CLEANING LABORATORY EVALUATION SUMMARY

SCL #: 2003

DateRun: 10/24/2003

Experimenters: Dave Hout

ClientType: Lab

ProjectNumber: Project #1

Substrates: Aluminum

PartType: Coupon

Contaminants: Fluxes

Cleaning Methods: Immersion/Soak

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.

Three products were used at full strength at room temperature and five products were heated to 130 F on a hot plate. Twenty four preweighed coupons were coated with Flux Kester Solder Flux 1544 (64-17-5, 78-92-2, 8050-09-7) and allowed to dry for a half an hour and reweighed. Three coupons were cleaned in each solution for 5 minutes using stir-bar-agitation, rinsed in a tap water bath for 15 seconds at 120 F and dried using air blow off for 30 seconds at 68 F. Coupons were allowed to dry for a half an hour and then reweighed a final time. Efficiencies were calculated.

Results:

Summary:

Substrates:	Aluminum				
Contaminants:	Fluxes				
Company Name:	**Product Name:**	**Conc.:**	**Efficiency:**	**Effective:**	**Observations:**
Finger Lakes Chemical	Safer Stuff	100	84.41	☐	
Transene Company, Inc.	D Greeze 1000	100	92.62	☑	
National Diagnostic	Histo Clear	100	88.06	☑	
Alconox Inc	Liquinox	5	61.84	☐	
Fine Organic Corporation	FO 2085 M	5	96.64	☑	
Magnaflux	Daraclean 235	5	97.86	☑	
Today & Beyond	Beyond 2003	5	77.24	☐	
US Polychem Corporation	Polychem A 2000 P	5	2.27	☐	

Conclusion: Half of the products were effective at removing the contaminant at an efficiency rate of over 88%.