

## FIELD EQUIPMENT VERIFICATION (PRE/POST A WEEKLY SAMPLING):

Session No:	Verifiers (pre-sampling):	Pre Date:	Pre Time:	Verifiers (post-sampling):	Post Date:	Post Time:
78	T. Stark, Y. St-Louis	3/28/22	10:20 am	T. Stark, Y. St-Louis	3/31/22	10:18

QA/QC Check	Inst #	Probe #	Last Cal Date		PRE: Verification Value		POST: Verification Value		Acceptable Range	Comments/ Notes	QA?
Temperature	NIST	n/a	NIST Exp. Date	Std Val	NIST <sup>ym</sup>	NIST °C	NIST	NIST °C	± 0.6 °C of NIST	Compare to NIST Std value in tap water	
		2	10/16/22		26.53	25	29.4	—			
		3			26.4	25	30.3	—			
Salinity			3 months	Std Val	Tap water	Salin Std 1/24 date	Tap water	Salin Std 1/24 date	± 1 ppt	Tap water - compare pre & post values Salinity Std - compare to value on Salinity Std bottle	
	2	3	2/14/22		0.13	33.9 ppt	0.13	33.9 ppt			
	2	2	2/14/22		0.19	34.0	—	—			
	2	2	2/14/22		0.18	33.5	0.18 ym	33.7			
Dissolved Oxygen			1 year	Std Val	100%		100%		± 5 %		
	2	1	12/16/21		98.47 ym		—				
	2	2	12/16/21		98.6		97.0				
pH			3 weeks	Std Val	pH 7.00	pH 10.00	pH 7.00	pH 10.00	± 0.1 pH of pH std value	Compare to Manufacturer pH Std value on bottle	
	2	5	3/28/22		7.03	10.01	—	—		pH 10.01 exp: 03/22 pH 7.00 exp: 03/23	
	2	4	3/28/22		7.03	10.03	7.02	10.00		pH 4.01 exp: 12/23	
Turbidity			3 months	Std Val	BLANK <0.1	LOW 1-10 NTU	BLANK <0.1	LOW 1-10 NTU	± 0.18 NTU Low 1-10	Compare to Gel LOW 1-10 Std Calibration value	
	1	n/a	1/24/22		0.07	6.59	—	—		Low STD: 6.57 NTU	
	2	n/a	1/24/22		0.06	6.35	0.08	6.36		Low STD: 6.32 NTU	

QA: \* Are pre- and post within one week?  
\* Delay times are ok?  
\* Other equipment issues?

Lab: NMS



Team	Kamaole	Samplers (Last Name, 1st Initial)	S. Graves H. Hecht Y. Mayen	Meters and Probes ID		
Session	78			HQ40d: 2	2100Q: 2	
Date	03/29/2022			pH: 4	DO: 2	Salinity: 2

Location Name Sample ID	Freshwater Flowing (Y/N)	Time (of collection)	Temp (°C) variable	Salinity (ppt) 30-35 normal	Dissolved Oxygen		pH 8-8.3 normal	Turbidity (NTU)			People (within 100 ft)		
					(mg/L)	(%) 85-105 normal					water	beach	camp
Kalepolepo North NKN220329	N	0757	24.8	34.1	6.36	92.6	8.16	2.41	2.36	2.23	6	6	0
Waipuilani Park KWP220329	N	0815	24.5	32.4	6.11	87.7	8.10	9.06	8.39	9.19	1	6	0
Kihei South KKS220329	N	0832	25.6	33.9	5.73	84.6	8.13	6.09	5.62	7.41	0	0	0
Kalama Park KKP220329	N	0850	25.3	34.6	6.45	95.2	8.14	6.31	7.86	7.83	0	7	0

NOTES AND COMMENTS (trends, equipment problems, errors, concerns).  
Use the back of the form if needed.

Calm waters, no wind/very light wind.  
Canoeers paddling in.

KWP: Very light wind, calm waters  
Multi meter is acting up!  
It has to be restarted often.

Sites with potential for freshwater flow: All

#### TURBIDITY VERIFICATION

	Blank (must be <0.10)	Low (+/- 0.18)	Med (+/- 1.80)	High (+/- 18)
Standard	0.06	6.32	54.6	607
Pre-sampling	0.07	6.35	54.2	607
Post-sampling	0.07	6.35	54.7	606

#### CHAIN OF CUSTODY INFORMATION

	# of samples	Relinquished to	Contact
Sediment	-	-	-
Nutrients	4	NMS	T. Stark
Bacteria	-	-	-

Signature (Team Lead):

*Y. Mayen*

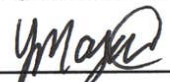
Printed Name:

Ylenia M St-Louis

Team	Kamaole	Samplers (Last Name, 1st Initial) S. Graves H. Hecht Y. St-Louis
Session	78	
Date	03/29/2022	

Sample ID	Location Name	Sample taken?	Duplicate sample?	Time	Volume	Protocol Notes	Comments
Nutrients							
NKN220329-N-1	Kalepolepo North	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0757	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
KWP220329-N-1	Waipuilani Park	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0815	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
KKS220329-N-1	Kihei South	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0832	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
KKP220329-N-1	Kalama Park	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0850	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	

Sediments							
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		

Signature (Team Lead): 	Printed Name: Ylenia M St-Louis
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<b>Team</b>	Wailea-Makena	<b>Samplers</b> (Last Name, 1st Initial)	B: Sousa, J. Dunning, M. Sharpe	<b>Meters and Probes ID</b>		
<b>Session</b>	78			HQ40d: 2	2100Q: 2	
<b>Date</b>	03/30/2022			pH: 4	DO: 2	Salinity: 2

Location Name Sample ID	Freshwater Flowing (Y/N)	Time (of collection)	Temp (°C) variable	Salinity (ppt) 30-35 normal	Dissolved Oxygen		pH 8-8.3 normal	Turbidity (NTU)			People (within 100 ft)		
					(mg/L)	(%) 85-105 normal					water	beach	camp
Cove Park KCP220330	N	8:20	25.1	33.1	6.45	94.1	8.12	2.06	2.23	2.44	1	1	2
S Maluaka Beach MMB220330	N	9:02	24.9	35.0	6.62	97.3	8.14	1.03	0.76	1.10	5	23	Ø
Ahihi Kinau North MAN220330	N	9:25	24.8	35.1	6.73	98.6	8.07	0.92	0.92	0.95	5	5	Ø
Ahihi Kinau South MAS220330	N	9:43	24.8	33.8	6.43	93.6	8.00	0.73	0.69	0.82	15	10	Ø

**NOTES AND COMMENTS** (trends, equipment problems, errors, concerns).  
Use the back of the form if needed.

cove park - 2 dogs on beach

Sites with potential for freshwater flow: Cove Park

#### TURBIDITY VERIFICATION

	Blank (must be <0.10)	Low (+/- 0.18)	Med (+/- 1.80)	High (+/- 18)
Standard	0.06	6.32	54.6	607
Pre-sampling	0.14	6.35	54.9	607
Post-sampling	0.06	6.29	54.6	606

#### CHAIN OF CUSTODY INFORMATION

	# of samples	Relinquished to	Contact
Sediment	-	-	-
Nutrients	4	NMS	T. Stark
Bacteria	-	-	-

Signature (Team Lead):

*Ymaje*

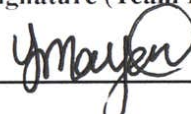
Printed Name:

Ylenia St-Louis

Team	Wailea-Makena	Samplers (Last Name, 1st Initial)	B. Sousa, J. Duming m. Sharpe
Session	78		
Date	03/30/2022		

Sample ID	Location Name	Sample taken?	Duplicate sample?	Time	Volume	Protocol Notes	Comments
Nutrients							
KCP220330-N-1	Cove Park	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0820	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
MMB220330-N-1	S Maluaka Beach	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0902	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
MAN220330-N-1	Ahihi Kinau North	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0925	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
MAS220330-N-1	Ahihi Kinau South	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0943	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	

Sediments							
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		

Signature (Team Lead): 	Printed Name: Ylenia St-Louis
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Team	North Kihei	Samplers (Last Name, 1st Initial)	Wolf, A, Baker, F	Meters and Probes ID		
Session	78			HQ40d: 2	2100Q: 2	
Date	03/31/2022			pH: 4	DO: 2	Salinity: 2

Location Name Sample ID	Freshwater Flowing (Y/N)	Time (of collection)	Temp (°C) variable	Salinity (ppt) 30-35 normal	Dissolved Oxygen		pH 8-8.3 normal	Turbidity (NTU)			People (within 100 ft)		
					(mg/L)	(%) 85-105 normal					water	beach	camp
Maalaea Harbor NMH220331	N	7:48	24.2	35.1	6.23	90.6	8.15	1.46	1.39	1.52	0	0	0
Maalaea Condos NMC220331	N	8:15	24.3	33.3	7.27	104.8	8.12	5.05	6.48	5.95	0	0	0
Haycraft Park NHP220331	N	8:25	24.6	34.5	6.73	98.0	8.11 <del>8.0</del>	5.29	6.06	5.67	0	3	8
Kealia Pond NKP220331	N	8:45	24.6	35.4	6.69	98.3	8.18	1.16 <del>1.10</del>	1.00		0	1	0
Kihei Canoe Club NKC220331	N	9:10	25.7	34.5	6.50	96.4	8.13	5.50	6.95	7.58	0	3	0

**NOTES AND COMMENTS** (trends, equipment problems, errors, concerns).  
Use the back of the form if needed.

Magnic Sign Blew off  
could not find it

Sites with potential for freshwater flow: Maalaea Harbor, Maalaea Condos, Kealia Pond, Kihei Canoe Club

#### TURBIDITY VERIFICATION

	Blank (must be <0.10)	Low (+/- 0.18)	Med (+/- 1.80)	High (+/- 18)
Standard	0.06	6.32	54.6	607
Pre-sampling	0.42	6.35	54.3	607
Post-sampling	0.08	6.36	54.9	607

#### CHAIN OF CUSTODY INFORMATION

	# of samples	Relinquished to	Contact
Sediment	-	-	-
Nutrients	5	NMS	T. Stark
Bacteria	-	-	-

Signature (Team Lead):

*[Signature]*

Printed Name:

Tiana Stark

\* Will speak to volunteers about Blank turbidity. Will plan to accompany them next  
examine the field for observation. - Tiana

Team	North Kihei	Samplers (Last Name, 1st Initial)	Wolf, A. Baher, F.
Session	78		
Date	03/31/2022		

Sample ID	Location Name	Sample taken?	Duplicate sample?	Time	Volume	Protocol Notes	Comments
Nutrients							
NMH220331-N-1	Maalaea Harbor	<input checked="" type="checkbox"/>	<input type="checkbox"/>	7:48	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
NMC220331-N-1	Maalaea Condos	<input checked="" type="checkbox"/>	<input type="checkbox"/>	8:15	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
NHP220331-N-1	Haycraft Park	<input checked="" type="checkbox"/>	<input type="checkbox"/>	8:25	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
NKP220331-N-1	Kealia Pond	<input checked="" type="checkbox"/>	<input type="checkbox"/>	8:45	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	
NKC220331-N-1	Kihei Canoe Club	<input checked="" type="checkbox"/>	<input type="checkbox"/>	9:10	125 ml	Washed, rinsed syringes; acid washed bottles; 0.2 um disposable filters	

Sediments							
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		
		<input type="checkbox"/>	<input type="checkbox"/>		500 ml		

Signature (Team Lead):	Printed Name:
<i>Tiara Stark</i>	Tiara Stark