CLEANING LABORATORY EVALUATION SUMMARY

SCL #: 2006

DateRun: 05/11/2006

Experimenters: Jason Marshall

ClientType: General

ProjectNumber: Project #1

Substrates: Steel

PartType: Part

Contaminants: Paints

Cleaning Methods: Ultrasonics

Analytical Methods: Visual

Purpose: To evaluate selected products on third set of spindles using ultrasonic cleaning

Experimental Procedure: One of the three products was diluted to 5% using DI water and the other was diluted 50% in 600 ml beakers. The cleaning solutions were heated to 130 F in an ultrasonic tank.

The supplied parts were coated with a water based paint mixture. One end of spindle was immersed into a cleaning product and cleaned for 30 minutes using a 40 kHz ultrasonic tank. Visual observations were made at 5, 10, 20 and 30 minutes. After the cleaning, the part was rinsed in a tap water spray for 15 seconds at 120 F and air dried for 30 seconds at room temperature. The parts were then rubbed with a gloved hand to determine how easily the paint could be removed.

Results: The products removed most of the paint from the supplied parts. The observations made for each product are listed in the table below.

Cleaner	Time	End	Observations
Inproclean 4000 T	5	1-Top	No visual change
	10		Paint coming off
	20		Still paint at tip
	30		Pull paint off of tip; Mostly clean
Inproclean 4000 T	5	1-Base	Paint peeling off; oil coming off
	10		Good removal
	20		Some paint hard to remove
	30		Still paint remaining; Mostly clean
SC Acitisolv	5	2-Top	Paint peeling off base; coming loose
	10		Peel off paint
	20		Nearly clean
	30		Clean
SC Actisolv	5	2-Base	Paint falling off; good removal of oil
	10		Good removal of paint and oil
	20		Nearly clean
	30		Mostly clean

Summary:

Substrates:	Steel				
Contaminants:	Paints				
Company Name:	**Product Name:**	**Conc.:**	**Efficiency:**	**Effective:**	**Observations:**
Oakite Products	Inproclean 4000 T	5		☑	
Gemtek Products	SC Actisolv Safety Solvent	50		☑	

Conclusion: Both products removed most of the oil and paint from the spindles after 30 minutes of ultrasonic cleaning.