## AIR TURQUOISE SA | PARA-TEST.COM

Route du Pré-au-Comte 8 🔺 CH-1844 Villeneuve 🔺 +41 (0)21 965 65 65

Test laboratory for paragliders, paraglider harnesses and paraglider reserve parachutes



## Flight test report: EN 926-2:2013 & LTF 91/09

Manufacturer Address	<b>Davinci Products Inc.</b> 63 Shinchon Gil Okcheon Myeon / Yangpyeong Gun 12505 Gyeongi do Republic of Korea	Certification number Date of flight test		PG_1206.2017 26. 07. 2017		
Glider model	Rhythm L	Classification		Α		
Serial number	ART-L170601A	Representative		None		
Trimmer	no	Place of test		Villeneuve		
Folding lines used	no					
Test pilot		Thurnheer Claude		Zoller Alain		
Harness		Niviuk - Hamak M		Gin Gliders - Gingo 2 L		
Harness to risers distance (cm) Distance between risers (cm)		44		43		
		44		48		
	Total weight in flight (kg)			120		
1. Inflation/Take-off		A				
Rising behaviour		Smooth, easy and constant rising	А	Smooth, easy and constant rising	А	
Special take off technique	required	No	А	No	А	
2. Landing		Α				
Special landing technique		No	A	No	A	
3. Speed in straight fligh		Α				
Trim speed more than 30 I		Yes	A	Yes	A	
Speed range using the cor	ntrols larger than 10 km/h	Yes	A	Yes	A	
Minimum speed		Less than 25 km/h	A	Less than 25 km/h	А	
4. Control movement		Α				
Max. weight in flight up t	to 80 kg					
Symmetric control pressur	e / travel	not available	0	not available	0	
Max. weight in flight 80 k	tg to 100 kg					
Symmetric control pressur	e / travel	Increasing / greater than 60 cm	Α	not available	0	
Max. weight in flight grea						
Symmetric control pressur		not available	0	Increasing / greater than 65 cm	A	
5. Pitch stability exiting a	•			D: ( )     000		
Dive forward angle on exit		Dive forward less than 30°	A	Dive forward less than 30°	A	
	ng controls during accelerated	No A	A	No	A	
flight Collapse occurs		No	А	No	А	
7. Roll stability and dam	pina	A	~		~	
Oscillations		Reducing	А	Reducing	А	
8. Stability in gentle spira	als	A		J. J		
Tendency to return to strai		Spontaneous exit	А	Spontaneous exit	А	
9. Behaviour exiting a fu	lly developed spiral dive	Α				
Initial response of glider (fi	irst 180°)	Immediate reduction of rate of turn	A	Immediate reduction of rate of turn	А	
Tendency to return to strai	ight flight	Spontaneous exit (g force decreasing, rate of turn decreasing)	A	Spontaneous exit (g force decreasing, rate of turn decreasing)	A	

Turn angle to recover normal flight	Less than 720°, spontaneous recovery	A	Less than 720°, spontaneous recovery	A
10. Symmetric front collapse	Α			
Approximately 30 % chord				
Entry	Rocking back less than 45°	А	Rocking back less than 45°	А
Recovery	Spontaneous in less than 3 s	A	Spontaneous in less than 3 s	A
Dive forward angle on exit Change of course	Dive forward 0° to 30° Keeping	A	Dive forward 0° to 30° Keeping	A
	course		course	
Cascade occurs	No	А	No	А
Folding lines used	No		No	
At least 50% chord				
Entry	Rocking back less than 45°	А	Rocking back less than 45°	А
Recovery	Spontaneous in less than 3 s	А	Spontaneous in less than 3 s	А
Dive forward angle on exit / Change of course	Dive forward 0° to 30° / Keeping course	A	Dive forward 0° to 30° / Keeping course	A
Cascade occurs	No	А	No	А
Folding lines used	No		No	
With accelerator	Docking book loss that 15°	^	Posking back loss than 45°	^
Entry	Rocking back less than 45°	A	5	A
Recovery	Spontaneous in less than 3 s	A	Spontaneous in less than 3 s	A
Dive forward angle on exit / Change of course	Dive forward 0° to 30° / Keeping course	A	Dive forward 0° to 30° / Keeping course	A
Cascade occurs	No	A	No	A
Folding lines used	No		No	
11. Exiting deep stall (parachutal stall)	A Yes	А	Yes	۸
Deep stall achieved				A
Recovery	Spontaneous in less than 3 s Dive forward 0° to 30°	A A	Spontaneous in less than 3 s Dive forward 0° to 30°	A
Dive forward angle on exit				A A
Change of course Cascade occurs	Changing course less than 45° No	A A	Changing course less than 45° No	A
12. High angle of attack recovery	A	~	INO .	A
Recovery	Spontaneous in less than 3 s	А	Spontaneous in less than 3 s	А
Cascade occurs	No	A	No	A
13. Recovery from a developed full stall	Α			
Dive forward angle on exit	Dive forward 0° to 30°	А	Dive forward 0° to 30°	А
Collapse	No collapse	А	No collapse	А
Cascade occurs (other than collapses)	No	А	No	А
Rocking back	Less than 45°	А	Less than 45°	А
Line tension	Most lines tight	А	Most lines tight	А
14. Asymmetric collapse	A		-	
Small asymmetric collapse		•		
Change of course until re-inflation / Maximum dive forward or roll angle	Less than 90° / Dive or roll angle 0° to 15°	A	Less than 90° / Dive or roll angle 0° to 15°	A
Re-inflation behaviour	Spontaneous re-inflation	А	Spontaneous re-inflation	А
Total change of course	Less than 360°	А	Less than 360°	А
Collapse on the opposite side occurs	No (or only a small number of collapsed cells with a spontaneous reinflation)	A	No (or only a small number of collapsed cells with a spontaneous reinflation)	A
Twist occurs	No	А	No	А
Cascade occurs	No	А	No	А
Folding lines used	No		No	
Large asymmetric collapse				
Change of course until re-inflation / Maximum dive forward or	Less than 90° / Dive or roll angle	А	Less than 90° / Dive or roll angle	А
roll angle	15° to 45°		15° to 45°	
Re-inflation behaviour	Spontaneous re-inflation	А	Spontaneous re-inflation	А
Total change of course	Less than 360°	А	Less than 360°	А
Total change of course	Less than 360°	A	Less than 360°	A

Collapse on the opposite side occurs	No (or only a small number of collapsed cells with a spontaneous reinflation)	A	No (or only a small number of collapsed cells with a spontaneous reinflation)	A
Twist occurs	No	А	No	А
Cascade occurs	No	А	No	А
Folding lines used	No		No	
C C				
Small asymmetric collapse with fully activated accelerator				
Change of course until re-inflation / Maximum dive forward or roll angle	Less than 90° / Dive or roll angle 15° to 45°	A	Less than 90° / Dive or roll angle 0° to 15°	A
Re-inflation behaviour	Spontaneous re-inflation	А	Spontaneous re-inflation	А
Total change of course	Less than 360°	А	Less than 360°	A
Collapse on the opposite side occurs	No (or only a small number of collapsed cells with a spontaneous reinflation)	A	No (or only a small number of collapsed cells with a spontaneous reinflation)	A
Twist occurs	No	А	No	А
Cascade occurs	No	А	No	А
Folding lines used	No		No	
I are a comparis callence with fully activated accelerator				
Large asymmetric collapse with fully activated accelerator Change of course until re-inflation / Maximum dive forward or	Less than 90° / Dive or roll angle	^	Loss than 90° / Divo or roll angle	٨
roll angle	15° to 45°	A	Less than 90° / Dive or roll angle 15° to 45°	A
Re-inflation behaviour	Spontaneous re-inflation	А	Spontaneous re-inflation	А
Total change of course	Less than 360°	А	Less than 360°	А
Collapse on the opposite side occurs	No (or only a small number of collapsed cells with a spontaneous reinflation)	A	No (or only a small number of collapsed cells with a spontaneous reinflation)	A
Twist occurs	No	А	No	А
Cascade occurs	No	А	No	А
Folding lines used	No		No	
15. Directional control with a maintained asymmetric collapse	Α			
Able to keep course	Yes	А	Yes	А
180° turn away from the collapsed side possible in 10 s	Yes	Α	Yes	A
Amount of control range between turn and stall or spin	More than 50 % of the	А	More than 50 % of the symmetric	А
	symmetric control travel		control travel	
16. Trim speed spin tendency	Α			
Spin occurs	No	Α	No	A
17. Low speed spin tendency	Α	_		
Spin occurs	No	А	No	А
18. Recovery from a developed spin	A			•
Spin rotation angle after release	Stops spinning in less than 90°	A	Stops spinning in less than 90°	A
Cascade occurs 19. B-line stall	No	A	No	A
Change of course before release	Changing course less than 45°	А	Changing course less than 45°	А
Behaviour before release	Remains stable with straight	A	Remains stable with straight span	A
	span	~	Remains stable with straight span	~
Recovery	Spontaneous in less than 3 s	А	Spontaneous in less than 3 s	А
Dive forward angle on exit	Dive forward 0° to 30°	А	Dive forward 0° to 30°	А
Cascade occurs	No	А	No	А
20. Big ears	Α			
Entry procedure	Dedicated controls	А	Dedicated controls	А
Behaviour during big ears	Stable flight	А	Stable flight	А
Recovery	Spontaneous in less than 3 s	А	Spontaneous in less than 3 s	А
Dive forward angle on exit	Dive forward 0° to 30°	A	Dive forward 0° to 30°	А
21. Big ears in accelerated flight	A			
Entry procedure	Dedicated controls	A	Dedicated controls	A
Behaviour during big ears	Stable flight	A	Stable flight	A
Recovery Disc forward and a society	Spontaneous in less than 3 s	A	Spontaneous in less than 3 s	A
Dive forward angle on exit	Dive forward 0° to 30°	A	Dive forward 0° to 30°	A

Stable flight	A	Stable flight	A
A			
Yes	А	Yes	А
No	А	No	А
0			
not available	0	not available	0
not available	0	not available	0
not available	0	not available	0
)   	A Yes No D not available not available	A Yes A No A D not available 0 not available 0	A       Yes       No       A       No       A       No       D       not available       0       not available       0       not available

24. Comments of test pilot

Comments