

ALL VICTORY GRASS (GAUNGZHOU) CO., LTD

Test Report

Japan Labotech Corporation

1-42-2, Itabashi, Itabashi Ku, Tokyo To, 173-0004, Japan

TEL.03-5944-1180 FAX.03-5944-1187

Experimental reception date: 24 May 2021

Product name: ARTIFICIAL TURF (CODE: CDQ068)



Test content Antibacterial test: JIS L1902:2015 Test method and antibacterial effect of fiber products (bacterial liquid absorption method)
-As far as possible to cut the turf substrate as a sample for practical testing
-Test strains: Staphylococcus aureus subsp. aureus (NBRC No.12732)

Test Result Summary

Samples	Antibacterial activity value
① Artificial Turf (CODE: CDQ068)	2.0

(Reference) Antibacterial Activity Value and Effect Standard (JIS L1902)

Antibacterial activity value A	Antibacterial effect
$2.0 \leq A < 3.0$	Effective
$3.0 \leq A$	Strong Effective

Test Results Details

Antibacterial Effect on Staphylococcus aureus (NBRC No. 12732)

Bacterial concentration (CFU/mL)
1.4×10^5

Control sample	Distinction	N	Amount of Living bacteria (CFU/ mL)	Common logarithm of the mean of living bacteria [log]	Proliferation value[G]
Standard cotton cloth	After inoculation [C ₀]	1	9.4×10 ³	4.0	2.9
		2	9.4×10 ³		
		3	1.0×10 ⁴		
	18hr after cultivation [C _t]	1	9.3×10 ⁶	6.9	
		2	7.8×10 ⁶		
		3	9.2×10 ⁶		

Test sample	Distinction	N	Amount of Living bacteria (CFU/mL)	Common logarithm of the mean of living bacteria [log]	Proliferation value[G]	Antibacterial activity value[A]
①Artificial Turf (CODE: CDQ068)	After inoculation [T ₀]	1	2.2×10 ⁴	4.3	0.9	2.0
		2	1.9×10 ⁴			
		3	2.4×10 ⁴			
	18hr after cultivation [T _t]	1	2.4×10 ⁵	5.2		
		2	2.0×10 ⁵			
		3	6.0×10 ⁴			

Calculation method of Antibacterial activity value

$A = (\log C_t - \log C_0)$ As far as possible to remove the turf part of the substrate as a sample to carry out the test

A: Antibacterial activity value

F: Proliferation values of the control samples ($F = \log C_t - \log C_0$)

G: Proliferation value of test samples ($G = \log T_t - \log T_0$)

$\log C$: Common arithmetic logarithmic value of live bacteria of 3 control samples after inoculation after 18 to 24 h

$\log C_0$: Common arithmetic logarithmic value of live bacteria of 3 control samples after inoculation

$\log T_t$: Common arithmetic logarithmic value of live bacteria of 3 test samples after inoculation after 18 to 24 h of culture

$\log T_0$: Common arithmetic logarithmic value of live bacteria of 3 test samples after inoculation

When $\log C_0 > \log T_0$, change $\log T_0$ to $\log C_0$ calculate .