

TEST REPORT

COMPANY NAME:

ADDRESS

EMAIL:

ATTN:

TEL:

FAX:

MECDEX

LIBERMANN International
P.O Box-1166 Harrar, Wazirabad
Road, Sialkot-51310, Pakistan

ali.anwar@libermann.com

Ali Anwar

+92 52 3252201-up to 5

+92 52 3252208

Report No.:

TRF No.:

Date In:

Date Out:

No. Of Working Days:

Pretest for Buyer

Temperature & Humidity:

FTL-1353/020923

FTL-1353/020923

01-09-2023

04-09-2023

04 Days

Not Listed

23°C ± 2 53 ± 5%

Sample Description:	Rope Grip Gloves
Color(s):	Black
Lab Id Color(S):	Black
P.O. No(s):	Not Listed
Article No(s):	OD-825
Season:	Not Listed
Quantity Submitted:	10 Pairs
Country of Origin:	Pakistan
Country of Destination:	Europe
Dept:	Not Listed
End Use:	Not Listed

Submitted Fiber Content:	Not Listed
Multi Layers	Goatskin Leather
Test Requested:	EN 388:2016+A1:2018, EN ISO 21420:2020
Submitted Care Instruction:	Not Listed
Suggested Care Instruction:	Not Listed

PHOTO OF THE SUBMITTED SAMPLE



EN 388:2016+A1 2018



3 X 3 2 C

FIRST TESTING LAB
AUTHORIZED SIGNATORIES


Test Conducted by


Test Checked by


Approved By

SUMMARY OF TEST RESULTS

TEST PROPERTY	Standard Method	Results	Comments
ABRASION RESISTANCE	EN 388:2016+A1:2018	Level-3	
BLADE CUT RESISTANCE	EN 388:2016+A1:2018	Level-X	
TEAR RESISTANCE	EN 388:2016+A1:2018	Level-3	
PUNCTURE RESISTANCE	EN 388:2016+A1:2018	Level-2	
SIZING	EN ISO 21420:20020	Pass	
DEXTERITY	EN ISO 21420:20020	Level-2	
ANSI CUT RESISTANCE	ANSI/ISEA105-2016 (ASTM F2992)	Level-A3	
TDM CUT RESISTANCE	EN 388:2016+A1:2018	Level-C	

Test Results:

Parameter	Test Requirement EN 388:2016+A1:2018		Test Results	Remarks														
6.1 Abrasion Resistance (Cycles) Tested – Palm Portion Used abradant: Klingspor PL 31 B	<table><tr><th>Level of Performance</th><th>Number of Cycles</th></tr><tr><td>1</td><td>100</td></tr><tr><td>2</td><td>500</td></tr><tr><td>3</td><td>2000</td></tr><tr><td>4</td><td>8000</td></tr></table>		Level of Performance	Number of Cycles	1	100	2	500	3	2000	4	8000	>2000 & <8000 Cycles	Complies with Level - 3				
Level of Performance	Number of Cycles																	
1	100																	
2	500																	
3	2000																	
4	8000																	
6.2 Blade Cut Resistance (i) Tested – Palm <i>Blade Thickness – 0.3 mm</i> <i>Angle of Blade – 24°</i>	<table><tr><th>Level of Performance</th><th>Index (i)</th></tr><tr><td>1</td><td>> 1.2</td></tr><tr><td>2</td><td>≥ 2.5</td></tr><tr><td>3</td><td>≥ 5.0</td></tr><tr><td>4</td><td>≥ 10.0</td></tr><tr><td>5</td><td>≥ 20.0</td></tr></table>		Level of Performance	Index (i)	1	> 1.2	2	≥ 2.5	3	≥ 5.0	4	≥ 10.0	5	≥ 20.0	-	Level-X		
Level of Performance	Index (i)																	
1	> 1.2																	
2	≥ 2.5																	
3	≥ 5.0																	
4	≥ 10.0																	
5	≥ 20.0																	
6.3 TDM Cut Resistance <i>EN ISO 13997: 2016</i> Tested – Palm <i>Type of Blade (Straight)</i>	<table><tr><th>Level of Performance</th><th>Cut Load N</th></tr><tr><td>A</td><td>> 2 Newtons</td></tr><tr><td>B</td><td>≥ 5 Newtons</td></tr><tr><td>C</td><td>≥ 10 Newtons</td></tr><tr><td>D</td><td>≥ 15 Newtons</td></tr><tr><td>E</td><td>≥ 22 Newtons</td></tr><tr><td>F</td><td>≥ 30 Newtons</td></tr></table>		Level of Performance	Cut Load N	A	> 2 Newtons	B	≥ 5 Newtons	C	≥ 10 Newtons	D	≥ 15 Newtons	E	≥ 22 Newtons	F	≥ 30 Newtons	>10.0 & <15.0 Newtons	Level-C
Level of Performance	Cut Load N																	
A	> 2 Newtons																	
B	≥ 5 Newtons																	
C	≥ 10 Newtons																	
D	≥ 15 Newtons																	
E	≥ 22 Newtons																	
F	≥ 30 Newtons																	
6.4 Tear Resistance (Newton) Tested – All Layers	<table><tr><th>Level of Performance</th><th>Strength (N)</th></tr><tr><td>1</td><td>10</td></tr><tr><td>2</td><td>25</td></tr><tr><td>3</td><td>50</td></tr><tr><td>4</td><td>75</td></tr></table>		Level of Performance	Strength (N)	1	10	2	25	3	50	4	75	> 50 & < 75 Newton	Level-3				
Level of Performance	Strength (N)																	
1	10																	
2	25																	
3	50																	
4	75																	
6.5 Puncture Resistance (Newton) Tested – Palm All Layers Together	<table><tr><th>Level of Performance</th><th>Strength (N)</th></tr><tr><td>1</td><td>20</td></tr><tr><td>2</td><td>60</td></tr><tr><td>3</td><td>100</td></tr><tr><td>4</td><td>150</td></tr></table>		Level of Performance	Strength (N)	1	20	2	60	3	100	4	150	>20 & <60 Newton	Level-2				
Level of Performance	Strength (N)																	
1	20																	
2	60																	
3	100																	
4	150																	

Test Results:

Parameter	Test Requirement EN ISO 21420:2020		Test Results	Remarks												
5.1 Sizing	Size		Lab Analysis	PASS												
	Submitted Size: Small, Medium, Large, X-Large, XX-Large, XXX-Large		➤ Hand Length: All gloves meet the requirements of standard method. ➤ Circumference: All gloves meet the requirements of standard method.													
5.2 Dexterity Pin sizes in millimeters (mm)	<table><tr><th>Level of Performance</th><th>Diameter of Pins (mm)</th></tr><tr><td>1</td><td>11</td></tr><tr><td>2</td><td>9.5</td></tr><tr><td>3</td><td>8</td></tr><tr><td>4</td><td>6.5</td></tr><tr><td>5</td><td>5</td></tr></table>		Level of Performance	Diameter of Pins (mm)	1	11	2	9.5	3	8	4	6.5	5	5	Level-2	Pass
Level of Performance	Diameter of Pins (mm)															
1	11															
2	9.5															
3	8															
4	6.5															
5	5															

The above-specified results are valid for only this glove model.

Test Results

Parameter	Test Requirement ANSI/ISEA 105-2016		Test Results	Remarks																				
6.3 TDM Cut Resistance <i>ASTM F2992-15</i> <i>Tested</i> – Palm <i>Type of Blade (Straight)</i>	<table><tr><th>Level of Performance</th><th>Cut Load N</th></tr><tr><td>A1</td><td>> 200 Grams</td></tr><tr><td>A2</td><td>≥ 500 Grams</td></tr><tr><td>A3</td><td>≥ 1000Grams</td></tr><tr><td>A4</td><td>≥ 1500 Grams</td></tr><tr><td>A5</td><td>≥ 2200 Grams</td></tr><tr><td>A6</td><td>≥ 3000 Grams</td></tr><tr><td>A7</td><td>≥ 4000 Grams</td></tr><tr><td>A8</td><td>≥ 5000 Grams</td></tr><tr><td>A9</td><td>≥ 6000 Grams</td></tr></table>	Level of Performance	Cut Load N	A1	> 200 Grams	A2	≥ 500 Grams	A3	≥ 1000Grams	A4	≥ 1500 Grams	A5	≥ 2200 Grams	A6	≥ 3000 Grams	A7	≥ 4000 Grams	A8	≥ 5000 Grams	A9	≥ 6000 Grams		> 1000 & < 1500 Grams	Level-A3
Level of Performance	Cut Load N																							
A1	> 200 Grams																							
A2	≥ 500 Grams																							
A3	≥ 1000Grams																							
A4	≥ 1500 Grams																							
A5	≥ 2200 Grams																							
A6	≥ 3000 Grams																							
A7	≥ 4000 Grams																							
A8	≥ 5000 Grams																							
A9	≥ 6000 Grams																							

The specified performance levels are valid for only the palm area of this glove.

“End of Report”