

Advance International Cleaning Systems (NZ) Ltd
PO Box 12642
Penrose, Auckland 1642
NZ

Client Account Number: A01184126QPX
Eurofins Quote Number: UF8DPH21003202

Eurofins Sample Number NJ21AB3400-5

Original Received Date:	20-Oct-2021
Description:	5L Germshield
Containers Submitted:	1 Bottle(s)

Analysis**Virucidal Test by Carrier Method**

Refer to Attachment # 1

Method: TMCV 006, ASTM E1053

Analysis Date: 04-Nov-2021

Supplemental Information

Samples were tested as received. Specifications (if) reported are as provided by the client.

Contracted Company: Eurofins ams Laboratories (Sydney)

8, Rachael Close, Silverwater, NSW 2128 Australia
SampleReceiptAMS@eurofins.com

TGA Licence No: MI-15112007-LI-002191-11 APVMA Licence No: 6139

Questions about this report should be directed to your project manager or the general email listed above.

CONDITIONS	
Virus Strain	Murine hepatitis virus (MHV1) ATCC/VR-261
Cell Substrate	A9 cells ATCC/CCL- 1.4
Test Concentration	Neat
Contact Time	10 minutes
Test Temperature	Room temperature
Test Condition	Dirty 5% FBS (Fetal Bovine Serum)
Neutraliser	3 cc Sephadex Gel in PBS (Phosphate Buffer Saline)

RESULTS: TABLE 1: MHV1 test/control results for 10 minutes contact

Virus Dilution	Number of Inoculated Wells	Virus Control	Percentage	Cytotoxicity	Neutralisation	Test Sample	Percentage
10 ⁻¹	4	4 ⁺ /4	100.00	C	C	C	N/A
10 ⁻²	4	4 ⁺ /4	100.00	C	C	C	N/A
10 ⁻³	4	4 ⁺ /4	100.00	0 ⁺ /4	4 ⁺ /4	0 ⁺ /4	0.00
10 ⁻⁴	4	4 ⁺ /4	100.00	N/A	N/A	0 ⁺ /4	0.00
10 ⁻⁵	4	4 ⁺ /4	100.00	N/A	N/A	0 ⁺ /4	0.00
10 ⁻⁶	4	3 ⁺ /4	87.50	N/A	N/A	0 ⁺ /4	0.00
10 ⁻⁷	4	2 ⁺ /4	57.14	N/A	N/A	N/A	N/A
10 ⁻⁸	4	2 ⁺ /4	28.57	N/A	N/A	N/A	N/A
Log ₁₀	-	7.25	-	2.50	2.50	2.50	-
Log ₁₀ Reduction of Virus after Treatment					4.75		

Note: Presence of virus in each response is recorded as “+”
 Absence of virus in each response is recorded as “0”
 Cytotoxic response is recorded as “C”
 Calculated virus titre = 10^{7.25}TCID_{50/0.1ml} (7.25 log₁₀)
 Cell control - 4 wells with healthy cell monolayer

* The Reed & Muench LD50 Method was used for determining the virus titre endpoint.

CONCLUSIONS:

Considering the cytotoxicity and neutralisation test results, the sample has shown virucidal efficacy against MHV1 by achieving 4.75 log reduction in virus concentration after 10 minutes exposure period at room temperature.