Metalphoto® Laminated Teflon® and Fused Teflon®

Durability Characteristics

PRODUCT DATA	EFFECT Laminated Teflon® FEP[3]	EFFECT Fused Teflon® PTFE[4]	EFFECT Fused Teflon® FEP[3]	TEST METHOD
Exterior Exposure	No Effect	No Effect	No Effect	Using Metalphoto Image Instensification Process, black and silver image exceeds 400 hr. Weatherometer est GG-P-455b, estimated equivalent to 20 yr. exposure
Abrasion Resistance	Not Recommended Teflon Loss - Image OK	Not Recommended Teflon Loss - Image OK	Not Recommended Teflon Loss - Image OK	TaberAbraser with CS17 wheel, a total of 1000 gm. load 7000 cycles
Paint Shedding	Excellent	Excellent	We Recommend Testing Your Application	
Temperature Resistance	300°F	500°F	400°F	Using Metalphoto Image Instensification Process
Salt Spray	No Corrosion	No Corrosion	No Corrosion	5% at 95°F for 700 hrs.
Chemical Resistance				
MII-S-3136 111 Hydrocarbon Fluid	No Effect[2]	No Effect	No Effect	1 hr. immersion
MIL-L-5161C-Turbine & jet engine fuel	No Effect[2]	No Effect	No Effect	1 hr. immersion
JP-4 Fuel	No Effect[2]	No Effect	No Effect	72 hr. immersion
Kerosene	No Effect[2]	No Effect	No Effect	12 hr. immersion
Skydrol (Hydraulic Fluid)	No Effect[2]	No Effect	No Effect	24 hr. immersion at both room temp. and boiling point
Methyl Ethyl Ketone (MEK)	No Effect[2]	No Effect	No Effect	24 hr. immersion
Ethyl Acetate	No Effect[2]	No Effect	No Effect	24 hr. immersion
Xylol	No Effect[2]	No Effect	No Effect	72 hr. immersion
Heptane	No Effect[2]	No Effect	No Effect	72 hr. immersion
Ethyl Alcohol	No Effect	No Effect	No Effect	72 hr. immersion
Ferric Chloride	No Effect	No Effect	No Effect	10% solution, 16 hr. immersion
Ammonium Hydroxide	No Effect	No Effect	No Effect	10% solution, 16 hr. immersion
MIL-P-21563 soap solution	No Effect	No Effect	No Effect	16 hr. immersion
MIL-C-25179 AIN in heptane	No Effect	No Effect	No Effect	25% solution, 1 min. immersion (cleaning solution)
Sulfuric Acid	No Effect	No Effect	No Effect	10% solution, 24 hr. immersion
Phosphoric Acid	No Effect	No Effect	No Effect	1% solution, 12 hr. immersion
Nitric Acid	No Effect	No Effect	No Effect	3% solution, 72 hr. immersion
TSP (Trisodium Phosphate)	No Effect	No Effect	No Effect	1% solution, 40 hr. immersion
Sodium Hydroxide	No Effect[1]	No Effect[1]	No Effect[1]	1% solution, 1 hr. immersion

SPECIFICATION	PUBLICATION	DETAIL	DESCRIPTION
GG-P-455b	Federal Specification	Type I, Grade A or B Class 1 & 2	Photosensitive anodized aluminum impregnated with silver compounds printable on one or two sides - all finishes and thicknesses.
MIL-P-15024D	Military Specification	Type H & G	Totally anodized aluminum with characters integrated into the anodized layer photographically using silver compounds.
MIL-P-19834B	Military Specification	Type I or II Style III or IV	Metalphoto .003" thick plates with the proper adhesive applied meets or exceeds all of the performance requirements of this spec.
MIL-P-514D	Military Specification	Composition C	Photosensitive aluminum plates, grade and class as specified in federal specification GG-P-455b.
Industrial Commercial Products	Original Equipment Panel Fronts Nameplates	Metalphoto Products	Material shall be Metalphoto. Image (black on silver or silver on black shall be sealed into the anodized layer with photosensitive silver compounds) colors other than black may be imbedded by resist or screen process.

[1] Top Surface Only - will react with exposed edge.

[2] Top Surface Only - exposed adhesive edges may soften or swell.

[3] FEP should not be used in place of PTFE in applications where the label is exposed to high levels of radiation (>0.2 Mrad).

[4] Black background not recommended.

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Note: Users must test products in the specific environment anticipated.

Camcode does not warrant performance of its materials in any environment.

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