

Report ID: 365954
Date of sample receipt: 27/02/24
Date of issue: 16/05/24

SAVAS PLASTIK SAN. VE. TIC. A.S.
BEYSAN SAN. SIT. BIRLIK CAD. NO: 18-BEY.
34524 ISTANBUL
TR - TURKEY

Sample name: Chair Shell-O

SAMPLE N° 365954

Overall dimensions: 690 x 690 x 810 (h) mm

List of test reports:

1. Outdoor furniture - General safety requirements EN 581-1:2017
2. Seat and back static load test and seat front edge static load test EN 1728:2012+AC:2013
3. Seat and back fatigue test EN 1728:2012+AC:2013
4. Seat impact test EN 1728:2012+AC:2013
5. Stability - EN 1022:2005
6. Stability EN 1022:2023, clause 7.3



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The managing director
Dr. Franco Bulian
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SAMPLE N° 365954

Date of issue: 16/05/24
Sample weight: Not determined
Sample name: Chair Shell-O



Side view



Rear view



Bottom view

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TEST REPORT

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Revision: 0
Date of sample receipt: 27/02/24
Date of test: 28/02/24
Date of issue: 16/05/24



Sample name: Chair Shell-O

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Outdoor furniture - General safety requirements EN 581-1:2017

5.1 General:

Requirement	Observed	Remarks
Edges of seat, back rest and arm rests rounded and chamfered	Yes	None
All other parts: free from burrs, sharp edges and sharp points.	Yes	None
Movable and adjustable parts designed so that injuries and inadvertent operation are avoided	Not present	None
Any load bearing part of furniture not come loose unintentionally	Yes	None
Lubricated parts are protected	Not present	None

5.2 Tubular components:

Requirement	Observed	Remarks
Absence of tubular components with diameter > 7 mm and < 12 mm with a depth > 10 mm.	Yes	None
Tubulars in contact with the floor are closed. Holes in them are allowed as long as they are < 7 mm or > 12 mm	Yes	None

5.3 Shear and squeeze points:

Requirement	Observed	Remarks
Shear and squeeze points that are created only during adjusting and folding away are acceptable if the user has the control of his/her movements.	Not applicable	None
Absence of shear and squeeze points, created by parts operated by powered mechanism.	Not present	None
Absence of shear and squeeze points, created by loads applied during normal use.	Yes	None

Conformity to requirements of clause 5 of standard EN 581-1:2017:	YES
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TEST REPORT

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Revision: 0
Date of sample receipt: 27/02/24
Date of test: 04/03/24
Date of issue: 16/05/24



Sample name: Chair Shell-O

SAVAS PLASTIK SAN. VE. TIC. A.S.
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Seat and back static load test and seat front edge static load test EN 1728:2012+AC:2013

Test performed according to the test method EN 1728:2012+AC:2013, clauses 6.4 and 6.5 and in accordance to the test parameters of EN 581-2:2015+AC:2016, table 2

Seat and back static load test, clause 6.4, EN 1728:2012+AC:2013

Risultati della prova:

Seat load N	Back force N	Number of cycles	Remarks
2.000	500	1	Under load overbalancing that does not allow the application of the test loads.
2.000	500	/	/

Note:

According to EN 1728:2012+AC:2013, back force has been reduced from 560 N to 500 N to avoid tipping. The minimum back force required is 500 N.

Seat front edge static load, clause 6.5, EN 1728:2012+AC:2013

Seat load N	Number of cycles	Remarks
1.300	/	/

The test results do not comply with the requirements in clause 7.2.2 of standard EN 581-2:2015+AC:2016

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Date of test: 18/03/24
Date of issue: 16/05/24



Sample name: Chair Shell-O

SAVAS PLASTIK SAN. VE. TIC. A.S.
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Seat and back fatigue test EN 1728:2012+AC:2013

Test performed according to the test method EN 1728:2012+AC:2013, clause 6.17 and in accordance to the test parameters of EN 581-2:2015+AC:2016, table 2

Test results:

Seat load N	Back force N	Number of cycles	Remarks
1.100	300	50.000	No defects

Note:

In order to avoid tipping, the applied back force according to clause 6.2.1 of EN 1728:2012+AC:2013, has been reduced from 333 N to 300 N and the seat force has been increased from 1000 N to 1100 N. The minimum back force required is 300 N.

The test results comply with the requirements in clause 7.2.2 of standard EN 581-2:2015+AC:2016 contract level

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Seat impact test EN 1728:2012+AC:2013

Test performed according to the test method EN 1728:2012+AC:2013, clause 6.24 and in accordance to the test parameters of EN 581-2:2015+AC:2016, table 2

Test results:

Mass of impactor kg	Height of drop mm	Impact point	Number of drops	Remarks
25	240	seat loading point (A)	10	No defects
25	240	on the longitudinal axis, 100 mm from the front seat edge	10	No defects

The test results comply with the requirements in clause 7.2.2 of standard EN 581-2:2015+AC:2016 contract level

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TEST REPORT

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Sample name: Chair Shell-O

SAVAS PLASTIK SAN. VE. TIC. A.S.
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Stability - EN 1022:2005

Type of chair: fixed geometry

Minimum horizontal force for rearwards overturning of fixed back chair: 158 N

Forwards overturning

Horizontal force : 20 N does not overturn

Rearwards overturning

Fixed back chair

Horizontal force : 158 N does not overturn

Tilting chair in the rearmost position

Loading discs on the seat : /

Sideways overturning for chairs with arms

Horizontal force : /

Sideways overturning for chairs without arms

Horizontal force : 20 N does not overturn

Forwards overturning for chairs with footrest

Horizontal force : /

The test result complies with the requirements of EN 1022:2005

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Stability EN 1022:2023, clause 7.3

Type of chair: fixed geometry

Positioning of chair components: as specified in Table 2 of EN 1022:2023

Loads and masses according to table B1 of EN 1022:2023, annex B

Forwards overturning

Forwards overturning, clause 7.3.1 : 20 N does not overturn
Forwards overturning for seating with foot rest, clause 7.3.2 : /
Corner stability, clause 7.3.3 : does not overturn

Sideways overturning

Sideways overturning, all seating without arm rests, clause 7.3.4 : 20 N does not overturn
Seating with arm rests, clause 7.3.5.2 : /
Seating with raised side edges, clause 7.3.5.3 : /

Rearwards overturning

Rearwards overturning all seating with back rests, clause 7.3.6
Minimum force required: 158 N : 158 N does not overturn
Tilting seating, clause 7.4.2 : /
Reclining seating with leg rest, clause 7.4.3 : /
Reclining seating without leg rest, clause 7.4.4 : /
Rearwards stability test for rocking chairs, clause 7.4.5 : /

The test results comply with the requirements in clause 7.2 of standard EN 1022:2023

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