

Flight and Load test report - EN 12491:2001

Manufacturer Sup'Air
Address Parc Altais / 34 rue Adrastée
 74650 Chavanod
 France

Certification number: EP 015.2008
Type/model: SUP G4 S
Total weight in flight: 86 kg

Description of tests	place:	date:	result:
1. Deployment system strength test A load of 700 N between each components	Villeneuve	17/02/2009	OK
2. Speed of opening test - ref. A (2 times) Time from the instant of free drop until a load of 200 N is sustained Opening time Opening time	Villeneuve Villeneuve	10/01/2008 25/01/2008	< 5 seconds < 5 seconds
3. Descent rate and stability test - ref. A and B (2 times) The paraglider is released as the parachute begins to open, minimum 100 m descent. Stability 1 Sink rate 1 Stability 2 Sink rate 2	Villeneuve Villeneuve Villeneuve Villeneuve	10/01/2008 10/01/2008 25/01/2008 25/01/2008	Stable 5.31 m/s Stable 5.31 m/s
4. Strength test 40 m/s opening shock (2 times) The drop test device is accelerated to a straight line velocity of 40 m/s and the parachute deployment handle activated using a static line attached to a drogue chute. Speed of opening is less than 5 seconds Test 1 Test 2	France France	30/12/2006 30/12/2006	OK, done by Aerotests OK, done by Aerotests
5. Interaction and stability test (piloted) - ref. C a the emergency parachute is deployed from a paraglider in normal straight flight. b the pilot shall take no action while the behaviour of the parachute and paraglider are observed 200 metres. c the pilot take action while the behaviour of the parachute and paraglider are observed 200 metres.			not available not available not available

The model described is in conformity with the flight and load tests carried out by Air Turquoise SA.



For Air Turquoise SA

Randi Eriksen
 Randi Eriksen

Air Turquoise SA
 Route du Pré-au-Comte 8
 Case postale 10
 CH- 1844 Villeneuve
 email: info@para-test.com



homepage: www.para-test.com

Weather data, ref. 3 and B

Date / place	hPa	wind	temp	humidity
10/01/2008 Villeneuve	975.5	0	4.6°	71.2%
<i>Corrected mass:</i>		85.9 kg		
25/01/2008 Villeneuve	991.7	0	3.4°	83.9%
<i>Corrected mass:</i>		87.7 kg		

Reference

A. At horizontal airspeed 8 m/s and vertical speed 1.5 m/s

B. Formula to be used for correcting the test mass ofr differences from ICAO standard atmosphere

$$m_{\text{corr}} := m_{\text{dec}} \cdot \frac{p \cdot T_0}{p_0 \cdot T}$$

Ground level atmospheric pressure at the test location: (p)

ICAO standard atmospheric pressure at MSL: (p₀)

Ground level temperature at the test location: (T)

ICAO standard temperature at MSL: (T₀)

Total weight in flight: (m_{dec})

Corrected mass: (m_{corr})

C. Only parachute with controls for steering and landing flare



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For Air Turquoise SA

Randi Eriksen

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Flight and Load test report - EN 12491:2001

Manufacturer Sup'Air
Address Parc Altais / 34 rue Adrastée
 74650 Chavanod
 France

Certification number: EP 016.2008
Type/model: SUP G4 M
Total weight in flight: 105 kg

Description of tests	place:	date:	result:
1. Deployment system strength test A load of 700 N between each components	Villeneuve	17/02/2009	OK
2. Speed of opening test - ref. A (2 times) Time from the instant of free drop until a load of 200 N is sustained Opening time Opening time	Villeneuve Villeneuve	02/01/2008 07/02/2008	< 5 seconds < 5 seconds
3. Descent rate and stability test - ref. A and B (2 times) The paraglider is released as the parachute begins to open, minimum 100 m descent. Stability 1 Sink rate 1 Stability 2 Sink rate 2	Villeneuve Villeneuve Villeneuve Villeneuve	02/01/2008 02/01/2008 07/02/2008 07/02/2008	Stable 5.28 m/s Stable 5.36 m/s
4. Strength test 40 m/s opening shock (2 times) The drop test device is accelerated to a straight line velocity of 40 m/s and the parachute deployment handle activated using a static line attached to a drogue chute. Speed of opening is less than 5 seconds Test 1 Test 2	France France	30/12/2006 30/12/2006	OK, done by Aerotests OK, done by Aerotests
5. Interaction and stability test (piloted) - ref. C a the emergency parachute is deployed from a paraglider in normal straight flight. b the pilot shall take no action while the behaviour of the parachute and paraglider are observed 200 metres. c the pilot take action while the behaviour of the parachute and paraglider are observed 200 metres.			not available not available not available

The model described is in conformity with the flight and load tests carried out by Air Turquoise SA.



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Weather data, ref. 3 and B

Date / place	hPa	wind	temp	humidity
02/01/2008 Villeneuve	970.1	0	2.2°	79.9%
	Corrected mass:	105.2 kg		
25/01/2008 Villeneuve	989.3	0	4.4°	82.2%
	Corrected mass:	106.43 kg		

Reference

A. At horizontal airspeed 8 m/s and vertical speed 1.5 m/s

B. Formula to be used for correcting the test mass ofr differences from ICAO standard atmosphere

$$m_{\text{corr}} := m_{\text{dec}} \cdot \frac{p \cdot T_0}{p_0 \cdot T}$$

Ground level atmospheric pressure at the test location: (p)

ICAO standard atmospheric pressure at MSL: (p₀)

Ground level temperature at the test location: (T)

ICAO standard temperature at MSL: (T₀)

Total weight in flight: (m_{dec})

Corrected mass: (m_{corr})

C. Only parachute with controls for steering and landing flare



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For Air Turquoise SA

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ISO 9001
BUREAU VERITAS
Certification



Flight and Load test report - EN 12491:2001

Manufacturer Sup'Air
Address Parc Altais / 34 rue Adrastée
 74650 Chavanod
 France

Certification number: EP 017.2008
Type/model: SUP G4 L
Total weight in flight: 130 kg

Description of tests	place:	date:	result:
1. Deployment system strength test A load of 700 N between each components	Villeneuve	17/02/2009	OK
2. Speed of opening test - ref. A (2 times) Time from the instant of free drop until a load of 200 N is sustained Opening time Opening time	Villeneuve Villeneuve	01/04/2008 24/04/2008	< 5 seconds < 5 seconds
3. Descent rate and stability test - ref. A and B (2 times) The paraglider is released as the parachute begins to open, minimum 100 m descent. Stability 1 Sink rate 1 Stability 2 Sink rate 2	Villeneuve Villeneuve Villeneuve Villeneuve	01/04/2008 01/04/2008 24/04/2008 24/04/2008	Stable 5.47 m/s Stable 5.47 m/s
4. Strength test 40 m/s opening shock (2 times) The drop test device is accelerated to a straight line velocity of 40 m/s and the parachute deployment handle activated using a static line attached to a drogue chute. Speed of opening is less than 5 seconds Test 1 Test 2	France France	30/12/2006 30/12/2006	OK, done by Aerotests OK, done by Aerotests
5. Interaction and stability test (piloted) - ref. C a the emergency parachute is deployed from a paraglider in normal straight flight. b the pilot shall take no action while the behaviour of the parachute and paraglider are observed 200 metres. c the pilot take action while the behaviour of the parachute and paraglider are observed 200 metres.			not available not available not available

The model described is in conformity with the flight and load tests carried out by Air Turquoise SA.



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Weather data, ref. 3 and B

Date / place	hPa	wind	temp	humidity
01/04/2008 Villeneuve	979	0	8.9	77.5%
<i>Corrected mass:</i>		128.32 kg		
24/04/2008 Villeneuve	980	0	8.0°	82.2%
<i>Corrected mass:</i>		128.86 kg		

Reference

A. At horizontal airspeed 8 m/s and vertical speed 1.5 m/s

B. Formula to be used for correcting the test mass off differences from ICAO standard atmosphere

$$m_{\text{corr}} := m_{\text{dec}} \cdot \frac{p \cdot T_0}{p_0 \cdot T}$$

Ground level atmospheric pressure at the test location: (p)

ICAO standard atmospheric pressure at MSL: (p₀)

Ground level temperature at the test location: (T)

ICAO standard temperature at MSL: (T₀)

Total weight in flight: (m_{dec})

Corrected mass: (m_{corr})

C. Only parachute with controls for steering and landing flare



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ISO 9001
 BUREAU VERITAS
 Certification



ElseErklärung über Bauausführung und Leistung (EBL)
Declaration of Design and Performance (DDP)

Rettungsgerät - Rescue

- | | | |
|----|---|--|
| 1 | Musterprüfung / Type testing | EAPR-RG-7177/09 |
| 2. | Gerätemuster / Test sample: | Type sup G4 S (Sup 08 S) |
| 3. | Hersteller / Manufacturer: | Sarl Supair
Parc Altais
34 rue Altais
74650 - Chavanod
France |
| 4. | Datum der Musterprüfbescheinigung / Date of type testing certification: | 22.04.2009 |
| | Datum Belastungstest / Date of load testing: | 30.12.2006 |
| | Datum Öffnungstest / Date of opening test: | 02.01.2008 |
| | Datum Flugtest / Date of flight test: | 07.02.2008 |
| 5. | Nachgewiesene Normen und Verfahren:
Certified standards and procedures | LTF 35/03 |

6 Merkmale und Betriebsgrenzen / Characteristics and limitations

6.1.	Gerätegewicht System weight	1.350 g
6.2.	max. Anhängelast max. payload	86 kg
	Sinkgeschwindigkeit Sinkrate	< 6,7 m/s
6.3.	Empfohlene max. Startgewicht Recommended max. Takeoff weight	86 kg
	Sinkgeschwindigkeit Sinkrate	< 6,7 m/s
6.4.	Mittelleinenschirm Pull down Apex	Ja / Yes
6.5.	Steuerbar Steerable	Nein / No
6.8.	Ausgelegte Fläche Overall surface area	22,5 m²
6.9.	Packvolumen Packing volume	3.321 cm³

7. Besonderheiten / particularities: **keine / None**
8. Betriebsanweisung in der Fassung vom:
Manual version dated **Rev. 1.0 - 28.04.2009**
9. Nachprüfanweisung in der Fassung vom:
Periodical check instruction version:
10. Nachprüffristen / Periodical checks: **24 Monate / 24 months**

Ort, Datum, Stempel und Unterschrift des Herstellers:
Place, Date, Stamp and Signature of the manufacturer:

Sichtvermerk der Prüfstelle:
Test center endorsement:

Erklärung über Bauausführung und Leistung (EBL)

Declaration of Design and Performance (DDP)



EBL-RG-DB - Stand 01.11.2010 - V4

Rettungsgerät - Rescue

Musterprüfung / Type testing

EAPR-RG-7178/09

Gerätemuster / Test sample

Sup G4 (Sup08) M

Musterprüfinhaber / Type Testing Holder

SupAir Srl
rue Adrastee 34
74650 Chavanod
Frankreich

Datum der Musterprüfbescheinigung / Date of type testing certification	22.04.2009
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Nachgewiesene Normen und Verfahren <i>Certified standards and procedures</i>	LTF 91/09
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Gerätegewicht / System weight - kg	1,60 kg
Zulässiges max. Anhängelast LTF / Allowable max. payload LTF	105 kg
Zulässiges max. Anhängelast EN / Allowable max. payload EN	
Bauform / Kind of construction	Mittelleinenschirm
Steuerbar / Steerable	nein - no
Ausgelegte Fläche / Overall Surface area - m ²	26,2
Packvolumen / Packing volume	3998 ccm
Mittelwert Leinenlänge / Average line length	4546 mm
Mittelleine / Centerline	4960 mm
V-Leine / V-line	220 mm

Besonderheiten / particularities	keine - none
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Betriebsanweisung in der Fassung vom / Manual version dated	Rev. 1.0 - 28.04.2009
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Nachprüffristen / Periodical checks	24 Monate / 24 month
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Bad Grönenbach, 09.10.2011

Diese Erklärung wurde elektronisch erstellt und ist ohne Unterschrift gültig
This explanation was provided electronically and is valid without signature

ElseErklärung über Bauausführung und Leistung (EBL)
Declaration of Design and Performance (DDP)

Rettungsgerät - Rescue

- | | | |
|----|---|--|
| 1 | Musterprüfung / Type testing | EAPR-RG-7179/09 |
| 2. | Gerätemuster / Test sample: | Type sup G4 L (Sup 08 L) |
| 3. | Hersteller / Manufacturer: | Sarl Supair
Parc Altais
34 rue Altais
74650 - Chavanod
France |
| 4. | Datum der Musterprüfbescheinigung / Date of type testing certification: | 22.04.2009 |
| | Datum Belastungstest / Date of load testing: | 30.12.2006 |
| | Datum Öffnungstest / Date of opening test: | 10.01.2008 |
| | Datum Flugtest / Date of flight test: | 25.01.2008 |
| 5. | Nachgewiesene Normen und Verfahren:
Certified standards and procedures | LTF 35/03 |

6 Merkmale und Betriebsgrenzen / Characteristics and limitations

6.1.	Gerätegewicht System weight	1.850 g
6.2.	max. Anhängelast max. payload	130 kg
	Sinkgeschwindigkeit Sinkrate	<6,7 m/s
6.3.	Empfohlene max. Startgewicht Recommended max. Takeoff weight	130 kg
	Sinkgeschwindigkeit Sinkrate	< 6,7 m/s
6.4.	Mittelleinenschirm Pull down Apex	Ja / Yes
6.5.	Steuerbar Steerable	Nein / No
6.8.	Ausgelegte Fläche Overall surface area	32,5 m²
6.9.	Packvolumen Packing volume	5.406 cm³

7. Besonderheiten / particularities: **keine / none**
8. Betriebsanweisung in der Fassung vom:
Manual version dated **Rev. 1.0 - 28.04.2009**
9. Nachprüfanweisung in der Fassung vom:
Periodical check instruction version:
10. Nachprüffristen / Periodical checks: **24 Monate / 24 months**

Ort, Datum, Stempel und Unterschrift des Herstellers:
Place, Date, Stamp and Signature of the manufacturer:

Sichtvermerk der Prüfstelle:
Test center endorsement: