## **Diamond Plate Knob Back Anti Fatigue**

In a rigorous environment, exceptional comfort, dimensional stability and durability are the hallmarks of a successful antifatigue mat. Our Diamond Plate products are manufactured from specially formulated proprietary low static formulation vinyl compounds. Diamond Plate mattings are a superior value with puncture resistance that exceeds comparable rubber products by up to 90%. This increased spike resistance helps eliminate premature failure due to exposure to casters, heels, and other sharp objects. These materials are only available through the Rhino Mats and Matting division Ranco Industries.

- Surface shall be permanently fused to a closed cell polymeric sponge base, comprised of polyvinyl chloride, acrylnitrile butadlene rubber and chloroprene.
- Sponge base shall have a skin surface to block moisture and resist most oils and industrial chemicals. Additionally, the bottom of the mat will be sealed with a rubber knobbed back sheet and sealed to top making totally liquid impervious, allowing fluids to flow under the mat.
- Edges of sponge base shall be beveled to within 1.5" of the top surface to effectively taper the edges of th surface to the floor and create a visibly bonded incline around the perimeter of the mat, and seal the edge of the beveled sponge base to the surface.

## **Physical Properties and Specifications**

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Characteristic	Test Method	Reflex Result	
Tensile Strength	ASTM D-412	1000 lbs. / sq. in.	
Elongation	ASTM D-412	300%	
Puncture Resistance	ASTM D-1046(Section 19)	36.5 Pounds	
Taber Abrasion Resistance (Surface)	ASTM D-4060,	1000 Grams, 1000 Revs	
	CS-17 wheel	.1 grams lost	
	H-22 wheel	.22 grams lost	
Flammability	Motor Vehicle Safety Standard		
	No. 302(49CFR 541.302)	Self-Extinguishing (A)	
Surface Hardness (Shore A)	ASTM D-2240	90+/5	
Graves Tear Strength:	ASTM D-1004		
Longitudinal		39.3 Pounds	
Transitional		40.9 Pounds	
Wear Surface Thickness	Calipers	5/32 inches	
Slip Resistance of Composites:			
On Tile Floor	Scales	1.8 Pounds Force	
On Carpeted Surface		3.8 Pounds Force	
Density (Sponge)		7 lbs. / ft. <sup>3</sup>	
25% Compression Resistance (PSI)	ASTM D-1056	5.0 - 9.0	
50% Compression Set (%)	ASTM D-1056	40	
Overall Thickness	Gauge	3/4 inches Heavy Duty	
		1-1/8 inch Super Duty	
Weight	2.2 lbs. sq. ft.	Heavy Duty	
	2.6 lvs. sq. ft.	Super Duty	
Warranty	See Warranty sheet for terms	3 years	

## **Chemical Resistance (Surface)**

Chemical	Ranking	Chemical	Ranking
Butyl Alcohol	Good	Nitric Acid (dilute)	Excellent
Carbon Tetrachloride	Good	Nitric Acid 30%	Excellent
Chromic Acid (dilute)	Great	Potassium Permanganate(dilute)	Good
Gasoline	Great	Sodium Perborate	Good
Hydrogen Peroxide (dilute)	Good	Sodium Hydroxide	Good
Most Acids	Good	Sulfuric Acid (dilute)	Good
Most alkalis	Good	Water	Excellent

