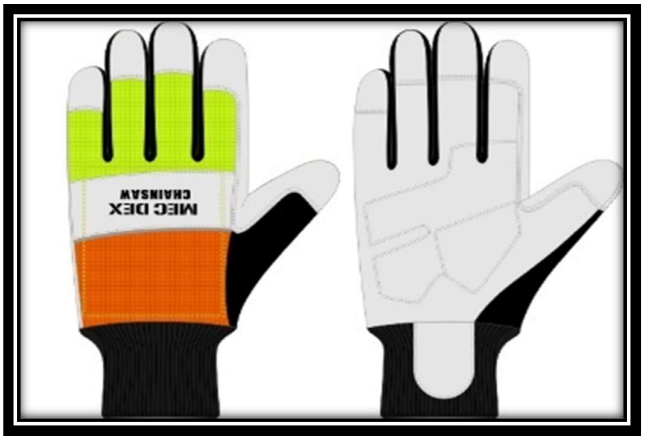
FIRST TESTING LAB

TEST REPORT

COMPANY NAME:	MECDEX (LIBERMANN INTERNATIONAL)	**Report No.:**	FTL-231/081017
ADDRESS	HARRAR, WAZIRABAD ROAD, SIALKOT, PAKISTAN	**TRF No.:**	FTL-231/081017
		Date In:	8th Oct 2017
		Date Out:	12th Oct 2017
EMAIL:	ali.anwar@libermann.com	**No. Of Working Days:**	04 Days
ATTN:	Ali Anwar	**Page:**	1 of 4
TEL:	+92 52 3252201-2	**Pretest for Buyer**	Not Listed
FAX:	+92 52 3252208		

Sample Description:	Chainsaw Gloves
Color(s):	White/Hi-Vis Orange/Hi Vis Yellow
GSM / Thickness:	-
Production Gate Pass (PGP):	Not Listed
Article No(s):	CS-811 (Cutter)
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 | **Test Checked by** | **Approved 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

SUMMARY OF TEST RESULTS

TEST PROPERTY	Standard Method	Results	Comments
ABRASION RESISTANCE	BS: EN: 388	Level-3	
BLADE CUT RESISTANCE	BS: EN: 388	Level-1	
TEAR RESISTANCE	BS: EN: 388	Level-2	
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 abradant:** Klingspor PL 31 B	Clause 6.1	Level of Performance / Number of Cycles 1 – 100 2 – 500 3 – 2000 4 – 8000	2200 Cycles	Compiles with Level -3
Blade Cut Resistance (*i*) ***Tested*** – All Layers Together. *Blade Thickness – 0.3 mm* *Angle of Blade – 24°*	Clause 6.2	Level of Performance / Index (*i*) 1 – 1.2 2 – 2.5 3 – 5.0 4 – 10.0 5 – 20.0	Average 1 – 1.8 Average 2 – 1.9	Level-1
Tear Resistance (Newton) **Tested** – All Layers Together.	Clause 6.4	Level of Performance / Strength (N) 1 – 10 2 – 25 3 – 50 4 – 75	45.50 Newton	Level-2
Puncture Resistance (Newton) **Tested** – All Layers Together	Clause 6.5	Level of Performance / Strength (N) 1 – 20 2 – 60 3 – 100 4 – 150	69.23 Newton	Level-2

The specified performance levels only valid for the palm area.

<table>
<tr><th>Parameter</th><th>According to EN:420:2003</th><th>Test Requirement</th><th>Test Results</th><th>Remarks</th></tr>
<tr><td>Sizing in millimeters (mm)</td><td>Clause 5.1</td><td>Size
Submitted Size: Small, Medium, Large, X-Large, XX-Large, XXX-Large</td><td>Lab Analysis
<u>Small</u>
Length of Glove-230
Hand Length- 175
Circumference- 190 Size 7
<u>Medium</u>
Length of Glove-240
Hand Length- 185
Circumference- 215 Size 8
<u>Large</u>
Length of Glove-250
Hand Length- 200
Circumference- 225 Size 9
<u>X-Large</u>
Length of Glove-260
Hand Length- 210
Circumference- 235 Size 10
<u>XX-Large</u>
Length of Glove-270
Hand Length- 215
Circumference- 245 Size 11
<u>XXX-Large</u>
Length of Glove-280
Hand Length- 225
Circumference- 255 Size 11</td><td>PASS</td></tr>
<tr><td>Dexterity in millimeters (mm)</td><td>Clause 5.2</td><td><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></td><td>Pin – 5 mm</td><td>Level-5</td></tr>
</table>

<table>
<tr><th>Parameter</th><th>According to ANSI/ISEA 105-11</th><th>Test Requirement</th><th>Test Results</th><th>Remarks</th></tr>
<tr><td>Blade Cut Resistance</td><td>Clause 1</td><td><table><tr><th>Level of Performance</th><th>Strength (grams)</th></tr><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></table></td><td>> 200 grams</td><td>Level-1</td></tr>
<tr><td>Puncture Resistance (Newton)

Tested – All Layers Together</td><td>Clause 2</td><td><table><tr><th>Level of Performance</th><th>Strength (Newton)</th></tr><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></table></td><td>69.23 Newton</td><td>Level-3</td></tr>
<tr><td>Abrasion Resistance (Cycles)

Tested – Material of Palm

Used Abrasive wheel:
H-18</td><td>Clause 3</td><td><table><tr><th>Level of Performance</th><th>Number of Cycles</th></tr><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></table></td><td>1600 Cycles</td><td>Compiles with Level-3</td></tr>
</table>

The above specified result valid for glove model.

“End of Report”