

# CLEANING LABORATORY EVALUATION SUMMARY

SCL #: 2017

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ClientType: Cleaner Manufacturer

ProjectNumber: Project #7

Substrates: Skin

PartType: Coupon

Contaminants: Dirt

Cleaning Methods: Manual Wipe

Analytical Methods: Tactile, Visual

Purpose: To evaluate the supplied product's performance for cleanliness, lathering and dryness under GS 41 Hand Washing test method.

Experimental Procedure: Three testers were used to evaluate the supplied product's performance. A preliminary review of the tester's hands was conducted before soiling their hands with GS 41 Hand Washing test soil. The soil used consisted of 5 grams of Synthetic carpet soil AATCC Test Method 122, 20 ml tap water. The water and soil were mixed together to make a paste. A quarter size amount of soil was applied to a subject's hand. Both hands were then rubbed together to distribute the soil to both hands for 20 seconds. The subjected hand was then reevaluated for a cleanliness rating. Two pumps of hand soap were applied to the dirty hands. The hands were rubbed together with soap for 20 seconds and followed by rinsing hands in tap water for 20 seconds. The hands were then blotted dry with paper towels for 20 seconds. Observations were made after cleaning the contaminated hands for cleanliness, lathering/rinsing and skin condition. Cleanliness and lathering observations were made once and the skin condition was recorded at 1, 5, 20 and 60 minutes.

Observations were ranked using the following guidelines:

Observe cleanliness  
Rank Cleanliness

- 1 No signs of soil
- 2 Only in fine lines of hand or Intermittent spots but not in fine lines
- 3 Intermittent spots and in fine lines
- 4 Multiple spots
- 5 Continually covered

Observe lathering/rinsing  
Rank Lathering/Rinsing

- 1 Lots of lathering - easy rinsing
- 2 Some lathering - easy rinsing
- 3 Some lathering - hard rinsing
- 4 Little lathering - easy rinsing/ No lathering - easy rinsing
- 5 No lathering - hard rinsing

Observe skin condition after clean/rinse/dry at 1 minute, 5 minutes, 20 minutes and 60 minutes.  
Rank Skin Condition Observation

- 1 Smooth and soft
- 2 Some dryness
- 3 Dry - Hands turning white
- 4 Skin stiffening
- 5 Very dry - Cracking of skin

Subjects were selected on the basis of initial skin condition. The goal was to select skin types that were normal to dry so that the effect of the cleaners could be judged on at least two skin types.

Results: The observed cleanliness is rated from 1 being no signs of soil to 5 having continuous soil coverage. In addition to that the observed lathering is rated from 1 being lots of lathering to 5 having no lathering. Furthermore, the observed skin condition for dryness is rated from 1 being smooth and soft to 5 being very dry skin. Therefore, a cleaner is more effective when it has a lower observed rating in all three ratings: cleanliness; lathering; and dryness.

Cleaner	Dirty	Cleanliness	Average Cleanliness
Green Foaming A38AA	5	4	3.5
	5	3.5	
	5	3	

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Azura Foam Wash	5	1.5	2.7
	5	2.5	
	5	4	

Observed Lathering Results:

Cleaner	Lathering	Average Lathering
Green Foaming A38AA	3	2
	1	
	2	
Azura Foam Wash	1	1
	1	
	1	

Observed Skin Dryness Results:

Cleaner	1 min	5 min	20 min	60 min	Average (60 min.)
Green Foaming A38AA	1	1	1	1.5	2
	1	1	2	2.5	
	2	2	2	2	
Azura Foam Wash	2	1	1	2	1.8
	1.5	1.5	2	2	
	2	2	1	1.5	

Summary:

<b>Substrates:</b>		Skin			
<b>Contaminants:</b>		Dirt			
Company Name:	Product Name:	Conc.:	Efficiency:	Effective:	Observations:
Vi-Jon	Vi-Jon Green Foaming A38AA	100		<input type="checkbox"/>	Clean 3.5; Lathering 2.0; Skin 2.0
Deb Group	Azure Foam Wash	100		<input type="checkbox"/>	Clean 2.7; Lathering 1.0; Skin 1.8

Conclusion:

Comparative Analysis:

Green Foaming A38AA was less effective in removing GS 41 Hand Washing soil; the observed cleanliness rating was less clean than the comparative cleaner (Azura Foam Wash) (3.5 and 2.7 respectively).

The Green Foaming A38AA evaluated cleaner was observed to have less lathering than the comparative cleaner (2.0 and 1.0 respectively).

There was some observed dryness on the skin for both Green Foaming A38AA and Azura Foam Wash in one hour after washing the hands (2.0 and 1.8 respectively). However, hands treated with Green Foaming A38AA were observed to be less dry right after washing the hands as opposed to an hour later.

Overall, the most effective evaluated cleaning product in removing GS 41 Hand Washing soil is listed as the following: Azura Foam Wash, Green Foaming A38AA.