

Operational Procedures Guidance

References

Canadian Aviation Regulations (CAR) 405, 406, 605, 425, 426, SFFC MCM (Rev. 6), Appendix to MCM, SFFC PPL Flight Training Outline, SFFC Flight Instructors Guide, Aeronautical Information Manual (AIM), Pilot Operating Handbook (POH), Transport Canada Flight Training Manual, Transport Canada Flight Instructor Guide.

General

The objective of the SFFC FTU (Smiths Falls Flying Club, Flight Training Unit) Operational Procedures Guidance (OPG) is to promote safety through establishment and implementation of standard procedures in SFFC flight operations. It reflects directives contained in the referenced CARs and SFFC documents.

Compliance with this operational guidance document is **MANDATORY** for all pilots who fly SFFC aircraft.

The Chief Flight Instructor (CFI) is responsible for the management and exercise of operational control of the overall pilot training program, the supervision of all FTU instructors and direct supervision of Class 4 instructors. The CFI also ensures the qualification and currency of all flight instructors. He/she exercises these responsibilities in accordance with the referenced documents.

Prior to flying a SFFC aircraft as PIC, each pilot must have read and understood this OPG. This will be demonstrated by satisfactory completion of a written assessment (quiz). **THIS TO BE COMPLETED ANNUALLY.**

Should a policy in this OPG differ from the CARs, the CARs shall prevail. SFFC expects that pilots will always use good airmanship and decision making. Should safety necessitate a deviation from the policies outlined in this OPG, pilots are expected to put safety first.

Booking Aircraft and Instructors

Aircraft and instructors shall be booked on the SFFC electronic booking system Flight-Sheets (FS) (https://www.flight-sheets.com/servlet/SFFC-FlightBookings). Booking of student solo flights must also include contacting a flight instructor for flight authorization, and to ensure that an instructor is in attendance for the student solo flight.

Booking of cross-country flights to destinations more than **200 NM** from CYSH, flights to sparsely settled areas, flights to USA, and flights intending to remain away overnight shall be made with sufficient lead time to receive required approval by the CFI or Assistant Chief Flight Instructor (ACFI).

Aircraft Dispatch

Flight Authorization

All flights must be authorized by a SFFC Flight Instructor prior to departure. Such authorization of a flight shall be indicated in the Flight-Sheets, electronic based dispatch and time recording system (Daily Flight Record (DFR)). When activating a flight in the DFR pilots are to indicate the route of flight including any stops and/or exercises to be carried out. Any deviations from the planned flight itinerary should be relayed to the authorizing instructor as soon as possible.

Prior to authorizing a rental or solo flight the flight instructor will ensure that the PIC is licensed, qualified, and current as per the requirements of this OPG. Flights will not be authorized if any of these requirements are not met. Cross-country flights as per the above section must be authorized by the CFI or ACFI.

Completing the DFR

Once a booking of an aircraft, and Instructor where applicable, is completed, the PIC can then log into the Dispatch Page of Flight Sheets (https://www.flight-sheets.com/servlet/SFFC-FlightSheets) where they will select the appropriate DFR. They can then Activate their respective flight. In the case of a dual training flight, the student may be tasked with activating the flight, supervised by the instructor.

The PIC shall complete the DFR ensuring that:

- Appropriate aircraft is selected.
- Appropriate PIC is indicated.
- Passenger(s) are listed when applicable.
- The appropriate program is selected.
- Exercise(s) to be carried out shall be identified where applicable.
- If the flight is cross country with stop overs, these shall also be noted on the DFR (Legs).
- A return time.

Once the PIC or student enters their password to complete the flight activation, and clicks Okay, the system reverts to the basic DFR page of the day and sends a message to persons authorized to Authorize a flight. The PIC will receive notification by email once the flight has been authorized by a flight instructor. **No flight shall be permitted to depart until authorization has been received.** Flights must be activated with sufficient lead time for authorization.

Upon return of the aircraft the PIC or student shall log into the Dispatch Page of Flight Sheets. They shall then locate their flight line of the appropriately dated DFR and click on "Enter Hobbs and Air Time" and make the appropriate entries. If the flight was not completed, the flight line must be closed by selecting "DNCO" and entering the reason for cancellation.

Flight Time: is chronological time from engine start up to engine shutdown. Flight Time shall be recorded as the incremental Hobbs time, the difference in HOBBS meter reading from the start of the engine to the shut down of the engine.

Air Time: is the difference between Wheels up and Wheels down. Air Time shall be recorded as the incremental Tachometer time, the difference in TACH meter reading from the start to end of the flight

Once the times are entered, person entering the data ensuring their name is displayed at the bottom of the page as the person entering such, then the person's password is entered and click Okay. The system will return to the DFR of the day. The person who will be paying for the flight then clicks Close Flight at the right-hand side of the DFR of the day. One simply follows the prompts through to payment conclusion. The person completing the data entry shall ensure that Dry Rate is checked if appropriate as well as ensuring that the appropriate box Dual, Solo etc. are checked.

Wet Rental Rate Policy

When it will not be necessary to fuel the aircraft away from CYSH, the rental will be at the Wet Rate.

- The Wet Rate shall be used for the whole flight.
- Prior to departure from CYSH, the aircraft shall be filled with fuel (or to a specified level as dictated by weight and balance requirements), and paid for using the SFFC aircraft fuel card.
- If refueling is required, the aircraft shall be refilled immediately upon return to CYSH and shall be paid for using the SFFC aircraft fuel card.
- Aircraft must be refueled if less than 20 USG of fuel is remaining at the completion of the flight.

Dry Rental Rate Policy

When it becomes necessary to fuel the aircraft away from CYSH, the rental will be at the Dry Rate.

- Prior to departure from CYSH, the aircraft shall be filled with fuel (or to a specified level as dictated by weight and balance requirements), and paid for using the SFFC aircraft fuel card.
- Fuel purchased away from CYSH shall be paid for by the rental pilot using a personal credit card.
- The aircraft shall be refilled immediately upon return to CYSH to the same fuel state as CYSH departure, and shall be paid for by the rental pilot using a personal credit card.
- A copy of the CYSH refill fuel receipt shall be left in the FTU.

Payment for flight

Quickbooks invoices for flights will be sent by email following the flight and are due upon recipt. Invoices can be paid securely online by credit card or PayPal. In the event invoices are outstanding for more than **two weeks**, access to Flight-Sheets will be suspended until the account is settled in full.

Flight Following

Flight following is the responsibility of the authorizing flight instructor. The authorizing instructor shall be available during the flight. In the case of a renter, available shall mean the flight instructor can be easily contacted by phone, radio, or other means. In the case of a student solo, available shall mean the flight instructor is on-site at the airport or in flight in the immediate area and can be contacted by radio.

Flight-Sheets automatically notifies the authorizing flight instructor and CFI 30 minutes past the expected return time entered in the DFR if the flight line is not closed. Once this occurs, the aircraft is considered overdue and the authorizing flight instructor shall attempt to contact the pilot by phone or other means. If the aircraft cannot be located, the CFI shall be notified.

A flight plan filed with the FIC is required for all cross-country flights beyond 100NM from CYSH.

Preparation for Flight

The ultimate responsibility for ensuring the aircraft is airworthy and safe for flight, and that the weather conditions are acceptable for flight, rests with the Pilot in Command (PIC). Preparation shall include obtaining all relevant information for the intended flight. This is not limited to; obtaining a weather briefing, pre-flight inspection of the aircraft, and filing a flight plan. If in doubt, pilots are encouraged to contact a flight instructor.

Documents

The PIC shall ensure the following documents are onboard the aircraft:

Journey Log if flight is to be more than 25nm from CYSH

Certificate of Airworthiness (CofA)

Certificate of Registration (CofR)

Proof of Aircraft Insurance

Pilot Operating Handbook (POH)

Applicable Flight Manual Supplements (aircraft specific)

Weight and Balance report (most current)

Hobbs/Tach recording Sheet

Nav Canada Flight Information publications

Current Maps and charts as required

Pre-Flight Inspection

A detailed walk around of the aircraft is required to be performed by the PIC prior to every flight in accordance with the Pilot Operating Handbook (POH).

Weight and Balance

It is the responsibility of the PIC to ensure the aircraft is operated within the approved weight and balance limitations as per the POH. The PIC shall complete an operational weight and balance for each flight. This is normally done by filling out the weight and balance form on the FS DFR when activating the flight. The current weight and balance report can be located in the front of the journey log and posted on the wall of the FTU office. The information can also be found on the aircraft information page of Flight-Sheets.

Any cargo or loose items must be appropriately secured to prevent movement during normal flight maneuvers and turbulence. Items are to be stored in the baggage area or on the rear seats. Carriage of dangerous goods, other than those required to be on board for the safe operation of the aircraft, is prohibited.

Survival and Emergency Equipment

It is the responsibility of the PIC to ensure that everyone on the aircraft wears or brings along clothing appropriate to the season. In winter, each passenger shall have available a coat, hat, boots, gloves, etc. to ensure survival overnight in the bush. A SFFC Survival Kit shall be carried on all flights flying more than 25nm from CYSH. Survival kits contain means to provide shelter, water, fire, a signaling device, and other items.

Survival equipment, first aid kits, and fire extinguishers are inspected once per year or after use. Any use of this equipment must be reported to the authorizing flight instructor, CFI, or PRM.

All SFFC aircraft are equipped with a 406 MHz emergency locator transmitter (ELT). The ELT is to be left in the AUTO position at all times. In the event of an emergency landing the ELT shall be turned on and left on. Any inadvertent activation of the ELT must be reported to the authorizing flight instructor and PRM as soon as possible.

Checklists

SFFC aircraft are provided with checklists covering normal operations and emergencies. These checklists shall be used in conjunction with the POH and applicable Flight Manual Supplements when operating SFFC aircraft. The PIC shall ensure the appropriate checklist for the aircraft is readily available on board the aircraft.

Over Water Flights

No dual or solo flights are to be planned over water except on routes and altitudes that will permit a safe glide to land in the event of an aircraft malfunction.

Night Flights

Pilots must hold a valid night rating. Additional mandatory equipment for night flights shall include one or more hand lights and a portable VHF radio capable of actuating the ARCAL runway lights. Night approaches must be made on or above the APAPI slope. If at any time below 300' AGL the aircraft goes below the APAPI slope (red on red), a go-around shall be conducted due to the obstacles (trees) on final approach.

IFR Flights in IMC Conditions

IFR conditions exist when the ceiling is less than 1,000' AGL and/or the visibility is less than 3 SM. The PIC must hold a valid and current group 1, 2, or 3 instrument rating. The instrument approaches at Smiths Falls (CYSH – RNAV 24 and RNAV 06) are published in the RCAP (Restricted Canada Air Pilot) because they do not meet the standard instrument approach criteria for obstacles required by Transport Canada. Training on these approaches is **mandatory** for pilots flying the approaches in IMC (ceiling below 1,000' or visibility less than 3SM). Training will be done by flight instructor and assessed by a written quiz (https://www.classmarker.com/onlinetest/start/?quiz=mve62ebd10d4160c).

Updating the Journey Log

Aircraft journey logs are to be updated following a series of flights or at the end of each day. This is normally completed by the CFI or delegate.

Additional Operational Information

Information relevant to operational safety not included in this document shall be posted on the information whiteboard in the FTU office and brought to the attention of pilots by the authorizing Flight Instructor. Such information may also be posted in Flight-Sheets.

Safety Reporting

Pilots are encouraged to report any safety concerns, issues, incidents or events. Non-punitive safety reporting is paramount to the success of our safety culture. Under this policy, it is understood that errors will occur in our dynamic training and flying environment. Reporting of errors, incidents or any general concerns and observations will ensure that we have a proactive safety culture that is constantly striving to improve safety at SFFC. Provided negligence or intentional non-compliance is not the root cause of a safety incident no SFFC member will face any disciplinary action as a result of a report.

The core of the SFFC Safety Program is to improve safety practices in our operations by:

- Proactively minimizing risks associated with our operations on the ground and in the air;
- Actively improving our safety processes;
- Establishing policies and procedures that promote safety with students, instructors and all members;
- Complying with and exceeding where possible all regulatory standards using industry best practices.

The Safety Officer reviews and files all reports and takes required action when necessary under the guidance of the SFFC President. This action may include information to members, revising documents or procedures or a full investigation.

Safety Reports can be submitted in several ways and can be anonymous or not:

- Email to the Safety Officer (safetyofficer@smithsfallsflyingclub.com) using the Safety Report Form is available for download on the SFFC website or simply send an email;
- Use the Submit Safety Report button in Flight Sheets on the Daily Flying Record flight details. The Flight Sheets Safety Report should be clear, concise and complete. The more information that you provide, the better the club can work to rectify the problem.

Note: Safety reports are NOT to be used for reporting aircraft defects.

Accidents and Incidents

In the event of an emergency pilots are expected to use the resources available to them, including air traffic (ATS) and emergency services. Accidents or incidents shall be reported **immediately** to the CFI, ACFI, or the authorizing flight Instructor. Accidents or incidents that occur at CYSH shall also be reported to the airport manager (613-430-5060).

Should an accident occur it is important to protect the site from disturbance, except for action required to preserve and protect life. Aircraft are not to be moved without authorization.

In the event of an off-airport landing, pilots are to remain with the aircraft and contact the CFI, ACFI, or authorizing instructor (and ATS, emergency services as required). If contact cannot be made by phone or other means, ensure the ELT is activated. A takeoff shall not be attempted under any circumstances.

Aircraft Maintenance and Defects

The PIC shall ensure that Flight-Sheets and Journey Log indicate that the aircraft is serviceable and has sufficient time to next maintenance action by which to complete the planned flight. Current Air Time can be found on Flight-Sheets (under aircraft status icon – booking page, right hand side of aircraft line listing). Pilots shall ensure that all defects are rectified or deferred on the Defect Control Sheet and in the Journey Log, and that any operating restrictions do not preclude safe and legal completion of the planned flight.

Aircraft defects detected by pilots at CYSH or when on cross country shall be reported to the authorizing Instructor or CFI who will confer with the Person Responsible for Maintenance (PRM) for disposition. Defects shall be recorded in the Journey Log (including a description, date, signature, and license number) and on the <u>PILOT</u> side of the Defect Record Sheet located at the front of the Journey Log under the direction of a flight instructor or PRM. Only defects that do not affect airworthiness shall be deferred by the PRM.

All abnormal occurrences must be reported to the authorizing flight instructor, CFI, or PRM and recorded in the journey log. This includes, but is not limited to: engine overspeed, overweight landings, severe turbulence, exceeding airspeed limits (including flap limits), bird strikes, and ground collisions.

Aircraft Servicing

Training

Prior to being authorized to fly SFFC aircraft as PIC, pilots shall receive training on servicing (fuelling, adding oil, cold weather pre-heat system). Initial training shall be completed by a flight-instructor and contain a practical demonstration. Annual recurrent training is completed with the OPG quiz as per the recency requirements. Documentation of this training shall be recorded in the pilots Flight-Sheets profile.

Fuel Requirements

SFFC aircraft will use 100LL aviation fuel only. Fuel levels are to be checked by dipping fuel tanks with appropriately marked dip sticks (ensure the dip stick is marked or identified for the aircraft). Aircraft shall not take off with less than the fuel required for the flight, plus sufficient fuel for an additional <u>one hour</u> of flying time. Aircraft fuel gauges shall never be used to determine fuel levels.

Aircraft must be refueled if less than 20 USG of fuel is remaining at the completion of the flight unless at the direct requested of the next PIC.

Fueling Aircraft at CYSH

- Ground aircraft with grounding wire.
- Process payment using the terminal in the fuel hut.
- Turn on the fuel pump and unreel hose.

during refuelling to avoid damaging the fuel tanks.

- Fill aircraft to desired fuel level. Take care not to touch the ladder or the hose to the side of the aircraft or windscreen during fueling. Fuel nozzle must ground (touch) the filler cap during refueling.
- Return hose and grounding wire to the cabinet, shut off fuel pump. When rewinding the hose, care must be taken not to drag the fuel nozzle across the ground. It is encouraged to wind the last 1m of hose by hand to ensure the nozzle does not get stuck in the rear of the hose cabinet.

Emergency fuel shutoffs are located outside the fuel hut and on the northwest corner of the Clubhouse. Aircraft must be grounded at two points (grounding wire and by touching the fuel nozzle to the filler neck) at all times during fueling. The fuel nozzle shall be supported and must not be allowed to put pressure on the filler neck

Oil Requirements

Oil grades approved for use are listed in the front of the aircraft journey log. Oil grades are subject to change seasonally as well as during engine break-in periods. The current oil grade in use is specified in the journey log, listed in Flight Sheets (under aircraft status icon – booking page, right hand side of aircraft line listing), on the information whiteboard located in the dispatch office, and on the oil storage cabinet.

Oil level shall be maintained between 5 to 6 quarts. Care needs to be taken so as not to overfill. Oil used shall be recorded on the Flight-Sheets DFR by entering the amount of oil added upon closing the flight line.

Hangar Operations

Care must be taken when moving aircraft into and out of the hangar to avoid damage. Painted lines on the hangar floor denote the parking spaces for the three SFFC aircraft. Aircraft should not be parked in close proximity to the man door such that the door is able to contact the wing when opened. **Tow bars are not to be left on the aircraft when parked outside of the hangar.**

Unless the next pilot to fly the aircraft is readily available, all aircraft must be returned to the hangar after flight. When parked in the hangar aircraft must have the control lock, pitot cover, engine plugs (summer), and cowl cover (winter) installed. Props should be rotated to horizontal.

Note: Be mindful of propwash when starting or taxiing the aircraft to not direct propwash into the hangar.

Opening the Hangar Door

- Ensure that there are no aircraft parked near the door that may make contact during opening (both on the apron and inside the hangar).
- Open the upper hydraulic valve.
- Open the lower hydraulic valve.
- Ensure the latches on BOTH sides of the door are retracted. Failure to retract the latches before opening can cause damage to the hangar door.
- Press and hold the "Up" button until the hangar door is open to 10' (marked by a black line). The hangar door must **NEVER** be left partially open.

Closing the Hangar Door

- Ensure all aircraft are parked behind the yellow line marked on the hangar floor. If any part of the aircraft is forward of this line it will contact the door.
- Press and hold the "down" button until the hangar door is completely closed and the motor shuts off.
- Close the upper hydraulic valve.
- Pressurize the system by pumping the handle until both latches are secure against the posts. Be careful to not over pressurize the system.
- Close the lower hydraulic valve.

Checkout and Currency Requirements

For each scenario listed below, the renter or student must demonstrate proficiency in ALL of the exercises to a SFFC flight instructor prior to being authorized to fly SFFC aircraft as PIC. This process may be accomplished over one or more flights and additional training may be assigned if deemed necessary.

Students

- **Prior to first solo**: Quizzes (OPG and POH) and instructor led training on SFFC operational control procedures, aircraft servicing, and hangar operations completed. Copy of Student Pilot Permit and Medical required to be on file. All first solo flight shall immediately follow a dual flight on the same day.
- **Currency**: after 14 days since last flight, a dual flight and solo recommend is required. The dual flight will include, at minimum, three circuits and an overshoot.
- For the initial 1 hour of solo flight, no touch and goes will be permitted. Circuit work must include full stop landings with a backtrack to the runway threshold.

Renters

Initial qualification

- Quizzes (OPG and POH) and instructor led training on SFFC operational control procedures, aircraft servicing, and hangar operations completed.
- Copy of Licence and Medical on file.
- Checkout including at minimum airwork (steep turns, slow flight, stalls, forced landing), 3 circuits, an overshoot, and emergency procedures.

Additional qualifications

- **Rear seat passengers:** Prior to carrying passengers in the rear seat, a separate checkout must be completed with the aircraft fully loaded. This will include at minimum, 3 circuits, and an overshoot.
- **Night:** Prior to flying at night, a separate night checkout must be completed. This will include at minimum, 3 circuits and an overshoot. Should a renter not be night current (5 takeoffs and landings every 6 months), the recurrency flight must be dual.

Currency requirements

- Every 12 months, one hour of dual instruction. This may be accomplished by a checkout, review of a specific skill or exercise, or instruction towards a licence or rating.
- After 30 days (extendable to 60 days by CFI or ACFI based on experience and other flying) up to 6 months since last flight: Circuit check including minimum 3 circuits and an overshoot.
- After 6 months since last flight: Full checkout including at minimum airwork (steep turns, slow flight, stalls, forced landing), 3 circuits, an overshoot, and emergency procedures.
- The OPG and C172 Quizzes are to be completed annually.

Note: circuit checks should include at least one approach and landing with full flaps and one approach and landing with flaps up. The overshoot shall be done from a full flap approach.

Quizzes

The pass mark for all quizzes is 80%.

OPG: https://www.classmarker.com/online-test/start/?quiz=4np62e3dadf04579 C172: https://www.classmarker.com/online-test/start/?quiz=ghj62e3cd0ebed76

Weather Minima

Dual

Local, VFR, Day	Class E Airspace 1000' 3sm
Local, VFR, Night	1500' 5sm
Cross-Country, VFR	2000' 3sm, forecast for flight +2 hrs
IFR Training	1000' 3sm departure & destination
Winds	Actual and forecast not above 25 kts

Solo

Circuits	1500' 3sm
Local, Practice Area	4000' 10sm
Cross-Country	Route + 2 hrs, 4000' 10sm (+two hrs daylight past ETA)
Winds	max 20 knots, max x-wind 10 kts

While the foregoing is for flight training operations, licensed pilots renting SFFC aircraft and flight instructors authorizing such flights should consider these limits as prudent.

Winter Operations

Engine Pre-Heat

All SFFC Aircraft are equipped with engine heaters. Use of these heaters is mandatory when temperature is 0 C or colder. When temperatures are consistently below freezing, SFFC aircraft will be plugged-in continuously to avoid temperature cycling the engine which may introduce moisture into the crankcase. When authorized for a cross country, the PIC should ensure that both an extension cord and cowl cover are carried, and the heater used. Otherwise, the PIC must ensure that the engine is pre-heated by some other means.

Engine Operation

SFFC aircraft engines shall not be started in temperatures below minus 25 C.

The minimum temperature for dual, solo, or rental flights is minus 20 C. Practice forced approaches shall not be conducted in temperatures below 0 C unless a reduced power simulation of 1500 RPM and ½ flap is used.

No student solo flights will be authorized when the runway is more than 25% contaminated with ice, snow, or slush.

Summer Operations

The maximum temperature for dual, solo, or rental flights is 30 C or 35 C with the humidex.

SFFC Practice Areas

Two designated practice areas are bounded as follows:

Training Area #1 (South)

44 51 N 76 00 W to (West of 29, south of Smiths Falls)

44 58 N 75.40 W to (Oxford Mills)

44 50.7 N 75 32.5W to (Spencerville)

44 39.6N 75 53 W to (Addison)

44 40 N 76 00W (just west of Addison)

Training Area #2 (West)

44 54N 76 00 W to (Smiths Falls)

44 41.7N 76 11.3 W to (Portland)

44 40.5N 76 24W to (Westport)

44 50N 76 30 W (just east of Maberly)

