Albatross Standard Flight Procedures

Madison Harrington

September 24, 2018

1 Pre-flight Checklist

The safety of flight is the most important consideration. If anything seems out of ordinary or damaged during the pre-flight checks **do not fly** before discussing the problem and following through with solutions as a team.

1.1 Determine flight conditions

- For weather advisory in Ames, IA call 515-233-2611 (automated). Especially consider wind and visibility to see if the weather is adequate for flying that day.

- Choose location. Prior FAA or tower approval is needed for certain circumstances.

- Calculate the weight and balance of the Albatross and ensure that the center of gravity isn't too far forward or aft.

- Have a flight procedure ready with clear goals in mind for the flight.

1.2 Albatross System Checks

Structure:

- All screw attachments should be secure

- Ailerons and flaps intact, visually inspect the connection to the wings

- Ensure rear attachment is securely attached

- Manually check all control surfaces to ensure that they move freely

- Wheels should be secure and in good condition

- Visually inspect the entire structure for damage

- All hook and loop attachments are secure inside the fuselage

- Batteries are secure in their holders

Avionics:

- Wires and connecting wires are all intact and free (not crushed in any way)

- Communication with sensors and controls is established

- Test ailerons, flaps, rear controls and motor inputs

- Sufficient battery charge for flight

1.3   Equipment

Before flying, ensure that the proper equipment is available for flying, potential repairs, and documentation.

- Hook and loop adhesive sheets

- Glue

- Tool kit and electrical tape

- Extra screws and battery

- Dremel (in case of crashes)

- Scissors and gloves

- First aid kit

- FAA documents

- Remote pilot certificate

- Aircraft registration (identifier on UAS)

- Authorization or waiver for flight

1.4   At launch site

- Go through the same system checks as in section 1.2 above

- Follow predetermined flight procedures