

# DH.114 Heron Checklists

## Before Departure:

1. Entrance Ladder ... Correctly Stowed
2. Entrance Door ... Closed, check for ease of opening, then re-close.
3. Cabin Lighting ... As required.

## Departure:

1. Switches ... All OFF, except cabin lights as necessary.
2. Windows ... Clean, free from crazing
3. Direct Vision windows... Satisfactory opening. Closed and locked.
4. Pneumatic System:
  - Master Air Supply... ON
  - Air Supply ... 450 to 650 p.s.i.
  - Brake Pressure ... 120 to 185 p.s.i. when applied. Check pressure zero when Brakes released.
5. All Circuit Breakers ... ON
6. Ground/Flight Switch ... To FLIGHT
7. Fire Warning Lamps (On applicable models) Filament illumination checked (by pressing button over each pair of warning lamps).
8. Alighting Gear Electrical Indicator... Green lights on.
9. Rudder Pedals ... Check locking bar is released and stowed.
10. Flying Controls ... Checked for freedom of operation.
11. Fuel Tank Contents ... (Main and outer wing) Gauge readings.
12. Outer Wing Fuel Cocks (On)
13. Propeller De-icing:
  - Tank Contents ... Gauge reading

Pump Functioning	Pump switched ON, checked aurally for functioning, switched OFF.
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14. Lifejackets (if carried): Correct stowage.

15. Cabin Signs: ... ON

16. Flaps: ... UP

## Starting Engines:

Engines are normally started in sequence 1 to 4.

Proceed as follows:

1. Brakes ... ON

2. Generator Switches ON

3. Anti-collision lamps ON

4. Engine Interconnected Oil and Fuel Cocks ON

6. Main Wing Tanks Cross-feed Cock Normal

7. Oil Cooler Shutters ... CLOSED (up), or as appropriate.

8. Carburettor Air ... COLD

9. Check main wing fuel tanks booster pumps:

Fuel Pressure Warning Lights	ON
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Booster Pumps	... ON, checked aurally
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Fuel Pressure Warning Lights	OUT
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Booster Pumps	... OFF
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Each Engine:

1. Priming Pump: ... Operate Kigass pump until resistance is felt (inop)

2. Throttle: ... Slightly open

3. Magneto Switches ... ON

4. Start Engines ... Press appropriate STARTER button

5. Warm Up Engines ... 1,200 to 1,400 r.p.m.

6. Oil Pressure ... Immediately satisfactory: if not, shut down and investigate.

7. Generator Warning Lights Out

## **Ground Running:**

1. Ground/Flight Switch ... FLIGHT
2. Landing Lamp (if used) ... Extension, retraction and illumination checked
3. Oil Pressure and Temperature: Readings
4. Flight Instruments ... Checked
5. Gyro Compass ... Checked and synchronized
6. Artificial Horizon ... OFF flag not showing
7. Radios ... ON
8. Oil Temperature ... Suitable for opening up
9. Magneto Switches ... Proved at 1,200 r.p.m.
10. Vacuum Pressure ... Checked
11. Throttle ... Fully open
12. Magnetos ... Check drop readings
13. Manifold Pressure ... Gauge readings
14. Carburettor Air Intake Control Checked
15. Accumulator Cut-out ... Checked: as throttle is brought back check that power failure warning lamp lights
16. Slow Running ... Checked
17. Ice Formation Spot Lamps Checked
18. Chocks ... Removed

## **Taxying:**

1. Pneumatic System ... 450 to 650 p.s.i.
2. Instruments ... Check gyro instruments and oil temperatures while taxiing
3. Brakes ... Check while taxiing (it is not necessary to put them on fully)

## Before Take-off:

While carrying out the following vital actions, engines should be running at above 1,200 r.p.m., with brakes on, to ensure that the generators are providing out-put.

### VITAL ACTIONS: T, C, P, F, F, F, G, G, A, H, A

1. **T**rimmers, elevator, aileron and rudder Neutral
2. **C**arb. Air ... COLD, normally
3. **P**neumatic Pressure ... Checked
4. **F**uel:
  - Tank Contents: ... Sufficient for flight
  - Oil and Fuel Cock Levers ON
  - Main Wing Tanks Booster Pumps ON
  - Cross-feed Cock ... Normal
5. **F**laps ... 20 deg. DOWN (take-off position)
6. **F**reedom of Flying Controls ... Checked
7. **G**yro Instruments ... Checked
8. **G**auges ... Checked
9. (**G**ills) Oil Cooler Shutters ... As Required
10. **A**utopilot ... OFF
11. (**H**atches) Direct-view windows ... Closed
12. **A**irframe De-icing ... OFF

## After Take-off:

- |                     |  |
|---------------------|--|
| 1. Alighting Gear   | UP, indicator lights out (on appropriate models) |
| 2. Flaps            | UP (90 knots; climb at 110 knots)                |
| 3. Carburettor Air  | COLD, or as required                             |
| 4. Pneumatic System | 650 p.s.i.                                       |
| 5. Vacuum Gauge     | Min. 3.5 +/- 0.125 in.Hg                         |
| 6. Generators       | Checked, charging, power failure lights out.     |
| 7. Ammeter Readings | Checked for load balance                         |
| 8. Cabin Signs      | OFF  |
| 9. Booster Pumps    | OFF  |

## *ARRIVAL*

## Field Approach:

- |                                     |         |
|-------------------------------------|---------|
| 1. Fuel Contents and Landing Weight | Checked |
| 2. Booster Pumps                    | ON      |
| 3. Cabin Signs                      | ON      |
| 4. Pneumatic Pressure               | Checked |
| 5. Airframe De-icing                | OFF     |
| 6. Autopilot                        | OFF     |
| 7. Flaps                            | 20 deg. |

## Before Landing:

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|---------------------------------|-------------------|
| 1. U/C: (on appropriate models) |                   |
| Alighting Gear                  | ... Selected DOWN |

Green Lights ... All on  
 Mechanical Indicators ... Up (indicating U/C down)

2. Brakes:

Pressure ... Sufficient  
 Operation ... Satisfactory  
 Brake Lever ... Off  
 Pressure ... Released

4. Carb. Air ... As required

5. Fuel:

Tank Contents, Booster Pumps ... Checked

6. Flaps ... Fully DOWN

7. Landing Lamp ... Switch to DOWN (if required)

## After Landing:

1. Landing Lamp ... (if used) OFF

2. Flaps ... UP

3. Fuel Booster Pumps ... OFF

4. Engines No. 2 and 3 ... Stop

## Post Flight Checks:

1. Engines No, 1 and 4 ... Stop

2. Brakes ... Parked

3. Cabin Signs ... OFF

4. All Magneto Switches ... OFF

5. Fuel Cocks ... OFF

6. Oil Cooler Air Outlet Shutters CLOSED

- 7. Master Air Valve ... OFF
- 8. Pitot Heat ... OFF
- 9. Windscreen Wipers ... (if used) OFF (resistance returned to slow speed, then parked)
- 10. Direct Vision Panels ... Closed and locked
- 11. Carburettor Air ... As required
- 12. Radios ... OFF
- 13. All Switches ... Checked OFF
- 14. Ground/Flight Switch ... OFF