome status and any CASA or other requirements which may apply (Refer Sections 17.2 and 18).

9.2.7 Record-keeping

The RTO/O is responsible for keeping records of all instructors in the region. This includes AEIs and Charter pilots. Clubs are required to submit Active Instructor returns to their RTO/O annually (Refer Section 11.3). Reminders will be sent by GFA to all clubs when the data is required. Upon receipt of the required data, the RTO/O will compile a consolidated list of the above and then forward it to the CTO.

9.2.8 Revalidation of inactive instructors

Flexibility is encouraged in the handling of instructors who have become inactive for any reason. The RTO/O must define and authorise the requirements for reactivation in each individual case. Depending on the reason for the Instructor becoming inactive and the total experience of the person concerned, the RTO may become personally involved, delegate responsibility to a Level 3 Instructor or require the CFI to carry out specific work with the person before revalidation.

9.2.9 Regional Operations Committee

The RTO/O is encouraged to hold regular Regional Operations Committee meetings, comprising the Level 3 Instructors and CFIs from the Region, to discuss operational matters prior to bringing them to the GFA Operations Panel.

9.2.10 Line of responsibility

The RTO/O is directly responsible to the GFA CTO (see 9.3.3) and to the Regional Association for the day-to-day running of GFA operational affairs.

The RTO/O may select Level 3 Instructors to assist in the various duties which are required to be performed periodically in the region. Persons delegated by the RTO/O to carry out particular duties are directly responsible to the RTO/O for the conduct of those duties and have the same status as the RTO/O when acting on his/her behalf.

9.3 OPERATIONAL RESPONSIBILITY AT FEDERAL LEVEL

9.3.1 The GFA Operations Panel

The GFA Operations Panel, comprising a Chairman and all RTOs/O, is the GFA body responsible for the control of operational standards, safety and training.

As well as matters which arise at Operations Panel meetings, input is also encouraged from Regional Operations Committees (refer Section 9.2.9) or any suitably qualified and interested bodies or individuals.

9.3.2 The Chairman of the Operations Panel

The GFA Operations Panel meets periodically, usually annually, under the leadership of the Chairman of the Operations Panel (COP). The COP is a voluntary officer, elected by the Operations Panel and appointed by the GFA Board, and is directly responsible to the Board for the entire operational affairs of the GFA as formulated by the Operations Panel. The COP is also a member of the GFA Executive, with full voting powers on that body.

The COP is generally responsible for the establishment of operational policy in the GFA, in consultation with the Operations Panel and the CTO. This policy is usually established during the annual meeting and normally takes the form of a recommendation to GFA Board to ratify a change of policy.

The COP is also responsible for negotiations at a political level on matters of operational policy which impinge on CASA or ATSB areas. Examples of this kind of policy include changes to GFA Operational Regulations, Civil Aviation Orders or gliding-related NOTAMs. The COP would normally be expected to attend high-level meetings with the CASA, ATSB and other government bodies to arrive at mutual agreements on policies which affect gliding.

9.3.3 The Chief Technical Officer

The Chief Technical Officer (CTO) is an employee of the GFA and is directly responsible to the Chairman of the Operations Panel for the day-to-day running of all operational matters in the Federation. Specific areas of responsibility are:

- On the recommendation of the Regional Body, approves the appointment of an RTO/O prior to the ratification of the appointment by GFA Board or Executive.
- Pursues the development of improved operational and instructional procedures, and is generally responsible for ensuring that existing procedures are followed.
- Organises and supervises instructor training nationally.
- Maintains a central register of all GFA instructors.
- Collates and analyses all occurrence reports received via the GFA Safety Occurrence Reporting Portal and ATSB.
- Submits periodic reports to the COP, and compiles an annual report for delivery by the COP to the GFA Board meeting, which must include a statistical analysis of gliding accidents in the preceding year.
- Attends meetings with statutory bodies as directed by the COP.
- Produces manuals and handbooks for flying training, instructor training, and general operational purposes.
- Carries out club visits in any region on the basis of an RTO request, or spot checking on an opportunity basis (approval of the COP is required).
- Attends meetings of the GFA Operations Panel as an advisory, non-voting member of that body.
- Appoints pilots for the carrying out of test flying duties (Refer Section 14.1).

10 PILOT QUALIFICATIONS, REQUIREMENTS, CHECKS AND PRIVILEGES

10.1 MEDICAL REQUIREMENTS

For medical declaration requirements, refer to GFA Operational Regulations, Section 3.2. The medical standards applicable for the issuing of this Certificate are as for the Austroads fitness to drive test – Private vehicle drivers. These standards are to be found at the Austroads website: http://www.austroads.com.au/assessing-fitness-to-drive.

10.1.1 Loss of Medical Fitness – Pilots

A pilot flying under the provisions of the self-declaration of physical fitness who suffers from a physical or psychological problem which prevents him/her from continuing to fly under the self-declaration provisions must obtain a Medical Practitioner's Certificate of Fitness' before recommencing flying.

A pilot flying under the provisions of a 'Medical Practitioner's Certificate of Fitness' who suffers a physical or psychological problem which renders him/her unfit for flying is required to undergo another medical examination by that person's own GP, or a medical specialist as specified by the RTO/O of the region before resuming flying as PIC. A fresh 'Medical Practitioner's Certificate of Fitness' will be required confirming the problem has been treated and the person is again fit to fly.

The above requirements do not apply to minor injury or temporary illness (such as the flu, head cold, broken limb, etc.).

10.1.2 Loss of Medical Fitness - Chief Flying Instructors and Regional Technical Officers/Operations

A CFI or RTO/O who suffers from a physical or psychological problem that renders him/her unfit for flying will not be required to stand down from their position if:

(a) There is an expectation that a 'Medical Practitioner's Certificate of Fitness' will be provided within 6 months; and
(b) The problem does not prevent him/her from continuing to manage their Club's/Regions operations.

If the condition is likely to be of a long-term nature, a suitable replacement should be found.

10.2 BASIC PILOT CERTIFICATES

10.2.1 THE "A" CERTIFICATE

10.2.1.1 Requirements

- Minimum age 15 years.
- GFA medical declaration to be signed.
- GFA Radiotelephone Operator Authorisation (or FROL).
- Minimum of 5 solo flights with normal landings.
- Satisfactory check flight, which must include the following :-
  - An awareness of pre-spin symptoms and a demonstration of the correct action to prevent a spin developing.
  - An accurate circuit without reference to altimeter.
  - Correct handling of selected emergencies.
- Oral examination on basic theory and flight rules and procedures by a Level 1 or higher Instructor.

10.2.1.2 Privileges and limitations

- May only fly solo under the direct supervision of a Level 2 or higher rated instructor.
- May carry out local soaring only.

10.2.2 THE "B" CERTIFICATE

10.2.2.1 Requirements

- A total of 15 solo flights with normal landings; including at least one soaring flight of not less than 30 minutes duration. (Note: This means an overall total of 15 solo flights, not 15 solo flights since qualifying for the "A" Certificate).
- Completion of post-solo training syllabus in accordance with the Instructor's Handbook.
- Oral examination on basic theory, flight rules and procedures and basic airworthiness by a Level 1 or higher Instructor.

Note: Power pilots holding a Student or higher licence may count 5 landings as pilot-in-command towards the "B" Certificate, but must meet the soaring requirement.

10.2.2.2 Privileges and limitations

- May only fly solo under the direct supervision of a Level 2 or higher rated instructor.
- May carry out local soaring only.
- May carry out mutual flying, subject to the following conditions:-
  - The other occupant of the glider also holds a minimum of a "B" Certificate.
  - Each mutual flight is authorised by and carried out under the direct supervision of a Level 2 or higher rated Instructor, who must nominate the command pilot for the flight.

10.2.3 THE "C" CERTIFICATE

10.2.3.1 Requirements

- A total of 20 solo or ‘in command’ mutual flights, including two solo soaring flights of at least one hour's duration each.
- Trained and checked in ability to carry out a safe outlanding.
- Received a passenger awareness briefing using the "Air Experience" section in Part 2 of the Instructor's Handbook as a reference.

- Oral examination on basic theory, navigation, meteorology, airways procedures, outlanding hazards, post-outlanding actions, and SAR requirements by a Level 1 or higher Instructor.
- A satisfactory demonstration of spin entry and recovery.

Note: Power pilots holding a Student or higher licence may count 10 powered landings as pilot-in-command towards the "C" Certificate, but must meet the soaring requirements.

10.2.3.2 Privileges and limitations

- May fly cross-country at the discretion of the CFI.
- May carry private passengers (i.e. not for hire or reward and not Air Experience Flights), under the provisions of a Private Passenger Rating as described in 10.3.

10.3 PRIVATE PASSENGER RATING

A Private Passenger Rating is an adjunct to the “C” Certificate and permits the holder to carry passengers when carrying out private flights. A private flight is a flight carried out on behalf of the pilot alone and specifically not acting as the agent or on the behalf of a gliding club or organisation. The costs of a private flight may be shared with the passenger but the pilot must pay at least an equal share (CAR 2 (7A)).

10.3.1 Endorsement, privileges and limitations

Authorisation for the carriage of private passengers is by logbook endorsement by the CFI, subject to direct authorisation by the duty instructor on each passenger-carrying flight or group of flights.

Handover of control to the passenger not permitted.

10.3.2 Independent Operator, Private Passenger Flights

When a pilot holds a Private Passenger rating and an Independent Operator rating he/she may be authorised by his/her CFI to conduct Private Passenger flights within the privileges and limitations of the Independent Operator rating.

10.4 FAI PILOT CERTIFICATES

After the "C" Certificate, the GFA follows the international sequence of FAI Silver, Gold and Diamond badges, plus the various GFA and international diplomas. Details of the international badges will be found in Section 3 of the FAI "Sporting Code", which can be obtained from the FAI Certificates Officer or downloaded from the FAI web page.

10.4.1 Official Observers

Official Observers are the FAI representatives for the purpose of overseeing all flights claimed for FAI badges. Official Observers are appointed by the FAI Certificates Officer, on recommendation by a club committee. The FAI Official Observer & Pilot Guide provides further detail.

10.5 GFA GLIDER PILOT CERTIFICATE

The Glider Pilot Certificate (GPC) is awarded to a pilot in recognition that he/she has been trained and assessed as competent to operate a sailplane as an independently proficient GFA soaring pilot following satisfactory completion of the GPC Training Syllabus.

All pilots operating under GFA are subject to GFA Operational requirements. The GPC recognises that the pilot has been trained and tested to the full extent of the GPC training syllabus and is therefore entitled to be approved to operate a glider within the privileges and limitations of the syllabus items as notified by pilot logbook endorsements.

Individual pilot application for the issue of the GPC is to be made by the club CFI (refer Operational Regulations, Section 3.3.8) by completing and submitting the application form along with a passport quality photo or preferably electronically submitting and attaching a digital passport quality photo.

The GPC training syllabus may be found in the Operational Regulations at Appendix 3 and a copy is to be printed or attached inside the cover of the Pilot's Log Book.

10.6 CHARTER FLYING

A club or organisation that holds an Air Operator's Certificate issued by CASA may carry out "hire and reward" passenger operations, provided such passengers are carried by pilots holding a GFA Charter rating and compulsory insurance and other requirements are met. See GFA Operational Regulations Section 4.2 for details of all aspects of charter flying, including the requirements for a Charter rating.

Note: The holder of a GFA Instructor rating is not automatically the holder of a Charter rating. A separate logbook endorsement by the club's CFI is necessary for the Charter rating.

The CFI shall furnish a biennial return to the RTO/O listing those pilots holding a charter authorisation. This list shall be forwarded by 31st August in the revalidation year. Included in the return shall be a copy of the General Practitioner's certificate or CASA medical certificate for those holders of new charter authorisations included on the list;

10.7 AIR OPERATOR CERTIFICATES

An Air Operator Certificate (AOC) is necessary in order for a club to carry out charter operations. A charter operation is defined as any operation which carries passengers purely for hire and reward, without them becoming GFA members. AOCs are issued by CASA, on application from individual clubs. CASA will only issue an AOC if the terms of a "compliance statement" are met.

Under no circumstances may pilots other than charter-rated pilots be used to carry passengers for hire and reward under the terms of an AOC (See also Operational Regulations, Section 3.3.4).

10.8 LOW LEVEL FINISHES ENDORSEMENT

A pilot holding a Low Level Finish Endorsement may conduct low level finishes, which are defined as an approved circuit entry and landing technique where a glider descends below 500ft AGL within 5km of an airfield with sufficient kinetic energy to enable the pilot to convert "energy into height" and recover adequate height to enable a safe circuit and landing to be performed.

10.8.1 Endorsement requirements

Authorisation for pilots to perform low level high energy finishes is by pilot logbook endorsement issued by a Level 2 or higher rated Instructor following assessment and/or training as detailed below. Instructors issuing authorisations need to have practical experience with low level finish techniques and procedures in order to fully appreciate the skill, judgement and airmanship standards required in this high workload flight situation. Instructors that do not have recent practical experience should decline to issue this rating and refer pilots to another Instructor with suitable background experience

10.8.2 Assessment

Level 2 or higher rated Instructors may conduct, and/or authorise, low level finish flights for the purpose of training and/or assessing pilots for this endorsement. However, all such flights must be conducted strictly in accordance with the published procedures.

10.8.3 Low Level Finish Procedures

The following conditions are to be met when conducting Low Level Finishes:

1. Pilots must ensure that operations are conducted at a safe height at all times. As an absolute minimum, the glider must never descend below 50ft AGL during the finish run prior to the pull-up and all objects must be cleared by at least 50ft.
2. Radio – carriage of radio is mandatory
3. Low Level finishes may only be conducted when the procedure will not unduly disrupt other operations taking place at an airfield and will not compromise safety.
4. Whenever a Low Level Finish is intended to be performed, prior consultation must be attempted with sufficient time for all concerned to be aware. This may be prior to the flight commencing, or by radio communications during the flight. If attempts to communicate intentions are unsuccessful, a pilot may proceed on the basis that operations are inactive. However, should the pilot become aware that operations are active, the pilot should abandon the procedure if there is any concern that a Low Level Finish will unduly conflict with other users.
5. Low Level Finishes must never be attempted at an aerodrome unless the pilot is familiar with the aerodrome and is aware of any hazards or local aspects that could affect the safety of his/herself, or others.
6. Announcements – The following radio announcement requirements are in addition to required aerodrome procedural notifications:
   - When a pilot is inbound to an Aerodrome and beyond 10nm (approx. 18km) from the circuit area, the pilot must endeavour to ensure that his/her intention to perform a low level finish has been announced on the appropriate radio frequency(s) and has been clearly understood.
   - A Pilot wishing to announce an intention to perform a low level finish while inside the 10nm (approx. 18km) boundary must ensure that adequate time is provided to allow all other airfield users to be made fully aware and respond. Information communicated will include inbound direction and the intended circuit procedure.
   - Pilots must ensure that appropriate subsequent radio announcements are made to ensure that arrival in the circuit area will not “surprise” other pilots.

Advice and requests received from other users should always be given careful due consideration, especially if safety concerns are raised. If gliding operations are active, relevant information and advice should be sought throughout all phases of the procedure.

Note: Lookout is always the prime defence for avoiding potential conflicts with “targeted scan” techniques being particularly relevant during the final stages of the low level finish procedure. If at any time during the run to the finish point the pilot becomes concerned, or aware, that his/her operations may be a hazard, the pilot must abandon the “Low Level Finish” procedure.

10.8.4 Special conditions

Competition Organisers may issue directions to pilots varying procedures and requirements, or deny competitors the privilege to perform low level finishes, as considered appropriate.

Clubs/Organisations may introduce additional procedures and requirements with consideration of local circumstances such as increased minimum height, finish run directions, finish point locations and circuit entry procedures etc.

Clubs/Organisations may deny pilots the privilege to perform low level finishes if the procedure is considered to be inappropriate at particular locations.

Duty Instructors may deny a pilot the privilege to perform the low level finish procedure at any time.

10.8.5 Endorsement privileges and validity

Pilots holding Low Level Finish endorsement may conduct low level finishes in accordance with the above procedures when finishing in gliding competitions, or completing cross-country flights, or in order to train and practice for these occasions.

Endorsements once issued will not require revalidation, but can be suspended by a Level 2 or higher rated Instructor for a period of not more than 30 days, at any time. Suspension of endorsement must be referred to the Pilot's CFI for further consideration, who may remove the endorsement. Appeal against suspension or removal will be as per the normal GFA appeal process (Refer Section 10.10).

10.9 CONCESSIONS FOR GLIDER PILOTS WISHING TO OBTAIN A POWERED AIRCRAFT LICENCE

A glider pilot who is the holder of a GPC may obtain considerable concessions against the number of hours of training required to obtain a licence.

There is no set minimum of hours a pilot is required to complete in powered aircraft (except the statutory minimum of three hours instrument flying) before attempting the flight test for the issue of a Private Pilot Licence. Consult the CFI of the Aero Club chosen for obtaining the licence and an assessment will be made of the amount of training likely to be needed.

10.10 MEMBER DISCIPLINARY MEASURES AND APPEAL PROCESSES

Where a member of the GFA has contravened the applicable CARs, CAOs, GFA Operational Regulations, GFA Manual of Standard Procedures, or local club rules or procedures, the club CFI may suspend, cancel or vary the member's flying privileges. The appeal process for the affected member in this case is the club's Operations Panel and/or Committee.

In the case where a member continues to operate in contravention of any of the above actions, or where contraventions are particularly serious in nature or number, the club CFI may refer the matter to the RTO/O, who may suspend, cancel or vary whichever of the member's pilot or instructor ratings are considered appropriate.

Where pilot/instructor ratings are suspended, cancelled or varied in accordance with the previous paragraph, the member shall have the right to appeal in writing to the GFA Operations Panel (via the Chairman) within 14 days of the decision being notified to the member and shall have the right of access to all evidence upon which the decision was based.

In the interests of natural justice, if an appeal is lodged within the 14 day period, any penalty which may be considered appropriate shall not take effect until the appeal has been heard. If the appeal is upheld, the proposed penalty may be altered or rejected. If the appeal is dismissed, the penalty shall take immediate effect.

Where an RTO/O has evidence that there is an immediate risk of a member intending to act so as to compromise operational safety or in contravention of CAR's, CASR's, CAO's or other legislation, the RTO/O may suspend the member's flying privileges for a period not to exceed seven days for the purpose of the prevention of commission of such an act and shall fully report such suspension to the Chairman of the GFA Operations Panel (COP) as soon as possible.

If considered necessary, an RTO/O may extend a period of suspension imposed under the previous paragraph for a further period not to exceed seven days, for the same purpose. This extension shall also be fully reported to the COP as soon as possible.

Where a member has pilot or instructor ratings suspended, cancelled or varied in accordance with the preceding two paragraphs, the member shall have the right of

appeal to the GFA Operations Panel (via the Chairman) and shall have access to all the evidence upon which the decision was made.

Where a member has appealed to the Operations Panel in accordance with the foregoing provisions, the Chairman of the Operations Panel shall request the President of the relevant State Association to participate in the appeal process.

Notification to the member under these provisions shall be served in writing, but verbal notice given to the member prior to the service of written notification shall be of the same effect and shall be effective immediately.

11 INSTRUCTOR TRAINING AND RATINGS

Training of Levels 1 and 2 instructors is carried out by persons who hold Level 3 Instructor authority. Such training may be carried out on a decentralised basis within clubs, or courses may be convened if there are enough candidates to warrant it, the required staff personnel are available and the necessary number of gliders and tugs can be organised to satisfactorily cover the syllabus.

Training of Air Experience Instructors (AEIs) is carried out at club level, by the club CFI or suitable delegate, in accordance with the GFA Instructor Handbook.

11.1 AIR EXPERIENCE INSTRUCTOR (AEI)

11.1.1 Requirements

- Minimum age 16 years
- 50 hours total gliding experience, or 200 launches in the case of a winch/autotow pilot. Power pilots may count 10% of their power flying hours towards this total after 10 hours or 50 launches have been gained.
- "C" Certificate.
- Trained within the club by an instructor of at least Level 2 rating, in accordance with the syllabus in Part 2 of the GFA Instructor's Handbook.

11.1.2 Privileges and limitations.

The purpose of an Air Experience Instructor rating is to carry out Air Experience Flights (AEFs) as defined in Section 11.1.3. The pilot may demonstrate the glider's controls to the person undertaking the AEF and may hand over control to that person, subject to the following conditions:-

- The AEI must carry out all launches, circuits, approaches and landings.
- The AEI is not authorised to allow the other person on the controls below 800ft AGL.
- A pilot holding an Air Experience Instructor rating and a GFA Sport Coach accreditation may carry out in flight coaching as defined in Section 12.

11.1.3 Definition of Air Experience flight

An Air Experience flight is defined as carriage of a person who is a member of the GFA (which may be short-term or introductory membership, as defined from time to time by the GFA Board) for the purpose of experiencing the sport of gliding.

11.2 LEVELS 1 AND 2 INSTRUCTORS

The AEI rating is the highest instructor authority which can be obtained within a club. For the Levels 1 and 2 ratings, more formal involvement by GFA Operations is required.

The coordinator of instructor training in a region is the RTO/O. No instructor training may take place without the RTO/O's approval. When a rating test has been successfully completed, the Level 3 Instructor who carried out the test should endorse the candidate's logbook at the appropriate level. This will serve as interim authority for the candidate to serve as an instructor, pending receipt of the logbook sticker from the RTO/O.

11.2.1 Level 1 Instructor

There are two methods of Level 1 instructor training in place; the common method is by formal training course run over several days within a region, the other is by mentoring. In either case, the preference is for a maximum of two trainees to be assigned to each Level 3 instructor.

Level 1 Instructor training is carried out in three stages, viz:

1. ***Preparation by club***. This is carried out in accordance with the "Club Preparation" section in Part 1 of the GFA Instructor's Handbook. Club preparation is followed by an application for instructor training, made on the appropriate form, which can be obtained from the RTO/O. A sample form is at APPENDIX 2 - APPLICATION FOR LEVEL 1 INSTRUCTOR TRAINING and is also available from the GFA Website. **Note:** Instructor training may not commence until this form has been submitted to the RTO/O and a Level 3 Instructor allocated for the purpose by the RTO/O.
2. ***The training itself***. When a Level 3 Instructor has been allocated by the RTO/O to a candidate or group of candidates, mutual arrangements are made for these persons to come together to enable instructor training to commence. This training continues for as long as necessary to produce the required standard, but experience has shown that it should not be prolonged unnecessarily and a maximum of 10 weekends should not be exceeded. The training is recorded by the Level 3 Instructor in the 'Level 1 Instructor Training Syllabus' (Refer Appendix 7 of the Operational Regulations). When training is complete, the Level 3 instructor forwards the completed Training Syllabus to the RTO/O.
3. On receipt of the completed Flight Progress record, the RTO/O allocates an independent Level 3 Instructor to carry out a Rating test on the candidate. The results of this Rating Test are recorded on a 'Level 1 Instructor Rating Test' form (Refer Appendix 8 of the Operational Regulations) and sent to the RTO/O. If the Rating Test is successful, the RTO/O issues the appropriate logbook sticker to the candidate, via his/her club.

11.2.1.1 Requirements

- Minimum age 18 years.
- 75 hours total gliding with a minimum of a C Certificate. Power pilot credits as for AEI rating.
- Prepared by club in accordance with Part 1 of Instructor's Handbook, with application form signed by the club CFI.
- Adequate knowledge of Parts 1 and 2 of the Instructor Handbook, which will be tested by oral examination during the instructor-training process.

11.2.1.2 Privileges and limitations

- Authorised to instruct all sequences in Part 2 of the Instructor's Handbook.
- May give instruction under the supervision of an instructor holding a Level 2 or higher rating.
- When a Level 1 Instructor also holds a current and valid Independent Operator authorisation he/she may be authorised by the CFI concerned to conduct independent training flights without the direct supervision of a Level 2 or higher rated Instructor.
- May not approve initial solo flight.
- May not take charge of a club's operations, or in any way supervise the operations of other pilots when a Level 2 or higher rated Instructor is not present.

11.2.2 Level 2 Instructor

The upgrading of a Level 1 Instructor to a Level 2 Instructor is undertaken by a Level 3 instructor allocated for the purpose by the RTO/O on the recommendation of the Club CFI.

The Level 3 instructor will assess the candidates flying demonstrations and patter, and will coach the candidate in leadership, supervision and disciplinary skills as outlined in Part 1 of the Instructors Handbook.

11.2.2.1 Requirements

- 100 hours total gliding, with credits for power flying as for Level 1 rating.
- Glider Pilot Certificate.
- Club certification found on the Application for Instructor Upgrade form declaring that the applicant has performed satisfactorily as a Level 1 Instructor and that all basic training sequences have been carried out to the satisfaction of the CFI.
- Comprehensively checked by club CFI prior to requesting an upgrading.

11.2.2.2 Privileges and limitations.

- Authorised to instruct all sequences in Part 2 of the Instructors Handbook and to supervise Level 1 Instructors carrying out training work.
- Authorised to approve first solo flight.
- Authorised to take charge of a club's operations.
- Authorised to carry out duties of CFI if ratified by the RTO/O.

11.3 AEI, LEVEL 1 AND LEVEL 2 INSTRUCTOR RATINGS VALIDATION AND RECENCY REQUIREMENTS

Instructor ratings remain valid provided the instructor has been:

- Actively engaged in Instructing duties during the 12 months prior to 31st August each year; and
- Listed as an active Instructor in his/her Club's current annual return to the relevant RTO/Operations.

11.3.1 Active Instructors

Annual returns listing only those instructors that have been actively engaged in in-flight instructing duties during the 12 months prior to 31st August each year are to be forwarded to the relevant RTO/Operations by 31st August each year by the Club CFI (Active Instructor Report forms are available from the GFA Website).

Instructors not listed in current annual returns may only recommence in-flight instructing duties under conditions determined and set by the RTO/O following consultation with the CFI (Refer to Section 9.2.8).

Instructors that have been authorised to commence, or recommence, in-flight instructing duties during a reported period shall be deemed to have been added to his/her Club's active Instructors list.

CFI's may include Instructors in active instructor lists that have not completed their Annual Flight Review prior to 31st August. However, any Instructor so listed may not carry out in-flight instructing duties after 31st August until the Annual Flight Review has been satisfactorily completed.

11.3.2 Recency Requirements

Instructors that have been actively engaged in in-flight instructing duties during the 30 days prior to undertaking in-flight instructing duties may continue to carry out instructing duties on an ongoing basis.

Instructors not meeting the above recency requirement but who have completed at least 3 glider flights, or 2 hours as pilot in command during the 90 days immediately prior to performing instructing duties may carry out in-flight instructing duties.

11.3.3 Failure to meet recency requirement

Instructors that fail to meet either of the above recency requirements will be required to undertake a flight competency check as specified by his/her CFI or a Level 2 or higher rated Instructor delegated to act on behalf of the CFI.

CFIs are not exempt from any of the above requirements and must be satisfactorily evaluated by a level 2 or higher rated Instructor as required.

11.3.4 Instructor Annual Flight Reviews

- All active AEIs are to undergo an Annual Flight Review conducted by their Club CFI or a Level 2 or higher rated Instructor appointed by the CFI. Checking is to include the relevant skills and qualities consistent with providing Air Experience Flights
- All active Level 1, 2 and 3 Instructors are also to undergo Annual Flight Review conducted by their Club CFI or a level 2 or higher rated Instructor appointed by the CFI. Checking is to include some basic instructional skills and qualities.
- CFI's are required to undertake an Instructor Annual Flight Review conducted by a level 2 or higher rated Instructor.

Satisfactory completion of an Instructor Annual Flight Review will remove the necessity for the general Annual Flight Review.

11.4 LEVEL 3 INSTRUCTOR

Level 3 Instructors are Level 2 Instructors who have been recommended to the RTO/O of their Region and coached in instructor-training techniques, and approved by the RTO/O.

The number of Level 3s in each Region will be as considered appropriate for the requirements of the Region.

Initial training requirements are as determined by each RTO/O but usually the candidate is required to act as understudy to an experienced Level 3 instructor for a period of time.

11.4.1 Requirements

- Minimum of 200 hours instructing.
- Minimum of two year's continuous service as a Level 2 Instructor.
- Glider Pilot Certificate and Gold C
- Selected by RTO/O following consultation with the candidates CFI. CFIs may recommend Level 2 Instructors to RTO/O for consideration.
- Initially trained by accompanying an experienced Level 3 Instructor during instructor-training sessions and acting in the capacity of an understudy to that Level 3 Instructor.
- Notified by logbook endorsement issued by RTO/O and subject to biennial revalidation, carried out by the RTO/O.

Note. Only sufficient Level 3 appointments will be made to meet the anticipated workload assessed by the RTO/O.

11.4.2 Privileges and limitations

- Authorised to carry out the training of instructors at the request of RTO/O and in accordance with the Instructor Handbook as amended from time to time.
- Authorised to carry out Rating Tests of Level 1 and Level 2 Instructors at the request of the RTO/O.
- Authorised to carry out biennial Operational Safety Audits on gliding clubs at the request of the RTO/O.

11.4.3 Revalidation requirements

Biennial revalidation, conditional on meeting standards and requirements determined by the RTO/O in line with agreed to guidelines set by the GFA Operations Panel and notified by logbook endorsement issued by the RTO/O.

11.5 GROUND SUPERVISORY INSTRUCTORS

A “non-flying” rating, utilising former Level 2 Instructors who are interested in using their supervisory skills and experience to assist in the running of their clubs operations.

11.5.1 Requirements

- Have held a minimum of a Level 2 instructor rating for a time-span of at least 4 years;
- Be in possession of all relevant and up-to-date operational documentation;
- Approved and recommended to RTO/O by club CFI.

11.5.2 Initial issue and revalidation

- Initial issue shall be by RTO/O and notified by logbook endorsement. Annual validation shall be by inclusion on his/her club active Instructors list.

11.5.3 Privileges and limitations

- May exercise all privileges of a Level 2 instructor, except those related to actual flying duties.

11.6 GENERAL NOTES ON INSTRUCTOR RATINGS

The initial issue of a Level 1 or Level 2 rating shall only be carried out by the RTO/O on the recommendation of the Level 3 Instructor carrying out the Rating Test.

Club Active Instructor lists must be submitted annually by the CFI listing all the Club’s Instructors that meet the active instructor listing requirements at the 31st August each year to the RTO/O who will in turn submit to the CTO (refer Section 11.3.1).

Reminders will be sent by GFA to all clubs at the appropriate time.

The holder of an instructor rating (except ground instructors) has automatic private passenger-carrying privileges.

IMPORTANT NOTE: The CFI is responsible for ensuring that active instructors’ lists are correct, complete and submitted on time. Failure to comply may compromise the cover afforded those instructors by the GFA Broad-based and Contingent Liability Insurances.

11.7 OVERSEAS INSTRUCTOR RATINGS

Overseas instructor ratings are not valid in Australia and all GFA Level 1 and 2 Instructors must have Instructor ratings issued by an RTO/O.

In the case of a pilot that holds or has previously held an Instructor rating issued in another country, the RTO/O should be provided with all relevant details of the rating held and experience. The RTO/O will consider each case individually and determine the requirements necessary for the issuing of a GFA Instructor rating, which at the discretion of the RTO/O may or may not be equivalent to the rating held overseas.

11.8 SELECTION OF NEW INSTRUCTORS

As well as meeting the requirements of Part 1 of the Instructor's Handbook, the Club's Training Panel should give careful consideration to the temperamental suitability of proposed new instructors at the selection stage.

Effective instruction requires a high personal standard of integrity, honesty and fairness, together with the desire to obtain and use the rating in the service of the club and the GFA. It is not appropriate that a pilot desire to be issued with a rating merely as a status symbol. The personal qualities cannot be reliably assessed during instructor-training and should be assessed by the club panel/CFI before the candidate is proposed to the RTO/O. Club Training Panels should remember that, once issued with a rating, an instructor will become a member of the club panel and that removal of the rating is (rightly) made difficult and dependent on natural justice and hard evidence. The new instructor will then, in the first instance, be the responsibility of that club panel.

Experience has shown that it is better to cope with a short-handed panel than to include an inappropriate instructor on that panel.

Similarly, Club Training Panels should not be allowed to exclude good instructor candidates because they have at some stage disagreed with Panel decisions for good and sufficient reasons.

11.9 RELATIONSHIP BETWEEN CLUB OPERATIONS PANEL AND CLUB COMMITTEE

The Committee of a gliding club is responsible for the general management of a club, which includes the activities of the Club Operations Panel. However, a Committee should be very careful not to rule on matters outside its technical competence (refer also to Section 9.1).

On the other hand, a Club Operations Panel which works in isolation and does not keep the Committee in the picture on important matters is likely to acquire a reputation as a secret society. This invariably causes problems within a club and disrupts the smooth running of all club activities.

12 COACHING ACTIVITIES

In addition to basic flying instruction, a system of sporting coaches exists, the purpose of which is to provide pilots with ongoing soaring and cross-country training. The training given is intended to assist pilots progress from "C" Certificate standard through to the GPC and, in some cases, to advanced racing techniques applicable to championship flying. Coaches work with the Club Training Panel and compliment the Instructors.

12.1 SOARING COACHING

Coaches who undertake 2-seat training must hold, as a minimum, an active and current AEI rating.

A Coach who holds an AEI rating only must not allow pre 'C' Certificate pilots to be on the controls below 800ft AGL. 'C' Certificate pilots may be allowed on the controls of the glider below 800ft AGL, but the coach must take adequate care to ensure that safety is not compromised.

Coaching activities must be conducted under terms and conditions determined by the Club's Training Panel with the consent of the CFI and with daily authorisation by the duty instructor.

Coaches with an AEI rating may undertake 2-seater training and assessment of the following GPC Training Syllabus items only:

- Item 13 - Radio and FLARM use
- Item 16 - Thermal centring techniques
- Item 17 - Thermal entry
- Item 18 - Soaring with other gliders
- Item 28 - Thermal sources and selection

- Item 30 - Flight preparation, glider/trailer and pilot
- Item 31 - Soaring instruments and flight computers
- Item 32 - Meteorology and flight planning
- Item 33 - Navigation and airspace
- Item 34 - Cruising, speed to fly and height bands
- Item 35 - Demonstrated cross country capability

12.2 RTO/SPORT

The Regional Technical Officers/Sport is responsible to the GFA Performance Coach for the implementation of the coaching programme at regional level.

Although not normally expected to be a problem, in the event of an operational or safety-related dispute in coaching activities at Regional level, the decision of the RTO/O shall prevail over that of the RTO/Sports.

12.3 CLUB COACHES

Club coaches are nominated by their clubs, ratified by CFIs and appointed by RTO/Sport. As stated, Coaches must hold a minimum of an AEI rating and the requirements of this rating must be adhered to during the conduct of coaching activities in 2 seat gliders with pre 'C' Certificate pilots.

In the event of a safety-related dispute in coaching activities at club level, the decision of the CFI shall prevail over that of the Club Training Panel.

13 INDEPENDENT OPERATIONS

In accordance with GFA Operational Regulation 3.3.4 a pilot may be authorised by logbook endorsement to fly a sailplane without being supervised by a Level 2 or higher rated Instructor.

The Independent Operator Endorsement is a very important pilot authorisation and must not be issued without careful consideration. Pilots issued with this rating are afforded greater freedom to make decisions regarding their own safety and sometimes the safety of others.

Prior to issuing this rating Instructors should carefully consider the following:

1. Responsible Behaviour

   Independent Operator pilots operating without the direct supervision of Club Officials are representatives of their Clubs, both in the air and on the ground. Clubs/Organisations Committees and Training Panels should be in agreement of the candidate's suitability to hold the rating as not all considerations are operational. Care of equipment and the image projected of the Club can be prime considerations.

2. General skill and "Airmanship"

   Pilots must not be issued an Independent Operator endorsement unless the issuing Instructor is satisfied that the pilot has demonstrated a level of basic flying skill that will enable him/her to safely deal with any flight situations that could reasonably be expected to be encountered during unsupervised operations. Instructors must also be satisfied that the candidate can be expected to exercise appropriate caution when assessing operational risk factors

3. Assessing safe conditions

   Independent Operator pilots must be capable of assessing conditions and safety factors that could affect their own safety, such as wind strength and the likelihood of deteriorating weather conditions that could impact on safe operations during the intended period of operations. Many pilots will never have had to make these decisions during their gliding experience prior to gaining an Independent Operator rating and issuing Instructors must be satisfied that the candidate has adequate background knowledge and experience to enable him/her to make these assessments within safe limits.

4. Operational requirements

Pilots operating without supervision must be fully conversant with all operational procedures and requirements relevant to their activities while conducting independent operations, such as SAR requirements (Section 8.1.19), accident/incident reporting (Section 21), etc and any club imposed operational requirements.

13.1 INDEPENDENT OPERATIONS

13.1.1 Level 1 Independent Operator

A pilot holding a 'C' Certificate may be authorised by logbook endorsement to fly a sailplane without being supervised by a Level 2 Instructor. A pilot with a GPC automatically qualifies for a Level 1 endorsement.

13.1.1.1 Limitations

In the case of a L1 Independent Operator flying at a site which has a Level 2 Instructor present, L1 Independent Operator privileges do not apply and the Level 2 Instructor's jurisdiction must prevail.

When operating from a site with a resident gliding club, Independent Operators are subject to the requirements of the resident club.

In the case of more than one club operating from a particular site, the resident clubs must ensure that an appropriately qualified person is appointed on any given flying day to oversee the activities of visiting pilots.

13.1.1.2 Club Responsibility

A club issuing Level 1 Independent Operator authority to a person is responsible for that person's operations, even when the person is operating independently.

13.1.2 LEVEL 2 INDEPENDENT OPERATOR

Unlike the Level 1 Independent Operator authority, where club responsibility of independent operations is of primary importance, holders of Level 2 Independent Operator authority are solely responsible for all aspects of their operations when operating independently. This includes airways clearances, tower clearances, SAR notification and accident/incident reporting.

Initial issue of Level 2 Independent Operator authorisation shall be by logbook endorsement by CFI.

13.1.2.1 Requirements for initial issue

- Glider Pilot Certificate;
- Flight Radiotelephone Operator Licence or GFA Radio Operator logbook endorsement;
- A minimum of 100 hours command time in gliders, which may include powered sailplanes and power-assisted sailplanes. 10% of powered aircraft command time may be counted towards this requirement;
- Club committee approval;
- Oral examination on airways and radio procedures, SAR requirements and accident/incident reporting procedures;
- Be in possession of GFA Airways and Radio Procedures for Glider Pilots and all relevant current aeronautical charts and documentation (e.g. ERSA).

13.1.2.2 Annual revalidation

Revalidation of Level 2 Independent Operations authority is by Annual Flight Review as per GFA Operations Regulation 3.3.5. The review must be conducted by a Level 2 or higher rated instructor who is familiar with the pilots Independent Operations but may not be revalidated without the consent of the pilot's CFI.

13.1.3 Independent Private Passenger Flights

A pilot with an Independent Operator endorsement and who also holds a Private Passenger rating may carry private passengers independently.

13.1.4 Independent Charter and AEI Flights

A pilot with an Independent Operator endorsement who also holds a Charter or AEI rating may carry out independent Charter or AEF flights.

13.1.5 Independent Level 1 Instructor Flights

A pilot with an Independent Operator endorsement who also holds a Level 1 Instructor rating may, with CFI authorisation, carry out independent instructing flights.

Note: In the case of 13.1.3, 13.1.4 and 13.1.5 above, a CFI may impose special conditions on the conduct of flights in these categories. For example, the CFI may require telephone contact prior to each occasion of conducting such operations to obtain direct authorisation.

13.1.6 Annual Flight Reviews

Independent Operators are subject to a competency check at least annually, as per Operational Regulations 3.3.6.

14 TEST AND EVALUATION FLYING

14.1 TEST FLYING

Test flying is defined as the flying of a new type of glider which has not previously been flight-tested and approved, or a glider that has been significantly modified. As the nature of the handling characteristics of a new glider type are unknown, the pilot will be called upon to explore them across the entire design envelope and modifications to a glider may have changed handling characteristics and/or design parameters and the pilot will called upon to explore specific aspects of the design envelope.

The test-flying requirements of new glider types are contained in GFA Airworthiness Advice Notice (AN) 98, "Flight Testing New Glider Designs". That document must be used as the reference for test flying new glider types.

Specific test flying requirements will be provided by the CTO/CAD for modified gliders.

Test pilots are appointed by the CTO as one-off authorisations for each test flight programme. The appointment must be notified by letter.

Only pilots authorised as GFA Test pilots may carry out test flying as defined above.

14.2 EVALUATION FLYING

Evaluation flying is not in the same category as test flying, as the glider's characteristics are known and the pilot will be required to establish whether they have changed in any way from their original values.

Evaluation flying includes the following:

1. The first example of a Type-Certificated glider to be flown in Australia.
2. Any glider being evaluated for satisfactory flight characteristics following a Form 2 inspection or any other maintenance or repair work.

Evaluation flights are functional tests to assess whether the glider's handling characteristics are normal and that all systems e.g. airbrakes, flaps, etc., function in the correct manner, i.e. as originally Certificated.

Test pilot authority is not required for carrying out evaluation flying, as defined above. Any suitably experienced pilot who has familiarised him/herself with the aircraft's characteristics, either by experience on type or by study of the relevant manuals, may carry out this work, at the discretion of the club CFI.

In the case of two-seat gliders, the second seat may be occupied during evaluation flying provided that both pilots are qualified glider pilots. No passengers are permitted on evaluation flights.

14.3 TEST FLYING INFORMATION

The methodology and practices for Test Flying are contained in various documents, such as BCAR and JAR-22. These documents are available for purchase from the GFA Secretariat.

15 OPERATION IN AUSTRALIA BY FOREIGN PILOTS AND FOREIGN-REGISTERED GLIDERS

15.1 FOREIGN PILOTS

Regardless of whether the glider(s) concerned in any given operation are registered in Australia or a foreign country, foreign pilots operating in Australia must be GFA qualified, be issued with GFA pilot authorisations for the tasks contemplated, and must be members of the GFA and an affiliated club.

Foreign pilots must be provided with a comprehensive briefing on Australian procedures (general and local) before flying as pilots-in-command. In particular, information on operations on Certified and Registered aerodromes, including requirements for operations in the vicinity of non-towered aerodromes and associated CTAF procedures must be provided in clearly-understandable written form to each pilot.

Site checks must be provided for those foreign pilots who have not operated at that site before.

Competency checks must be carried out on foreign pilots, at the discretion of the Instructor supervising the operation.

Foreign pilots must be provided with a safety and survival briefing if they have not operated in Australia before.

Communications with Air Traffic Control or other airspace users must be in the English language.

Foreign operations in Australia must meet all aspects of normal GFA operational requirements, including applicable CARs/CASRs, the provisions of CAO 95.4 and the GFA Operations Manual.

15.2 FOREIGN-REGISTERED GLIDERS

The temporary import and subsequent export of any foreign-registered glider(s) is the responsibility of the owner(s) and/or pilot(s) concerned.

16 LAUNCHING

16.1 WINCH AND AUTO-TOW LAUNCHING

16.1.1 Vehicle Tow Launching

Except with the approval of the RTO/O, a sailplane shall not be launched by vehicle tow from a site with less than 1,600 metres of usable length. The surface shall permit the tow vehicle to be safely driven along it at launch speeds.

16.1.2 Winch Launching

Except with the approval of the RTO/O, a sailplane shall not be winch launched from a site with a cable run shorter than 1200 metres.

16.1.3 Vehicle Requirements

Any vehicle used for launching gliders, whether winch or towcar, must have adequate protection for the driver and co-driver against the ingress of launching wire, especially that occurring under tension such as a cable-break. Such protection must consist of a combination of sheet metal, wire cage material and armoured transparencies (e.g. polycarbonate or toughened glass) appropriate to the design and dimensions of the winch or launching vehicle.

Winch-drivers must ensure that members of the public are not permitted to remain in close proximity to the winch when launching is in progress.

The winch or autotow vehicle, together with its associated wires or ropes, must receive a Daily Inspection before flying commences. This inspection must consist of, as a minimum, checking that there is sufficient fuel, oil and water in the vehicle and that the engine is warmed up and running properly. The vehicle must be fitted with a serviceable fuel contents gauge or simple dipstick.

16.1.4 Cable Cutters

All winches introduced into gliding operations must be fitted with cabin operated emergency cable cutters.

Winches introduced into gliding operations prior to 01/01/2005 may continue to be operated without cabin operated cable cutters under the following conditions:

1. The operator must have registered the winch via the RTO/O as a winch operated without a cabin operated cable cutter.
2. No alternative emergency cable cutting device or method requiring the winch driver to leave the safe confines of the cabin is to be provided and winch drivers are to be instructed that they are not expected to leave the cabin during a launch emergency whenever he/she is at risk of personal injury. Winch drivers should be advised that in the case of a launch emergency they should shut-down the winch, leave the drum free to rotate and wait until all danger has passed.
3. Pilots must be made aware and accept that during a launch emergency the winch cable will not be severed at the winch end.

16.1.5 Launching Wires/Ropes

The glider end of winch and autotow wires or ropes must be fitted with linked rings of a design approved by GFA. The rings must be inspected before flying commences and must not be used if damaged or distorted.

If solid wire is to be used, the recommended standard for such wire is "Range 2 Spring Steel". The two common diameters of this material in use for glider-launching purposes are 2.8mm and 3.15mm, either of which is suitable and easily obtainable from spring manufacturers.

The launching wire or rope must be inspected at least daily and determined to be in a safe condition.

If a drogue parachute is fitted to the launching wire, the minimum distance between the drogue and the rings shall be 5 metres.

The drogue parachute must be of such a design that it has no tendency to fully or partially open during the launch.

If a two-drum winch is used, only one glider may be attached to a cable at any one time. The idle cable must be separated from the live cable by at least one wingspan and it must be securely anchored.

In a multiple-cable operation, the cables must be laid out, and the first glider to be launched must be so positioned that the first cable pulls apart from the second cable under tension. This ensures that there is no risk of cables becoming crossed during the launching process.

16.1.6 Weak Links

A weak link is mandatory and the specified breaking strength must be placarded in the glider cockpit and on the glider's external surface adjacent to each release hook (refer Airworthiness Advice Notice (AN) 75).

The weak link must be placed on the glider side of the drogue, so that the drogue is pulled well clear of the glider in the event of a weak link break.

The "Tost" weak link system is recommended. Alternative weak link systems may be used provided they have been tested and found to be reliably accurate within the glider's weak link specifications and the results of tests are available for inspection.

16.1.7 Ground Signals for Winch and Autotow

These signals are defined as follows:

"Take up slack on [*Type of Glider*]" (self-explanatory).

"All out, all out" (in some regions "full power") - this signal means all the slack is out of the wire and the launch may proceed.

"Stop, Stop, Stop" (self-explanatory).

Hand signals from the pilot to the wingtip holder are not recommended, on the basis that they distract the pilot from keeping control of the glider when things can be happening very quickly and they also detract from the ability to release the cable quickly should the need arise.

The following is the standard procedure to be used:-

1. After attaching the cable and ensuring all clear above and behind, pilot signifies ready for take-off by giving a thumb-up signal with the left hand. This is confirmed verbally by the expression "pilot ready for take-off".
2. Crew member (who must be adequately trained or under supervision) raises wingtip and gives take-up-slack signal if satisfied that it is still clear. This signal should be given verbally as well as visually to ensure that all persons around the launch point are in no doubt that a launch is taking place. Pilot keeps left hand as close to release as possible.
3. When cable has tightened sufficiently, wingtip holder gives all-out (full power) signal, again verbal as well as visual. The pilot will have no input to this signal.
4. The stop signal may be given by anyone who believes that the launch should not take place for any reason. It may be given by the pilot, the wingtip holder or by a bystander who sees something which nobody else has noticed. No person should hesitate to give a stop signal if in any doubt about the safety of the operation. When a stop signal is given, the pilot releases the cable immediately.

16.1.8 Communication between Launch Point and Winch/Towcar

An adequate method of communication must be established between the launch point and the winch or tow-car, to relay the above signals. The alternative methods of signalling are listed here.

16.1.8.1 Radio

If used for launch signals, the radio must be external to the glider, typically in the pie-cart. In this way, problems external to the glider and unseen by the pilot can be detected and the launch stopped (e.g.

airbrakes unlocked). For this reason, the use of the glider's internal radio for initial launch signals is prohibited. Terminology to be used is as described above.

For auto towing, a normal loudspeaker in the vehicle is usually adequate to enable the tow-car driver to hear the signals clearly. For winch-launching, the noise level may be too high for this to be relied upon and a headset is recommended. It is especially important to be able to hear a stop signal, which may be given after full power has been applied.

16.1.8.2 Telephone

Terminology is the same as for radio and the same principles apply to the use of headsets in a high-noise environment.

16.1.8.3 Single bat

"Take up slack"	Bat moved from side to side in an underarm motion across the body.
"All out"	Bat moved from side to side over the head.
"Stop"	Bat held stationary above the head.

16.1.8.4 Two bats

"Take up slack"	One bat moved up and down alongside the body.
"All out"	Two bats moved up and down each side of the body.
"Stop"	Two bats held up over the head.

The single bat method is generally easier than the two bat method. However, in summer conditions where mirage effects may distort signals, the two bat system may have advantages in making signals less confusing over winch-launch distances. Bats should be large and of a colour contrasting with the local environment.

16.1.8.5 Lights

"Take up slack"	Morse dashes.
"All out"	Morse dots.
"Stop"	Steady light.

A single "Aldis" type light is ideal for signalling over long distances. In mirage conditions, a second light may be added, in which case the "All out" signal becomes Morse dashes on two lights instead of one. As with two bats, this eliminates confusion. Car headlights work very well for signalling, but obviously this removes the option of doubling up in difficult signalling conditions.

16.1.8.6 Wing-Waggling

"Take up slack"	Glider rocked laterally by moving wingtip up and down.
"All out"	Wings held level.
"Stop"	Wing down.

Wing-waggling must not be used unless a back-up stop signal is available (e.g. bat), to cover the case of a stop signal being required after the wing has left the wingtip holder's hand. An example of where this might occur is the case of a glider's tailskid picking up the second wire of a pair on a crosswind take-off.

16.1.9 Winch/Autotow Signals During Launch

Radio communication between the pilot and the winch/vehicle is now common practise at many winch sites, thus enabling the pilot to give direction to the winch/vehicle driver to speed up or slow down during the climb. The alternate method is for the pilot to signal the winch/vehicle driver by manoeuvring the glider in the following manner:

Too fast While still below the placarded upper speed limit, the glider is yawed until a response is obtained from the winch/vehicle driver. If there is no response and speed continues to rise toward the upper limit, the pilot releases the cable and adopts the flying attitude.

Too slow While still above the minimum safe speed of 1.3Vs, the glider nose is lowered and, at a safe height, the glider is rolled from side to side. If there is no response and the speed continues to fall toward minimum safe speed of 1.3Vs, the pilot releases the cable and adopts a 'safe speed near the ground' before manoeuvring.

Note: The too slow signal should never be undertaken below a height from which recovery from a spin can be achieved, or when the speed is rapidly falling to the safe speed of 1.3Vs. In these circumstances the pilot should abandon the launch and adopt a 'safe speed near the ground' before manoeuvring.

16.1.10 Winch/Autotow Airfield Specifications

The minimum field length for winch launching is described at 16.1.2. The runway strip must be approved by the RTO/O before operations can commence. The airfield should be clear of obstructions in the take-off and landing directions.

The minimum field length for autotow operations is described at 16.1.3. The runway strip should be smooth enough to drive a car or truck at 100km/hr. RTO/O approval and obstruction requirements are the same as for winch launching.

Consideration will be given to reducing the above strip length for autotowing if the operational situation warrants it. An example of a case for reduction of strip length is autotowing with polypropylene rope, which does not need a drogue to stabilise it after release. This eliminates the need for a long "run-off" to keep tension in the rope after release and potentially reduces the strip requirement by up to 250 metres. The RTO/O has discretionary power to vary strip length in any individual case.

Winch launching is more awkward. There will normally be no concession against the 1,200 metre requirement, because of the risk that a short strip can promote early rotations into excessively steep climbs. Any concession that may be granted will be a very minimal one.

16.1.11 Winch/Autotow Drivers

Winch and tow-car drivers must be properly trained by club members with appropriate experience and must remain under supervision until all emergency situations have been experienced or adequately simulated. Winch or tow-car drivers who are under training are not permitted to launch gliders on Charter Flights (Refer GFA Operations Regulation 4.2.18).

16.1.12 Winch/Auto Launch Emergency Training (Pilots)

During pre- and post-solo training, all likely launch failure cases, e.g. Wire/rope breaks and engine failures must be adequately simulated during the launch, in accordance with the Instructor's Handbook. These exercises must be carried out

at a variety of heights, to ensure flexibility of response on the part of pilots under training. It is not sufficient to carry out this training solely by simulating the failure cases in free flight at altitude.

16.1.13 "Kiting" During Winch-Launching is Prohibited

The practice of kiting during winch-launching potentially endangers members of the public who have nothing to do with the gliding operation. As kiting is only possible during strong wind conditions, a cable-break (or running to the end of the cable on the winch) means the certainty of the cable drifting downwind well outside the confines of the gliding site, crossing public roads or becoming entangled with power-lines outside the airfield. Innocent parties may thereby become electrocuted or otherwise killed or maimed. For this reason, the practice of "kiting" is prohibited.

16.1.14 Winch Launching Manual

The GFA Winch Launching Manual covers all aspects of winch launching, including basic techniques, pilot training and checking, winch driver training and checking, wire and other equipment standards, driver protection and all potential failure cases. It is available for purchase in hard copy from the GFA Secretariat, or free of charge as a downloadable file from the GFA Website.

16.2 AEROTOW LAUNCHING

16.2.1 Tug aircraft

The tug aircraft must be approved for glider-towing by the relevant authority and the release mechanism must be of an approved type (see MOSP 3, Airworthiness). The release must be functionally checked and certified for on the aircraft Maintenance Release (AD/SUPP/8) each day before flying commences.

One or more mirrors must be fitted to the tug aircraft to enable the pilot to see the glider during towing.

16.2.2 Towropes

The required length for an aerotow rope is 55 metres plus or minus 5 metres and only GFA approved rings are permitted (refer Airworthiness Advice Notice (AN) 75).

Ropes shorter than 50 metres but not less than 35 metres are only permitted for the following purposes:

- For aerotow retrieves from outlanding paddocks.
- As the shorter rope of a double-tow pair.
- For wave-flying in rotor conditions.

Ropes longer than 60 metres are permitted for the following purposes:-

- As the longer rope of a double-tow pair
- For Cross-country ferrying

16.2.3 Weak links

A weak link is mandatory and must normally be placed at the tug end, provided that the specified weak link strength for the tug also suits the glider. If the specified weak link strength for a heavy glider is greater than the specified strength for the tug, the operator is stuck with the weaker of the two values. If the specified strength for a light glider is less than that specified for the tug, a separate weak link of the correct glider strength must be inserted at the glider end, in addition to the one already in place at the tug end.

Glider weak link strengths are placarded in the cockpit and also listed in the sailplanes flight manual. For tug weak link strengths, consult the tug flight manual towing supplement (See also Airworthiness Advice Notice (AN) 75).

16.2.4 Tug pilots

Tug pilots are required to hold an approval to tow gliders. The requirements for the issue of a glider towing permit are contained in the GFA Aerotowing Manual (approved by CASA), which may be purchased from the GFA Secretariat, or downloaded free of charge from the GFA Website.

A glider-towing approval remains valid as long as the pilot's authority to fly the tow-plane in use is valid, and provided the recency requirements are met. These requirements are specified in the GFA Aerotowing Manual.

When engaged in glider-towing operations, the tug-pilot is deemed to be the pilot-in-command of the entire combination.

16.2.5 CASA Delegate – Glider towing permits

CASA Delegates are defined as experienced tug pilots who hold CASA authority to train, test and issue Glider Towing Permits. The requirements for CASA Delegates will be found in the GFA Aerotowing Manual.

The main duty of delegates is the initial training of tug pilots in accordance with the Aerotowing Manual. An additional duty is the revalidation of any tug pilot who fails to meet the specified recency requirement.

16.2.6 Tugmaster

The tugmaster of a gliding club is responsible for ensuring the serviceability and availability of tug aircraft within the club and monitoring the club's tug pilots operating standards.

16.2.7 Aerotow ground signals

The signals for aerotowing are the same as for the bat signals used in winch/auto launching, except that a bat is not normally used. The short distance between the glider and the tug means that the under arm and over arm signals can be easily seen without a bat.

The procedure to be used between cockpit and wingtip holder is the same as for winch and autotowing, i.e. the wingtip holder controls the launch after the pilot has confirmed ready for take-off. Once again, anyone can give a stop signal if necessary.

Two external signallers will normally be used in aerotowing, one at the wingtip of the glider and the other positioned forward and to one side of the tug. The wingtip holder gives the signals as appropriate and the forward signaller relays the signals to the tug pilot. Signallers are responsible for keeping a good lookout in the direction of launch, on the approach, and on any cross-strip.

The forward signaller may be omitted when using tugs with good all-round visibility and all involved in the launch are satisfied that safety is not being compromised. The forward signaller should not be omitted in busy gliding operations which are combined with power-flying operations. Forward signallers should be aware that in the case of a launch failure (e.g. dropped wing) he/she may need to take evasive action (run) and they should situate themselves accordingly to minimise risk.

16.2.8 Aerotow signals during launch

In today's modern operation where the tug and the sailplane are generally both radio equipped, the primary means of communication is the radio. In stating the above, the following emergency signals are frequently used in our operations and sailplane pilots must still train and correctly respond to visual emergency signals in case of any radio malfunction or system failure.

16.2.8.1 Sailplane unable to release

If the sailplane is unable to release because of some fault in its release mechanism or the tow-rope, the following procedure shall be adopted:

(a) The sailplane pilot will advise the tow pilot by radio that the sailplane is unable to release. In the event that the radio is unserviceable the sailplane pilot will carry out (b),
(b) The sailplane shall fly out to the left of the tug, keeping the tow-rope taut. This signals that the sailplane cannot release;
(c) On receiving an acknowledgement (a wave of the hand) from the tug pilot, the sailplane is flown back to the line-astern position in high or low tow;
(d) When ready to release, the sailplane pilot shall adopt the high-tow position, whereupon the tug pilot shall release the rope.

Note: Emergency procedures, other than premature release initiated by the sailplane pilot, may only be practised by mutual arrangement as to the type, timing and nature of the emergency to be practised.

16.2.8.2 Tug emergency, glider must release

The "wave-off" signal consists of a rolling of the tug aircraft from side to side (that the signal is a definite rolling motion of the aircraft, not just a waggling of the ailerons). Upon recognising a wave-off signal, the glider pilot **MUST RELEASE IMMEDIATELY**. The tug pilot will only give the glider pilot the opportunity to release in this way if there is time to do so. If the emergency is sudden and/or catastrophic, the tug-pilot will release the glider from the tug end without warning. For this reason, if the tug-pilot is considerate enough to give a wave-off signal, the glider pilot is duty bound to release without delay.

16.2.8.3 Glider release failure

If the glider fails to release when the pilot has pulled the release knob, and further attempts prove fruitless the glider is flown out to the left side of the tug and is held in that position. The tug pilot feels the tug's tail being pulled around and realises the problem when the glider stays in its new position. The tug pilot then acknowledges the glider pilot's predicament by a wave of the hand. Upon receipt of the tug pilot's wave, the glider pilot returns the glider to the normal low-tow position behind the tug.

The glider is then flown up through the slipstream into the high-tow position and held there. The tug pilot when safe to do so, releases the rope from the tug end.

The glider is flown back to the aerodrome with the rope attached, taking the precaution of ensuring a high approach over all obstacles to avoid snagging the rope.

16.2.8.4 Double release failure

If the above signal is given and the full procedure followed, the glider should be released from the tug without further problems. However, there is an outside chance that the rope may also fail to release at the tug end. In this case the tug will begin a gentle descent towards the circuit area of the aerodrome.

In the case that radio communication has not been achieved between the tug and glider, upon recognising that a descent has commenced, the glider pilot will realise that a double failure has occurred. Sufficient airbrake is used to keep the tow rope tight and to maintain station in low-tow during the descent.

The glider is landed in normal fashion, and the appropriate braking method (wheel brake, skid) used to bring the entire combination to a halt. The tug pilot does not use the tug's brakes during the landing roll, allowing the glider to provide all the braking action.

If the sailplane for any reason starts gaining or overtaking the tug when on the ground, the sailplane shall do so to the right.

16.2.8.5 Airbrakes open

If the glider takes off with the airbrakes unlocked and they suck open during the climb, the tug pilot will detect a reduction in the rate of climb. If the airbrakes are very powerful and the tug not so, the climb may never begin. In this case the glider must release early, so as not to endanger the entire combination. If the glider pilot does not take this action, the tug pilot will do so.

If the combination gets off the ground, but the rate of climb is abnormally low, the tug pilot will check in the mirror to see whether the glider's airbrakes have opened. The signal for open airbrakes is a waggle of the tug's rudder. The glider pilot will then check the airbrakes and close them if they are open. Note that the rudder- waggle is not as pronounced as the rolling of the wings; the tug does not have to be yawed, just a rhythmic waggling of the rudder is sufficient for this signal.

If a rudder-waggle signal is received and the glider's airbrakes are checked and found to be locked, there may be something wrong with the tug which is not yet obvious to the tug pilot. In this case, having checked the airbrakes, the glider pilot should anticipate that he might be receiving a wave-off fairly soon.

On gliders fitted with tail-chutes, this item might be the cause of a rudder-waggle. If a signal is received and the airbrakes are found to be closed and locked, the tail chute should be jettisoned. If it has in fact deployed, this will fix the problem; if it has not deployed and the problem is elsewhere, nothing is lost because the tail-chute will remain within its tail fairing. The glider pilot must remember that the chute has been jettisoned when coming in to land.

16.2.9 Airfield specifications for aerotowing

Aerotow operations at gliding sites must be conducted in accordance with Section 18.

In general, any new permanent or semi-permanent aerotow operation (e.g. lengthy summer camp) requires RTO/O approval. This obviously does not apply to aerotow retrieves from paddocks, which belong in the realm of pilot responsibility (Refer Operational Regulations 5.2.1). Remember that the tug-pilot is the command pilot of an aerotow combination.

16.2.10 Aerotow launch emergency training

During pre- and post-solo training, all likely launch failure cases must be practised in accordance with the Instructor's Handbook. Rope-breaks and wave-offs must be practised at a variety of heights during the launch.

16.2.11 Dual towing

Towing of two gliders with one tug aircraft may be carried out subject to the following requirements:

- The tow pilot is appropriately endorsed.
- Strip length and width must be adequate and provide obstacle clearance.
- Wingtip holders are to be positioned at the outer wings.

- Forward signaller is essential.
- Water ballast must not be carried.

The short rope to be a minimum of 35 metres long and the long rope minimum 65 metres long. Ropes are to be connected to the tug aircraft in such a way that, if jettisoned by the tug pilot, the ropes will separate. The GFA approved set up for rings and tow ropes for the towing of two gliders simultaneously is detailed in GFA Airworthiness Advice Notice (AN) 167.

Prior to take-off, if there is any crosswind, the glider on the short rope must be placed on the upwind side of the tug.

The glider with the most efficient ground-braking system (skid or wheelbrake) must be placed on the long rope, in case the short rope breaks during the take-off run.

The more experienced pilot must fly the glider on the long rope (in case of a take-off emergency requiring a rapid reaction to release the rope).

Once the entire combination is airborne, both gliders must fly directly behind the tug, the glider on the short rope flying in high-tow, the glider on the long rope in low-tow.

At the releasing stage, the glider in high-tow on the short rope must release first and ensure that an immediate clearing turn is made.

In the event of a wave-off, the gliders break to the respective sides from which they commenced the launch.

Radio will be used for effective communication between the two sailplanes and the tug.

In the event of a radio failure and a release failure in the first glider, the pilot must fly the glider out to the left to warn the tug pilot and the pilot of the other glider. Upon receipt of acknowledgment from the tug pilot, the glider is returned to normal high-tow, whereupon the glider on the long rope releases and clears away. The tug pilot then releases the short-rope glider from the tug end.

If the glider on the long rope has not released and cleared away within 10 seconds of the glider on the short rope returning to the normal high-tow position, the tug pilot must assume that it has also failed to release and must release the ropes at the tug end. If connected to the tug in the prescribed manner, the ropes will separate cleanly after release.

16.2.12 Aerotowing Manual

The GFA Aerotowing Manual is a CASA approved Manual. It is available for purchase in hard copy from the GFA Secretariat, or free of charge as a downloadable file from the GFA Website.

16.3 REVERSE PULLEY LAUNCHING

Any operator who wishes to conduct reverse pulley operations must seek the approval of the CTO, who will ensure that the correct methods are applied.

16.4 BUNGY LAUNCHING

Bungy launching is not in general use in Australia and the necessary elastic ropes are not obtainable locally. There are special requirements for bungy sites and the conduct of this method of launching. Any operator who obtains an imported bungy rope and has found a site from which to conduct such operations must seek the approval of the CTO, who will ensure that the correct methods are applied. Bungy launching operations must not take place without approval.

16.5 REFLEX LAUNCHING IS NO LONGER SUPPORTED.

Reflex launching is no longer considered a satisfactory launch method.

16.6 SELF-LAUNCHING

See Section 19.2.

17 AIRFIELDS AND AIRSPACE

17.1 AIRFIELDS AND AIRSPACE OFFICERS

17.1.1 GFA Airfields and Airspace Officer

This is an elected voluntary position, responsible to the GFA Board through the Operations Panel for the following:

- To ensure the continuance of the maximum amount of freedom for gliding operations in accordance with GFA policy.
- To attend CASA/Industry airspace consultative meetings when necessary, to ensure adequate representation of gliding interests.
- To coordinate the activities of Regional Airfields and Airspace Officers in assisting clubs to obtain access to adequate sites for their operations and to ensure that the regional personnel liaise with the relevant RTO/O to ensure that such sites meet operational requirements.
- To act as the Convenor of the GFA Airfields and Airspace Committee and to organise meetings of that committee as required.

17.1.2 Regional Airfields and Airspace Officers

These are voluntary positions elected by State Associations/Regional Committees. Duties are similar to those of the GFA Airfields and Airspace Officer, but on a regional basis.

17.2 OPERATIONS AT CERTIFIED, REGISTERED AND MILITARY AERODROMES

Approvals for regular or occasional gliding operations at Certified, Registered and Military aerodromes shall be obtained from the aerodrome operator (or the appropriate Military Authority in terms of CAO 20.17) and all relevant CASA requirements and procedures shall be adhered to. CASA may issue directions under CAR 92 (2).

Responsibility for the conduct of gliding operations at non-controlled aerodromes shall be vested in a person nominated by the gliding organisation and approved by the aerodrome operator. NOTE: This person will be expected by CASA to be the usual means of liaison between the club, aerodrome operator and CASA.

Any scheduled or unscheduled outlandings at Certified, Registered and Military aerodromes, and subsequent aerotow launches, shall be conducted so as to cause minimum disturbance to normal aerodrome traffic (CAR 92 (1)).

Gliding operations (except aerotow retrieves) must only take place from an area which has been approved by the RTO/O.

At all permanent or semi-permanent gliding sites, the standard "Gliding in Progress" signal (double white cross) must be displayed during the period that operations are taking place.

Specific requirements for site dimensions will be found in Sections 16.1.10 (winch/auto operations) and 16.2.9 (aerotow operations).

Unless specifically approved by the Civil Aviation Safety Authority, a gliding site must not be located (a) within a Control Zone or Class C airspace, (b) within 10 nautical miles of an aerodrome with a published instrument approach or (c) within 5 nautical miles of a Certified aerodrome, a military aerodrome or an aerodrome under the control and management of CASA.

17.3 OPERATIONS AT OR IN THE VICINITY OF A NON-TOWERED AERODROMES

All pilots must monitor and communicate on the CTAF frequency whenever they are operating at or in the vicinity of a non-towered aerodrome.

An aircraft is defined as operating at the aerodrome whenever it is within the active areas of the aerodrome - when the aircraft is located within the aerodrome runway, or taxiway markers.

In the vicinity of an aerodrome is defined as within a horizontal distance of 10 nm of the aerodrome reference point and at a height above the aerodrome reference point that could result in conflict with operations at the aerodrome..

17.4 AIRSPACE

Comprehensive information on operating procedures for glider pilots operating in Australian Airspace is provided in the GFA publication “Airways and Radio Procedures for Glider Pilots”. It is the responsibility of all pilots to comply with the procedures contained in this booklet and all pilots must ensure that they are familiar with the requirements and procedures contained therein. Other reference documents are the AIP, PCA, ERC and VTC.

Note: When making reference to the above documents the pilot must ensure the documents are the most current version or of the latest revision.

The “Airways and Radio Procedure for Glider Pilots” may be purchased in hard copy from the GFA Secretariat or downloaded free of charge as a from the GFA website.

17.4.1 Airspace and Flight Notification

- A sailplane, other than in an emergency, shall only be operated in controlled airspace in accordance with an airways clearance. No aircraft shall enter military or civil controlled airspace without a clearance.
- If the pilot in command cannot comply with an airways clearance, he/she must advise ATC immediately and request an amended clearance. **Note:** Within controlled airspace a sailplane must be flown so as to remain within 5 NM of its nominal track Refer Operational Regulations 4.4.1).
- The pilot of a sailplane operating within uncontrolled airspace for which mandatory radio procedures apply must monitor the appropriate VHF frequency, report when entering and leaving the airspace and respond to reports and broadcasts from other aircraft in potential conflict.

17.4.2 Controlled Airspace Steps

Be aware that CTA steps are generally based upon the location of the aerodrome DME/VOR, while GPS often uses the aerodrome reference point which might be a couple of miles away from the DME/VOR. Therefore apply a safety buffer.

18 AERODROME OPERATIONAL STANDARDS AND PROCEDURES

18.1 OPERATIONS APPROVAL

Gliding Club airfield sites from which regular club operations are conducted require Regional Technical Officer Operations (RTO/O) approval (Refer Section 9.2.6). Occasional or irregular gliding operations may be conducted without prior RTO/O approval provided that operations are conducted in compliance with relevant GFA operational requirements and the standards and procedures contained in this document.

Regular Gliding operations require the consent and approval of the Aerodrome owner and/or the aerodrome operator. In the case of privately owned airfields or privately owned land this will normally be the land owner. However, in many instances it may be Government Agencies or Aerodrome Committees. CASA District Office approval will be required for gliding operations at some aerodromes.

Persons wishing to conduct a gliding operation at an established aerodrome should consult with the aerodrome operator, aerodrome committee and other operators based

at, or regularly using the aerodrome, to develop a plan for the integration of gliding with other aerodrome traffic.

The procedures to be adopted by a gliding operation will be determined by the nature and volume of peak traffic flows during the proposed period of gliding operations. The CASA document 'Rules and Practices for Aerodromes' (RPA) Volume IIa, Chapter 7 and Chapter 11, specifies the dimensions and markings of aerodromes for gliding operations and should be read in conjunction with this document. Airports Inspection Sections are able to advise on aerodrome layout. Areas of the aerodrome approved for gliding operations will be marked on the aerodrome plan

Regular gliding operations conducted from privately owned land/airfields without significant 'other' traffic must be conducted in accordance with the requirements contained in this document. However, exemptions may be sought by operators if specific requirements are considered inappropriate or unnecessary. Exemptions will be provided by the relevant RTO/O and noted on the Club's Operational Safety Audit Form.

18.2 GENERAL CONDITIONS

When considering an application to conduct gliding operations on a regular basis the following factors should be considered:

(a) siting and layout of the aerodrome;
(b) existence and level of utilisation of radio navigation aids;
(c) the organisation of the surrounding airspace;
(d) the composition and timing of existing traffic movements; and
(e) the proposed amount of gliding traffic and the method(s) of launch.

18.2.1 Regular Gliding Operations

Where regular gliding operations have been approved the gliding activity shall be notified in AIP ERSA as follows:

(i) where contra-circuit procedures are in operation the circuit direction from each runway shall be specified;
(ii) where launching is by aerotow and a common circuit direction applies the location of the gliding strip shall be specified, e.g. "Gliding OPS HJ JF within RWY strip" or "Gliding OPS HJ. Gliders operate common circuit direction from separate strips alongside RWS";
(iii) Where launching is by winch or car-tow this shall be included by the phrase "Wire launching";
(iv) the scale of the gliding operation may be a consideration in the selection of the dimensions and frequency for the aerodrome CTAF, to enhance the ability of gliding traffic to be 'on frequency'.

18.2.2 Occasional gliding operations

Occasional gliding operations for particular events or specified periods of time may be approved at aerodromes, including aerodromes other than those where regular gliding operations occur, provided that adequate notification is given to permit NOTAM action. The standards and procedures in this document are applicable.

18.2.3 Aerotow Retrieves

Scheduled or unscheduled glider outlandings and subsequent aero-tow launches and Powered Sailplane movements are permitted at aerodromes at which regular gliding operations are not established provided the glider is operated so as to cause minimum disturbance to normal aerodrome traffic.

18.3 PRIMARILY GLIDING AERODROMES

Aerodromes that are primarily established as "gliding sites" may have runway strips designed specifically for the gliding operations. However, adequate provision for other traffic should be provided to allow safe use of the airfield when required.

Operations should be conducted consistent with recommended CTAF procedures. Whenever practical a gliding frequency should be used and published for CTAF purposes.

The RTO/O may provide specific exemptions to operating requirements at sites established primarily as “gliding sites”. However, exemptions to 12.1 below should not be provided unless justified by exceptional circumstances.

18.4 SPECIFIC CONDITIONS FOR MIXED OPERATIONS (GLIDING AND OTHER USERS) INCLUDING OPERATIONS AT REGISTERED, CERTIFIED, UNCERTIFIED AND MILITARY AERODROMES.

Operations shall normally take place from a designated glider runway strip of the dimensions specified in RPA. The use of other parts of the aerodrome as emergency landing areas is permissible.

Where space permits, a glider runway strip shall be located outside the existing runway strip, with the glider and tug circuit in the same direction as the normal powered-aircraft circuit. In this situation takeoffs and landings on the two runway strips must not occur simultaneously. An aircraft may, however, land or take off from one runway while another aircraft is stationary or taxying on another.

When space permits at a location, and where the balance and total volume of powered and gliding movements warrants it, the glider runway strip may be so located as to permit contra-circuits to be flown.

A glider runway within the existing runway strip shall only be permitted where insufficient space exists to place it outside the runway strip and where peak powered traffic movements are light enough that conflictions can be readily avoided by only brief delays. Runway strip markers may be moved to permit additional space for gliding operations.

If a glider runway strip is unserviceable due to aerodrome works or soft wet surface, gliding operations from an existing runway may be permitted at sites where total movements are light enough to avoid confliction. In such a situation, gliding operations shall be conducted so as to cause minimum disturbance to other traffic.

Where approval is sought for gliding operations at a controlled aerodrome, appropriate procedures for the control of gliding traffic shall be developed in consultation with the Airways Operations unit and Regional Office prior to such approval being given.

Gliders may be launched by aerotow or self-launch from any aerodrome where gliding operations are approved, or on an ad-hoc one-off basis from other aerodromes as specified in paragraph 18.2.2.

Gliders may be launched by wire/rope (either winch or car-tow) at aerodromes where powered aircraft movements are light enough that this does not cause conflictions, provided:

(a) if launch cables must cross any runway or taxiway to provide sufficient length of cable run for the operation, they do so to the minimum extent necessary for the operation and the aerodrome entry in ERSA draws attention to this fact; and either
(b) the glider runway strip is located outside the runway strip; or
(c) where the glider runway strip is located within the runway strip and markers are moved to accommodate it, all cables are laid out and winch equipment remains at least 21 metres from the runway edge outside the normal portion of runway strip.

Note: this figure is the spacing from runway edge to runway strip markers where an 18 metre runway lies in a 60 metre strip.

No aeroplane, glider or vehicle shall be permitted on a glider runway or runway strip unless it is:

(a) an aircraft taking-off, landing or taxying; or
(b) a glider or gliders lined up ready for launch and attended by a competent crew; or

(c) a vehicle actually engaged in launching or towing a glider, or towing a glider launch cable.

Note: a glider being towed by a vehicle is considered to be an aircraft taxying.

Adequate parking and tie-down facilities for tug aircraft, gliders and vehicles shall be provided outside the glider runway strip.

18.5 COMPETITIONS AND FLYING MEETS

18.5.1 Approvals Required

The gliding organisation must obtain permission to hold a competition or flying meet from CASA and the aerodrome operator, and nominate a person as organiser. The organiser shall ensure that the competition or flying meet is conducted in accordance with any conditions specified by the CASA and/or the aerodrome operator.

18.5.2 Operations

Operations from within an existing runway strip, as outlined in section 18.4, are suitable only where gliding activity is not conducted on an intensive basis. Where it is intended to significantly exceed this for a short period, e.g. for a competition, course or flying meet, approval for the event must be sought from CASA at least 21 days in advance and special conditions may be imposed.

18.5.3 Notifications

CASA shall be notified of the dates and contest area at least 21 days in advance to permit NOTAM action to be taken. The NOTAM should also alert other users to the likelihood or desirability of gliders and tug aeroplanes using a nonstandard circuit direction to expedite traffic flow. Daily route details of gliding competition tasks shall be notified to the responsible Flight Service unit prior to launching so that these details may be provided to other traffic.

18.5.4 Radio

A competition or flying meet at an aerodrome may well generate 75% or more of all movements during the period of the event. If this is likely, it is recommended that the gliding contest official frequency be promulgated as the CTAF for the contest period in order to minimise conflictions on the aerodrome and in the circuit area.

18.5.5 Temporarily Displaced Thresholds

CASA may approve the establishment of a temporarily displaced threshold for powered traffic for a special event such as a gliding competition provided:

(a) a NOTAM is issued;
(b) gliders are parked at least 60 metres behind the displaced threshold; and
(c) the full length of the runway can be made available on 20 minutes notice for the movement of an aircraft which operationally requires the full length.

18.5.6 Permanently Displaced Thresholds

An application for a permanently-displaced threshold for powered aircraft to facilitate a regular gliding operation should be referred to CASA. The position of the displaced threshold should be at least 60m ahead of the most forward position from which glider tug aeroplanes are permitted to line up to commence the launch of a glider.

18.6 OPERATIONAL CONTROL

18.6.1 Controlled Aerodromes

At controlled aerodromes responsibility for the control and integration of glider and other traffic rests with Air Traffic Control. These procedures will be

developed in consultation with the gliding operator, SR&S District and Central Offices, and the ATS unit and Regional Office.

18.6.2 Non-Controlled Aerodromes

At non-controlled aerodromes responsibility for the conduct of gliding operations shall rest with a person (normally the Chief Flying Instructor of the gliding organisation) nominated by the gliding organisation and accepted by CASA. CASA acceptance will ensure that the District Office has confidence in the ability of the nominee to assume this responsibility. This person shall:

(a) accept responsibility for ensuring the gliding operations at that site are conducted in accordance with the operating conditions and limitations specified in the approval; and
(b) liaise with the aerodrome operator and other aerodrome users to achieve a harmonious working relationship.

18.7 OPERATING PROCEDURES

The operating procedures adopted will depend to a large extent on the aerodrome layout and availability of additional space, together with the nature, timing and volume of other aerodrome traffic. Whilst no particular movement numbers are specified, there will be a point at which any given traffic arrangement will reach effective saturation.

The three standard arrangements are:

(a) Single strip operations, (small operations only) where gliders (and tug aeroplanes if launch is conducted by aerotow) and other aircraft operate from runways within a common runway strip;
(b) Dual strip operations, (the preferred standard) where gliders (and tug aeroplanes) and other traffic operates to a common circuit direction from separate, closely spaced runway strips; and
(c) Parallel runway operations, (very busy aerodromes) where gliders and tug aeroplanes operate to a contra-circuit pattern from other traffic, using separate parallel runway strips with centre-lines at least 120 metres apart.

18.7.1 Dual Strip Operations

This is the preferred and most practical arrangement for allocations where space and traffic density are not limiting considerations. The glider runway strip may abut directly onto the main runway strip or be separated by less than 120 metres between centre-lines. In this event the normal take-off and landing separation minima specified in AIP OPS will apply as if all operations were being conducted from the same runway, but an aircraft stationary or taxying on one runway strip does not affect operations on the other.

If a glider runway strip is established on only one side of the main runway strip, consideration should be given to promulgating circuit directions such that the glider runway strip is always on the inside of the circuit. This will avoid traffic for the glider runway strip crossing the main runway centreline on final.

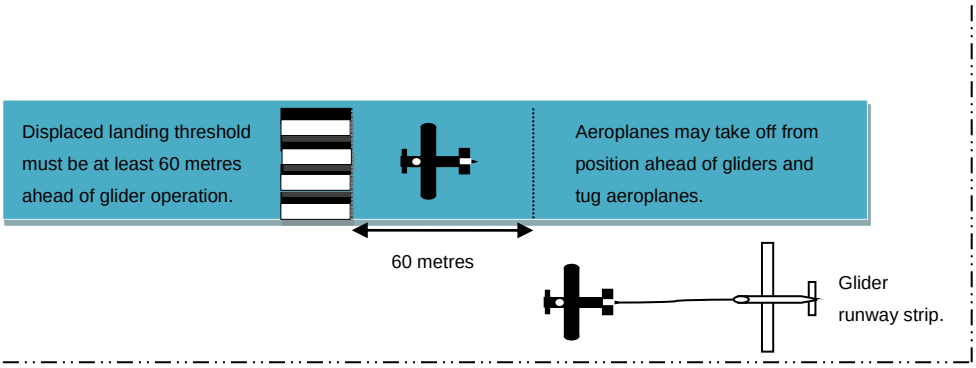
18.7.2 Single Strip Operations

This arrangement may be permitted where space does not permit dual runway operations and peak powered traffic movements are light enough that conflictions can be avoided by only brief delays. Where the glider runway lies within a single runway strip, both runways will be deemed to be occupied when an aircraft is taxying or stationary within the runway strip or is on final approach to either runway. Aircraft shall have priority to use the runway strip in the following order:

(a) gliders landing;
(b) powered aircraft landing;
(c) powered aircraft taking-off;
(d) gliders taking-off or being launched; and
(e) any aircraft taxying.

Take-off and landing operations of tug aeroplanes within the glider runway strip shall be confined to the glider runway (i.e. not within 10metres of the edge of the glider runway strip).

Notwithstanding the above, where a displaced threshold has been established on the runway for powered aircraft operations and gliders are stationary behind and not closer than 60 metres to the displaced threshold, a powered aircraft may land on the runway provided no glider has commenced a take-off run or is on final approach or landing roll. Similallry, a powered aircraft may commence a take-off run on the runway from a position ahead of a stationary glider or tug aircraft on the glider runway.



18.7.3 Parallel Runway (Contra Circuit) Operations

Where the volume and timing of aerodrome traffic is such that conflictions in use of the runway strip(s) cause frequent or prolonged delays, the use of parallel runways separated by at least 120 metres, and promulgation of contra-circuit procedures, will alleviate this. However, it should not be implemented at aerodromes with only a light traffic density, because of:

(a) the complexity of this arrangement, particularly where intersecting runways exist;
(b) its constraints on use of airspace; and
(c) its propensity for being misunderstood by pilots who are unfamiliar with this style of operation.

Where contra-circuits are employed from runways spaced at least 120 metres apart, simultaneous day VFR operations on both runways are permitted

Where contra-circuits are in use gliders should make every effort to avoid flying in the powered aircraft circuit, and vice-versa, below 2000’ AGL.

18.8 WINCH AND VEHICLE TOW LAUNCHING

Wire/Rope launching, by winch or car-tow, may be carried out at aerodromes which meet the requirements specified in 18.4 of this document.

18.8.1 Parking of Equipment

Winches, tow-cars and associated vehicles shall be so positioned that whilst parked they do not occupy any portion of the runway strip or taxiways, nor infringe a 5% take-off gradient. Infringement of the 1:7 transitional surfaces may, however, be permitted. The launch cable shall not remain deployed across any crossing runway or taxiway for any longer than the minimum required for the actual launching of gliders.

18.8.2 Conspicuity Marking

Winches and tow-cars should be conspicuously marked (preferably painted either orange-and-white chequers or bright yellow) and shall display one or more white strobe lights whenever the launch cable is moving. Associated vehicles shall display a yellow rotating beacon when being used.

18.8.3 Personnell Standards

The drivers of all winches and tow-cars shall be trained in accordance with a syllabus of training which covers normal and emergency procedures and the requirements of this document. Additionally, all winch or tow-car drivers operating at aerodromes shall be qualified to operate a VHF transceiver on the frequency promulgated for use in the circuit area.

18.8.4 Operational Requirements

Launching operations shall cease and the cable shall be retracted or removed at least 21 metres from the runway edge whenever an aircraft not associated with the gliding operation joins circuit, taxies for take-off or is expected to arrive in the next five minutes.

For aerodromes that are not licensed or certified, launching shall cease as above unless separation can be arranged by radio.

Launching may recommence when an aircraft not associated with the gliding operation has taxied clear of the runway strip (and glider runway strip if applicable) or has departed.

Where wire/rope launching takes place from a glider runway within an expanded runway strip the wire shall not be deployed on, nor the tow-car or cable retrieve vehicle driven on, that portion within 21 metres of the runway edge. All such operations shall be confined to the outer portion.

Whenever a winch or tow-car is unattended the launch cable shall be retracted or parked off the glider runway outside the strip markers.

18.9 Notification and Communications

The operator of the launch equipment (tug aeroplane, winch or tow-car) shall listen out on the frequency promulgated in ERSA for use in the circuit area during launching and shall broadcast his/her intentions prior to commencing each launch. The launch shall not proceed if it appears likely to conflict with other traffic.

Details of the gliding operations shall be advised in AIP-ERSA, specifying days of operation, situation of glider runway strips, whether wire/rope launching occurs and other significant information. The Inspector (sport aviation), flying operations section in the CASA Central Office is the co-ordinator for this information.

Gliders operating within the area promulgated at non-towered aerodromes for mandatory carriage of radio shall maintain a communications watch on the CTAF published for that

aerodrome and respond to relevant broadcasts made by other aircraft (Refer also to Section 17.3).

Gliders and tug aeroplanes operating at non-towered aerodromes where mandatory carriage of radio is not required shall comply with CTAF procedures in the area promulgated when they are equipped to do so.

19 RADIO

Comprehensive information for glider pilots on the use of radio is contained in the GFA publication "Airways and Radio Procedures for Glider Pilots", which may be purchased in hard copy from the GFA Secretariat or downloaded free of charge as a from the GFA website. It is the responsibility of all pilots to comply with the procedures contained in this booklet and all pilots must ensure that they are familiar with the requirements and procedures contained therein.

19.1 GFA FLIGHT RADIOTELEPHONE OPERATOR'S LOGBOOK ENDORSEMENT

Pilots must obtain the above endorsement prior to flying solo. The reference document is "Airways and Radio Procedures for Glider Pilots". Following study of this document, an oral examination on radio usage and procedures must be conducted and, if the candidate's level of competence is satisfactory, the logbook is endorsed.

Oral examinations may be carried out and logbook endorsements made by Level 1 or higher rated instructors who themselves hold either a FROL or a GFA logbook endorsement.

Candidates who successfully pass the oral examination will have their logbooks endorsed as follows:-

"This is to certify that (name).....has successfully passed an oral examination on radio usage and procedures and is approved to operate VHF flight radiotelephone equipment carried in gliders".

The logbook endorsement should carry the instructor's name, instructor level, signature, club and date.

Pilot logbook stickers are available for the purpose from the GFA Website:

The holder of a GFA Radiotelephone Operator Authorisation is not permitted to operate Aeronautical HF radio equipment.

19.2 PRIMARY GLIDING FREQUENCIES

The three VHF frequencies on permanent allocation to gliders are 122.5, 122.7 and 122.9 Mhz. A Flight Radiotelephone Operators Licence or GFA Radiotelephone Operator Authorisation is required to operate on thee frequencies (Operational Regulations 3.5.1).

19.3 ADDITIONAL TEMPORARY GLIDING FREQUENCIES

Additional frequencies may be allocated for the exclusive use of gliders for short periods e.g. National Championships. Any organisation needing extra frequencies on a temporary basis for any purpose should contact the GFA Radio Officer.

19.4 AREA VHF FREQUENCY

Gliders are encouraged, but not required, to monitor the area VHF frequency when operating above 5,000 feet OCTA (AIP ENR 1.1, 21.1.10) (Exemption CAR 243(1)).

19.5 AIRCRAFT CALLSIGNS

Radio callsigns in use for gliders and sailplanes consist of the last three letters of the aircraft registration (e.g. the callsign for VH-GFR is 'Golf Foxtrot Romeo'). When making radio broadcasts pilots must use the callsign prefixed with the word "glider". Pilots of aircraft whose callsign is prefixed with a 'G' are not exempt from this requirement.

20 POWERED SAILPLANES

A powered sailplane is an aircraft that, if not for the attachment of an engine, would be a sailplane and that:

(a) meets the criterion of having a span loading (W/b2) equal to, or less than, 3 kg/m2 (where W is the maximum allowable weight in kilograms during flight, and b is the wingspan in metres); and
(b) has adequate performance with the engine operating to meet the applicable performance criteria for powered sailplanes referred to in Part 22 of CASR 1998.

There are three Powered Sailplane Endorsements that can be achieved (refer GFA Operational Regulations 3.3.9 to 3.3.12):

1. Self-Launching;
2. Cross-country/Touring; and
3. Controlled Airspace.

20.1 POWERED SAILPLANE ENDORSEMENT - SELF-LAUNCHING

20.1.1 Endorsement requirements for pilots with recognised previous power flying training

Pilots holding a GFPT or higher Licence or a pilot certificate issued by RAAus on becoming members of the GFA may be issued with a self-launching Powered Sailplane Endorsement at the discretion of a Level 2 or higher rated Instructor. However, pilots must be trained and be familiar with glider operations to solo standard.

20.1.2 Endorsement requirements for pilots without recognised previous power flying training

Training for a Self-launching Powered Sailplane Endorsement shall be conducted in a two seat Powered Sailplane by a Level 1 or higher rated Instructor who holds a Self launching Powered Sailplane Endorsement and is experienced with the aircraft type being utilised. The training syllabus is in the GFA Operational Regulations at Appendix 4.

It is recognised that the training required to fulfil the syllabus will vary considerably depending on the Powered Sailplane being used for the training. However, as the purpose of the training is to introduce pilots trained in un-powered gliders to Powered Sailplanes, the training is required to be as applicable to the aircraft in use.

Logbook endorsement shall be authorised by a Level 2 or higher rated Instructor.

20.1.3 Privileges and limitations

The “Powered Sailplane Endorsement - Self-launching” allows a pilot to self-launch a powered sailplane and to operate it “engine-on” locally. For this purpose “locally” is defined as being within a 25nm (46km) radius of the take-off point. However, operations away from the field are subject to normal GFA requirements

Pilots who hold a “Powered Sailplane Endorsement – Self-launching” may operate a Powered Sailplane outside the 25nm radius of the take-off point “engine off” provided that they satisfy the necessary GFA requirements and authorisations for cross-country soaring. Restarting of engines is permitted outside the 25nm radius of the take-off point for the purpose of regaining altitude to avoid outlandings and for the purpose of “self-retrieving” by proceeding directly back to the take-off point, or an alternative safe landing site.

20.1.4 Further Conversions

Following logbook endorsement for self-launching, conversions to other types shall be as per normal GFA type conversion procedures. Instructors undertaking

or supervising Powered Sailplane type conversions should take into account the suitability of previous training, including that received for the “self-launching” endorsement and if it is considered inadequate, require further training before authorising the type conversion.

20.2 POWERED SAILPLANE ENDORSEMENT - CROSS-COUNTRY/TOURING

Pilots must be further endorsed in order to operate Powered Sailplanes “engine-on” Cross-country.

A Pilot holding a “Powered Sailplane Endorsement - Self-launching”, and “C” Certificate may be Cross-country/Touring endorsed following training and assessment by a Level 1 or higher rated instructor who holds a Powered Sailplane Cross-country/Touring Endorsement. The training syllabus is in the GFA Operational Regulations at Appendix 5.

20.2.1 Endorsement requirements for pilots with recognised previous power flying training

Pilots holding a Private or higher Licence, or a Pilot Certificate, with cross-country endorsement issued by RAAus and a ‘C’ Certificate may be Cross-country/Touring endorsed provided that the Instructor issuing the endorsement is satisfied that the pilot meets the requirements above.

Logbook endorsement shall be authorised by a Level 2 or higher rated Instructor

20.3 POWERED SAILPLANE ENDORSEMENT – CONTROLLED AIRSPACE

Pilots must be trained and endorsed in order to operate Powered Sailplanes “engine-on” in controlled airspace. Training and assessment to be conducted by Level 1 or higher rated instructors that are Powered Sailplane Controlled Airspace Endorsed

The training syllabus is in the GFA Operational Regulations at Appendix 6.

The controlled airspace endorsement is applicable to operations conducted under either, or both, the Powered Sailplane self launching and cross-country/touring endorsements

20.3.1 Endorsement requirements for pilots with recognised previous power flying training

Pilots holding Private or higher Licence or a Pilot Certificate issued by RAAus may be issued a Controlled Airspace endorsement provided that the Instructor issuing the endorsement is satisfied that the pilot meets the requirements above.

Logbook endorsement shall be authorised by a Level 2 or higher rated Instructor

20.4 ALTERNATIVE TRAINING

Where appropriate for any of the above Endorsements, training may be carried out in a suitable GA or RAA registered aircraft by non GFA Instructors suitably qualified to do so by the appropriate authority and these Instructors/Trainers may sign-off the training stages contained in the “Powered Sailplane Training and Endorsement” document. However, all Powered Sailplane Endorsements must be logbook notified and authorised by GFA Level 2 or higher rated Instructors who are satisfied that the training received fulfils the training requirements.

20.5 TRAINING GLIDER PILOTS IN POWERED SAILPLANES

Powered sailplanes may be used to carry out the GFA glider pilot training syllabus in accordance with the Instructor's Handbook and the GFA Powered Sailplane Manual. When claiming GFA or FAI Certificates using powered sailplanes, the requirements of this manual and the FAI Sporting Code must be met.

20.6 SPECIAL WARNING FOR "ENGINE-ON" CROSS-COUNTRY OPERATIONS

Because many powered sailplanes have engines which are not aero-engines and may not be as reliable as those fitted to powered aircraft, it is prudent that engine failure

should be anticipated at all times and they should not be flown outside of gliding range of a known safe landing area until it is certain that they can reach the next one along track.

20.7 INSTRUCTING IN POWERED SAILPLANES

An instructor who is qualified in either or all of the various categories of powered sailplane may exercise the privileges of his/her instructor authorisation in powered sailplanes. The logbook endorsement notifying the powered sailplane endorsement must supplement the Instructor logbook sticker to act as the authority for instructing in powered sailplanes.

It is left up to each individual instructor to become sufficiently familiar with all modes of operation of any given type of powered sailplane before attempting to give instruction in it.

20.8 POWER-ASSISTED SAILPLANES

These are gliders fitted with retractable power-plants which are not capable of being used for launching, but only produce sufficient power to give a small rate of climb (about 1 M/S, 2 knots) once they are in the air. All of them must be launched by aerotow or winch/auto tow and they are not approved for self-launching. The intention is to provide a glider so fitted with a facility to "self-retrieve" and thus obviate the need for a trailer retrieve. In line with their self-retrieving purpose, most machines of this type do not have any facility for starting the engine on the ground and are reliant on a "windmilling" air start to get them going. The exact definition of a power-assisted sailplane ("turbo" sailplane in Europe) will be found in CAO 95.4.

In most cases, there is no engine management required in these machines by Basic design, as they are designed as simple "on-off" installations with no throttle and a folding propeller which unfolds automatically as the engine extends. The only control is a simple decompressor which allows the propeller to start windmilling. In machines of this type, no special requirements are necessary for training and conversion, beyond careful study of the Flight Manual.

However, the evolution of powered sailplanes and power-assisted sailplanes is a continuous process and there may be variations to the above operating mode in some designs. Although the basic design parameter remains, i.e. that the glider cannot self-launch, but only self- retrieve (otherwise it becomes a powered sailplane), extra engine-management tasks may be introduced from time to time by various designers and a good working knowledge of the engine operating requirements is obviously necessary before flying such a machine cross-country.

21 ACCIDENTS, SERIOUS INCIDENTS AND INCIDENTS

21.1 ACCIDENT OR INCIDENT NOTIFICATION

Accidents and serious incidents (commonly called Immediately Reportable Matters), which affect the safety of aircraft must, in the first instance, be notified to the ATSB by telephone toll-free call: **1800 011 034** or fax (02) 6274 6434.

Notify the ATSB by telephone toll-free
1800 011 034

21.1.1 Notification to GFA

GFA has an obligation to examine the results of incident and accident investigations to ensure that standards have been complied with and are appropriate. Therefore, in addition to the above statutory requirement, it is a GFA requirement that Immediately Reportable Matters are also reported to the GFA Chief Technical Officer (CTO) or the Chairman of the Operations Panel (COP) at or around the time they are reported to ATSB. The telephone contact details for

the CTO and COP can be found on the GFA website. The CTO or COP will notify the appropriate GFA officers and the Regional Technical Officer, Operations of the relevant Region.

The GFA also requires notification to the CTO of all 'Routine Reportable Matters' and those accident and incidents that are not required to be reported to ATSB.

21.1.2 Online Reporting

A secure Safety Occurrence Reporting Portal is to be used to notify the GFA about all aviation safety occurrences. This system automatically advises the ATSB, thereby ensuring our statutory obligations are met. Reports will also be automatically copied to the Regional Technical Officers and Club's Chief Flying Instructor.

Notify the GFA via secure online form
Click here

21.1.3 Offline Reporting

In those circumstances where access to the GFA's Safety Occurrence Reporting portal is impracticable, members can use a hard copy paper form which can be downloaded from the GFA website and sent to the GFA office for entry into the Safety Occurrence Reporting portal.

21.1.4 Further Information

Accidents and serious incidents are required to be immediately notified to the ATSB in accordance with Section 18 of the Transport Safety Investigation Act 2003.

Written notifications are required to be submitted within 72 hours of an accident, serious incident or incident in accordance with section 19 of the Transport Safety Investigation Act 2003 and Regulation 2.6 of the Transport Safety Investigation Regulations 2003. The written notification should contain as much information about the accident, serious incident or incident as is within the knowledge of the person at the time of submitting the notification.

Submission of information known by the reporter to be false or misleading is a serious offence under section 137.1 of the Criminal Code. Aiding, abetting, counselling, procuring or urging the submission of false or misleading information is also a serious offence.

21.1.5 Immediately Reportable Matters

An immediately reportable matter is a serious transport safety matter that covers occurrences such as accidents involving death, serious injury, destruction of, or serious damage to vehicles or property or when an accident nearly occurred. Immediately reportable matters must be reported to a nominated official by a responsible person as soon as is reasonably practical. The list of immediately reportable matters is contained in the TSI Regulations.

21.1.6 Routine Reportable Matter

A routine reportable matter is a matter that has not had a serious outcome and does not require an immediate report but safety was affected or could have been affected. Under section 19 of the TSI Act a responsible person who has knowledge of a routine reportable matter must report it within 72 hours with a written report to a nominated official. The list of routine reportable matters is contained in the TSI Regulations. Routine reportable matters include a non-serious injury or the aircraft suffering minor damage or structural failure that does

not significantly affect the structural integrity, performance or flight characteristics of the aircraft and does not require major repair or replacement of the affected components.

21.1.7 Who must report an aviation accident?

Under the Transport Safety Investigation Act 2003 and regulations, the owner, operator or crew of the aircraft must report the accident immediately to the ATSB. However, sometimes the owner and/or operator may not learn of the accident until sometime after the event. The crew may also be unable to notify the ATSB due to personal injuries. Therefore, anyone learning of an aviation accident should report the accident to the ATSB immediately, as well as alerting emergency services as required. While the ATSB does not investigate all accidents and incidents, you should notify the ATSB of all aviation accidents and serious incidents involving civil registered aircraft.

21.2 ACCIDENT INVESTIGATION

Generally, the ATSB does not investigate sports aviation accidents or those involving amateur built or experimental category aircraft. The ATSB will inform the Gliding Federation of Australia and the police that the ATSB is not investigating. The police will normally coordinate the accident investigation. Consequently, the ATSB will not attend the scene or conduct an investigation.

21.2.1 Coordinating With Police Inquiries

The police may wish to utilise the expertise of the Gliding Federation of Australia to assist their investigation. The GFA contacts are the Chairman of the Operations Panel, the Chief Technical Officer, and the RTOs/O.

21.2.2 Protection of Aircraft Wreckage

The ATSB understands that police and emergency services personnel need to take immediate action when arriving at the scene. However, it is important that wreckage, ground scars and the accident site are disturbed as little as possible. This will ensure that investigators are able to determine the factors that contributed to the accident.

21.2.3 Removal of Aircraft Wreckage

When an accident occurs, the aircraft is deemed to have come into the custody of the Executive Director of Transport Safety Investigation and it must not be moved except with the permission of the Executive Director or authorised representative. However, where the ATSB has informed the GFA that it is not investigating, Police authority is required to remove the wreckage.

21.2.4 Dealing with the Media

The media have a job to do and deserve access to certain information in order to do that job. However, for their own safety they must remain outside the secured area. Names of casualties are not to be given to the news media. This information will be released by the appropriate authorities and this will happen only after next of kin have been informed. Investigators will not provide access to the media to photograph survivors or deceased persons. Care should be exercised in the use of mobile telephones or radios to discuss the accident or the personnel involved as the media may be capable of monitoring communications frequencies.

21.3 POST-TRAUMATIC STRESS DISORDER (PTSD)

This may occur not only in flight crew associated with the Accident/Incident, but witnesses, relatives, friends and club members. It has been noted that Clubs have been deeply affected after such occurrences, in some cases straining the viability of the organisation. The following resources are listed for the information of Clubs, Instructors and members wishing to find out more about PTSD as part of their risk management:

- Post Traumatic Stress Disorder
- Coping with a critical incident

Support for Clubs and members affected by PTSD can be found at the Lifeline Service Finder.

21.4 AVIATION SELF REPORTING SCHEME

The Aviation Self Reporting Scheme (ASRS) commenced operation on 21 February 2004. Under the ASRS, the holder of a Civil Aviation Authorisation may report a reportable contravention committed by the holder. Reports pertaining to third parties are ineligible and will be returned to reporters. No action will be taken in response to ineligible reports. A report made under the ASRS by the holder of a Civil Aviation Authorisation does not satisfy the reporting obligations for Immediately or Routine Reportable Matters.

Reporters submitting eligible reports can claim protection from administrative action by CASA, in accordance with section 30DO of the Civil Aviation Act 1988, once every five years. For an ASRS report your identity will be kept confidential in accordance with Division 3C of the Civil Aviation Amendment Act 2003 and Division 13.K.1 of Subpart 13.K of the Civil Aviation Safety Regulations 1998.

Submission of information known by the reporter to be false or misleading is a serious offence under section 137.1 of the Criminal Code. Aiding, abetting, counselling, procuring or urging the submission of false or misleading information is also a serious offence. No postage stamp is required if the printed form and any other material are mailed.

Mail: Aviation Self Reporting Scheme Reply Paid 600 PO Box 600 Civic Square, ACT 2608	**Facsimile:** (02) 6274 6461 **Telephone:** 1800 020 505 (Australia-wide 24-hour toll-free) **International**: +61 2 6274 6430 **Email:** asrs@atsb.gov.au

21.5 CONFIDENTIAL REPORTING SCHEME

REPCON is a voluntary confidential reporting scheme. REPCON allows any person who has an aviation safety concern to report it to the ATSB confidentially. Protection of the reporter's identity and any individual referred to in the report is a primary element of the scheme.

21.5.1 What may be reported with REPCON?

Any matter may be reported if it endangers, or could endanger the safety of an aircraft. These matters are reportable safety concerns.

Examples include:

- unsafe scheduling or rostering of crew; or
- crew or aircraft operator bypassing safety procedures because of commercial pressures; or
- non-compliance with rules or procedures.

To avoid doubt, the following matters are not reportable safety concerns and are not guaranteed confidentiality:

- matters showing a serious and imminent threat to a person's health or life
- terrorist acts
- industrial relations matters
- conduct that may constitute a serious crime.

REPCON would also like to hear from you if you have experienced a 'close call' safety concern and think others may benefit from the lessons you have learnt. These reports can serve as a powerful reminder that, despite the best of intentions, well-trained and well-meaning people are still capable of making mistakes. The de-identified stories arising from these reports may serve to reinforce the message that we must remain vigilant to ensure the ongoing safety of ourselves and others.

21.5.2 Who may make a REPCON report?

A REPCON report may be made by anyone who observes or becomes aware of a reportable safety concern.

21.5.3 What is confidential?

Personal information about the reporter and any person referred to in the report. If you believe it would be necessary to act on information about an individual referred to in your report then you should consider reporting this directly to the Civil Aviation Safety Authority (CASA) on 1800 074 737.

21.5.4 How are REPCON reports processed?

REPCON staff will assess reports for clarity, completeness and significance for aviation safety. To do this, the staff may need to contact the reporter. Once satisfied that the report is as complete as possible, the staff enter the de-identified content of the report into the REPCON database, which allocates it a unique identification number.

REPCON may use the de-identified version of the report to issue an information-brief or alert bulletin to a person or organisation including CASA, which is in a position to take safety action in response to the safety concern.

21.5.5 What are the possible outcomes from a REPCON report?

The desired outcomes are any actions taken to improve aviation safety in response to the identified concern. This can include variations to standards, orders, practices, procedures or an education campaign.

21.5.6 Is an anonymous report via REPCON acceptable?

As a general rule, REPCON does not accept anonymous reports. REPCON staff cannot contact an anonymous reporter to verify the report or to seek additional information. Further, REPCON staff must be satisfied that the reporter's motivation for reporting is aviation safety promotion, and that the reporter is not attempting to damage a rival or pursue an industrial agenda.

22 OPERATIONS DIRECTIVES, OPERATIONS ADVICE NOTICES AND OPERATIONAL SAFETY BULLETINS

Operations Directives, Operations Advice Notices and Operational Safety Bulletins may be issued by the GFA to notify changes to procedures, alert pilots to possible problems, and to provide safety advice.

22.1 OPERATIONS DIRECTIVES

Operations Directives (ODs) are mandatory in nature and have the same status as the GFA Operations Manual itself. ODs eventually become incorporated into amendments of the Operations Manual, which are carried out from time to time. Operations Directives must be ratified by the GFA Board and approved by CASA.

22.2 OPERATIONS ADVICE NOTICES

Operations Advice Notices (OANs) are generally advisory in nature and are used when it is more appropriate to recommend than to mandate.

22.3 OPERATIONAL SAFETY BULLETINS

Operational Safety Bulletins (OSBs) are issued to provide guidance and advice on operational safety issues identified by the GFA Operations Panel.

APPENDIX 1 – CHECK LISTS

GFA standard checks are designed to ensure configuration for the flight mode intended. The GFA pre take off check comprises of a pre boarding and post boarding element.

PRE TAKE OFF

Pre Boarding

A Airframe (walk around check for damage and / or defects. Maintenance Release checked, including DI validity.

B Ballast (glider loading is within placarded limitations and trim ballast, if required, secure).

C Controls (check controls, including airbrakes and flaps, for correct sense and full deflections).

D Dollies (all dollies and ground handling equipment removed).

Post Boarding

C Control Access (Seat adjustments secure and positioned to allow for comfortable access to all flight controls, panel switches/knobs and the tow release. Rudder pedals adjusted for reach if applicable).

H Harness (secure, lap belt low on hips, both pilots)

A Airbrakes and Flaps (airbrakes cycled and set for launch, or closed and locked. Flaps set).

O Outside (airspace and take-off path clear. Wind velocity checked. Sufficient competent ground crew available).

Options (evaluate emergency plan).

T Trim (Trim set as required, ballast confirmed).

I Instruments (altimeter set, other instruments reading normally, no apparent damage. Radio on and on the correct frequency).

Canopy (closed, locked and clean)

C Carriage (undercarriage down and locked)

Controls (checked for full and free movement).

PRE LANDING CHECK

F Flaps (set as required)

U Undercarriage (Down and locked)

S Speed (safe speed near the ground)

T Trim (set for selected speed)

PRE AEROBATIC

H HEIGHT – Sufficient for recovery by 1,000ft AGL.

A AIRFRAME – Flaps, airbrakes, undercarriage set as required. Trim as required. Hatches and vents closed and locked as apporpriate.

S SECURITY – Harness secure. Loose objects stowed.

L LOCATION – Clear of built-up areas, cloud, controlled airspace.

L LOOKOUT – 180^{o} plus 90^{o} turns checking carefully around, above and underneath. Do not do a 360^{o} turn.

APPENDIX 2 - APPLICATION FOR LEVEL 1 INSTRUCTOR TRAINING

APPLICATION FOR INSTRUCTOR TRAINING - LEVEL 1 RATING

DETAILS OF FLYING EXPERIENCE

Name	Date of birth
Address	
Phone (home and work)	
Club	
Gliding hours (total)	(Last 12 Months)
Launches (total)	(Last 12 Months)
Badges (or part badges) held	
Power flying experience (hrs)	Tug-pilot?
Powered sailplane experience	
No of flights in back seat of glider	
AEI or Charter rating? If so, experience (hrs)	

CLUB PREPARATION

CFI to sign that the candidate has been prepared for instructor training and that a satisfactory standard has been attained in the following areas:

Airmanship
Flying accuracy
Soaring ability
Circuit planning without use of altimeter
Approach control
Consistently good two-point landings
Stalling
Spinning
Conversant with "Basic Gliding Knowledge"
Conversant with GFA Operational Regulations and the Manual of Standard Procedures, Part 2.
Current in all applicable launch emergencies
Has acquired Instructor's Handbook
Has been coached in commanding the glider by talking alone in accordance with the paragraph "potential ability to communicate" in the Handbook.

Name of CFI	
Club	
Signature	Date

FORWARD THIS APPLICATION FORM TO RTO/O

APPENDIX 3 - APPLICATION FOR UPGRADE FROM LEVEL 1 to LEVEL 2 INSTRUCTOR

APPLICATION FOR INSTRUCTOR UPGRADING - LEVEL 1 TO LEVEL 2

DETAILS OF FLYING EXPERIENCE

Name:	Date of birth:
Address:	
Email:	
Phone (home, work and mobile):	
Club:	
Gliding hours (total):	(Last 12 Months):
Launches (total):	(Last 12 Months)
Level 1 Instructor rating issued (date):	
Instructing hours (total):	(Last 12 Months):
Badges (or part badges) held:	
Power flying experience (hrs):	Tug-pilot?
Powered sailplane experience:	

CLUB CERTIFICATION

CFI to certify that the candidate has performed satisfactorily as a Level 1 instructor in all pre- and post-solo instructional sequences.

In addition, at least one check flight shall be carried out by the CFI prior to the upgrading work being carried out by a Level 3 Instructor. The check flight shall ensure that the candidate is free from basic flying faults and is considered satisfactory for upgrading.

Finally the CFI is to certify that candidate has at least 12 month's service as a Level 1 instructor, during which a minimum of 25 hours or 100 launches as an instructor must have been completed. (Note: the 12 month period may be lowered in special cases, at RTO/O discretion, but the hours/launches requirement must be met.

Name of CFI	
Club	
Signature	Date

FORWARD THIS APPLICATION FORM TO RTO/O

APPENDIX 4 - OPERATIONAL SAFETY AUDIT

THE GLIDING FEDERATION OF AUSTRALIA

OPERATIONAL SAFETY AUDIT

Notes for auditing officers

GFA MOSP, Part 2, Operations – Section 8.1.21 requires that Operational Safety Audits be carried out on each operational Club or Operator at least biennially.

At times, audits may be carried out on an opportune basis to take advantage of a suitable person being available in a particular location, at the right time. However, it is not intended that these audits should be surprise visits and Clubs/Operators should, whenever possible, be given adequate prior notice.

The auditing officer should contact the Club's or Operator's CFI and inform him/her that the audit is to be conducted and arrange a time suitable for all. The CFI should be informed that the "Operational Safety Audit Report" will be used to conduct the audit and informed where a copy can be obtained. The CFI should also be reminded that the audit must be completed within the requirements of MOSP Part 2, otherwise operations must cease until a satisfactory audit has been achieved.

Operational Safety Audits are an important function of the GFA Operations Department and require diligence by the auditing officer to ensure that all relevant operational and safety requirements are covered. Whilst it is possible to conduct a check during a one-day visit, adequate time should be made available for formal, or semi-formal, discussions with Club Instructors and Officials to discuss matters of concern (even if not directly relate to Operations). If doing so requires extending a visit, it should be allowed for.

Clubs and Operators should be encouraged **not** to put on a special show for the auditing officer, but to conduct operations as they normally do. The purpose of the audit is to identify operational/safety deficiencies and assist the Club or Operator to take corrective action where required.

The auditing officer should remember that whilst performing this important function on behalf of GFA Operations, he/she is also a **guest** of the Club or Organisation and must show due respect and consideration of this position.

Where corrective action is required to be completed, the auditor should complete the Request for Corrective Action (RCA) section of the report and provide the Club or Operator with a reasonable time period for compliance. The time period allocated should reflect the severity of the RCA.

Upon completion of the audit, the auditor is to send a copy of this report to the RTO/O and CTO.

Chairman,
Operations Panel

GLIDING FEDERATION OF AUSTRALIA

OPERATIONAL SAFETY AUDIT REPORT
For biennial quality audits on Club operations

Items on this checklist are to be detailed, quantified, or assessed; as appropriate. Assessments to be noted as follows:

Satisfactory	Needs no attention
Acceptable	Needs some attention; specify
Unsatisfactory	Needs immediate attention; specify
N/A	Not Assessed

Use “comments” section to specify corrective action

Name of Club/Operator	
Site name and location	
Name of CFI	
Officer(s) carrying out the Check	
Date(s) of Audit	

GLIDERS

Maintenance release/DI Books	
Placards, speeds (VNE, rough air, manoeuvring, etc.)	
Placards, weight and balance (including front/rear pilot weights for two-seaters)	
Placards, others (weak links, canopy jettison, etc.)	
Glider airworthiness and general condition	
Comments	

AIRFIELD

Type of airfield (e.g. licensed, private)	
Airfield owned by	
Combined glider/power/parachute operation? Specify	
Length of strip(s)	
Obstructions	
Protection of the public	
Published procedures, e.g. CTAF/CTAF(R)	
Comments	

LAUNCHING

Aerotowing

Type of tug(s)	
Tug condition	
Flight manual towing supplement in aircraft?	
Rope length	
Weak links	
Towing and descent patterns	
Pilot standards and airmanship	
Comments	

Winch/auto launching

Serviceability of winches/launching vehicles	
Driver protection	
Type of cable or rope in use	
General condition of cable/rope (No of knots, etc)	
Weak links (appropriate for gliders in service)	
Drogue to rings trace lengths (minimum 5 metres)	
Rings (Type, condition)	
Emergency equipment (cable-cutting devices, etc)	
Separation of cables at launch point	
Anchoring of dead cable at launch point	
Signalling (state method in use)	
Standard of winch/towcar driving	
Standard of winch/towcar driver training	
Comments	

Self-Launching

Types of powered sailplanes in use	
Powered sailplane training	
Powered sailplane conversions	
Powered sailplane pilot logbook entries	
Independent powered sailplane operations	
Comments	

OPERATIONAL SAFETY

Launch-point discipline	
Cockpit checks	
Airmanship	
Take-offs and transition to full climb (winch/auto)	
Aerotow technique and accuracy	
Circuits, approach and landing	
Cross-country flying	
Emergencies	
Integration with power operations	
Integration with other operations (e.g. parachutes, etc)	
Knowledge of radio requirements	
Radio discipline (glider, CTAF, etc. and Multi Com procedures)	
GFA Safety Management System (SMS) Review	
Comments	

FLYING INSTRUCTION

Lookout training	
Airmanship training	
Briefings and debriefings	
Quality of demonstrations	
Handover/takeover discipline	
Conformity of training to Instructor Handbook	
Stalling	
Incipient and full spinning	
Circuit training (including running out of height)	
Soaring competence	
Standardisation of instruction	
Post-solo training and checking	

Flying without instruments	
Instructor rating validity and currency	
Instructor single-seater currency	
Instructor training	
Training panel meeting frequency	
Comments	

PASSENGER FLYING

Compliance with GFA Passenger carrying requirements	
Comments	

Charter flying

Air Operator Certificate (AOC) current and on display	
GFA Op Regs readily available for perusal	
First aid kit available at launch point	
Charter Pilot Rating validity and currency	
Appropriate aircraft in use for charter (as per AOC)	
Comments	

Air Experience Flights

AEI rating validity and currency	
Knowledge of AEI section of Instructor Handbook	
Comments	

Private Passenger Flights

Knowledge of private passenger privileges and limitations	
Supervision of private passenger operations	
Comments	

INDEPENDENT OPERATIONS

Instructor's knowledge of Independent Operator requirements	
Ind. Ops. Taking place? (define in "comments")	
Ind. Passenger carrying ops (refer GFA Ops manual)	
Ind. Operator annual revalidation	
Comments	

FOREIGN PILOTS

GFA membership of pilots	
Provision of written briefing material	
Quality and content of above material	
Provision of site checks	
Provision of competency checks	
Method of checking cross-country and outlanding competency	
Understanding of English Language	
Comments	

OVERALL COMMENTS

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Signature..... Date: .....

Name..... Auditor

REQUEST FOR CORRECTIVE ACTION

Name of Club/Operator	

An Operational Safety Audit conducted on (date) ..... has revealed the following operational deficiency:

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Corrective action as follows is requested:

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Due date for compliance: .....

Audit Officer

(Signature): .....

(Name): .....Date: .....

RTO/O Certification of Corrective Action Compliance:

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RTO/O: .....Date: .....

OPS F005