AUTOSTAT CT

Product Data Sheet

Pre-primed Polyester Film with Low Residual Heat Shrinkage

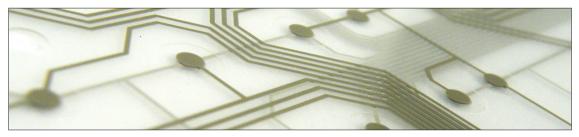


PRODUCT DESCRIPTION

The **Autostat** range of polyester* films are heat-stabilised to give low residual shrinkage at elevated temperatures. This is essential when tight registration tolerances need to be maintained during multiple printing operations.

Autostat CT is a high quality clear, heat stabilised polyester film, pre-primed on both sides, and is available in sheets and rolls with tight dimension and squareness tolerance.

Applications include: flexible circuitry, membrane switch circuitry, flexible flat cables, sensors and RFID antennae.



^{*}The term polyester is the generic term for several different polymers, of which polyethylene terephthalate (PET) is the most common. PET is used in MacDermid Enthone Industrial Solutions polyester products.

PRODUCT RANGE

| Product | Gauge | Version |
|---|-------------------------------------|--------------------------|
| Autostat CT – clear, pre-primed polyester film with low residual shrinkage at elevated temperatures | 75 μm 100 μm 125 μm 175 μm | CT3 CT4 CT5 CT7 |





TYPICAL PROPERTIES

| Property | Typical Value | Test Method | |
|--|---|--------------------------|--|
| Haze ¹ | < 2% | ASTM D1003 | |
| Yellowness index ¹ | < 2 | ASTM E313 | |
| Switch life ³ | > 5 million actuations | Test Method 003 | |
| Tensile strength at break ¹ | 172 N / mm² | ASTM D882 | |
| Breakdown voltage ¹ | 17 – 21 kV | ASTM D149 | |
| Dimensional stability ^{2,3} | MD ± 0.2% max @ 150 °C / 30 min | | |
| (Thickness ≥100μm) | TD ± 0.08% max @ 150 ℃ / 30 min | Test Method 094 | |
| Dimensional stability ^{2,3} | MD ± 0.5% max @ 150 °C / 30 min | | |
| (Thickness ≤75μm) | TD ± 0.1% max @ 150 ℃ / 30 min | | |
| Thickness all grades ² | ± 5% of gauge to nearest whole μm | Test method PLAWP 003 | |
| Recommended maximum processing temp. | 150 ºC | Test method 012 | |
| Chemical resistance | Chemical resistance of polyester is generally good but has not been extensively tested for circuitry applications | | |

Note: All evaluation results are obtained from lab produced samples at MacDermid Enthone Industrial Solutions.

PRIMER

Autostat CT has an ink adhesion primer on both surfaces.

The primer offers excellent adhesion to a wide range of solvent based conductive screen inks and UV dielectric inks, but it is recommended that the customer verifies that the adhesion of their own ink is fit for purpose.

SHELF LIFE & STORAGE CONDITIONS

The recommended shelf life is 36 months from date of manufacture. MacDermid Enthone Industrial Solutions guarantee a minimum remaining shelf life of 8 weeks at the time of despatch.



They are for general guidance only and do not represent the final product's properties.

¹Data derived from base film manufacturer's literature

²Specification value

³For details of test method, please contact MacDermid Enthone Industrial Solutions



The recommeded shelf life represents the maximum processing life time of the product from the date of manufacture when stored correctly and in unopened packaging.

The following storage conditions are recommended:

| Storage Conditions | | | |
|--------------------|---|--|--|
| Temperature | 15 ℃ to 25 ℃ | | |
| Relative Humidity | 50 to 65% | | |
| Packaging | Store in original protective packaging Once the packaging has been opened, the processing lifetime can be compromised due to air ingress, contamination or UV light | | |
| Moisture | Store away from water sources | | |
| Chemicals | Keep away from aggressive solvents | | |

IMDS ID-No

By arrangement with our regulatory affairs team.

SAFETY & WARNING

MacDermid Enthone Industrial Solutions recommends that the company/operator read and review the Safety Data Sheets for the appropriate health and safety warnings before use.

Safety Data Sheets are available from MacDermid Enthone Industrial Solutions.

WASTE TREATMENT

Prior to using any recommendations or suggestions by MacDermid Enthone Industrial Solutions for waste treatment, the user is required to know the appropriate local/state/federal regulations for on-site or off-site treatment which may require permits. If there is any conflict regarding our recommendations, local/state/federal regulations take precedent.

CONTACT INFORMATION

To confirm this is the most recent issue, please contact us:

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