1   Table S1. CFU/L before and after UV processing, % inactivation, and average log reduction of

2   bacterial pathogens in in PBS

PATHOGEN	5-strain cocktail/L	Before UV CFU/L	After UV CFU/L	% Inactivation	Log reduction (SD)
E. coli O157:H7	1ml	2.12×10^9	0	100	9.5 (0.27)
	10ml	1.24×10^{10}	1	99.9	10.0 (0.26)
S. enterica	1ml	6.87×10^8	0	100	8.8 (0.16)
	10ml	5.47×10^9	3	99.9	9.4 (0.41)
L. monocytogenes	1ml	1.53×10^9	3	99.9	8.8 (0.44)
	10ml	9.47×10^9	10	99.9	9.0 (0.25)
Ps. syringae pv. tomato	1ml	2.67×10^8	2	99.9	8.1 (0.21)
	10ml	6.00×10^9	24	99.9	8.5 (0.70)
C. michiganensis subsp. michiganensis	1ml	6.43×10^8	20	99.9	7.5 (0.23)
	10ml	7.47×10^9	193	99.9	7.5 (0.28)

3   all values represent averages (n=6)

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1   Table S2. Zoospores/L before and after UV processing, % inactivation, and log reduction of *Ph.*

2   *capsici* in RO water

PATHOGEN	Before UV zoospores/L	After UV zoospores/L	% Inactivation	Log reduction (SD)
Ph. capsici	5×10^4	0	100	4.7 (0.0)
	5×10^5	5	99.9	5.0 (0.18)

3   all values represent averages (n=6)

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1   Table S3. CFU/L before and after UV processing, % inactivation, and average log reduction of

2   bacterial pathogens in creek water

PATHOGEN	5 -strain cocktail/L	Before UV CFU/L	After UV CFU/L	% Inactivation	Log reduction (SD)
E. coli O157:H7	1ml	1.73×10^9	0	100	9.5 (0.36)
	10ml	6.47×10^9	2	99.9	9.5 (0.72)
S. enterica	1ml	4.67×10^8	0	100	8.6 (0.23)
	10ml	8.00×10^9	44	99.9	8.6 (0.67)
L. monocytogenes	1ml	1.97×10^9	19	99.9	7.9 (0.42)
	10ml	1.17×10^{10}	809	99.9	7.1 (0.25)
Ps. syringae pv. *tomato*	1ml	1.15×10^9	26	99.9	7.7 (0.34)
	10ml	1.03×10^{10}	198	99.9	7.7 (0.22)
C. michiganensis subsp. *michiganensis*	1ml	4.65×10^8	62	99.9	6.9 (0.19)
	10ml	5.51×10^9	1,817	99.9	6.5 (0.16)

3   all values represent averages (n=6)

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1   Table S4. Zoospores/L before and after UV processing, % inactivation, and log reduction of *Ph.*

2   *capsici* in creek water

PATHOGEN	Before UV zoospores/L	After UV zoospores/L	% Inactivation	Log reduction (SD)
Ph. capsici	5×10^4	0	100	4.7 (0.0)
	5×10^5	8	99.9	4.8 (0.21)

3   all values represent averages (n=6)

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1   Table S5. CFU/L before and after UV processing, % inactivation, and average log reduction of

2   bacterial pathogens in pond water

PATHOGEN	5-strain cocktail/L	Before UV CFU/L	After UV CFU/L	% Inactivation	Log reduction (SD)
E. coli O157:H7	1ml	2.67×10^9	0	100	9.5 (0.12)
	10ml	8.00×10^9	460	99.9	7.3 (0.33)
S. enterica	1ml	6.47×10^8	4	99.9	8.3 (0.35)
	10ml	7.00×10^9	108	99.9	7.9 (0.21)
L. monocytogenes	1ml	2.10×10^9	123	99.9	7.2 (0.13)
	10ml	1.13×10^{10}	4,576	99.9	6.3 (0.21)
Ps. syringae pv. *tomato*	1ml	1.68×10^9	138	99.9	6.9 (0.42)
	10ml	1.11×10^{10}	1,986	99.9	6.8 (0.22)
C. michiganensis subsp. *michiganensis*	1ml	1.92×10^9	311	99.9	6.8 (0.18)
	10ml	1.84×10^{10}	16,033	99.9	6.1 (0.16)

3   all values represent averages (n=6)

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1 Table S6. Zoospores/L before and after UV processing, % inactivation, and log reduction of *Ph.*

2 *capsici* in pond water

PATHOGEN	Before UV zoospores/L	After UV zoospores/L	% Inactivation	Log reduction (SD)
Ph. capsici	5×10^4	1	99.9	4.7 (0.0)
	5×10^5	32	99.9	4.2 (0.15)

3 all values represent averages (n=6)

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