## **EMSL Analytical, Inc.**

2500 Gateway Centre Blvd., Suite 600 Morrisville, NC 27560 919-465-3900/919-465-3950

raleighlab.com

Attention: Nick Medendorp
UV Innovators

401 Harrison Oaks Blvd, Suite 230

Cary, NC 27513

Project: Salmonella typhimurium ATCC 14028

Project ID:

Phone: 919-608-2947

Email: nick@uvinnovators.com

**Customer PO:** 

EMSL Order: 292011288 Customer ID: UVIN42

Revision: 0.00

## Antimicrobial Efficacy of Ultaviolet Germicidal Irradiation (Test Method ASTM E3135)

Number of test conditions: 3

Report Date: 11/6/2020

Date Incolulum created: 11/5/2020

Date Samples treated: 11/5/2020

Organism: Salmonella typhimurium ATCC 14028

Incubation Temperature: 35
Incubation Period: 24

Media, Lot & Expiration: TSA Lot # 134647 Exp. 11/23/20

Counted by & Date:

**Raw Counts** 

Goldstein 11/6/20

NOTES:

NC= Negative Control
PC Positive Control

Dry time 40 minutes

No growth on environmental controls

Test Name: NC1 NC2 NC3 PC1 PC2 PC3

Dilution

10 <sup>-1</sup>	0	0	0	ND	ND	ND
10 <sup>-2</sup>	ND	ND	ND	TNTC	TNTC	TNTC
10 <sup>-3</sup>	ND	ND	ND	TNTC	TNTC	TNTC
10 <sup>-4</sup>	ND	ND	ND	TNTC	TNTC	TNTC
10 <sup>-5</sup>	ND	ND	ND	TNTC	TNTC	TNTC
10 <sup>-6</sup>	ND	ND	ND	22	30	30
10 <sup>-7</sup>	ND	ND	ND	1	4	5

Positive Control Average

STD:

27,333,333.33

4.62

ND= Not Done, TNTC=Too numerous to count

alan Goldstein

Laboratory Manager or Other Approved Signatory

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Businests Calmana alla tradicionazione ATOO 44000

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Counted by & Date: Goldstein 11/6/20

Notes:

T1=1 second

T2=2 seconds

T3=4 seconds

Test Name:	T1a	T1b	T1c	T2a	T2b	T2c	T3a	T3b	T3c
mJ/cm2 :	13.89	13.88	13.88	28.02	28.01	28.01	56.29	56.24	56.22
Dilution	RAW COUNTS								
10 <sup>-1</sup>	TNTC	TNTC	TNTC	TNTC	TNTC	TNTC	63	63	68
10 <sup>-2</sup>	64	173	177	22	108	38	9	2	6
10 <sup>-3</sup>	8	13	9	6	13	3	0	0	0
10 <sup>-4</sup>	0	2	1	0	1	0	0	0	0
10 <sup>-5</sup>	0	0	0	0	0	0	0	0	0
10 <sup>-6</sup>	0	0	0	0	0	0	0	0	0
10 <sup>-7</sup>	ND	ND	ND	ND	ND	ND	ND	ND	ND
_	•						•		

POSITIVE CONTROL AVERAGE: 27,333,333.33

	T1	T2	Т3
AVERAGE DOSE:	13.883	28.013	56.250
AVERAGE COUNT:	13,800.00	5,600.00	646.67
STD:	64.12	45.74	2.89
% KILLED:	99.950	99.980	99.998
LogR:	3.30	3.69	4.63

% Kill=(positive control count-test count)/positive control count\*100

LogR = (log10 positive control count)-(log10 test count)

ND= Not Done, TNTC=Too numerous to count

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