



Cylindrospermopsin ELISA Summary Report

Office of Water Quality - Watershed Assessment and Planning Branch

Sample #	Location	Date Collected	Date Analyzed	Conc. (ppb)
AB43893	Raccoon Lake SRA	8/24/2020	8/27/2020	< 0.15
AB43895	Cagles Mill Lake Beach	8/24/2020	8/27/2020	< 0.15
AB43896	Paynetown SRA	8/24/2020	8/27/2020	< 0.15
AB43897	Fairfax SRA	8/24/2020	8/27/2020	< 0.15
AB43898	Starve Hollow SRA	8/24/2020	8/27/2020	< 0.15
AB43899	Whitewater Memorial SP	8/25/2020	8/27/2020	< 0.15
AB43900	Quakertown SRA	8/25/2020	8/27/2020	< 0.15
AB43901	Mounds SRA	8/25/2020	8/27/2020	< 0.15
AB43902	Hardy Lake SRA	8/25/2020	8/27/2020	< 0.15
AB43903	Ft. Harrison SP Dog Lake	8/25/2020	8/27/2020	4.58
AB43904	Ferdinand State Forest Lake	8/25/2020	8/27/2020	< 0.15
AB43905	Patoka Lake	8/25/2020	8/27/2020	< 0.15
AB43906	Paynetown SRA (Field Duplicate)	8/24/2020	8/27/2020	< 0.15
AB43907	Field Blank	8/24/2020	8/27/2020	< 0.15
AB43908	Kunkel Lake @ Ouabache SP	8/24/2020	8/27/2020	< 0.15

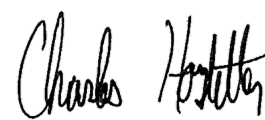
Test Information

Request: 8/27/2020 10:06:36 AM
Date: 8/27/2020

Name/ID	Assay	Absorbance	Concentration	Interpretation	Reference	Lot #
CYL Std 0	CYLINDROSPERMOPSIN	0.945 Abs	0.000 µg/L	R^2=0.99685, 101.50		19L2079
CYL Std 0	CYLINDROSPERMOPSIN	0.917 Abs [0.9310] {2.1 CV}	0.001 µg/L [0.001] {1.7 CV}	R^2=0.99685, 98.496		19L2079
CYL Std 1	CYLINDROSPERMOPSIN	0.793 Abs	0.041 µg/L	R^2=0.99685, 85.177		19L2079
CYL Std 1	CYLINDROSPERMOPSIN	0.791 Abs [0.7920] {0.2 CV}	0.042 µg/L [0.042] {1.7 CV}	R^2=0.99685, 84.962		19L2079
CYL Std 2	CYLINDROSPERMOPSIN	0.691 Abs	0.118 µg/L	R^2=0.99685, 74.221		19L2079
CYL Std 2	CYLINDROSPERMOPSIN	0.685 Abs [0.6880] {0.6 CV}	0.124 µg/L [0.121] {3.1 CV}	R^2=0.99685, 73.577		19L2079
CYL Std 3	CYLINDROSPERMOPSIN	0.588 Abs	0.254 µg/L	R^2=0.99685, 63.158		19L2079
CYL Std 3	CYLINDROSPERMOPSIN	0.602 Abs [0.5950] {1.7 CV}	0.231 µg/L [0.243] {6.1 CV}	R^2=0.99685, 64.662		19L2079
CYL Std 4	CYLINDROSPERMOPSIN	0.497 Abs	0.447 µg/L	R^2=0.99685, 53.383		19L2079
CYL Std 4	CYLINDROSPERMOPSIN	0.486 Abs [0.4915] {1.6 CV}	0.476 µg/L [0.461] {4.1 CV}	R^2=0.99685, 52.202		19L2079
CYL Std 5	CYLINDROSPERMOPSIN	0.345 Abs	1.051 µg/L	R^2=0.99685, 37.057		19L2079
CYL Std 5	CYLINDROSPERMOPSIN	0.336 Abs [0.3405] {1.9 CV}	1.105 µg/L [1.078] {3.1 CV}	R^2=0.99685, 36.090		19L2079
CYL Std 6	CYLINDROSPERMOPSIN	0.238 Abs	1.911 µg/L	R^2=0.99685, 25.564		19L2079
CYL Std 6	CYLINDROSPERMOPSIN	0.229 Abs [0.2335] {2.7 CV}	> 2.000 µg/L [1.911]	24.597 %Abs		19L2079
CYL QCS	CYLINDROSPERMOPSIN	0.422 Abs	0.686 µg/L	45.328 %Abs		19L2079
CYL QCS	CYLINDROSPERMOPSIN	0.424 Abs [0.4230] {0.3 CV}	0.679 µg/L [0.683] {0.3 CV}	45.542 %Abs [45.435]		19L2079

Note

Signature



Test Information

Request: 8/27/2020 10:08:24 AM
Date: 8/27/2020

Name/ID	Assay	Absorbance	Concentration	Interpretation	Reference	Lot #
LRB	CYLINDROSPERMOPSIN	0.889 Abs	0.005 µg/L	LOW, 95.489 %ABS	0.050 - 2.000	19L2079
LRB	CYLINDROSPERMOPSIN	0.834 Abs [0.8615] {4.5 CV}	0.022 µg/L [0.013] {8}	LOW, 89.581 %ABS	0.050 - 2.000	19L2079
LFB	CYLINDROSPERMOPSIN	0.438 Abs	0.627 µg/L	47.046 %Abs	0.050 - 2.000	19L2079
LFB	CYLINDROSPERMOPSIN	0.438 Abs [0.4380] {0.0 CV}	0.627 µg/L [0.627] {0}	47.046 %Abs [47.046]	0.050 - 2.000	19L2079
AB43893	CYLINDROSPERMOPSIN	0.798 Abs	0.039 µg/L	LOW, 85.714 %ABS	0.050 - 2.000	19L2079
AB43893	CYLINDROSPERMOPSIN	0.793 Abs [0.7955] {0.4 CV}	0.041 µg/L [0.040] {3}	LOW, 85.177 %ABS	0.050 - 2.000	19L2079
AB43895	CYLINDROSPERMOPSIN	0.830 Abs	0.024 µg/L	LOW, 89.151 %ABS	0.050 - 2.000	19L2079
AB43895	CYLINDROSPERMOPSIN	0.832 Abs [0.8310] {0.2 CV}	0.023 µg/L [0.023] {3}	LOW, 89.366 %ABS	0.050 - 2.000	19L2079
AB43895MS	CYLINDROSPERMOPSIN	0.465 Abs	0.538 µg/L	49.946 %Abs	0.050 - 2.000	19L2079
AB43895MS	CYLINDROSPERMOPSIN	0.450 Abs [0.4575] {2.3 CV}	0.586 µg/L [0.562] {6}	48.335 %Abs [49.14]	0.050 - 2.000	19L2079
AB43895MSD	CYLINDROSPERMOPSIN	0.439 Abs	0.624 µg/L	47.154 %Abs	0.050 - 2.000	19L2079
AB43895MSD	CYLINDROSPERMOPSIN	0.440 Abs [0.4395] {0.2 CV}	0.620 µg/L [0.622] {0}	47.261 %Abs [47.20]	0.050 - 2.000	19L2079
AB43896	CYLINDROSPERMOPSIN	0.799 Abs	0.038 µg/L	LOW, 85.822 %ABS	0.050 - 2.000	19L2079
AB43896	CYLINDROSPERMOPSIN	0.792 Abs [0.7955] {0.6 CV}	0.042 µg/L [0.040] {7}	LOW, 85.070 %ABS	0.050 - 2.000	19L2079
AB43897	CYLINDROSPERMOPSIN	0.823 Abs	0.027 µg/L	LOW, 88.400 %ABS	0.050 - 2.000	19L2079
AB43897	CYLINDROSPERMOPSIN	0.847 Abs [0.8350] {2.0 CV}	0.017 µg/L [0.022] {3}	LOW, 90.977 %ABS	0.050 - 2.000	19L2079
AB43898	CYLINDROSPERMOPSIN	0.829 Abs	0.024 µg/L	LOW, 89.044 %ABS	0.050 - 2.000	19L2079
AB43898	CYLINDROSPERMOPSIN	0.801 Abs [0.8150] {2.4 CV}	0.037 µg/L [0.031] {3}	LOW, 86.037 %ABS	0.050 - 2.000	19L2079
AB43899	CYLINDROSPERMOPSIN	0.795 Abs	0.040 µg/L	LOW, 85.392 %ABS	0.050 - 2.000	19L2079
AB43899	CYLINDROSPERMOPSIN	0.803 Abs [0.7990] {0.7 CV}	0.036 µg/L [0.038] {7}	LOW, 86.251 %ABS	0.050 - 2.000	19L2079
AB43900	CYLINDROSPERMOPSIN	0.805 Abs	0.035 µg/L	LOW, 86.466 %ABS	0.050 - 2.000	19L2079
AB43900	CYLINDROSPERMOPSIN	0.799 Abs [0.8020] {0.5 CV}	0.038 µg/L [0.036] {5}	LOW, 85.822 %ABS	0.050 - 2.000	19L2079
AB43901	CYLINDROSPERMOPSIN	0.813 Abs	0.031 µg/L	LOW, 87.325 %ABS	0.050 - 2.000	19L2079
AB43901	CYLINDROSPERMOPSIN	0.813 Abs [0.8130] {0.0 CV}	0.031 µg/L [0.031] {0}	LOW, 87.325 %ABS	0.050 - 2.000	19L2079
AB43902	CYLINDROSPERMOPSIN	0.811 Abs	0.032 µg/L	LOW, 87.111 %ABS	0.050 - 2.000	19L2079
AB43902	CYLINDROSPERMOPSIN	0.785 Abs [0.7980] {2.3 CV}	0.046 µg/L [0.039] {2}	LOW, 84.318 %ABS	0.050 - 2.000	19L2079
AB43903	CYLINDROSPERMOPSIN	0.484 Abs	4.820 µg/L	HIGH, 51.987 %ABS	0.050 - 2.000	19L2079
AB43903	CYLINDROSPERMOPSIN	0.502 Abs [0.4930] {2.6 CV}	4.340 µg/L [4.580] {7}	HIGH, 53.921 %ABS	0.050 - 2.000	19L2079
AB43904	CYLINDROSPERMOPSIN	0.800 Abs	0.038 µg/L	LOW, 85.929 %ABS	0.050 - 2.000	19L2079
AB43904	CYLINDROSPERMOPSIN	0.796 Abs [0.7980] {0.4 CV}	0.040 µg/L [0.039] {3}	LOW, 85.499 %ABS	0.050 - 2.000	19L2079
AB43905	CYLINDROSPERMOPSIN	0.819 Abs	0.028 µg/L	LOW, 87.970 %ABS	0.050 - 2.000	19L2079
AB43905	CYLINDROSPERMOPSIN	0.835 Abs [0.8270] {1.4 CV}	0.022 µg/L [0.025] {1}	LOW, 89.689 %ABS	0.050 - 2.000	19L2079
AB43906	CYLINDROSPERMOPSIN	0.804 Abs	0.036 µg/L	LOW, 86.359 %ABS	0.050 - 2.000	19L2079
AB43906	CYLINDROSPERMOPSIN	0.781 Abs [0.7925] {2.1 CV}	0.048 µg/L [0.042] {2}	LOW, 83.888 %ABS	0.050 - 2.000	19L2079
AB43907	CYLINDROSPERMOPSIN	0.784 Abs	0.046 µg/L	LOW, 84.211 %ABS	0.050 - 2.000	19L2079
AB43907	CYLINDROSPERMOPSIN	0.794 Abs [0.7890] {0.9 CV}	0.041 µg/L [0.043] {8}	LOW, 85.285 %ABS	0.050 - 2.000	19L2079
AB43908	CYLINDROSPERMOPSIN	0.795 Abs	0.040 µg/L	LOW, 85.392 %ABS	0.050 - 2.000	19L2079
AB43908	CYLINDROSPERMOPSIN	0.774 Abs [0.7845] {1.9 CV}	0.052 µg/L [0.046] {1}	83.136 %ABS [LOW]	0.050 - 2.000	19L2079

Note

Signature 

Assay Information

Assay Name: CYLINDROSPERMOPSIN

Version: 2

Temperature: Room Temperature

Last Modified By: Security disabled

Units: µg/L

Assay Description: PN 522011

Assay Substances: Controls:
CYL QCS

Standards:

CYL Std 0, Concentration = 0.000, Minimum number to use: 2

CYL Std 1, Concentration = 0.050, Minimum number to use: 2

CYL Std 2, Concentration = 0.100, Minimum number to use: 2

CYL Std 3, Concentration = 0.250, Minimum number to use: 2

CYL Std 4, Concentration = 0.500, Minimum number to use: 2

CYL Std 5, Concentration = 1.000, Minimum number to use: 2

CYL Std 6, Concentration = 2.000, Minimum number to use: 2

Curve valid interval: 1 days 0 hours

Axis Mode: Y = Abs, X = Log(Conc)

Assay Mode: 4-Parameter Logistic Weight by:None

Well Type: Flat bottom

Last Modified On: 8/15/2019 12:26:24 PM

Normal: 0.050 - 2.000

of decimals: 3

Kit Lot Number: 19L2079

Assay Calibration

Current Calibration Status: "

"

Name	Absorbance	Concentration	Interpretation	Position
8/27/2020 10:06:36 AM				
CYL Std 0	0.945 Abs		R^2=0.99685, 101.504 %Abs	RK1:23->A01@2
CYL Std 0	0.917 Abs [0.9310] {2.1 CV}		R^2=0.99685, 98.496 %Abs	RK1:23->B01@2
CYL Std 1	0.793 Abs		R^2=0.99685, 85.177 %Abs	RK1:24->C01@2
CYL Std 1	0.791 Abs [0.7920] {0.2 CV}		R^2=0.99685, 84.962 %Abs	RK1:24->D01@2
CYL Std 2	0.691 Abs		R^2=0.99685, 74.221 %Abs	RK1:25->E01@2
CYL Std 2	0.685 Abs [0.6880] {0.6 CV}		R^2=0.99685, 73.577 %Abs	RK1:25->F01@3
CYL Std 3	0.588 Abs		R^2=0.99685, 63.158 %Abs	RK1:26->G01@3
CYL Std 3	0.602 Abs [0.5950] {1.7 CV}		R^2=0.99685, 64.662 %Abs	RK1:26->H01@3
CYL Std 4	0.497 Abs		R^2=0.99685, 53.383 %Abs	RK1:27->A02@2
CYL Std 4	0.486 Abs [0.4915] {1.6 CV}		R^2=0.99685, 52.202 %Abs	RK1:27->B02@2
CYL Std 5	0.345 Abs		R^2=0.99685, 37.057 %Abs	RK1:28->C02@2
CYL Std 5	0.336 Abs [0.3405] {1.9 CV}		R^2=0.99685, 36.090 %Abs	RK1:28->D02@2
CYL Std 6	0.238 Abs		R^2=0.99685, 25.564 %Abs	RK1:29->E02@2
CYL Std 6	0.229 Abs [0.2335] {2.7 CV}		24.597 %Abs	RK1:29->F02@3

8/27/2020 10:06:36 AM				
CYL QCS	0.422 Abs		45.328 %Abs	RK1:30->G02@3
CYL QCS	0.424 Abs [0.4230] {0.3 CV}		45.542 %Abs [45.435 %Abs]	RK1:30->H02@3

Statistic				
CYL Std 0 [MEAN]	0.9310			
CYL Std 0 [SD]	0.0198			
CYL Std 0 [%CV]	2.1266			
CYL Std 1 [MEAN]	0.7920			
CYL Std 1 [SD]	0.0014			
CYL Std 1 [%CV]	0.1786			
CYL Std 1 [%DIFF]				
CYL Std 2 [MEAN]	0.6880			
CYL Std 2 [SD]	0.0042			
CYL Std 2 [%CV]	0.6167			
CYL Std 2 [%DIFF]				
CYL Std 3 [MEAN]	0.5950			
CYL Std 3 [SD]	0.0099			
CYL Std 3 [%CV]	1.6638			
CYL Std 3 [%DIFF]				
CYL Std 4 [MEAN]	0.4915			
CYL Std 4 [SD]	0.0078			
CYL Std 4 [%CV]	1.5825			
CYL Std 4 [%DIFF]				

Name	Absorbance	Concentration	Interpretation	Position	
CYL Std 5 [MEAN]	0.3405				
CYL Std 5 [SD]	0.0064				
CYL Std 5 [%CV]	1.8690				
CYL Std 5 [%DIFF]					
CYL Std 6 [MEAN]	0.2335				
CYL Std 6 [SD]	0.0064				
CYL Std 6 [%CV]	2.7255				
CYL QCS [MEAN]	0.4230				
CYL QCS [SD]	0.0014				
CYL QCS [%CV]	0.3343				

Assay Curve

$y = (A-D)/(1+(x/C)^B) + D$
 Weight: NONE
 A = 0.93173
 B = 0.62260
 C = 1.0287
 D = -0.23381
 R2 coef = 0.99685
 50% = 0.536

