

CLEANING LABORATORY EVALUATION SUMMARY

SCL #: 2006
 DateRun: 02/07/2006
 Experimenters: Jason Marshall
 ClientType: Cleaner Manufacturer
 ProjectNumber: Project #1
 Substrates: Glass/Quartz, Chrome
 PartType: Coupon
 Contaminants: Soaps
 Cleaning Methods: Manual Wipe
 Analytical Methods: Gravimetric

Purpose: To evaluate supplied products for glass cleaning application.

Experimental Procedure: The supplied cleaning product was diluted to vendor recommended concentration for glass cleaning using DI water (5%). Three preweighed chrome and three glass coupons were coated with SSL Soil 2 (Glass soap scum: Colgate Regular shaving cream 5.3%, Arid Extra Extra Spray Deodorant 3.5%, Suave Naturals Flexible Hold hair spray 3.7%, Aleeda Texurizing hair gel 25.6% Colgate Total toothpaste 10.4%, Water 51.5%) by pump spraying the mix. The soil was allowed to dry for 24 hours at room temperature. The contaminated coupons were weighed again to determine the amount of soil added.

Three coupons were placed into a Gardner Straight Line Washability unit. A Professional Painter's Rag was attached to the cleaning sled and soaked with 5-7 sprays of cleaning solutions. Each coupon was sprayed 7-10 times with the same cleaning solution. The cleaning unit was run for 5 cycles (~9 seconds). At the end of the cleaning, coupons were wiped once with a dry paper towel. Final weights were recorded, efficiencies were calculated and recorded.

Results: Both substrates were effectively cleaned with the supplied product. The table below list the amount of soil added, the amount reaming and the efficiency for each substrate. Additional results for glass cleaning using water was also included for comparative purposes.

Substrate	Initial wt	Final wt	% Removal
Glass	0.0354	0.0052	85.31
	0.0583	0.0047	91.94
	0.0408	0.0053	87.01
Chrome	0.0630	0.0082	86.98
	0.0567	0.0091	83.95
	0.0911	0.0042	95.39

Control

Water	Glass	0.0430	0.0066	84.65
		0.0567	0.0111	80.42
		0.0301	0.0052	82.72

Summary:

Substrates:		Glass/Quartz, Chrome			
Contaminants:		Soaps			
Company Name:	Product Name:	Conc.:	Efficiency:	Effective:	Observations:
Oxford Micelles	5009	5	88.43	<input checked="" type="checkbox"/>	
Water	Water	100	82.60	<input type="checkbox"/>	

Conclusion: Glass cleaning was above the 85% cut-off for acceptable cleaning.