

# FOTOTEX 3D

Hybrid-Cure Texturing Varnish

## PRODUCT DESCRIPTION

**Fototex 3D** is a solvent based, UV curable screen printable texturing lacquer, designed to enable a range of matt textured finishes for membrane switch, fascia and label applications.

**Fototex 3D** can be printed selectively onto MacDermid Alpha Electronics Solutions range of hardcoated products – Autoflex EB on polyester and Autotex PC on polycarbonate, and onto graphic inks for automotive dial applications.



# READ ENTIRE TECHNICAL DATA SHEET BEFORE USING THIS PRODUCT

## PRODUCT RANGE

**Fototex 3D** is supplied with a Supermatt finish and can be used on its own or blended with a gloss modifier lacquer to change the gloss or texture levels and create wide range of texture and gloss options.



# PRINT AND PROCESS GUIDELINES<sup>1</sup>

Method	Recommendations		
Environment	The workroom should be kept clean and dust free. Work areas should be out of direct sunlight, away from windows and shielded from other sources of UV light such as exposure units. Artificial light should use UV-shielded bulbs.		
Handling	Wear protective equipment (safety glasses, gloves and protective clothing) and ensure good ventilation at all times. Ensure nitrile or butyl rubber gloves are worn.		
Equipment	Stencil	Use a solvent resistant stencil with Autotype Capillex CX/CPS Ultra Cap HD or Autotype PLUS 7000/CPS Ultra Coat 535	
	Mesh	120.34 is the optimum mesh for Fototex 3D Supermatt	
	Squeegee	60 to 75 Shore Solvent Resistant squeegee such as Sericol Duralife or RKS HQ. A 20° angle is recommended.	
Printing	<ul> <li>Suitable for printing on a fflatbedor cylinder press and is designed to be printed onto Autoflex EB, Autoflex PC, polycarbonate, and many first surface printed inks. (When printing onto graphic inks, please test the ink chosen to confirm compatibility with the lacquer.)</li> <li>Fototex 3D should not be left on the mesh when not printing.</li> <li>To avoid contaminating unused lacquer, never return used Fototex 3D to the pot and always replace the lid when not in use.</li> </ul>		
Drying	80 to 100 °C using hot air (jet) drier for a minimum of 2 minutes. <b>Do not</b> bake after drying and <b>Do not</b> air or rack dry		
UV Curing	Lamp	Undoped medium pressure mercury vapor lamps. Elliptical reflectors for optimum cure, dichroic for minimum IR heat reflection	
	Power	240 watts per cm	
	Optimum Intensity	1.5 W/cm <sup>2</sup> (UVA measured using an EIT Powerpuck)	
	Dose	1J	
Storage	Below 25 °C but do not allow to freeze. Allow product to equilibrate with room conditions before use.		



Method	Recommendations		
	Printed sheets should be racked not stacked.		
Hazards	Refer to MSDS		

<sup>1</sup> Full processing guide is available upon request and must be referred to in designing a process of use with this product

# TYPICAL PROPERTIES

Property	Supermatt	Test Method
Gloss		
Black back-printed <sup>1,2</sup>		ASTM D2457 (modified to test method 022)
20°	0.3 to 0.4	
60°	1.5 to 2.5	
85°	3.0 to 4.5	
Haze <sup>1</sup>	95% ± 2%	ASTM D1003
Total luminous transmission <sup>1</sup>	92% ± 1%	ASTM D1003
MEK spot test <sup>3</sup>	Pass	Test method 005
Adhesion <sup>3</sup>	Pass	Test method 080
Pencil hardness <sup>4</sup>	F-H	Test method 058
Heat / humidity resistance <sup>1</sup>	7 days at 60 °C / 95% RH	Test method 012

Note - results are quoted for Fototex 3D Supermatt printed through 120.34 mesh

<sup>1</sup> For test method details, please contact MacDermid Alpha Electronics Solutions.

- <sup>2</sup> Gloss level will vary with print deposit
- <sup>3</sup> Specification property
- <sup>4</sup> For more information, please refer to MacDermid Alpha Electronics Solutions' statement on pencil hardness testing

## SHELF LIFE

The shelf Life of Fototex 3D when stored correctly in a sealed can is 12 months from the date of manufacture for Supermatt and 6 months for Gloss Modifier.



### **SAFETY & WARNING**

It is recommended 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.

#### WASTE TREATMENT

Prior to using any recommendations or suggestions 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 document is the most recent version, please contact techinfo@MacDermidAlpha.com

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Also read carefully warning and safety information on the Safety Data Sheet. This data sheet contains technical information required for safe and economical operation of this product. READ IT THOROUGHLY PRIOR TO PRODUCT USE. Emergency safety directory assistance: US +1 202 464 2554, Europe + 44 1235 239 670, Asia + 65 3158 1074, Brazil 0800 707 7022 and 0800 172 020, Mexico 01800 002 1400 and (55) 5559 1588

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