

Technical Information

DTF PREMIUM INK

1. DESCRIPTION

KIWO/ULANO DTF (Direct To Film) PREMIUM INKS are an aqueous based ink inkset for DTF printers. High density CMYK and White inks designed for low viscosity printheads, for vibrant color reproduction with lower ink limit than other formulations.

For use with DTF printers with White ink recirculation and ink tank agitation ONLY. White ink will cause clogging if active recirculation / agitation is NOT used.

2. APPLICATION

An environment where the relative humidity is between 40% and 80% (non-condensing) and the ambient temperature is between 15°C and 30°C (59°F – 86°F). MIX UNTIL HOMOGENEOUS BEFORE USE. Agitate all inks prior to installing on machine.

Using machine daily will prevent ink settling and clogging. Failure to do so may result in head clogging and ink line clogging.

It is recommended that you do NOT mix KIWO/ULANO DTF PREMIUM INK with other DTF/DFT inks. If you are installing KIWO/ULANO DTF PREMIUM INK on an existing system, please flush the old inks before installing KIWO/ULANO DTF PREMIUM INK. KIWO/ULANO DTF PREMIUM INK FLUSHING SOLUTION is recommended for use prior to installing KIWO/ULANO DTF PREMIUM INK.

After printing on the DTF film, apply the powdered thermoplastic polyurethane (TPU) glue immediately and melt between 220-340°F. Please refer to Hot Melt Powder TI for specifications relating to Temperature, and Time. Specifications depend upon workflow.

Place the film powdered side in contact with the substrate. Using a heat press set to 220-340°F, Please refer to TPU Manufacturers TI for specific Temperature, Time and Pressure Settings. KIWO/ULANO DTF PREMIUM INK is perfectly suited to post processing techniques. KIWO/ULANO DTF PREMIUM INK works with Hot, Warm and Cold Peel films.

3. PHYSICAL DATA

Colors: Cyan, Magenta, Yellow, Black, White, Clear (Flushing Solution)

Specifications for Colors (C,M,Y,K):

- Viscosity: 3 – 5 mPa.s (determined by A&D SV-10A Vibro Viscometer @22°C)
- pH: 8.0 – 9.2
- Density: 1.02 – 1.09 g/ml
- Dynamic Surface Tension: 30 - 40 nM/m (determined by Bubble Pressure Tensiometer @ 20ms)
- Static Surface Tension: 26- 32 nM/m (determined by Bubble Pressure Tensiometer @ 1400ms)

Specifications for White:

- Viscosity: 3.5 – 6 mPa.s (determined by A&D SV-10A Vibro Viscometer @22°C)
- pH: 8.0 – 9.2
- Density: 1.10 – 1.20 g/ml
- Dynamic Surface Tension: 40 - 50 nM/m (determined by Bubble Pressure Tensiometer @ 20ms)
- Static Surface Tension: 26- 34 nM/m (determined by Bubble Pressure Tensiometer @ 1400m)

Storage: Two years from date of manufacture if stored in sealed containers between 5°C and 35°C (41°F - 95°F). PROTECT FROM FREEZING.

4. PERSONAL PROTECTION

It is recommended to wear protective glasses and gloves. See Safety Data Sheet for additional information.

5. PACKAGING

1 Liter Bottles

6. ADDITIONAL INFORMATION

For additional product information, please visit our web site at www.kiwo.com or www.ulano.com. All products mentioned in this Technical Information are available through KIWO Inc. or Ulano Corp. and its distributor network. For further information contact your authorized KIWO or Ulano distributor or KIWO or Ulano directly.

Thank you for choosing KIWO and Ulano.