



EASA.BA.025

Description:	BA.025 Notheisz HAB
Language:	English
TCDS:	EASA.BA.025
Product type:	Balloon (CS-31GB/HB/TGB)
Manufacturer/TC Holder:	Notheisz Balloon Hungary Kft.

European Aviation Safety Agency

EASA

**TYPE CERTIFICATE
DATA SHEET**

Notheisz Hot Air Balloons

Manned Free Hot Air Balloon

Type Certificate Holder:
Notheisz Balloons Hungary Kft.
Pécs, Hungary

For models: TOMI Series

Issue: 3, 9 July 2014

Issue: 2, 3 February 2014

Issue: 1, 19 September 2011

List of effective pages:

Page	1	2	3	4	5	6	7
Issue	3	1	3	3	3	1	1

CONTENTS

SECTION 1: GENERAL, all models

- I. General
- II. Certification Basis
- III. Technical Characteristics and Operating Limitations
- IV. Operating and Service Instructions
- V. Notes

SECTION 2: TOMI Series definition and certification data

- Table 2.1: Type Design
- Table 2.2: Envelopes
- Table 2.3: Burners
- Table 2.4: Baskets
- Table 2.5: Approved combinations of TOMI Series envelopes and burners
- Table 2.6: Approved combinations of TOMI Series envelopes and baskets

SECTION 1 GENERAL, all models

I. General

- | | |
|--|---|
| 1. Data Sheet No: EASA.BA.025 | Issue Date: 9 July 2014 |
| 2. Type / Variant or Model | |
| - Type: | Notheisz Hot Air Balloons |
| - Model, Variant: | TOMI Series: AX-6, AX-7, AX-8, AX-9, AX-10 |
| 3. Airworthiness Category: | Normal |
| 4. Type Certificate Holder: | Notheisz Balloon Hungary Kft.
Sport utca 2.
7622 Pécs
Hungary |
| 5. Manufacturer: | Notheisz Balloon Hungary Kft.
Sport utca 2.
7622 Pécs
Hungary
Former Manufacturers:

Notheisz Ballon Kft.
H-7628 Pécs István III. Akna
Hungary

Bányászati Aknamélyítő Vállalat Mecseki Körzet Textil Üzeme
7630 Pécs, Tüskésréti út. 2
Hungary

Mecsek Balloon Ipari és Kereskedelmi Kft.
7624 Pécs, Kórház tér 8
Hungary

MHSz Szolnoki Repülő és Ejtőernyős Klub
Hungary

MHSz Központi Repülőgépjavitó Műhely Ejtőernyőjavító
Műhely
Hungary |
| 6. National CAA HU Certification Date: | Refer to Section 2 |
| 7. CAA HU Initial Application Date: | Refer to Section 2 |
| 8. EASA Application Date: | n/a |
| 9. EASA Type Certification Date: | Refer to Section 2 |
| 10. Certification History | This TCDS EASA.BA.025 replaces the Data Sheets related to the Hungarian Type Certificates:
- 262381/1982. KPM Lűf (TOMI AX 6/MHSz-AX-6)
- 266842/1982.Lűf (RSz-05 AX 7)
- 266845/1982.Lűf (TOMI AX 7)
- L.1/214/86 (TOMI AX 8)
- 253572/1982.Lűf (TOMI AX 9)
- 253572/1982.Lűf (TOMI AX 10) |

II. Certification Basis

- | | |
|--|--|
| 1. Reference Date for determining the applicable requirements: | Refer to Section 2, see Table 2.1 |
| 2. CAA HU Type Certificate Data Sheet No: | Data Sheets related to the Hungarian Type Certificates:
- 262381/1982. KPM Lűf (TOMI AX 6/MHSz-AX-6)
- 266845/1982.Lűf (RSz-05 AX 7)
- 266845/1982.Lűf (TOMI AX 7)
- L.1/214/86 (TOMI AX 8)
- 253572/1982.Lűf (TOMI AX 9)
- 253572/1982.Lűf (TOMI AX 10) |
| 3. Airworthiness Requirements: | - 40.sz Lűgűgyi Elűirás, BCAR 31, 2 nd edition
<i>Aviation Regulation no. 40, BCAR 31, 2nd edition</i>
- CS 31HB, Amdt. 1, 5 December 2011 (see V.2) |
| 4. Special Conditions: | None |
| 5. Reversion and Exemptions: | None |
| 6. Equivalent Safety Findings: | None |

III. Technical Characteristics and Operational Limitations

- | | |
|---|--|
| 1. Type Design Definition: | Refer to Section 2, Table 2.1 |
| 2. Description: | Manned free hot-air balloon with the natural shape envelope of 1 600 – 6 000 m ³ volume, (horizontal cutting) construction with 16, 24 or 32 gores; parachute in top for control and rapid deflation; turning valves optional.
Heater system with double burners.
Conventional wicker baskets suspended beneath the envelope by steel cables and karabiners.
MOFEM aluminium fuel cylinders (50 ltr) and other equipment/instruments fixed to the inner side of the basket wall. |
| 3. Equipment: | - Altimeter
- Rate of climb/descent indicator
- Envelope temperature indicator
- Fuel quantity indicator |
| 4. Envelope: | Refer to Section 2, see Table 2.2 |
| 5. Burner: | Refer to Section 2, see Table 2.3 |
| 6. Basket: | Refer to Section 2, see Table 2.4 |
| 7. Mass: | Maximum take-off mass: Refer to Section 2
see Table 2.1 |
| 8. Envelope Temperature: | Polyester fabric: 135°C (max. limit)
Polyamid fabric: 120°C (max. limit) |
| 9. Minimum Flight Crew: | 1 Pilot |
| 10. Maximum number of persons on board: | See Flight and Service Manual |
| 11. Other Limitations: | Life limited parts – see Airworthiness Limitations in the Flight and Service Manual |

IV. Operating and Service Instructions

1. Hőléggallon Kézikönyv, Öszeállította a Bányászati Aknamélytő Vallalat, 1983
Hot Air Balloon Handbook, written by Bányászati Aknamélytő Vallalat, 1983
2. Hot Air Balloon Handbook, Issue 1, 1982; and Amendment 1 Kögáz II, Issue 1987
3. Supplements concerning combinations of TOMI Series envelopes with other manufacturer's parts:
Operating instructions:
- Flight Manual Supplement Balóny Kubíček bottom ends, ID: FMS-001, Issue 1,
or later EASA approved revision
Service instructions:
Limitations specific to the combinations, where applicable, are listed in related supplement listed above.

V. Notes

1. Manufacturing confined to approved Part 21 Subpart F or Subpart G organisation (Commission Regulation (EU) No 748/2012 of 3 August 2012).
2. For combinations of TOMI Series envelopes with other manufacturer's components more recent Airworthiness Requirements (see II.3) may be chosen as "elect to comply" in accordance with Part 21.A.101
3. Combinations of TOMI Series envelopes with other manufacturer's components are defined in the related Notheisz Balloons Hungary Flight Manual supplements; see IV.3

SECTION 2: TOMI Series definition and certification data

Table 2.1: Type Design

Model	Type design document n°	Reference date	Airworthiness Requirements (see II.3)	Approval date
TOMI-AX-6	262381/82	12 June 1983	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	12 June 1983
TOMI-AX-7	262845/82	19 April 1983	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	19 April 1983
TOMI-AX-8	L.1/214/86	5 February 1986	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	5 February 1986
TOMI-AX-9	253572/82	27 April 1982	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	27 April 1982
TOMI-AX-10	LI/IG102//09	14 December 1989	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	14 December 1989

Table 2.2: Envelopes

Model	Drawing n°	Volume [m³]	Gores [-]	MTOM [kg]	Approval date
TOMI-AX-6 (or: MHSz-AX-6)	NB 100-01 AX6	1 600	16	480	12 June 1983
TOMI-AX-7 (or: RSz-05-AX-7)	NB 100-02 AX7	2 250	24	660	19 April 1983
TOMI-AX-8	NB 100-03 AX8	3 000	24	900	5 February 1986
TOMI-AX-9	NB 100-04 AX9	4 000	32	1 200	27 April 1982
TOMI-AX-10 (or: MECSEK AX10)	NB 100-05 AX10	6 000	32	1 800	14 December 1989

Table 2.3: Burners

Model	Drawing n°	Description	Applicable load frames [mm]	Airworthiness Requirements (see II.3)	Approval date
Kögáz 2	B-1-00-00	double	650 x 680	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	1988
Kögáz III-2-1	633-00-00	double	600 x 600	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	1988
Kögáz III.4.1	6345-00-00	quad	780 x 780	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	1988

Table 2.4: Baskets

Model	Drawing n°.	Description [m]	Occupants [pilot+pax]	Airworthiness Requirements (see II.3)	Approval date
KNB.10	NB-50-00-01	1.05 x 1.05	1+0	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	---
KNB.11	NB-50-00-02	1.05 x 1.4	1+2	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	---
KNB.12	NB-50-00-03	1.2 x 1.4	1+3	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	---
KNB.13	NB-50-00-04	1.2 x 1.6	1+4	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	---
KNB.14	NB-50-00-05	1.35 x 2.1	1+5	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	---
KNB.15	NB-50-00-06	1.55 x 2.6	1+9	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	---
KNB.16	NB-50-00-07	1.65 x 2.8	1+10	Aviation Regulation no. 40 / BCAR 31, 2 nd edition	---

Table 2.5: Approved configurations of envelopes and burners TOMI Series

Envelope Model	Burner		
	Kögáz 2 double	Kögáz III.2.1 double	Kögáz III-3-4.1 quad
TOMI-AX-6	•	•	-
TOMI-AX-7	•	•	-
TOMI-AX-8	•	•	-
TOMI-AX-9	•	•	-
TOMI-AX-10	-	-	•

Table 2.6: Approved configurations of envelopes and baskets for TOMI Series

Envelope Model	Basket						
	K.NB.10	K.NB.11	K.NB.12	K.NB.13	K.NB.14	K.NB.15	K.NB.16
TOMI-AX-6	•	-	-	-	-	-	-
TOMI-AX-7	-	•	-	-	-	-	-
TOMI-AX-8	-	•	•	-	-	-	-
TOMI-AX-9	-	-	-	•	•	-	-
TOMI-AX-10	-	-	-	-	•	•	•

* * *