General

1. There are many information resources available to the Grumman pilot. In addition to AYA membership, consider subscribing to the Grumman Gang mail list, (grummangang.org), and regularly visiting bondline.org, a maintenance website devoted to Grummans.

3. Flying characteristics of these aircraft are slightly different from most other general aviation aircraft. You can expect the controls to be more responsive than most planes. Many new Grumman pilots tend to over control the airplane. If you let it, the plane will quickly show you that you can be light and relaxed on the controls and it will respond very nicely.

Preflight

1. WARNING: AA-5-series aircraft can be loaded beyond the aft c.g. limit when rear-seat passengers are carried even if the aircraft is still within maximum gross weight limits. Pitch stability is decreased very quickly after the aft c.g. limit is exceeded. Also, AA-5 and AA-5A aircraft are easily overloaded with four adult occupants aboard. Takeoff and climb performance suffer substantially in any over-gross situation. Proper W&B computations should be performed. An Excel™-based W&B computation and equipment list program is available from the AYA Safety Director to help in this area.

2. During preflight, check the cotter pins in the elevator trim linkage, as well as those in the nose wheel axle and nose strut nut. Should the latter cotter pin be missing, the entire nose wheel, fairing, and fork assembly may fall off the aircraft! Stainless steel pins are highly recommended.

3. In addition to making sure that your pitot tube is clear, make sure your fuel tank vents are clear. These are favorite places for insects.

4. Be careful to avoid stepping on the flap while getting in and out. Brief your passengers on this. Stepping on the flap will damage the flap mechanism, and can cause asymmetrical flaps, prevent flaps from extending or prevent them from retracting, and the failure may not be immediately apparent.

5. When getting in and out of the cockpit, steady yourself with the canopy bow, not the glare shield. Teach your passengers to do the same.

Ground Ops

1. Do not maneuver the aircraft on the ground with the wingtips. Use the propeller or towbar. Use of the wingtips will create a torque which may cause fuel

tank sealant leaks. Also, when using the propeller to push or pull the aircraft, hold it as near as possible to the spinner.

2. Do not kick or push the nose wheel fairing to steer while pushing the aircraft backwards. Use a towbar to steer while pushing backwards.

3. When loading all seats in the four place aircraft, be careful. If you load both back seats first, the aircraft will probably tip back onto the tail tie down. An easy way to prevent this is for the front seat passengers to stand at the forward end of the walkway when the rear seat passengers board. This keeps the weight forward, where it belongs. Do the opposite on landing. Some owners have removed the boarding steps from their aircraft. In addition to reducing drag slightly, this automatically moves the weight of boarding passengers forward.

4. When stopping the aircraft during taxi, be sure to straighten the nose wheel before you stop. If you stop with the nose wheel in a turn, it takes a great deal of power to get it straightened out again when you resume taxi.

5. Grummans steer via differential braking. Losing one or both brakes will severely degrade your directional control. Be aware of the reduced braking available on wet or icy taxiways and runways.

6. Be aware of which antenna is connected to which com radio in dual installations. Ground communications can be impaired if using an antenna mounted on the bottom of the aircraft

7. The baggage compartment door is restrained by a small chain. If you open the door and allow a gust of wind to hit it, the chain will break readily. Keep the door latched at all times, unless loading or unloading.

8. With the key lock in the locked position, slamming the canopy will lock the occupants inside. More than one pilot has climbed out the baggage door, which has a release on the inside. In addition, there is a lock release catch on the canopy latching mechanism; ask your instructor to show you how to use it.

9. The parking brake on 1977 and older aircraft cannot be set or released from the copilot's side.

Flight Ops

Takeoff:

1. By the time you reach full power, the rudder is fully effective - keep your toes off the brakes so as not to hinder takeoff performance.

2. You may hear some pilots suggest using anywhere from a few degrees to one third flaps to aid in short or soft field takeoffs. This is not recommended by the POH/AFM or the AYA. Precise performance of the takeoff (including rotating to the correct attitude at the proper point in the takeoff roll) in the zero-flap configuration is what both the manual and the AYA recommend.

Inflight:

1. Grummans stall in a conventional manner, and are recovered conventionally. You should practice and be proficient in stall recovery. However, Grummans are prohibited from spins (for very good reason).

2. Despite their wonderful handling characteristics, Grummans are NOT aerobatic.

Landing:

1. Some pilots like to set full flaps on downwind so as to reduce the needed amount of airspeed, power, and trim changes on base and final. If you chose to do this, be aware of the reduced glide range and plan your pattern accordingly.

2. The Grummans don't glide as well as most Cessnas or Pipers. You will be well served to stay proficient on power-off landings in case one day you find yourself with no choice but to glide to a landing.

3. Do not allow the flap selector switch to spring back to neutral following flap deployment. It may overshoot, enter the retract position, and retract the flaps.

4. Flaps on Grummans don't significantly increase lift, but they do change pitch attitude, increase drag, and improve short field landing performance. They are great for loosing altitude quickly. Slipping the aircraft, with or without flaps, is also very effective for losing altitude without increasing airspeed. Stay proficient with both flaps and slips so you will always be prepared for the unexpected.

5. Touchdown MUST be accomplished on the main gear only, and not nose wheel first or even all three at the same time. Landing nose wheel first, or on all three wheels at the same time is virtually guaranteed to cause a porpoise situation, from which recovery is very difficult. A go-around is the only sure cure for porpoising. Patience in the flare and not letting the airplane touchdown early is the best way to avoid this situation. Think of it this way - in a Grumman, the only purpose of the nose wheel is to keep the propeller from striking the ground during taxi. It is not intended to absorb landing loads.

6. After touchdown, keep the nose wheel off the ground as long as possible (assuming available runway isn't an issue). Then lower it gently to the runway before you lose elevator effectiveness. On a short runway, braking effectiveness may be increased by raising flaps after touchdown, putting more weight on the main gear. However, attention must not be diverted unnecessarily from control of the aircraft during rollout. When runway length permits, leaving the flaps down and holding the nose up during rollout provides significant aerodynamic braking and reduces brake and tire wear.

7. Check your brakes on downwind. They should be firm and equal, left-and-right. If you don't have brakes from the left seat, they may work from the right seat. For landing with a brake failure, find a relatively long and wide runway with little crosswind, and fly a normal approach and landing. After touchdown, hold the nose up, leave the flaps down, and use the rudders for directional control. The airplane should roll to a stop somewhere between 3000' and 4000.' If you start to lose directional control at slow speed, and are headed off the runway edge, shut the engine down to avoid a prop strike on a runway edge light.

Post flight

1. Chocking the nose wheel in Cessnas, Pipers and Beeches works fine. With the Grumman nose wheel, however, a gust of wind can spin the nose assembly 90 degrees, and very rapidly rotate the aircraft into the wind. The solution is to chock both main gear, front and rear. Do not chock the nose wheel.

2. Some owners recommend leaving the strobe or flashing beacon switch on all the time. This serves as a reminder that your master switch is still on. Also, be careful that the dome light switch is off when you leave your aircraft. This circuit is wired directly to the battery, not through the master switch. Leaving it on has the same effect as leaving the master on - a dead battery.