

SQ-710001 Transparent Weather-resistant UV Texture Transfer Coating

Description

SQ-710001 is a single-component UV-curable transfer adhesive that can be molded onto PC, PET, TPU, or other film substrates using various texture and structural molds. It can be transferred manually in small batches with small molds, or via automated, high-throughput structural rollers or textured film transfer systems. It is widely used for creating textured decorative surfaces on mobile phones, laptops, home appliances, and other product housings. The product features excellent release properties, UV aging resistance, yellowing resistance, high transparency, good metallization compatibility, and good recoating performance.

Technical Data

Test Items	Test Data
Appearance	Transparent liquid
Viscosity (25°C, CPS)	850 - 950
UV Content (%)	100
Density (g/cm ³ , 25°C)	1.03 ± 0.05
Hardness (1Kg force load)	B - H
Coating Thickness (μm)	50 - 250
Boiling Performance (surface spray paint, no primer 100	Adhesion: 5B, no change in coating
Bending (cylindrical shaft diameter)	No cracking after 180° bend
Curing Energy (mercury lamp, mj/cm ²)	600 - 1,000
QUV Resistance	Over 500h

Note: The above performance parameters can be customized according to customer requirements.

Product Features

Good yellowing resistance and high transparency

Good tensile strength, low shrinkage; forms a flexible protective layer after curing with a film thickness of 50–250 μm

No cracking, deformation, or delamination after 180° bending

Excellent resistance to high/low temperature, high humidity, chemical solvents, moisture, and UV exposure; maintains stable performance under harsh conditions

Applications

Textured decoration and housing formation for products such as mobile phones, laptops, and home appliances.

Application Process

1. Clean the surface of the substrate.
2. Pour the adhesive into the metal mold and press the PC or PET film onto the mold. Use a rubber roller to press and level the adhesive, ensuring that air bubbles are removed and the bonding areas are fully covered.
3. Irradiate with a UV lamp at wavelengths of 265 or 395 nm. Keep the lamp as close as possible to the adhesive to accelerate curing.
4. Peel the PC or PET film from the metal mold. The adhesive layer will release completely and adhere to the PC or PET surface.
5. If the adhesive layer is not fully cured, continue UV irradiation until full curing is achieved.

Process Flow

Unwinding → Coating onto specially treated release film → Mold/roller pressing → UV curing → Demolding → Rewinding → Ink printing → Slitting → Forming → Injection molding → Peeling off surface polyester film → Spraying hard coat

Precautions

1. Ensure that the UV adhesive layer receives sufficient UV energy to achieve complete curing; inadequate irradiation may compromise the coating performance.
2. Do not pour leftover adhesive back into the original container. Store the remaining material in a sealed, light-proof condition at room temperature.

Storage Conditions

To prevent premature polymerization due to the high reactivity of this product, keep it tightly sealed and store away from heat sources and direct sunlight. It is recommended to maintain storage temperature below 30 °C. Unused product should be promptly resealed and must not be left open. Under ventilated conditions at 25 °C, the product has a safe storage period of 6 months. Available packaging: 1 kg / 5kg / 25 kg per drum

Tips: SQ-710001 is a transparent, weather-resistant UV transfer coating with good yellowing resistance, high transparency, excellent structural moldability, and easy processability.

Note: Technical data represents typical values only. In view of the differences in formulas, production process, conditions, all the above statements must be adjusted according to the actual situation, our company does not make any promises. Our company reserves the right to reform its products without prior notice of any changes.