

TEST REPORT

Test Report No.	TREN120230009
Revision No.	00

CUSTOMER DETAILS			
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TEST REPORT			
Date of Report:	11.02.2023		
Samples Received:	09.02.2023	Date(s) of work carried out:	09.02.2023
Product Code:	AFS550102D & AFS550102		
Product Description:	KSTRONG MICRON RETRACTABLE LANYARD WITH ALUMINUM SCAFFOLD HOOK AND TWIN SRL CONNECTOR AFC609101		
Product Serial or UID No.	NA	Total Quantity:	07 Nos.

WORK REQUESTED

Samples of AFS550102D & AFS550102, described as MICRON RETRACTABLE LANYARD, were received by PN International on the 09.02.2023, for testing in accordance with EN360:2002 & VG11 sheet PPE-R/11.060.

CONCLUSIONS

SAMPLE REFERENCE	STANDARD	CLAUSE/PROPERTY	PASS/FAIL
AFS550102D & AFS550102	EN 360:2002	Clause 4.4 - Static Strength Test	Pass
		Clause 4.5 - Dynamic Performance	Pass
		Clause 4.7 - Corrosion Test	Pass
	VG11 sheet PPE-R/11.060	Clause 4.4 - Dynamic Performance	Pass
		Clause 4.5 - Dynamic Strength	Pass
		Clause 4.6 - Static Strength Test	Pass

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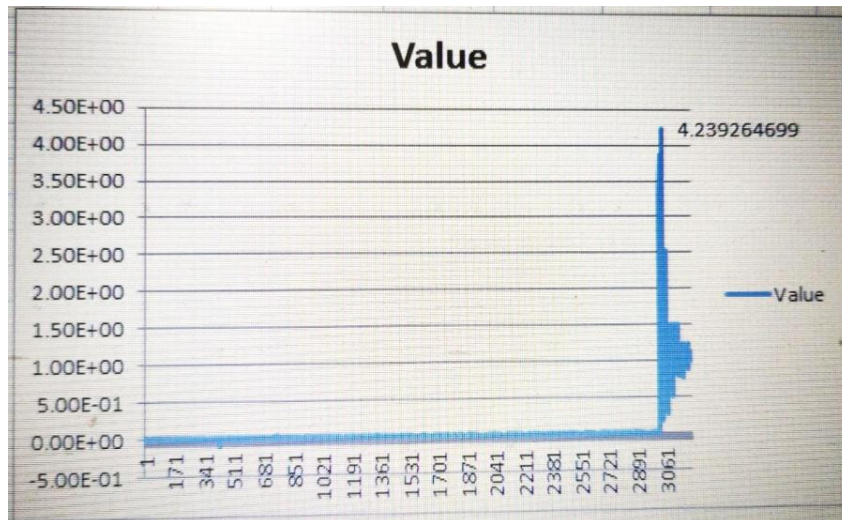
TEST RESULTS

Samples were tested as received, and were not subject to any pre-conditioning processes other than those stated in individual test clauses.

Table 1 — Testing of AFS550102D described as MICRON RETRACTABLE LANYARD in accordance with EN360:2002.

CLAUSE/TEST	REQUIREMENTS	TEST RESULTS	PASS/FAIL
Clause 4.4 Clause 5.2 Static Strength Test	Apply 15 kN load for synthetic lanyard and 12 kN for wire lanyard and this should be sustained for 03 min.	System Sustained for 03 Min at 15 kN for three Minute.	Pass
Clause 4.5 – Dynamic Performance Clause -5.3.2	Perform Dynamic Test with rigid test mass of 140 Kg and Fax should not be exceed 06 kN and arrest distance H should not greater than 2 meters.	Observed force after dynamic test is 4.23 kN and Fall arrest distance is 150 cm.	Pass
Clause 4.7 Clause 5.5 Corrosion Test	The corrosion test shall be Conducted as described in 5.13 of EN364:1992 for minimum period of 24 hr.	Test carried out as per standard for 24 hr and observed no red rust or corrosion.	Pass

FORCE GRAPH



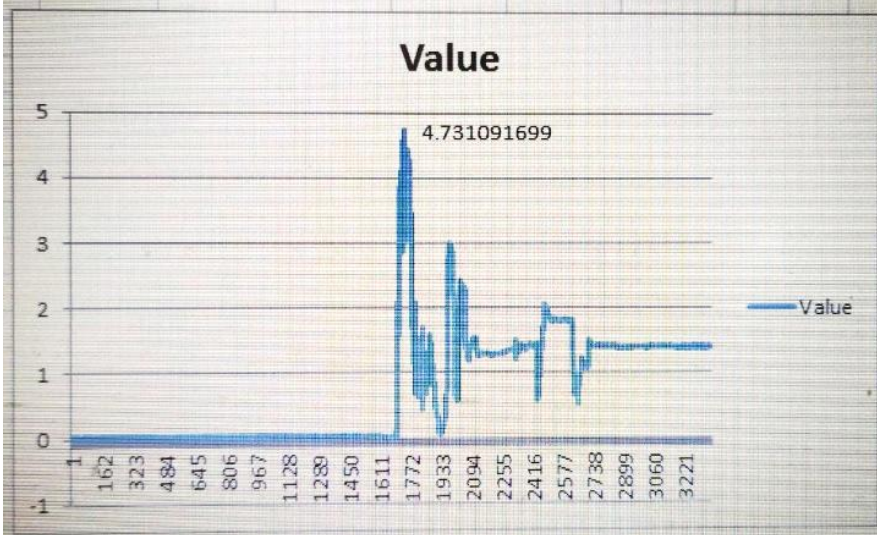
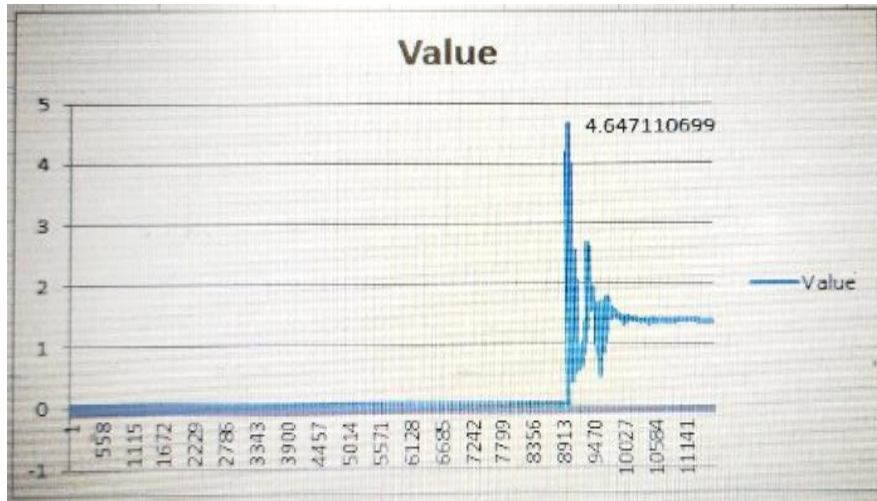
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Table 2 — Testing of AFS550102D described as MICRON RETRACTABLE LANYARD in accordance with VG11 sheet PPE-R/11.060.

CLAUSE/TEST	REQUIREMENTS	TEST RESULTS	PASS/FAIL
Clause 4.4 Dynamic Performance	Perform two drop tests with rigid test mass of 100 Kg in a horizontal arrangement when loaded over an edge with an edge radius of 0.5 mm and drop of height of 1.5 m from the edge: perpendicularly and 1.5 m lateral offset to the edge -The breaking force shall not be greater than 6kN -The retractable type fall arrester shall hold the test mass	Perpendicularly to the edge: Observed force after dynamic test is 4.64 kN and Fall arrest distance is 190 cm. 1.5 m Lateral offset to the edge: Observed force after dynamic test is 4.73 kN and Fall arrest distance is 201 cm.	Pass
Clause 4.5 – Dynamic Strength	Perform two drop tests with rigid test mass of 100 Kg in a horizontal arrangement when loaded over an edge with an edge radius of 0.5 mm and drop of height of 2 m from the edge: perpendicularly and lateral offset 1.5 mtr. to the edge -The retractable type fall arrester shall hold the test mass	Perpendicularly to the edge: The mass of 100kg is held & the fall indicator has occurred 1.5 m Lateral offset to the edge: The mass of 100kg is held & the fall indicator has occurred	Pass
Clause 4.6 – Static Strength	After the dynamic strength test, with the same test arrangement, the force applied to the lanyard is increased to 3 kN for wire ropes and 4.5 kN for textile lanyards and is maintained for 3 min. The lanyard shall withstand the force	After dynamic strength test performed perpendicularly to the edge: 4.5 kN force applied to the lanyard and No breaking observed After dynamic strength test performed lateral offset to the edge: 4.5 kN force applied to the lanyard and No breaking observed	Pass

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FORCE GRAPH



PRODUCT IMAGE



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ADDITIONAL INFORMATION / NOTES

Table 3 — Additional uncertainty of measurement information (see note 1)

CLAUSE	TEST / COMPONENT	UOM (SEE NOTE 1)
EN360:2002-Clause 4.4 Static Strength Test VG11 sheet- Clause 4.6 – Static Strength	Applied force	± 50 N
EN360:2002-Clause 4.5 Dynamic Performance VG11 sheet- Clause 4.4 Dynamic Performance	Dynamic force recording	± 4.4 %
	Length measurement	± 22 mm
EN360:2002-Clause 4.7 Corrosion Test	Fall-out rate of collected solution	± 2.25 ml (± 0.04 ml/hour for 24 hours)
	pH value of collected solution	± 0.1

NOTES:

- 'UOM' denotes estimated Uncertainty of Measurement for stated test results. This uncertainty value is based on a standard uncertainty multiplied by a coverage factor k=2, which provided for a confidence level of approximately 95%

REPORT APPROVED BY: Akash Singh

DESIGNATION: Production Lead (Testing Laboratory)

*****END OF REPORT*****

