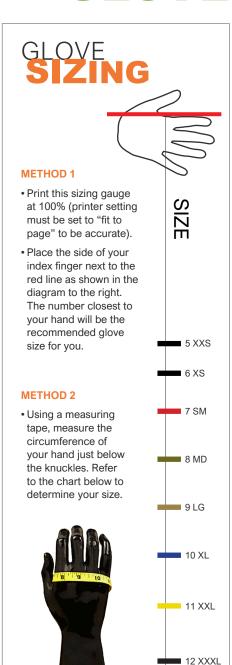
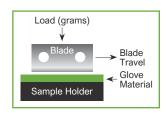
HAND PROTECTION GLOVE STANDARDS



MEASUREMENT	GLOVE SIZE			
5"	XXS			
6"	XS			
7"	SM			
8"	MD			
9"	LG			
10"	XL			
11"	XXL			
12"	XXXL			

Glove Standards: Two standards are in place to quantify the physical properties of hand protection. ANSI/ISEA 105 is a voluntary US standard that specifies test methods and provides performance ranges for many different properties including chemical resistance, cut resistance, puncture resistance and abrasion resistance. CE/EN 388 is a mandatory European standard that dictates test methods and performance ranges for gloves that provide protection against mechanical risks (abrasion, cut, tear and puncture).

Cut Resistance (ANSI/ISEA 105): To determine cut resistance, a test sample is cut by a straight-edge blade, under load, that moves along a straight path. The sample is cut five times, each under three different loads, and the data is used to determine the required load to cut through the test sample at a distance of 2mm (0.8 inches). Test scores are expressed in Levels and in the number of



grams (load). The higher the number of grams, the more cut resistant the material.

ANSI/ISEA CLASSIFICATIONS FOR CUT RESISTANCE

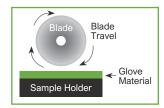
T REVIOUS CEASSII ICATIONS					
LEVEL	WEIGHT (GRAMS)				
0	< 200				
1	200 - 499				
2	500 - 999				
3	1000 - 1499				
4	1500 - 3499				
5	> 3500				

PREVIOUS CLASSIFICATIONS

LEVEL	WEIGHT (GRAMS)				
A1	≥ 200				
A2	≥ 500				
A3	≥ 1000				
A4	≥ 1500				
A5	≥ 2200				
A6	≥ 3000				
A7	≥ 4000				
A8	≥ 5000				
A9	≥ 6000				

NEW CLASSIFICATIONS

Cut Resistance (CE/EN 388 Testing): The machine used to perform the CE/EN 388 cut resistance test is called a Coup Tester. This machine uses a circular blade, under a fixed load, that moves back and forth across the sample until cut-through is achieved. The cut resistance of the test sample compared to the cut resistance of a standard reference material and a cut index is assigned.



	0	1	2	3	4	5
a. Abrasion (cycles)	< 100	100	500	2000	8000	
b. Blade Cut (factors)	< 1.2	1.2	2.5	5.0	10.0	20.0
c. Tear (newtons)	< 10	10	25	50	75	
d. Puncture (newtons)	< 20	20	60	100	150	

CE/EN 388 MARKINGS

abcd

d. Puncture Resistance
C. Tear Resistance
D. Blade Cut Resistance
a. Abrasion Resistance
a. Abrasion Resistance
a. Abrasion (cycles)

DEVIOUS MARKINGS

NEW MARKINGS

Abcdef

f. Impact Protection
e. Cut (TDM Test)
Level 0-4
Level 0-4
Level 0-4
Level 0-4
Level 0-5
a. Abrasion (cycles)
Level 0-5
a. Abrasion (cycles)