



# **5620 MARS**High Bond Foam

OCTOBER 2022
Supersedes all previous versions

High performance black acrylic/grey foam tape particularly suitable for bonding a broad range of substrates both indoor & outdoor.



















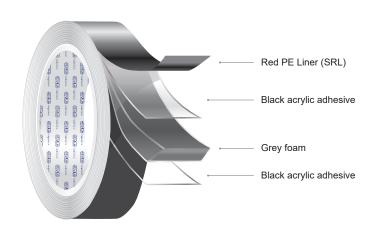
## **Applications**

- Adheres to a wide variety of smooth surfaces such as glass, metals & other substrates with a medium to high energy surface rating (refer next page)
- Used in automotive, construction, electronics, engineering, industrial, graphics & signage industries plus many more
- → Ideal for fixing of car weathershields due to its black appearance
- → Can be used to separate dissimilar metals
- → Permanent seal against air, water & moisture
- → Panel to frame applications in combination with fastensers & sealants



#### Benefits

- → Standard release liner (SRL)
- → High temperature rating up to 180°C
- Can replace or be used in conjunction with mechanical fasteners and/or liquid adhesives
- → Vibration dampening
- → Thickness (mm): 2.00 (others available by indent)
- Reduces unsightly appearances of holes, screw heads, rivets etc resulting in blind fastening to ensure surfaces remain pristine



#### Technical Data

Adhesive power	***	Conformance	RoHS & REACH
• Density - kgs/m³	750	Liner type	SRL Red PE (Standard Release Liner)
Tensile strength - N/cm²	80 - 90	Adhesive type	Black solvent acrylic
• Elongation - %	750 +/- 100	Adhesion to steel - N/25mn	45
-			
Temperature Resistance °C	-20 to 180	Backing material	Standard foam acrylic

The above information is given in good faith for guidance only and not specification purposes. All data is based upon average values, the Purchaser shall be responsible for determining the suitability of this product for their purposes.



# Stylus guide to ensuring you select the most suitable tape for your application for testing

## What is low surface energy?

Understanding the relationship between your substrate/s and the tape being applied to is critical in ensuring the best performance as each persons requirements are unique to them so testing and selection is critical to obtain peak performance.

All substrates exhibit different levels of what is commonly referred to as "surface energy".

So what is "surface energy" when it comes to adhesive tapes? It's the substrates ability to allow the tapes adhesive to bond (wet out) to the surface.

Simply put: the higher the substrates surface energy the easier it is for the tape to adhere to the object ensuring a high contact surface area of bond resulting in higher level of tape performance.

The 3 diagrams below demonstrate an adhesive's ability to stick to a surface. With standard adhesives the performance to high surface energy (HSE) is excellent. For standard adhesives with low surface energy (LSE) the performance is poor. For low surface energy (LSE) substrates we recommend application of our LSE adhesive range to ensure excellent bond strength.



#### **HSE** SUBSTRATE

Excellent wet-out
BOND STRENGTH TO
"HIGH SURFACE ENERGY"



#### **LSE SUBSTRATE**

Poor wet-out
BOND STRENGTH TO
"LOW SURFACE ENERGY"



Excellent wet-out
BOND STRENGTH TO
"LOW SURFACE ENERGY"

# Substrate examples

High Surface Energy	Low Surface Energy
• Aluminium	Acrylic
Anodized Aluminium	Polyethylene
• Copper	Polystyrene
• Glass	Polyurethane
Stainless Steel	• PVC



# RECOMMENDED CLEANING & INSTALLATION PROCEDURES

#### \* STEP 1 - SURFACE EVALUATION:

There are numerous types of adhesive tapes, some suited to a variety of uses and others for more specialised individual applications. A thorough evaluation is recommended when bonding to any surface. Porous surfaces such as wood, concrete & brick should be <a href="mailto:smooth">smooth</a> & <a href="mailto:sealed">sealed</a> with an appropriate sealer prior to application.

All adhesive tapes should only be applied to clean & dry surfaces. There are various methods of preparation depending on the surface and/or application. For technical advice we recommend you speak with our local sales office.

#### Surfaces must be free of:

Any Contaminants
Moisture & Chemical Residue
Dust, Fibres, Concrete Powders, Sand, Soil & Dirt Particles
O.E.M. Cleaners, Grease, Wax, Detergent & Release agents on plastic profiles/extrusions etc
Flaking Paint & Corrosion

#### \*STEP 2 - CLEANING INSTRUCTIONS:

The surface being applied to should be prepared with an appropriate cleaning solution, preferably IPA (Isopropanol) using a clean lint-free wiping cloth or disposable wipe (never re-cycled rags). Renew cleaning cloths regularly. (Applications involving paper, board, fabric etc do not require IPA cleaning)

This should be performed immediately prior to application of adhesive tape.

When using any cleaning solutions it is recommended to test a small area to ensure there is no reaction/discolouration with the surface.

It is important to note that all painted/sealed surfaces should be completely dry/cured. (Refer to manufactures recommendations).

#### \*STEP 3 - INSTALLATION PROCESS:

Once the surface has been adequately prepared tape application can commence. Care should be taken to avoid finger contact with adhesive. The portion of tape held by your fingers should overlap the area being applied to & trimmed, as finger contact with any adhesive tape will significantly reduce its performance.

Both single & double sided tapes require sufficient rub down pressure to ensure 100% surface contact. Where double sided tapes are being used pressure must be re-applied after both surfaces have been brought together.

Surface temperature should be above 10°C at time of application. (Use some heat if necessary - Hair Dryer, Fan Heater etc.).

**NB. Storage** – Ensure all tapes are stored in clean/dry condition & returned to the protective bag between use.

**SPECIAL NOTE:** Adhesive Bond Strength will improve with time varying from a few hours to 2-3 days depending on the adhesive tape product used & climactic conditions.

#### Recommended Storage Conditions

Product must be kept in its original box and packaging in a dry atmosphere away from direct sunlight.

The optimal storage conditions for this product is between 18°C - 22°C with a relative humidity of 40% - 50%.

#### Material Safety Data Sheet

MSDS can be downloaded from Stylus Tapes website www.stylustapes.com.au

### Recommended Cleaning & Installation Procedures

#### STEP 1 - SURFACE EVALUATION:

There are numerous types of adhesive tapes, some suited to a variety of uses and others for more specialised individual applications. A thorough evaluation is recommended when bonding to any surface. Porous surfaces such as wood, concrete & brick should be smooth & sealed with an appropriate sealer prior to application. All adhesive tapes should only be applied to clean & dry surfaces. There are various methods of preparation depending on the surface and/or application. For technical advice we recommend you speak with our local sales office. Surfaces must be free of:

- Any Contaminants
- · Moisture & Chemical Residue
- · Dust, Fibres, Concrete Powders, Sand, Soil & Dirt Particles
- · O.E.M. Cleaners, Grease, Wax, Detergent & Release agents on plastic profiles/extrusions etc
- Flaking Paint & Corrosion

#### STEP 2 - CLEANING INSTRUCTIONS:

The surface being applied to should be prepared with an appropriate cleaning solution, preferably IPA (Isopropanol) using a clean lint-free wiping cloth or disposable wipe (never re-cycled rags). Renew cleaning cloths regularly. (Applications involving paper, board, fabric etc do not requireIPA cleaning) This should be performed immediately prior to application of adhesive tape. When using any cleaning solutions it is recommended to test a small area to ensure there is no reaction/discolouration with the surface. It is important to note that all painted/sealed surfaces should be completely dry/cured. (Refer to manufactures recommendations).

#### STEP 3 - INSTALLATION PROCESS:

Once the surface has been adequately prepared tape application can commence. Care should be taken to avoid finger contact with adhesive. The portion of tape held by your fingers should overlap the area being applied to & trimmed, as finger contact with any adhesive tape will significantly reduce its performance. Both single & double sided tapes require sufficient rub down pressure to ensure 100% surface contact. Where double sided tapes are being used pressure must be re-applied after both surfaces have been brought together. Surface temperature should be above 10°C at time of application. (Use some heat if necessary - Hair Dryer, Fan Heater etc.).

NB. Storage - Ensure all tapes are stored in clean/dry condition & returned to the protective bagbetween use.

SPECIAL NOTE: Adhesive Bond Strength will improve with time varying from a few hours to 2-3 days depending on the adhesive tape product used & climactic conditions.

The information in this Product Data Sheet, including technical information, guidance, physical description of product, product characteristics, expected performance, safety and other information, are based on manufacturer tests, records, experience and review by Stylus Tapes technical staff, but not guaranteed as to reliability, accuracy or completeness. The values in the data tables in this Product Data Sheet are typical or average values and may vary. They are not specifications. Should you require further detail, please email Stylus Tapes Technical Department at sales@stylustapes.com.au.

The information in this Product Data Sheet is provided for the consideration of the distributor or user, as the case may be, and it is the responsibility of the distributor or user, as the case may be, to assess the product and the information and to independently determine whether the product is suitable for the intended application. Stylus Tapes cannot anticipate every intended use or potential application and many factors are beyond the control of Stylus Tapes and uniquely within the knowledge or control of the user or purchaser, as the case may be and related to the particular use and application by the distributor or user, as the case may be. Therefore, Stylus Tapes strongly recommends that products are first tested by the distributor or by the user, under individual application conditions, prior to commercial or specialist use.

The information does not constitute or imply a warranty of any kind, including, but not limited to, a warranty of saleability or of fitness for any particular purpose nor a representation for which Stylus Tapes assumes any legal responsibility. Except to the extent prohibited by law, Stylus Tapes will not be liable for any loss or damage arising from or related to the product.

Stylus Tapes will assess requests for return followed by replacement or refund of purchase price, at its sole discretion, of any product considered by the distributor or user, as the case may be, to be defective or faulty, provided that any defect or fault, if established, can be shown to be a manufacturing defect or fault and not caused by the distributor or user, as the case may be, including as a result of misuse, incorrect storage conditions, including exposure to sunlight or storage not in its original box, and including incorrect storage temperature or incorrect relative humidity level, or incorrect surface preparation. Stylus Tapes will only consider requests for return within 14 days of Stylus Tapes invoice date for any product considered faulty or defective by the distributor or user. Product cannot be returned until Stylus Tapes distributor has first submitted a request for return and obtained approval from Stylus Tapes after sales representative inspection. A return authorisation reference number together with written return instructions will then be provided. All special cut/non stock items cannot be returned. This Product Data Sheet is provided to all authorised distributors of Stylus Tapes and updated regularly by Stylus Tapes, and when information has changed, and it is the responsibility of any such distributor to provide the latest information herein, including the information in the Disclaimer, to any purchaser or user of the product, as the case may be.