

CLEANING LABORATORY EVALUATION SUMMARY

SCL #: 1996

DateRun: 03/18/1996

Experimenters: Jay Jankauskas

ClientType: Vessel Cleaning Company

ProjectNumber: Project #1

Substrates: Aluminum, Stainless Steel

PartType: Part

Contaminants: Carbon Deposits

Cleaning Methods: Ultrasonics

Analytical Methods: Visual

Purpose: Two chemistries were tested.

Experimental Procedure: Two stainless steel tank valves and four sections of tank lids were cleaned for Vessel Cleaning Company. Two different chemistries were tested. One was a twenty percent solution of Delta Omega Technologies DOT 111/113, the other chemistry was a mixed solution containing Sodium Hydroxide, Rochester Midland Split and Chemex 110. Each of these solutions were used in the Crest 40kHz ultrasonic unit. Cleaning time varied from 5 minutes to 30 minutes.
SUBSTRATE MATERIAL: Aluminum Drum Lids and Stainless-Steel tank valves.
CONTAMINANTS: Carbon Black
CONTAMINATING PROCESS USED: As received

Results: The DOT 111/113 appeared to work better than Vessel Cleaning Company's solution on the stainless-steel valves (heavy deposits still remained). Vessel Cleaning Company's solution was much more effective than the DOT-111/113 on the more lightly soiled tank lids. No etching was noticed, and all light contaminant was removed (some heavy deposits still remained).

Summary:

Substrates:	Aluminum, Stainless Steel				
Contaminants:	Carbon Deposits				
Company Name:	Product Name:	Conc.:	Efficiency:	Effective:	Observations:
Delta Omega Technologies Ltd	DOT 111/113	20		<input checked="" type="checkbox"/>	
No Specific Vendor	NaOH, Rochester Midland Split, Chemex 110			<input type="checkbox"/>	

Conclusion: The DOT-111/113 appeared to have some trouble in removing even the light deposits from the Aluminum.