

TEST REPORT

COMPANY NAME: MECDEX (LIBERMANN INTERNATIONAL)
ADDRESS: HARRAR, WAZIRABAD ROAD, SIALKOT, PAKISTAN
EMAIL: ali.anwar@nizamsons.com
ATTN: Ali Anwar
TEL: +92 52 3252201-2
FAX: +92 52 3252208

Report No.: FTL-213/081017
TRF No.: FTL-213/081017
Date In: 8th Oct 2017
Date Out: 12th Oct 2017
No. Of Working Days: 04 Days
Page: 1 of 3
Pretest for Buyer: Not Listed

Sample Description:	Synthetic Leather Gloves
Color(s):	Grey/Hi Vis Yellow/Orange
GSM / Thickness:	0.8 mm
Production Gate Pass (PGP):	Not Listed
Article No(s):	FS-821
Reference:	Not Listed
Quantity Submitted:	06 Pairs
Country of Destination:	Europe
Customer:	Not Listed
End Use:	Gloves
Submitted Fiber Content:	Not Listed
Test Requested:	EN: 388, EN: 420, ANSI/ISEA 105-11
Submitted Care Instruction:	Not Listed

PHOTO OF THE SUBMITTED SAMPLE



FIRST TESTING LAB AUTHORIZED SIGNATORIES



Test Conducted by

Please Contact:
 For any Technical Issues: Mr. Rehan Qamar
 Tel: +92 52 3252201 – 05
 Fax: +92 52 3252208
 Email: lab@nizamsons.com , lab@libermann.com



Test Checked by



Approved by

SUMMARY OF TEST RESULTS

TEST PROPERTY	Standard Method	Results	Comments
ABRASION RESISTANCE	BS: EN: 388	Level-2	
BLADE CUT RESISTANCE	BS: EN: 388	Level-1	
TEAR RESISTANCE	BS: EN: 388	Level-3	
PUNCTURE RESISTANCE	BS: EN: 388	Level-2	
DEXTERITY	BS: EN: 420	Level-5	
BLADE CUT RESISTANCE	ANSI/ISEA 105-11	Level-1	
PUNCTURE RESISTANCE	ANSI/ISEA 105-11	Level-3	
ABRASION RESISTANCE	ANSI/ISEA 105-11	Level-3	

Parameter	According to EN:388:2016	Test Requirement	Test Results	Remarks												
Abrasion Resistance (Cycles) Tested – Palm Portion Used abrasant: Klingspor PL 31 B	Clause 6.1	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Number of Cycles</th> </tr> </thead> <tbody> <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> </tbody> </table>	Level of Performance	Number of Cycles	1	100	2	500	3	2000	4	8000	1781 Cycles	Compiles with Level - 2		
Level of Performance	Number of Cycles															
1	100															
2	500															
3	2000															
4	8000															
Blade Cut Resistance (<i>i</i>) <i>Tested</i> – All Layers Together. <i>Blade Thickness</i> – 0.3 mm <i>Angle of Blade</i> – 24°	Clause 6.2	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Index (<i>i</i>)</th> </tr> </thead> <tbody> <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> </tbody> </table>	Level of Performance	Index (<i>i</i>)	1	1.2	2	2.5	3	5.0	4	10.0	5	20.0	Average 1 – 2.2 Average 2 – 2.3	Level-1
Level of Performance	Index (<i>i</i>)															
1	1.2															
2	2.5															
3	5.0															
4	10.0															
5	20.0															
Tear Resistance (Newton) Tested – All Layers Together.	Clause 6.4	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Strength (N)</th> </tr> </thead> <tbody> <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> </tbody> </table>	Level of Performance	Strength (N)	1	10	2	25	3	50	4	75	56.19 Newton	Level-3		
Level of Performance	Strength (N)															
1	10															
2	25															
3	50															
4	75															
Puncture Resistance (Newton) Tested – All Layers Together	Clause 6.5	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Strength (N)</th> </tr> </thead> <tbody> <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> </tbody> </table>	Level of Performance	Strength (N)	1	20	2	60	3	100	4	150	60.09 Newton	Level-2		
Level of Performance	Strength (N)															
1	20															
2	60															
3	100															
4	150															

Parameter	According to EN:420:2003	Test Requirement	Test Results	Remarks												
		Size	Lab Analysis													
Dexterity in millimeters (mm)	Clause 5.2	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Diameter of Pins (mm)</th> </tr> </thead> <tbody> <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> </tbody> </table>	Level of Performance	Diameter of Pins (mm)	1	11	2	9.5	3	8	4	6.5	5	5	Pin – 5 mm	Level-5
Level of Performance	Diameter of Pins (mm)															
1	11															
2	9.5															
3	8															
4	6.5															
5	5															

Parameter	According to ANSI/ISEA 105-11	Test Requirement	Test Results	Remarks																				
Blade Cut Resistance	Clause 1	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Strength (grams)</th> </tr> </thead> <tbody> <tr> <td>0</td> <td>< 200</td> </tr> <tr> <td>1</td> <td>≥ 200</td> </tr> <tr> <td>2</td> <td>≥ 500</td> </tr> <tr> <td>3</td> <td>≥ 1000</td> </tr> <tr> <td>4</td> <td>≥ 1500</td> </tr> <tr> <td>5</td> <td>≥ 3500</td> </tr> </tbody> </table>	Level of Performance	Strength (grams)	0	< 200	1	≥ 200	2	≥ 500	3	≥ 1000	4	≥ 1500	5	≥ 3500	> 200 grams	Level-1						
Level of Performance	Strength (grams)																							
0	< 200																							
1	≥ 200																							
2	≥ 500																							
3	≥ 1000																							
4	≥ 1500																							
5	≥ 3500																							
Puncture Resistance (Newton) Tested – All Layers Together	Clause 2	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Strength (Newton)</th> </tr> </thead> <tbody> <tr> <td>0</td> <td>< 10</td> </tr> <tr> <td>1</td> <td>≥ 10</td> </tr> <tr> <td>2</td> <td>≥ 20</td> </tr> <tr> <td>3</td> <td>≥ 60</td> </tr> <tr> <td>4</td> <td>≥ 100</td> </tr> <tr> <td>5</td> <td>≥ 150</td> </tr> </tbody> </table>	Level of Performance	Strength (Newton)	0	< 10	1	≥ 10	2	≥ 20	3	≥ 60	4	≥ 100	5	≥ 150	60.09 Newton	Level-3						
Level of Performance	Strength (Newton)																							
0	< 10																							
1	≥ 10																							
2	≥ 20																							
3	≥ 60																							
4	≥ 100																							
5	≥ 150																							
Abrasion Resistance (Cycles) Tested – Material of Palm Used Abrasive wheel: H-18	Clause 3	<table border="1"> <thead> <tr> <th>Level of Performance</th> <th>Number of Cycles</th> </tr> </thead> <tbody> <tr> <td colspan="2">With 500 grams Weight</td> </tr> <tr> <td>0</td> <td>< 100</td> </tr> <tr> <td>1</td> <td>≥ 100</td> </tr> <tr> <td>2</td> <td>≥ 500</td> </tr> <tr> <td>3</td> <td>≥ 1000</td> </tr> <tr> <td colspan="2">With 1000 grams Weight</td> </tr> <tr> <td>4</td> <td>≥ 3000</td> </tr> <tr> <td>5</td> <td>≥ 10000</td> </tr> <tr> <td>6</td> <td>≥ 20000</td> </tr> </tbody> </table>	Level of Performance	Number of Cycles	With 500 grams Weight		0	< 100	1	≥ 100	2	≥ 500	3	≥ 1000	With 1000 grams Weight		4	≥ 3000	5	≥ 10000	6	≥ 20000	1923 Cycles	Compiles with Level - 3
Level of Performance	Number of Cycles																							
With 500 grams Weight																								
0	< 100																							
1	≥ 100																							
2	≥ 500																							
3	≥ 1000																							
With 1000 grams Weight																								
4	≥ 3000																							
5	≥ 10000																							
6	≥ 20000																							

The specified performance levels only valid for the palm area.

“End of Report”