

CLEANING LABORATORY EVALUATION SUMMARY

SCL #: 2004
 DateRun: 05/28/2004
 Experimenters: Jason Marshall
 ClientType: Lab
 ProjectNumber: Project #1
 Substrates: Steel
 PartType: Coupon
 Contaminants: Coatings
 Cleaning Methods: Vapor Degreasing
 Analytical Methods: Gravimetric

Purpose: Laboratory evaluations of alternative cleaning products

Experimental Procedure: Basic cleaning performance testing was conducted using ASTM G122 as the bases for cleaning. Two hundred fifty milliliters of each product were used at full strength in a 4000 ml beaker and heated to its boiling point on a hot plate. Preweighed aluminum coupons were coated with the Rochester Midland Corp RI 780 (8052-41-3, 95-63-6) using a handheld swab. Coupons were weighed a second time to determine the amount of soil added to each coupon. Three coupons were cleaned in each solution for 5 minutes using vapor degreasing. After cooling to room temperature, the coupons were weighed a final time and efficiencies were calculated.

Results:

Summary:

Substrates:		Steel				
Contaminants:		Coatings				
Company Name:	Product Name:	Conc.:	Efficiency:	Effective:	Observations:	
AGA Chemical	AK 225	100	99.85	<input checked="" type="checkbox"/>		
DuPont	Vertrel CCA	100	100.00	<input checked="" type="checkbox"/>		
DuPont	Vertrel MCA	100	100.02	<input checked="" type="checkbox"/>		
Micro Care	Heavy Duty Degreaser C	100	100.65	<input checked="" type="checkbox"/>		
Micro Care	Flux Remover C	100	100.76	<input checked="" type="checkbox"/>		
3M	HFE 7100	100	95.07	<input checked="" type="checkbox"/>		
3M	HFE 7200	100	97.08	<input checked="" type="checkbox"/>		
Enviro Tech International Inc	Ensolv	100	100.19	<input checked="" type="checkbox"/>		
Poly Systems USA Inc	Solvon Kreussler IP	100	100.71	<input checked="" type="checkbox"/>		
Dow Chemical Company	OS 10	100	99.05	<input checked="" type="checkbox"/>		
Dow Chemical Company	OS 20	100	96.40	<input checked="" type="checkbox"/>		
Dow Chemical Company	OS 30	100	91.24	<input checked="" type="checkbox"/>		

Conclusion: The twelve products removed over 85%.