

CLEANING LABORATORY EVALUATION SUMMARY

SCL #: 2006
 DateRun: 06/05/2006
 Experimenters: Jason Marshall
 ClientType: General
 ProjectNumber: Project #1
 Substrates: Steel
 PartType: Coupon
 Contaminants: Paints
 Cleaning Methods: Ultrasonics
 Analytical Methods: Gravimetric

Purpose: To perform a follow up evaluation of product tested on other supplied contaminants.

Experimental Procedure: The one product was used at full strength and heated to 150 F in a Branson 3510 ultrasonic tank. Three contaminants were applied to separate sets of coupons. The first set was coated with RPM Wood Finishes Group - MS2664 Catalyst White (108-10-1, 28182-81-2, 822-06-0) and 9-6LP9258 White Primer Topcoat (13463-67-7, 110-43-0, 123-86-4, 108-10-1, 108-38-3) in the ratio of 3 parts to 1. The second paint mix from RPM Wood Finishes Group - MS2664 Catalyst White (108-10-1, 28182-81-2, 822-06-0) and MS2669 Primer (108-10-1, 28182-81-2, 822-06-0) in the same 3 to 1 ratio. The third paint mix was from Westfield Coatings Company - ARC Fast Dry Catalyst (123-86-4, 110-43-0, 108-65-6) and Fast Dry (108-10-1) in a 2 to 1 ratio.

Each paint mix was applied to three preweighed steel coupons and allowed to dry. Three painted coupons were immersed in the cleaning product and cleaned for 10 minutes using a 40 kHz ultrasonic tank. After the cleaning, coupons were rinsed in a tap water bath for 15 seconds at 120 F and air dried for 30 seconds at room temperature. Once dry, the coupons were weighed a final time and removal efficiencies were calculated.

Results: The Actisolv was very effective on the three paint mixes. The table lists the amount of paint mix applied, the amount remaining and the calculated efficiency for each coupon cleaned.

Cleaner	Initial wt	Final wt	% Removed
PRM Primer Mix	0.0467	0.0007	98.50
	0.0598	0.0009	98.49
	0.0480	0.0029	93.96
PRM Topcoat Mix	0.0584	0.0004	99.32
	0.0464	0.0013	97.20
	0.0523	0.0007	98.66
Wesfield	0.0446	0.0008	98.21
	0.0889	0.0015	98.31
	0.0783	0.0010	98.72

Summary:

Substrates:		Steel				
Contaminants:		Paints				
Company Name:	Product Name:	Conc.:	Efficiency:	Effective:	Observations:	
Gemtek Products	SC Actisolv Safety Solvent	100	96.98	<input checked="" type="checkbox"/>	RPM Wood Primer Mix	
Gemtek Products	SC Actisolv Safety Solvent	100	98.39	<input checked="" type="checkbox"/>	RPM Wood Topcoat Mix	
Gemtek Products	SC Actisolv Safety Solvent	100	98.41	<input checked="" type="checkbox"/>	Westfield Coating Mix	

Conclusion: The Actisolv was very effective in removing the three paint mixes with out the need to rub the paint off. The product caused the paint to lift off the surface and was easily blown off using compressed air.