

## Cross-Linked

Polyethylene Foam- XPE

**CODI Mexico** specializes in commercialization and distribution of high-performance cross-linked polyethylene foam. Our products are unique position to offer chemically cross-linked, irradiated, micro-cellular cross linked, and laminate cross-linked polyethylene foam. Ours Brands are the preferred choice for applications that require die cutting, lamination, welding, thermoforming, and others, due to the foam`s superior consistency.

### Product Introduction

Chemical crosslinked polyethylene foam, with low density polyethylene resin and a crosslinking agent and foaming agent through continuous foaming and high temperature, XPE is chemically stable, difficult to decompose, odorless and flexible. Polyethylene foam is closed cell, meaning it consists of cells so tightly packed together that it gives the appearance of one uniform structure. The reality is that the individual cells within polyethylene foam do not physically connect to one another. This cellular formation is like fish caught in a fisherman's net.

### Product Size

- Ratio: 3~40 times
- Width:100~1600MM (can be cut by customers' requirement)
- Thickness: 2~15MM (single layer), thermal compound 4~100MM (multilayer) ·Density:25~330 kg/m3
- Color: grey, black or color customized
- Foam Form Sheet, Roll, and Pad

### Product Features

- Thermal insulation
- Sound insulation
- Waterproof
- Shock absorption
- Thermal forming

## Technical Parameters Chemically Cross-Linked Foam\*

Test Item		5 times	8 times	10 times	15 times	20 times	25 times	30 times	35 times
Density (kg/m <sup>3</sup> )		<b>200±30</b>	<b>125±15</b>	<b>100±10</b>	<b>66.7±8</b>	<b>50±6</b>	<b>40±4</b>	<b>33.3±3</b>	<b>28.6±2</b>
Shore Hardnes (°)		60-70	50-60	45-50	34-45	30-35	25-30	18-25	13-18
Tensile Stenght (Mpa)	TD	≥1.3	≥0.9	≥0.7	≥0.5	≥0.35	≥0.3	≥0.2	≥0.15
	MD	≥1.5	≥1.0	≥0.8	≥0.6	≥0.38	≥0.35	≥2.5	≥0.2
Elongation (%)	TD	≥130	≥125	≥110	≥100	≥80	≥80	≥80	≥70
	MD	≥150	≥125	≥120	≥110	≥90	≥90	≥90	≥80
Tearing Stength (KN/m)	TD	≥9	≥8	≥6	≥4	≥2.5	≥2	≥1.5	≥1.3
	MD	≥9	≥8	≥6	≥4	≥2.5	≥2	≥1.2	≥1.2
Compressed Distortions (%) 23°C±2°C, 22h		≤2	≤3	≤5	≤7	≤8	≤9	≤10	≤11
Dimension Change (%) 70±2°C, 22h	TD	≤-4	≤-4	≤-4	≤-4	≤-6	≤-6	≤-6	≤-6
	MD	≤-6	≤-6	≤-6	≤-6	≤-8	≤-8	≤-8	≤-8
Water Absorbtion (g/cm <sup>2</sup> ) 23°C±2°C, 24 h		≤0.02	≤0.02	≤0.03	≤0.03	≤0.04	≤0.04	≤0.05	≤0.05
Thermal Conductivity (w/m.k)		≤0.092	≤0.082	≤0.072	≤0.062	≤0.053	≤0.047	≤0.041	≤0.038

**TD: Transverse Direction; MD: Machine Direction**

\*Testing done according to ASTM D3575 & ASTM C177 (thermal conductivity) standards. Test methods available upon request. All data is typical and not to be considered specification values. CODI MEXICO cannot predict or control the different conditions under which this information and our products may be applied. Therefore, we do not guarantee the applicability or the suitability of our foam nor the accuracy of this information. There is no warranty either expressed or implied on our products. Buyer assumes all responsibility for loss or damage arising from the use of our products, whether done accordance with direction or not. Statements concerning the possible use of our products are not intended as recommendations to use our products in the infringement of any patent. Users of our products should perform testing to determine their efficiency and suitability prior to use.