



***Wet Coefficient of Friction  
Lab Test Report***

**Prepared For:  
Chandler Balch  
Director, Technical Services  
Skudo, LLC**

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# Technical Report

**TRACTION AUDITING REPORT NUMBER:** SS04102018

**CUSTOMER NAME:** Chandler Balch  
Director, Technical Services

**TEST DATE:** 04/10/2018

**SUBJECT MATERIAL:** Skudo board

**TEST PROCEDURE:** ANSI/NFSI B101.3-2012 Wet Dynamic Coefficient of Friction  
ANSI/NFSI B101.1-2009 Wet Static Coefficient of Friction

**TEST DEVICE:** GS-1 Serial # 14A021 Calibrated 04/10/2018

**TEST RESULTS:**

**Wet SCOF**

Date	Time	Client	Case	Location	Condition	Test Pad	Oper	SCoF	AVG
10-Apr-18	12:46:14 PM	Skudo	lab 04102018	dome 1	Distilled Water	Neolite	BAJ	0.8615	
10-Apr-18	12:46:49 PM	Skudo	lab 04102018	dome 1	Distilled Water	Neolite	BAJ	0.8856	
10-Apr-18	12:47:33 PM	Skudo	lab 04102018	dome 1	Distilled Water	Neolite	BAJ	0.8036	0.85
10-Apr-18	1:19:35 PM	Skudo	lab 04102018	dome 2	Distilled Water	Neolite	BAJ	0.8125	
10-Apr-18	1:20:07 PM	Skudo	lab 04102018	dome 2	Distilled Water	Neolite	BAJ	0.814	
10-Apr-18	1:20:44 PM	Skudo	lab 04102018	dome 2	Distilled Water	Neolite	BAJ	0.7616	
10-Apr-18	1:21:13 PM	Skudo	lab 04102018	dome 2	Distilled Water	Neolite	BAJ	0.794	0.8
10-Apr-18	1:22:32 PM	Skudo	lab 04102018	dome 3	Distilled Water	Neolite	BAJ	0.7674	
10-Apr-18	1:23:05 PM	Skudo	lab 04102018	dome 3	Distilled Water	Neolite	BAJ	0.7766	
10-Apr-18	1:23:46 PM	Skudo	lab 04102018	dome 3	Distilled Water	Neolite	BAJ	0.7604	
10-Apr-18	1:24:16 PM	Skudo	lab 04102018	dome 3	Distilled Water	Neolite	BAJ	0.7792	0.77
10-Apr-18	1:29:10 PM	Skudo	lab 04102018	dimple 1	Distilled Water	Neolite	BAJ	0.6331	
10-Apr-18	1:29:45 PM	Skudo	lab 04102018	dimple 1	Distilled Water	Neolite	BAJ	0.6248	
10-Apr-18	1:30:13 PM	Skudo	lab 04102018	dimple 1	Distilled Water	Neolite	BAJ	0.65	
10-Apr-18	1:30:44 PM	Skudo	lab 04102018	dimple 1	Distilled Water	Neolite	BAJ	0.6922	0.65
10-Apr-18	1:36:19 PM	Skudo	lab 04102018	dimple 2	Distilled Water	Neolite	BAJ	0.6283	
10-Apr-18	1:36:37 PM	Skudo	lab 04102018	dimple 2	Distilled Water	Neolite	BAJ	0.642	
10-Apr-18	1:37:03 PM	Skudo	lab 04102018	dimple 2	Distilled Water	Neolite	BAJ	0.6536	
10-Apr-18	1:37:30 PM	Skudo	lab 04102018	dimple 2	Distilled Water	Neolite	BAJ	0.669	0.65
10-Apr-18	1:42:49 PM	Skudo	lab 04102018	dimple 3	Distilled Water	Neolite	BAJ	0.6766	
10-Apr-18	1:43:13 PM	Skudo	lab 04102018	dimple 3	Distilled Water	Neolite	BAJ	0.6659	
10-Apr-18	1:43:35 PM	Skudo	lab 04102018	dimple 3	Distilled Water	Neolite	BAJ	0.7069	
10-Apr-18	1:43:58 PM	Skudo	lab 04102018	dimple 3	Distilled Water	Neolite	BAJ	0.686	0.68



# Technical Report

Wet DCOF

Date	Time	Client	Case	Location	Condition	Test Pad	Oper	DCoF	AVG
10-Apr-18	12:49:10 PM	Skudo	lab 04102018	dome 1	SLS	SBR	BAJ	0.547	
10-Apr-18	12:49:52 PM	Skudo	lab 04102018	dome 1	SLS	SBR	BAJ	0.4801	
10-Apr-18	12:50:28 PM	Skudo	lab 04102018	dome 1	SLS	SBR	BAJ	0.4039	
10-Apr-18	12:51:08 PM	Skudo	lab 04102018	dome 1	SLS	SBR	BAJ	0.444	● 0.47
10-Apr-18	12:54:47 PM	Skudo	lab 04102018	dome 2	SLS	SBR	BAJ	0.4914	
10-Apr-18	12:55:21 PM	Skudo	lab 04102018	dome 2	SLS	SBR	BAJ	0.4069	
10-Apr-18	12:55:51 PM	Skudo	lab 04102018	dome 2	SLS	SBR	BAJ	0.3956	
10-Apr-18	12:56:27 PM	Skudo	lab 04102018	dome 2	SLS	SBR	BAJ	0.3878	● 0.42
10-Apr-18	1:25:31 PM	Skudo	lab 04102018	dome 3	SLS	SBR	BAJ	0.4885	
10-Apr-18	1:26:07 PM	Skudo	lab 04102018	dome 3	SLS	SBR	BAJ	0.459	
10-Apr-18	1:26:37 PM	Skudo	lab 04102018	dome 3	SLS	SBR	BAJ	0.4235	
10-Apr-18	1:27:08 PM	Skudo	lab 04102018	dome 3	SLS	SBR	BAJ	0.4689	● 0.46
10-Apr-18	1:32:29 PM	Skudo	lab 04102018	dimple 1	SLS	SBR	BAJ	0.4639	
10-Apr-18	1:33:02 PM	Skudo	lab 04102018	dimple 1	SLS	SBR	BAJ	0.3886	
10-Apr-18	1:33:30 PM	Skudo	lab 04102018	dimple 1	SLS	SBR	BAJ	0.3861	
10-Apr-18	1:34:01 PM	Skudo	lab 04102018	dimple 1	SLS	SBR	BAJ	0.4074	● 0.41
10-Apr-18	1:38:48 PM	Skudo	lab 04102018	dimple 2	SLS	SBR	BAJ	0.4155	
10-Apr-18	1:39:12 PM	Skudo	lab 04102018	dimple 2	SLS	SBR	BAJ	0.3893	
10-Apr-18	1:39:34 PM	Skudo	lab 04102018	dimple 2	SLS	SBR	BAJ	0.3947	
10-Apr-18	1:39:55 PM	Skudo	lab 04102018	dimple 2	SLS	SBR	BAJ	0.3397	● 0.38
10-Apr-18	1:44:52 PM	Skudo	lab 04102018	dimple 3	SLS	SBR	BAJ	0.4306	
10-Apr-18	1:45:15 PM	Skudo	lab 04102018	dimple 3	SLS	SBR	BAJ	0.427	
10-Apr-18	1:45:37 PM	Skudo	lab 04102018	dimple 3	SLS	SBR	BAJ	0.4158	
10-Apr-18	1:46:00 PM	Skudo	lab 04102018	dimple 3	SLS	SBR	BAJ	0.413	● 0.42



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## DATA INTERPRETATION

For Wet Static Coefficient of Friction results interpreted per the ranges set forth in the ANSI/NFSI B101.1-2009 Test Method for Measuring Wet Static Coefficient of Friction of Common Hard Surface Floor Materials

For Wet Dynamic Coefficient of Friction results interpreted per the ranges set forth in the: ANSI/NFSI B101.3-2012 Test Method for Measuring Wet Dynamic Coefficient of Friction of Common Hard Surface Floor Materials

**Table 1-ANSI/NFSI B101.1-2009**

Wet SCOF Value ( $\mu$ )	Available Traction	Remediation
$m\mu \geq 0.60$	High Traction - Lower probability of slipping	Monitor SCOF regularly and maintain cleanliness.
$0.40 \leq m\mu < 0.60$	Moderate Traction - Increased probability of slipping	Monitor SCOF regularly and maintain cleanliness. Consider traction enhancing products and technologies.
$m\mu < 0.40$	Minimal Available Traction - Higher probability of slipping	Seek professional intervention. Consider replacing flooring and/or coating with high traction products.

*NOTE: It is important to note that these categories are not indicative of all possible conditions. There are numerous variables that may add to, or take from the available traction of any given floor surface. (ie: type or style of footwear, types and frequency contaminants, pedestrian preoccupation, etc.) These ranges were established based on a list of approved tribometers, which were in turn based on a specific set of selection criteria. As such, these values contained in Table 1. have not been validated against the full range of other tribometers. Data produced by tribometers which are not designed to measure wet SCOF do not necessarily correlate to the values listed in Table 1.*

**Table 1- ANSI/NFSI B101.3-2012**

Wet DCOF Value ( $\mu$ )	Slip Resistance Potential	Action
$>0.45$ (inclines) $m\mu > 0.42$	High - Lower probability of slipping	Monitor SCOF regularly and maintain cleanliness.
$0.30 \leq \mu < 0.45$ (inclines) $0.30 \leq m\mu < 0.42$	Acceptable - Increased probability of slipping	Monitor SCOF regularly and maintain cleanliness. Consider traction enhancing products and technologies.
$m\mu < 0.30$	Low - Higher probability of slipping	Seek professional intervention. Consider replacing flooring and/or coating with high traction products.

*\*NOTE: It is important to note that these categories are not indicative of all possible conditions. There are numerous variables that may add to, or take from the available traction of any given floor surface. (ie: type or style of footwear, types and frequency contaminants, pedestrian preoccupation, etc.) The DCOF ranges were established based on research done in Europe utilizing empirical and mathematical techniques and were validated in the laboratory and field through extensive testing with the following standardized methods: DIN 13287 – BST Tester; DIN 51130 – German Ramp; DIN 51131 – GMG 2000 Tester. These values would be applicable to other test methods or devices which can produce an R correlation of greater than 0.80 to one of these three reference standards. Data produced by tribometers which are not designed to measure wet DCOF do not necessarily correlate to the values listed in Table 1. Results of dry and wet tests should be view independent of each other, and not compared.*

Test completed and testified to by:

**Brent A. Johnson**

ANSI/WACH 0001

04/10/2018