



Procedures for cleaning ElectroFin[®] E-Coat & Insitu[®] coated coils

The following cleaning procedures are recommended as part of the routine maintenance activities for ElectroFin E-coated and Insitu Spray Coated coils. Documented routine cleaning of coated coils is required to maintain warranty coverage under the Modine Manufacturing Terms and Conditions of Sale.

WARNING: PRIOR TO CLEANING THE UNIT, TURN OFF AND LOCK OUT THE MAIN POWER SWITCH TO THE UNIT AND OPEN ALL ACCESS PANELS.

REMOVE SURFACE LOADED FIBERS

Surface loaded fibers or dirt should be removed prior to water rinse to prevent further restriction of airflow. If unable to back wash the side of the coil opposite that of the coils entering air side, then surface loaded fibers or dirt should be removed with a vacuum cleaner. If a vacuum cleaner is not available, a soft non-metallic bristle brush may be used. In either case, the tool should be applied in the direction of the fins. Coil surfaces can be easily damaged (fin edges bent over) if the tool is applied across the fins.

NOTE: Use of a water stream (such as a garden hose) against a surface loaded coil will drive the fibers and dirt into the coil, making cleaning efforts more difficult. Surface loaded fibers must be completely removed prior to using low velocity clean water rinse.

PERIODIC CLEAN WATER RINSE

A monthly clean water rinse to remove dirt and debris is recommended for coils that are applied in coastal or industrial environments. It is very important that when rinsing, the water temperature is less than 130° F and pressure is < than 100 psig to avoid damaging the fin edges. An elevated water temperature (not to exceed 130° F) will reduce surface tension, increasing the ability to remove dirt.

ROUTINE QUARTERLY CLEANING OF MODINE COATED COIL SURFACES

Quarterly cleaning is essential to extend the life of a coated coil and is required to maintain warranty coverage. Coil cleaning shall be part of the unit's regularly scheduled maintenance procedures. Failure to clean a coated coil will void the warranty and may result in reduced efficiency and durability in the environment.

For routine quarterly cleaning, first clean the coil with the below approved coil cleaner (see approved products list under Recommended Coil Cleaner section). After cleaning the coils with the approved cleaning agent, use the approved chloride remover (under the Recommended Chloride Remover section) to remove soluble salts and revitalize the unit.

CHLOR*RID should be used to remove soluble salts from the coated coil, but the directions must be followed closely. This is a concentrate and should be diluted 100:1 with potable water for normal application, or 50:1 for heavy chloride application. A water rinse should be completed after use. This product is not intended for use as a degreaser. Any grease or oil film should first be removed with the approved cleaning agent.

1. REMOVE BARRIER WITH COIL CLEANER

Soluble salts adhere themselves to the substrate. For the effective use of this product, the product must be able to come in contact with the salts. These salts may be beneath any soils, grease, or dirt; therefore, these barriers must be removed prior to application of this product. As in all surface preparation, the best work yields the best results.

The following cleaning agent, assuming it is used in accordance with the manufacturer's directions on the container for proper mixing (4:1 condensers & 8:1 evaporators) and cleaning, has been approved for use on ElectroFin E-coated and Insitu Spray Coated coils to remove mold, mildew, dust, soot, greasy residue, lint, and other particulate.

2. APPLY CHLOR*RID

Apply CHLOR*RID directly onto the substrate. Sufficient product must be applied uniformly across the substrate to thoroughly wet out surface with no areas missed. This may be accomplished by use of a pump-up sprayer or conventional spray gun. Either method will suffice, as long as the entire area to be cleaned is wetted. After the substrate has been thoroughly wetted, the salts will be soluble and it is now only necessary to rinse them off.

3. RINSE

It is highly recommended that a hose be used, as a pressure washer will damage the fins. The water to be used for the rinse is recommended to be of potable quality, though a lesser quality of water may be used if a small amount of CHLOR*RID is added. Check with CHLOR*RID International, Inc. for recommendations on lesser quality rinse water.

CAUTIONS

HARSH CHEMICAL AND ACID CLEANERS

Harsh chemicals, household bleach, or acid cleaners should not be used to clean outdoor or indoor coated coils. These cleaners can be very difficult to rinse out of the coil and can accelerate the corrosion attack of the coil and coating.

HIGH VELOCITY WATER OR COMPRESSED AIR

High velocity water from a pressure washer or compressed air should only be used at a very low pressure (less than 100 psi) to prevent fin and/or coil damages. The force of the water or air jet may bend the fin edges and increase airside pressure drop. Reduced unit performance or nuisance unit shutdowns may occur.

TEXT: INSITU to 31996 For Product Information

RECOMMENDED CHLORIDE REMOVER

CHLOR*RID[®]

Distributed by Modine Manufacturing
Tel: 844 782 2100 Fax: 813 689 4630

RECOMMENDED COIL CLEANER

GulfCoat[™] Coil Cleaner

Distributed by Modine Manufacturing
Tel: 844 782 2100 Fax: 813 689 4630