



# TYPE-CERTIFICATE

## DATA SHEET

**NO. EASA.A.021**

for  
**AT-3 Series**

Type Certificate Holder  
**AERO AT Sp. z o.o.**

**ul. COP-u 2  
39-300 Mielec  
Poland**

For models: **AT-3R100**



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**SECTION A: AT-3R100**

**A.I. General**

1. Type/ Model/ Variant

- 1.1 Type: AT-3  
1.2 Model: AT-3R100  
1.3 Variant: AT-3R100

2. Airworthiness Category: Normal

3. Manufacturer: AERO AT Sp. z o.o.  
ul. COP-u 2  
39-300 Mielec  
Poland

4. EASA Type Certification Application Date: 11 March 2002

*Note: State of Design Authority certification application date for grandfathered products*

5. State of Design Authority: Civil Aviation Office (Poland)

6. State of Design Authority Type Certificate Date: 12 February 2003; (TC No. BB-210/1)

7. EASA Type Certification Date: 21 January 2005

**A.II. EASA Certification Basis**

1. Reference Date for determining the applicable requirements: 11 March 2002

2. Airworthiness Requirements: EASA CS-VLA dated 14 November 2003  
(Equivalent to JAR-VLA Issued 26 April 1990 including amendments up to VLA/92/1 dated 1 January 1992)

3. Special Conditions: CRI A-2 Night VFR

4. Exemptions: None

5. Deviations: None

6. Equivalent Safety Findings: None

7. Environmental Protection: ICAO, Annex 16, Volume 1, Chapter 10

For further details see EASA TCDSN.A.021



### **A.III. Technical Characteristics and Operational Limitations**

1. Type Design Definition: Master Drawing List, Document No. ATS3.02 dated 03.02.2003, Amendment 5 dated 16.05.2005 and subsequent
2. Description: Single engine, two-seater cantilever low wing aeroplane, all metal construction, fixed tricycle landing gear
3. Equipment: Equipment list, AFM, Document No. ATL3.03 or ATL3.04, Section 2 and 6

4. Dimensions:

4.1 Basic:

Span:	7.55 m
Length:	6.25 m
Height:	2.23 m
Wing Area:	9.30 m <sup>2</sup>

4.2 Optional (see Note 3):

Span:	8.35 m
Length:	6.25 m
Height:	2.23 m
Wing Area:	10.50 m <sup>2</sup>

5. Engine:

- 5.1.1. Model: Bombardier- Rotax 912S2 or S4
- 5.1.2 Type Certificate: EASA No. E.121
- 5.1.3 Limitations: Max take-off rotational speed: 5800 r.p.m  
Max continuous rotational speed: 5500 r.p.m  
For other engine limits refer to AFM, Document. No. ATL3.03 or ATL3.04, Section 2

- 5.2.1. Model: Bombardier- Rotax 912iSc Sport series
- 5.2.2 Type Certificate: EASA. E.121
- 5.2.3 Limitations: Max take-off rotational speed: 5800 r.p.m  
Max continuous rotational speed: 5500 r.p.m  
For other engine limits refer to AFM, Document. No. ATL3.03 or ATL3.04, Section 2

6. Load factors:

With wing flaps retracted:	- 1.5 to +3.8
With wing flaps extended:	0 to +2

7. Propeller

- 7.1.1 Model GT ELICHE GT-2/173/VRR-FW101SRTC
- 7.1.2 Type Certificate EASA.P.108
- 7.1.3 Number of blades 2
- 7.1.4 Diameter 1730 mm
- 7.1.5 Sense of Rotation Clockwise (pilot's view)



7.2.1 Model	ELPROP 3-1-1P
7.2.2 Type Certificate	EASA.P.009
7.2.3 Number of blades	3
7.2.4 Diameter	1730 mm
7.2.5 Sense of Rotation	Clockwise (pilot's view)

## 8. Fluids

8.1 Fuel:	Minimum 95 Grade Unleaded Automotive Gasoline or AVGAS 100 LL if other fuel is not available
8.2 Oil	Oils conforming to API classification marked SF or SG For more details see AFM, Document No. ATL3.03 or ATL3.04, Section 2
8.3 Coolant:	According to AFM, Document. No. ATL3.03 or ATL3.04, Section 2

## 9. Fluid capacities

9.1.1 Basic:	
Standard fuel tank:	Total: 68.5 litres Usable: 65.0 litres With additional fuel tank: Total: 123.5 litres Usable: 120.0 litres

Optional fuel tank:	Total: 78.5 litres Usable: 75.0 litres With additional fuel tank: Total: 133.5 litres Usable: 130.0 litres
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Optional fuel tank: (in the wings)	Total: 2 x 51.0 litres Usable: 2 x 50.0 litres
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9.1.2 Optional (see Note 3): Fuel tank (in the wings)	Total: 2 x 51.0 litres Usable: 2 x 50.0 litres
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9.2 Oil	Maximum: 3.5 litres Minimum: 2.5 litres
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9.3 Coolant system capacity	2.8 litres
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## 10. Air Speeds

Design Manoeuvring Speed $V_A$ :	109 kt (202 km/h) CAS
Flap Extended Speed $V_{FE}$ :	85 kt (157 km/h) CAS
Maximum structural cruising speed $V_{NO}$	109 kt (202 km/h) CAS
Never exceed speed $V_{NE}$ :	123 kt (228 km/h) CAS



11. Flight Envelope Not defined maximum operating altitude
12. Approved Operations Capability: Day & Night VFR - see Note 2
13. Maximum Masses:
- 13.1 Basic:
- |          |        |
|----------|--------|
| Take-off | 582 kg |
| Landing  | 582 kg |
- 13.2 Optional (see Note 3):
- |          |        |
|----------|--------|
| Take-off | 630 kg |
| Landing  | 630 kg |
14. Centre of Gravity Range:
- 14.1 Basic:
- |                |                                       |                      |
|----------------|---------------------------------------|----------------------|
| Forward limit: | up to 480 kg                          | 0.203 m behind Datum |
|                | at 582 kg                             | 0.267 m behind Datum |
|                | varying linearly with mass in between |                      |
| Rear limit:    | for all masses                        | 0.394 m behind Datum |
- 14.2 Optional (see Note 3):
- |                |                                       |                      |
|----------------|---------------------------------------|----------------------|
| Forward limit: | up to 530 kg                          | 0.241 m behind Datum |
|                | at 630 kg                             | 0.292 m behind Datum |
|                | varying linearly with mass in between |                      |
| Rear limit:    | for all masses                        | 0.394 m behind Datum |
15. Datum: Wing Leading Edge
16. Control surface deflections:
- |             |                    |   |
|-------------|--------------------|---|
| Wing flaps: | Retracted          | $0^\circ \pm 2^\circ$                           |
|             | For take-off       | $15^\circ \pm 2^\circ$                          |
|             | For landing        | $30^\circ \pm 2^\circ$ ; $40^\circ +5/-2^\circ$ |
| Slab tail:  | Trailing edge up   | $12^\circ \pm 1^\circ$                          |
|             | Trailing edge down | $10^\circ \pm 1^\circ$                          |
| Rudder:     |                    | $30^\circ \pm 2^\circ$                          |
- 16.1 Basic:
- |           |      |                        |
|-----------|------|------------------------|
| Ailerons: | Up   | $20^\circ \pm 2^\circ$ |
|           | Down | $15^\circ \pm 2^\circ$ |
- 16.2 Optional (see Note 3):
- |           |      |                        |
|-----------|------|------------------------|
| Ailerons: | Up   | $15^\circ \pm 2^\circ$ |
|           | Down | $10^\circ \pm 2^\circ$ |
17. Levelling Means: Spirit Level on the cockpit side rail with canopy open
18. Minimum Flight Crew: 1 (Pilot)
19. Maximum Passenger Seating Capacity: 1
20. Baggage/ Cargo Compartments:
- |                            |            |
|----------------------------|------------|
| Port Side Compartment      | max. 20 kg |
| Starboard Side Compartment | max. 10 kg |
21. Wheels and Tyres:
- Nose Wheel Tyre Size: Normal 5.00 - 4 6ply Type III, or tubeless 5.00-5



Main Wheel Tyre Size: Normal or tubeless 380x150/15x6.00-5 or 5.00-5  
22. (Reserved)





#### **A.IV. Operating and Service Instructions**

- |                       |  |
|-----------------------|--|
| 1. Flight Manual      | Document No. ATL3.03, Polish Language version and ATL3.04, English Language version                                  |
| 2. Maintenance Manual | Document No.ATT3.02, Polish Language version and ATT3.03, English Language version (incl. Airworthiness Limitations) |

#### **A.V. Notes**

1. This certification applies to:
  - Serial numbers AT3-008 and AT3-011 and subsequent,
  - Serial numbers from AT3-001 to AT3-005 and AT3-010 modernized according to the Remark No1 in the Master Drawing List, Document No ATS3.02 dated 03.02.2003, Amendment 5 dated 16.05.2005
2. The airplane is approved for VFR-Night operation when the appropriate equipment is installed and operative.
3. MTOW 630 kg when Option No. 92 according to drawing AT3.00.092.0 is installed. Supplement No. 76 must be attached to the AFM and MM. Only the ELPROP propeller is used in this version of the aircraft.

### **SECTION ADMINISTRATIVE**

#### **I. Acronyms & Abbreviations**

AFM	Aeroplane Flight Manual
AMM	Aeroplane Maintenance Manual
EASA	European Union Aviation Safety Agency
S/N	Aircraft Serial Number
VFR	Visual Flight Rules

#### **II. Type Certificate Holder Record**

to 2011      AERO Sp. z o.o.  
                  ul. Wał Miedzeszyński 844  
                  03-942 Warszawa  
                  Poland

since 2011    AERO AT Sp. z o.o.  
                  ul. COP-u 2  
                  39-300 Mielec  
                  Poland



### III. Change Record

Issue	Date	Changes	TC Issue No. & Date
Issue 01	21 January 2005	Initial Issue	Initial Issue, 21 January 2005
Issue 02	24 June 2005	<p>AT-3R100 airplanes S/N AT3-001 to 005 and 010 differ from airplanes S/N AT3-008 and 011 and subsequent only in standard equipment; that the part of optional equipment of these airplanes (S/N AT3-001 to 005 and 010) became standard equipment on airplanes S/N AT3-008 and 011 and subsequent. Accordingly, their Airplane Flight Manual have been changed. Additionally, the AFM of the airplanes S/N AT3-008 and 011 and subsequent took into account Imperial units.</p> <p>Modification of the airplanes S/N AT3-001 to 005 and 010 to the standard of the airplanes S/N AT3-008 and 011 and subsequent includes an installation on these airplanes of optional equipment which constitutes standard equipment on airplanes S/N AT3-008 and 011 and subsequent. It also includes the change in the AFM.</p>	
Issue 03	17 February 2006	Addition of alternative ELPROP 3-1-1P three-blade ground adjustable propeller with composite blades and metal hub, approved as a major change by EASA approval EASA.A.C.01865 dated 11 October 2005.	
Issue 04	24 July 2009	Clarification that the certification basis is CS-VLA, identical to JAR-VLA on the date of certification.	
Issue 05	13 December 2010	Extension of the operational approval to the "Day & Night VFR" conditions and extension of the CG forward limit in accordance with the approved TC changes.	
Issue 06	19 April 2013	Change of usable fuel quantity. Administrative Change of the company name and address.	
Issue 07	20 December 2017	Added: engine Rotax 912iS, fuel capacity, type and tire size.	
Issue 08	05 April 2018	Added: new optional fuel tanks in the wings	
Issue 09	17 April 2019	Added: new option MTOW 630 kg	
Issue 10	10 May 2019	Editorial Changes: A.II.7; A.III.5.2.1; A.III.21; A.V.3 Canceled Notes A.V.2	
Issue 11	23 March 2020	Editorial Changes: A.III.4.2; A.III.7.1.1; A.III.9.1.2; A.III.12; A.III.13.2; A.III.14.2; A.III.16.2	

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