



### **GENERAL** DESCRIPTION

Patented heat-expandable material for use as constrained layer damper (cld) or patch constrained layer (pcl) for vibrational noise management solution.

# **PRODUCT** HIGHLIGHTS

- Die-cut polymer sheet
- Attached to substrate via welding, stapling or adhesive
- Up to 250% volumetric expansion
- High damping rate
- Increases local stiffness
- Provides corrosion resistance to body panels

#### **MATERIAL PROPERTIES**

APPEARANCE	Non-Specific Black/Brown				
SPECIFIC GRAVITY	1.3 – 1.4 (prior to Expansion)				
WEIGHT/AREA	Thickness kg/m2		lb/ft2		
	1.0mm (0.040 in) 1.30 – 1.		40	0.28	
	1.5mm (0.060 i	n) 1.95 – 2.	10	0.42	
VOLUME EXPANSION	Range: 100%to 240%				
ADHESION PROPERTIES (Tested on Oiled Cold Roll Steel)	Initial	Salt Spray (250 Hrs)	Heat Aging (250 Hrs @175C)	100% Humidity (250 Hrs @38C)	
	100% Cohesive	100% Cohesive (No Undercut Corrosion)	100% Cohesive	100% Cohesive (No Undercut Corrosion)	

### **APPLICATIONS**

Typical automotive applications

- Wheelhouse
- Plenum
- Oil pan
- Dash panel
- Floor pan

# **STANDARDS**

Automotive Industry Standards passed by AcoustaDamp™:

- Ford WSS-M99P32-D1
- FCA MS-CD-640





DAMPING PROPERTIES / LOSS FACTOR	From 0.18 to 0.35 between 15C and 60C Oberst Test for Composite Loss ( c) per SAE J1637 0.8mm Base Beam / 0.6mm Top Beam / 2.5mm Bond Line (Linear extrapolated results @200Hz)	
DEFLECTION	0.055 inch Cantilever Beam Test (Beam Length of 10.0″ w/100g Weight @23C)	
ASSEMBLY	Passes FMVSS 302	
CHEMICAL RESISTANCE NON EXHAUSTIVE LIST	Salt solution, No. 1 Oil, brake fluid, sulfuric acid, coolant fluid, transmission fluid, washer solvent, power steering fluid.	
SHRINKAGE (BAKED MATERIAL)	~ 0.70%	
FLOW (BAKED MATERIAL)	No flow	
MOISTURE ADSORPTION	< 1.5%	



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