

## **VWS IV Visual Effects Matt Iridescent TECHNICAL & PERFORMANCE INFORMATION**

# K75500

50% humidity

>13.5 N/mm<sup>2</sup>

-40°C to +90°C

>75%

### K75500 Series Matt Iridescent Cast Vinyl - VWS

VWS (Vinyl Wrapping System) IV is a range of Visual Effects cast PVC films.

K75500 Matt Iridescent products are 85 micron dual cast PVC films specifically developed for vehicle wrapping where a novel colour flip is required after application. They are formulated using the latest advances in chemical and pigment technology to offer exceptional dimensional stability and long term durability. Produced with KPMF's Airelease structured liner that enables easy application.

They are suitable for applications in outdoor and indoor environments, with the 85 micron thickness offering excellent cutting and weeding properties. The combination of soft vinyl formulation and specific adhesive design offers excellent conformability and adhesion which allows the film to be removed using heat and/or chemicals up to a period of three years from a range of substrates subject to exceptions covered in the warranty.

Typical applications include total vehicle cover, vehicle graphics, signs and decal applications.

The film is available as:-

K75565 Purple/Black K75566 Purple/Blue

**CHARACTERISTIC** TEST METHOD TYPICAL VALUE ISO 4591:1992 Film Thickness ALI; 85 micron Adhesive Thickness ISO 4591:1992 25 micron Clear Semi Permanent Cross-Linking Acrylic Adhesive Type Release Liner 145gsm Double Sided PE Structured Liner Storage Two years, out of direct sunlight at 23°C and

ISO 527:1996 Tensile ISO 527:1996 Elongation

Heating and Stretching the Film 140% (100mm stretched to 140mm) Adhesion 20 Mins/180° FINAT FTM1/Stainless Steel 600 N/Metre Adhesion 24 Hrs/180° FINAT FTM1/Stainless Steel 750 N/Metre Static Shear (25 x 25mm) FINAT FTM8/Stainless Steel >16 hours FTM14/Aluminium <0.5mm

Dimensional Stability (150 x 150mm/48 hours/70°C)

Service Temperature

Gloss 60° ASTM 523-89 <20 (Matt films) Flammability Self Extinguishing Artificial Weathering >1000 hours Atlas Xenon arc

Weathering Vertical Exposure/Mid Europe 5-7 Years +8°C to +25°C **Application Temperature** Clean, dry surface

Resistance to various liquids after application and conditioned for 24 hours at 23°C. Results examined 1 hour after test.

Humidity 24 hours at 38°C and 100% No Effect 24 hours at 32°C Water (Distilled) No Effect Sea Water 1 year Mid Tide (BS 5609:1986) No Effect Reference Fuel 1 hour at 23°C Very Slight Film Softening Diesel Fuel 1 hour at 23°C No Effect SAE Motor Oil 24 hours at 23°C No Effect 24 hours at 23°C Antifreeze/Water (1:1) No Effect 8 hours at 65°C Detergent Solution No Effect Hydraulic Oil 24 hours at 23°C No Effect Battery Acid 24 hours at 23°C No Effect

Although we have good control of the colour production at KPMF, it is advisable to avoid using different batches of material for the same end

KPMF films should not be applied to unsound surfaces or to surfaces which may subsequently crack, peel, outgas or are of low surface energy. It is recommended that any application surface should have an energy level in excess of 40 dyne/cm. (Polyolefins should be in excess of 45 dyne/cm). The above data shows typical properties and should not be taken as a guarantee for performance. Purchasers should determine the suitability of each product prior to its intended use. Prolonged exposure to high and low temperatures in the presence of chemicals such as solvents, acids etc. may eventually cause deterioration. Durability is based on middle European exposure conditions. Actual performance will depend on substrate preparation, exposure conditions and application of marking.

#### IMPORTANT

Kay Premium Marking Films are produced under stringent manufacturing conditions. The information and typical values shown are based upon research believed to be reliable and are provided without guarantee and do not constitute a warranty. The values are not for use in specifications. Ink and paint systems can affect the performance of film and also the adhesive properties, as can application techniques. Users are advised to ensure that performance and reliability are not compromised by determining the suitability of each product prior to its intended use.

#### WARRANTY

Kay Premium Marking Films are produced under careful quality control and are warranted to be fit for the purpose and free from defect in material and workmanship. Any material shown to be defective to our satisfaction at the point of sale shall be replaced free of charge. Kay Premium Marking Films Limited liability to the purchaser shall in no circumstances exceed the cost of the amount of the defective material supplied. This product has been warranted to provide clean removability, under controlled conditions, up to a period of three years from a range of substrates. Clean removability is deemed with less than 30% adhesive residue when using heat and chemical removal methods. Exceptions to the removal warranty are those applied to the following: pre-existing graphics, paint which is not properly bonded to the substrate and custom paint applications. There is no guarantee made for; ease or speed of graphic removal, removal from improperly cured paint, removal from oxidized or chalked substrates, or from horizontally exposed outdoor applications. Due to the large variety of available paint finishes, it is advisable to fully evaluate small areas particularly after printing prior to complete applications.

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Approved MOS

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