



Scotch-Mount™

4632 Double Coated Foam Tape

Product Data Sheet

Updated : November 1993
Supersedes :

Product Description

A-20 is a firm acrylic pressure sensitive adhesive system. It features high ultimate bond strength, very high temperature and solvent resistance and

excellent shear holding power. Bond strength increases substantially with time.

Physical Properties

Not for specification purposes

Adhesive Type	Acrylic	3M ref : A-20
Foam Core	Acrylic Foam (closed cell)	Foam Density 630 kg/m ³
Thickness (ASTM D-3652) Tape Liner Total	0.75 mm 0.08 mm 0.83 mm	
Release Liner	Green Plaid Paper	
Tape Colour	White	
Shelf Life	12 months from date of despatch by 3M when stored in the original carton at 21°C (70°F) & 50 % Relative Humidity	

Performance

Characteristics

Not for specification purposes

Peel Adhesion to Stainless Steel 90° peel @ room temp, 72 hr dwell, jaw speed 300mm/min	24 N/10mm	
Static Shear Strength weight held for 100 hours to stainless steel with ½ sq in (3.23 sq cm) overlap	1500 g @ 20°C 1250 g @ 65°C	
Temperature Performance Max (hours/minutes) Max Continuous (days/weeks)	150°C 100°C	
Normal Tensile (T-Block) to Aluminium at room temp, 6.45 sq cm, jaw speed 50 mm/min	46 N/cm ²	
Solvent Resistance	No apparent degradation when exposed to splash testing of most hydrocarbon solvents.	
UV Light Resistance	No apparent degradation when exposed to 7 days in U.V. chamber.	

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Tape

Application Techniques

1. Bond strength is dependent upon the amount of adhesive-to-surface contact developed. Firm application pressure develops better adhesive contact & thus improves bond strength.

2. To obtain optimum adhesion, the bonding

surfaces must be clean dry and well unified. A typical surface cleaning solvent is isopropyl alcohol. Use proper safety precautions for handling solvents.

3. Ideal tape application temperature range is 21°C to 38°C (70°F to 100°F).

Initial tape application to surfaces at temperatures below 10°C (50°F) is not recommended because the adhesive becomes too firm to adhere readily. However once properly applied low temperature holding is generally satisfactory.

Applications

4632 has been developed to provide high peel and shear performance bonds to a variety of substrates. Its acrylic construction also allows for good sealing capabilities and high temperature performance.

Its superior shear performance makes it ideally suitable for mirror mounting and nameplate bonding applications. Care should be taken to avoid bonding to safety backed mirrors and low surface energy substrates.

It is suggested that a minimum of 25cm² of tape contact on each surface is used to support 1kg of continuous static shear load, however, this should be tested and thoroughly evaluated to ensure it meets specific requirements prior to use.

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Values presented have been determined by standard test methods and are average values not to be used for specification purposes. Our recommendations on the use of our products are based on tests believed to be reliable but we would ask that you conduct your own tests to determine their suitability for your applications. This is because 3M cannot accept any responsibility or liability direct or consequential for loss or damage caused as a result of our recommendations.



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