Clean Up

Water-based MICA primers are formulated to adhere to polymeric films, paper and foil. However, many of the primers are also prone to bonding with chrome and ceramic applicator cylinders, metal machine parts and other equipment when dried. The following recommendations are the culmination of more than 40 years of priming and clean up experience. If you have any questions, or need help obtaining the products recommended in this document, please contact your Mica Technical Sales Representative, or email us.

The Golden Rule of Clean Up

Do not allow primer to dry on surfaces.

Wet primer can be easily and thoroughly removed with water or a mix of soap and water. If possible, keep the cylinder wet during machine downtime or at unscheduled stops by applying a water mist over the cylinder. If that is not possible, disengage the cylinder and rinse the surface with water.

Removing Stubborn Deposits

Despite our best efforts, sometimes primer ends up drying on machine parts. The dry residue is often a tough, chemically-resistant coating, that demands the incorporation of more aggressive cleaning technique such as ammonium hydroxide, specialty cleaning products, and/or industrial cleaning equipment.

Note: Before using chemicals or specialty cleaning products, please use the appropriate safety precautions and ensure the machine surfaces will not be damaged. When working with chemicals, refer to the supplier's SDS for proper safety equipment, handling and disposal procedures.

Step 1: Ammonium Hydroxide

If you notice a dried deposit, we recommend using ammonium hydroxide first whenever possible, as it is typically readily available and will dissolve most types of primer residue.

   a) Spray a 10% ammonium hydroxide in water mixture onto the cylinder.
   b) Scrub with a cloth or brush until dried deposits have loosened. To avoid scratching, scrub chrome surfaces with a soft bristle brush, and ceramic surfaces with a brass brush.
   c) Wipe away remaining debris with a clean, wet cloth.
Step 2: Specialty Cleaning Products
For extra stubborn deposits that cannot be removed with ammonium hydroxide, we recommend using specialty cleaning products, such as Danko Industries’ Extra UV\(^1\) or Super C\(^2\).

a) Saturate paper towels with the cleaning product.
b) Lay the paper towels on the cylinder.
c) Wrap the cylinder with shrink film or plastic wrap overnight.
d) The next morning, use a brush to scrub off the remaining residue, and then rinse well with water.

Step 3: Mechanical Methods for Roll Cleaning
On some occasions, ammonium hydroxide and specialty cleaning products may not remove deposits in the cells of the engraved cylinder. For those cases, industrial roll cleaning equipment that use ultrasonic or chemical washing methods, should be used to deep-clean the cylinder cells. We recommend systems that blast sodium bicarbonate onto the surface of the cylinder and remove the dried coating from the cells, or MicroClean\(^\text{TM}\) dry media anilox cleaning systems, because they are environmentally conscious methods and produce good results.

Sources

1. “Extra UV” is a unique, non-flammable water-based replacement for flammable cleanup solvents such as Alcohol, Ethyl Acetate, MEK, Acetone and other flammable solvent blends in the graphic arts industry. “Extra UV” may be used straight, or diluted with water prior to use, and is a safe and efficient solvent replacement in cleaning applications where reduction in VOC’s is sought, and/or an upgrade of safety practices is required. “Extra UV” may be used on flexographic, rotogravure, dry offset, and rotary letterpress printing applications.

2. “SUPER C” is a raw material designed to yield an effective, heavy-duty industrial concentrate called “Super C Finished A”. “Finished A” can then be further diluted, up to 50:1 with water for use on a variety of industrial applications. “Super C Finished A” has been found to be effective on grease, oil, tar, and food soils as well as printing inks and related coatings found in the packaging industry.

Extra UV and Super C are manufactured and distributed by Danko Industries in the U.S.A. Phone: (630) 8882-6070 Email: info@dankoindustries.com