

APPENDIX A

STRATIFICATION DATA TABLES

2005 Walter Stratification

Station	Date	Depth	Temp	DO%	DO Conc	pH	Chlorophyll
	M/D/Y	Feet	C		mg/L		ug/L
WA-1 Outfall	4/28/2005	0	10.45	83.8	9.36	6.84	2.7
	5/13/2005	0	11.96	94.7	10.21	6.13	2.6
	5/25/2005	0	14.48	99.3	10.12	6.56	1
	6/9/2005	0	17.19	102.7	9.88	6.37	9.2
	6/14/2005	0	21.56	102.1	9	6.26	0.2
	6/14/2005	0	19.55	100.2	9.19	6.24	0.1
	6/23/2005	0	20.57	99.5	8.95	6.69	-1.2
	6/28/2005	0	21.34	112	9.92	6.59	-2.5
	7/1/2005	0	22.47	109.8	9.52	6.54	0.3
	7/6/2005	0	22.68	140.9	12.16	6.49	0.8
	7/14/2005	0	21.27	93.8	8.32	5.8	0.5
	7/22/2005	0	23.99	92.6	7.79	5.99	0.6
	7/27/2005	0	23.84	90.9	7.67	5.93	0.7
	8/4/2005	0	24.22	94.3	7.9	6.11	0.2
	8/24/2005	0	22.96	89.3	7.67	6.52	0.6
9/20/2005	0	20.77	98.9	8.86	6.63	0.3	
WA-2 Lake Tower	4/28/2005	0	12.12	88.4	9.5	7.1	1.7
		5	12.13	88.8	9.55	7.11	1.9
		10	11.81	87.1	9.42	7.1	1.8
		15	11.72	86.5	9.38	7.11	1.4
		20	11.63	86.9	9.44	7.12	0.9
		25	11.55	85.9	9.35	7.1	0.3
		30	11.03	84.5	9.31	7.11	0.3
		35	10.71	85	9.43	7.13	0.8
		40	10.42	84.4	9.43	7.13	0.8
		45	10.11	82.9	9.33	7.11	0.5
		50	9.98	82.6	9.32	7.1	0.6
		55	9.69	81.7	9.29	7.11	0.2
		60	9.18	81.2	9.34	7.13	0.6
		65	9.23	80.5	9.25	7.11	0.7
		70	8.71	77.9	9.06	7.09	0.6
		75	8.59	75.6	8.83	7.07	0.5
		80	8.59	69.2	8.08	7.02	1.1
85	8.28	62.4	7.34	6.91	1.1		
WA-2 Lake Tower	5/13/2005	0	17.47	89.3	8.55	5.94	2.2
		5	16.9	89.5	8.66	5.92	4.1
		10	16.46	85.9	8.4	5.92	3.2
		15	14.91	85.8	8.67	5.89	1.4
		20	14.47	83.7	8.54	5.95	0.7
		25	13.67	82.9	8.6	5.99	1.1
		30	12.95	82.8	8.74	5.98	1
		35	11.96	81.8	8.82	6	0.5
		40	11.55	81.3	8.85	6	0.4
		45	11.32	78.9	8.64	6.06	0.5
		50	11.01	77.3	8.52	6.06	0.3
		55	10.88	75.7	8.37	6.08	0.1
		60	10.54	74.3	8.28	6.1	0.3
		65	10.23	70.8	7.95	6.1	0.2
		70	9.86	68.8	7.79	6.09	0.1
75	9.67	64.5	7.33	6.11	0.3		
80	9.56	60.3	6.88	6.13	2.2		

2005 Walter Stratification

Station	Date M/D/Y	Depth Feet	Temp C	DO%	DO Conc mg/L	pH	Chlorophyll ug/L
WA-2 Lake Tower	5/25/2005	0	16.56	91.3	8.9	6.13	2.4
		5	16.56	91.3	8.9	6.12	2.9
		10	16.57	91.2	8.9	6.11	1.9
		15	16.55	90.9	8.87	6.07	2.8
		20	16.54	90.3	8.81	6.05	2.5
		25	16.52	87.8	8.57	6	2.3
		30	15.24	81.3	8.15	5.94	0.9
		35	14.62	83.6	8.5	5.94	1.2
		40	14.31	78.7	8.06	5.9	0.8
		45	14.02	77.2	7.95	5.9	0.8
		50	13.64	69.4	7.21	5.87	0.5
		55	13.07	64.1	6.74	5.83	0.9
		60	11.9	51.3	5.54	5.8	0.8
		65	11.47	53.6	5.85	5.87	0.4
		70	10.4	26.3	2.95	6	1.3
		75	10.34	22.1	2.48	6.05	9
		80	10.31	19.3	2.16	6.1	7.1
85	10.26	19.9	2.24	6.1	11.6		
WA-2 Lake Tower	6/9/2005	0	24.58	100.6	8.38	6.51	1.6
		5	23.97	99.5	8.38	6.38	1.7
		10	23.71	97.5	8.25	6.32	1.2
		15	20.92	91.1	8.13	6.16	1.6
		20	19.58	87.6	8.03	6.15	1.9
		25	18.83	86.4	8.05	6.12	1.6
		30	17.92	85.3	8.08	6.09	1.3
		35	17.15	80.9	7.79	5.99	0.6
		40	16.14	73.1	7.2	5.87	0.4
		45	15.75	71.1	7.05	5.86	0.3
		50	15.01	66.5	6.7	5.87	0.5
		55	14.44	52	5.31	5.84	0.2
		60	13.36	45	4.7	5.75	0.8
		65	12.55	25	2.66	5.69	0.5
		70	12.28	16.4	1.75	5.68	0.7
75	11.99	8.2	0.88	5.74	0.6		
WA-2 Lake Tower	6/14/2005	0	27.21	99.9	7.93	6.23	0.9
		5	26.79	96.8	7.74	6.14	2
		10	25.55	88.2	7.21	6.05	1.6
		15	24.5	82.2	6.85	6	1.8
		20	23.49	82.1	6.98	5.97	1.4
		25	22.57	78.8	6.81	5.99	1.2
		30	21.53	73.9	6.52	5.96	1.1
		35	20.47	79.8	7.18	6.04	0.8
		40	19.19	74.4	6.87	5.97	0.8
		45	17.89	71.3	6.76	5.91	1.1
		50	16.56	63.2	6.17	5.86	0.5
		55	15.74	48.7	4.83	5.79	0.5
		60	14.98	40.1	4.04	5.77	0.4
		65	13.91	27.1	2.8	5.78	0.4
		70	13.6	9.9	1.03	5.78	0.7
75	13.62	14.8	1.53	5.71	0.5		
80	13.1	4.7	0.5	5.68	2.7		

2005 Walter Stratification

Station	Date	Depth	Temp	DO%	DO Conc	pH	Chlorophyll
	M/D/Y	Feet	C		mg/L		ug/L
WA-2 Lake Tower	6/23/2005	0	24.15	88	7.38	6.31	1.3
		5	23.24	84	7.17	6.25	3
		10	23.1	83.7	7.17	6.22	1.8
		15	22.96	80.4	6.9	6.15	1.7
		20	22.18	63.3	5.52	6.01	1
		25	21.84	62.4	5.48	6	0.7
		30	21.43	63.6	5.62	5.99	0.9
		35	20.75	60.2	5.39	5.97	0.5
		40	20.41	59.6	5.37	5.98	0.7
		45	20.17	60.3	5.46	5.97	0.5
		50	19.99	61.8	5.62	6.03	0.5
		55	19.74	60.9	5.56	6.03	0.7
		60	19.39	56.2	5.17	6	0.9
		65	19.02	46.1	4.27	5.93	0.8
		70	18.9	33	3.06	5.9	1.2
75	18.81	19.7	1.83	5.88	1.8		
WA-2 Lake Tower Secchi 2.1 meters (6' 11")	6/28/2005	0	28.02	112.1	8.77	6.39	0.9
		5	26.31	109.9	8.87	6.31	1.6
		10	23.97	99.6	8.39	6.15	1.8
		15	23.08	86.4	7.4	6.06	1
		20	22.67	74.6	6.44	6	1
		25	22.19	67.1	5.84	5.95	0.6
		30	21.96	64.1	5.6	5.94	0.4
		35	21.4	64.5	5.71	5.95	0.7
		40	21.02	65.2	5.81	5.98	0.7
		45	20.71	63.6	5.7	5.96	0.4
		50	20.49	63.2	5.69	5.96	0.4
		55	20.26	60.4	5.46	5.98	0.7
		60	19.95	51.2	4.66	5.98	-0.1
		65	19.73	39.7	3.63	6.01	0.3
		70	19.48	14.2	1.31	6.13	0.1
WA-2 Lake Tower	7/1/2005	0	26.88	125.4	10.01	6.57	1.7
		5	26.24	119.6	9.66	6.38	2.2
		10	24.72	99.6	8.27	6.21	1.8
		15	23.78	101.8	8.6	6.13	0.9
		20	23	87.9	7.54	6.04	1
		25	22.55	74	6.41	6.05	0.7
		30	22.54	73.1	6.32	6.04	0.9
		35	22.17	69.7	6.07	6.01	0.7
		40	21.85	67.4	5.91	5.99	0.5
		45	21.51	65.5	5.78	5.99	0.7
		50	21.12	64.9	5.78	6.01	0.1
		55	20.66	54.8	4.91	6.02	0.3
		60	20.33	48	4.33	6	0.3
		65	20.06	33.2	3.01	6	0.5
		70	19.94	24.2	2.2	6.02	0.4
		75	19.54	0.7	0.07	6.06	1.3
		80	19.29	0.5	0.05	6.13	2.2

2005 Walter Stratification

Station	Date M/D/Y	Depth Feet	Temp C	DO%	DO Conc mg/L	pH	Chlorophyll ug/L
WA-2 Lake Tower	7/6/2005	0	24.6	151.4	12.61	6.51	3.3
		5	24.6	144.8	12.05	6.49	4
		10	24.58	145.8	12.14	6.48	3.6
		15	24.08	127.6	10.73	6.31	3.6
		20	23.36	98.8	8.42	6.15	1
		25	22.81	87.4	7.52	6.11	1.2
		30	22.26	79.6	6.92	6.14	0.9
		35	21.62	64.6	5.69	6.1	0.4
		40	21.35	54.7	4.84	6.11	0.8
		45	20.98	38.6	3.44	6.09	0.7
		50	20.79	19.3	1.73	6.05	6.5
WA-2 Lake Tower	7/14/2005	0	26.37	101.3	8.16	6.74	2
		5	24.44	88.9	7.42	6.2	3.9
		10	23.69	81.9	6.94	6.17	2.3
		15	23.18	74.6	6.38	5.94	2
		20	22.65	68.3	5.9	5.83	1.8
		25	22.18	63.8	5.56	5.71	0.9
		30	21.77	64.2	5.64	5.7	1.2
		35	21.25	65.2	5.79	5.66	0.6
		40	21.04	61	5.44	5.68	0.8
		45	20.81	60.5	5.42	5.64	0.9
		50	20.64	59.7	5.36	5.62	0.7
		55	20.25	42.7	3.87	5.53	1.2
		60	19.9	18.3	1.67	5.52	3.8
WA-2 Lake Tower	7/22/2005	0	27.96	93.9	7.35	6.85	1.7
		5	27.45	92.5	7.31	6.64	3.9
		10	26.7	79.9	6.4	6.26	4.2
		15	25.67	70	5.71	6.06	1.4
		20	25.08	67.2	5.54	6.02	1.5
		25	24.56	63.1	5.25	5.93	0.8
		30	24.21	59.5	4.99	5.85	0.6
		35	23.97	56.4	4.75	5.84	0.6
		40	23.5	50.2	4.27	5.78	0.7
		45	23.28	43.4	3.7	5.73	0.6
		50	23.22	37.3	3.19	5.69	0.7
		55	23.06	22.1	1.89	5.64	0.9
60	23.04	23.2	1.98	5.7	1.8		
WA-2 Lake Tower Secchi 2.0 meters (6' 7")	7/27/2005	0	27.26	93	7.38	6.44	1.2
		5	26.74	91.5	7.33	6.36	2.1
		10	26.51	87.2	7.01	6.27	1.7
		15	25.26	64.3	5.29	5.92	1.4
		20	24.97	61.3	5.07	5.9	1
		25	24.47	60.7	5.06	5.88	0.6
		30	23.97	58.8	4.95	5.86	0.9
		35	23.68	52.6	4.46	5.81	0.6
		40	23.47	45.9	3.9	5.78	1.4
		45	23.39	41.2	3.5	5.78	1
		50	23.22	30.4	2.6	5.78	1.8

2005 Walter Stratification

Station	Date	Depth	Temp	DO%	DO Conc	pH	Chlorophyll
	M/D/Y	Feet	C		mg/L		ug/L
WA-2 Lake Tower	8/4/2005	0	27.35	96.9	7.67	6.53	1.9
		5	26.85	94.8	7.57	6.45	3.1
		10	26.17	79.5	6.43	6.11	2.9
		15	25.3	57.6	4.73	5.89	1.4
		20	24.75	53.4	4.43	5.87	0.4
		25	24.55	53.8	4.48	5.86	0.6
		30	24.36	53.7	4.49	5.87	0.5
		35	24.19	50	4.19	5.86	0.4
		40	24.02	50.5	4.25	5.84	0.7
		45	23.81	38	3.21	5.8	0.7
		50	23.57	24.4	2.07	5.75	1.2
WA-2 Lake Tower Secchi 2.1 meters (6' 9")	8/24/2005	0	24.11	85.4	7.17	6.79	2.6
		5	24.11	85.2	7.15	6.74	3
		10	24.1	85.2	7.16	6.74	3.1
		15	24.1	84.4	7.09	6.65	2.9
		20	24.07	81.3	6.84	6.48	3.1
		25	23.89	70	5.9	6.28	1.2
		30	22.64	66	5.7	6.31	1.3
		35	22.15	71	6.18	6.36	1.3
		40	22.02	74.7	6.53	6.38	1.1
		45	21.66	78.2	6.88	6.43	1.5
		50	21.67	78.1	6.87	6.41	1.7
WA-2 Lake Tower Secchi 2.7 meters (9 feet)	9/20/2005	0	22.73	100.7	8.68	6.88	4.1
		5	22.64	99.7	8.61	6.77	7.1
		10	22.32	89.1	7.74	6.52	2.1
		15	21.75	79	6.94	6.37	1.2
		20	21.5	76.2	6.73	6.35	2.2
		25	21.24	71.9	6.38	6.32	0.7
		30	20.94	64.4	5.74	6.28	1.2
		35	20.62	59.6	5.35	6.28	0.7
		40	20.53	55.4	4.98	6.31	0.8
		45	20.31	53.7	4.85	6.36	0.6
		50	20.15	50.4	4.57	6.43	0.7
WA-3 Tobyhanna Creek Upstream	4/28/2005	0	11	99.6	10.79	6.2	NR
	5/13/2005	0	11.1	104.9	11.55	5.97	3.4
	5/25/2005	0	12.55	97.2	10.35	6.54	2.4
	6/14/2005	0	21.1	95.6	8.5	6.16	1.8
	6/23/2005	0	15.65	122.5	12.18	6.29	0.3
	6/28/2005	0	21.69	108.5	9.55	6.89	0.7
	7/6/2005	0	19.86	148.3	13.52	6.97	1.1
	7/27/2005	0	21.9	91.8	8.04	6.49	1.3
	8/24/2005	0	18.24	103.5	9.75	6.86	0.5
	9/20/2005	0	17.99	99.7	9.44	7.09	0.4

2005 Walter Stratification

Station	Date	Depth	Temp	DO%	DO Conc	pH	Chlorophyll
	M/D/Y	Feet	C		mg/L		ug/L
WA-4 Lehigh River Upstream	4/28/2005	0	12.1	ER	ER	7.11	1.2
	5/13/2005	0	11.01	95.6	10.54	6.14	0.7
	5/25/2005	0	11.06	101.4	11.17	6.32	1.4
	6/14/2005	0	22.18	94	8.19	6.33	2.7
	6/23/2005	0	15.24	99.5	9.98	6.76	0.7
	6/28/2005	0	22.72	128.3	11.07	7.41	1.2
	7/6/2005	0	19.31	131.2	12.09	6.81	2.2
	7/27/2005	0	22.04	74.1	6.47	6.38	7.4
	8/24/2005	0	17.58	110.2	10.52	7.09	1.1
9/20/2005	0	17.8	103.7	9.86	7.17	0.6	
WA-5 Bear Creek Upstream	4/28/2005	0	12.32	90.2	9.65	6.68	-0.6
	5/13/2005	0	11.12	93.7	10.3	6.05	-0.1
	5/25/2005	0	12.22	98.5	10.56	6.57	1.6
	6/23/2005	0	16.75	100.4	9.75	6.45	-1
	6/28/2005	0	22.2	111.5	9.71	8.1	0.1
	7/6/2005	0	19.83	139.6	12.73	6.4	0.2
	7/27/2005	0	21.57	94.4	8.32	6.16	1
	8/24/2005	0	17.1	93.1	8.98	7.05	-0.2
	9/20/2005	0	17.42	98.2	9.4	7.44	-0.8
WA-6 Bear Creek Lake Arm	5/13/2005	0	17.9	90.2	8.55	5.98	4.4
		5	17.52	89.7	8.57	5.99	5.1
		10	16.6	88.3	8.61	6	2.7
		15	15.45	88.1	8.8	6.04	2.1
		20	14.91	84.6	8.54	6.08	1.1
		25	13.43	83.1	8.67	6.12	0.5
		30	12.56	82.9	8.82	6.14	0.6
		35	11.85	82.2	8.88	6.18	0.8
		40	11.6	81.9	8.91	6.2	0.7
		45	11.3	80.5	8.81	6.22	0.4
		50	11.13	78.8	8.66	6.23	0.3
		55	10.99	77.6	8.55	6.24	0.2
60	10.8	76.7	8.5	6.21	0.3		
WA-6 Bear Creek Lake Arm Secchi 2.5 meters (6' 8")	6/28/2005	0	28.41	108.3	8.41	6.36	1.1
		5	26.49	108.3	8.71	6.32	1.4
		10	24.3	95.1	7.96	6.15	5
		15	23.42	89	7.57	6.08	1
		20	22.71	69	5.95	5.98	0.8
		25	22.27	67.1	5.83	6	0.7
		30	21.9	64.4	5.64	5.99	0.5
		35	21.47	64.1	5.66	6	0.3
		40	21.18	62.9	5.59	6.01	0.6
		45	20.88	59.5	5.31	6.05	0.3
		50	20.61	54.2	4.87	6.08	0.8
WA-6 Bear Creek Lake Arm Secchi 2.2 meters (7' 3")	7/27/2005	0	27.09	91.9	7.31	6.43	1.3
		5	26.84	90	7.19	6.36	2
		10	26	82.9	6.73	6.18	1.8
		15	25.27	72.8	5.99	5.99	1.1
		20	24.66	63.5	5.28	5.92	1
		25	24.48	60.8	5.07	5.93	0.9

2005 Walter Stratification

Station	Date	Depth	Temp	DO%	DO Conc	pH	Chlorophyll
	M/D/Y	Feet	C		mg/L		ug/L
WA-6 Bear Creek Lake Arm Secchi 2.0 meters (6' 7")	8/24/2005	0	23.99	84.4	7.11	6.67	2.3
		5	23.98	84	7.07	6.62	3.7
		10	23.95	83.4	7.02	6.51	3.5
		15	23.86	80	6.75	6.38	2.8
		20	23.16	72.8	6.23	6.24	1.4
		25	22.82	67.7	5.82	6.17	1.6
WA-6 Bear Creek Lake Arm Secchi 2.7 meters (9 feet)	9/20/2005	0	22.61	101.6	8.78	6.98	4.1
		5	22.61	101.3	8.75	6.88	7.2
		10	22.53	99.6	8.62	6.73	11.8
		15	22.19	93.3	8.12	6.54	1.7
		20	21.54	76.3	6.73	6.39	0.2
		25	21.33	73.9	6.54	6.43	0.8
WA-7 Lehigh Lake Arm	5/13/2005	0	18.02	93.5	8.84	5.96	1.7
		5	17.55	93.8	8.96	5.98	3.8
		10	16.09	92.4	9.1	6.02	3.2
		15	15.49	91.4	9.12	6.04	2
		20	14.85	89.9	9.1	6.08	1.1
		25	13.79	87.2	9.03	6.14	0.6
		30	12.49	85.3	9.09	6.15	0.4
		35	11.89	84	9.07	6.17	0.1
		40	11.67	82.9	9	6.19	0.7
		45	11.72	81.6	8.85	6.18	0.3
		50	11.15	74.5	8.19	6.2	0.1
		55	10.83	65.8	7.28	6.16	0
60	10.78	66.6	7.38	6.15	0.7		
WA-7 Lehigh Lake Arm Secchi 2.5 meters (8' 3")	5/25/2005	0	16.48	90.2	8.81	6.11	2.5
		5	16.49	90.1	8.8	6.1	2.6
		10	16.46	89.4	8.74	6.08	2.2
		15	16.46	88.6	8.66	6.06	2
		20	16.38	86.8	8.5	6.05	2
		25	15.43	85	8.49	6.04	0.9
		30	14.91	87.2	8.81	6.06	1.3
		35	14.38	87.1	8.9	6.06	1.1
		40	14.18	86.8	8.9	6.03	1.1
		45	13.84	85.8	8.87	6.01	1
		50	13.64	80.6	8.37	5.97	1.1
		55	13.2	48.3	5.07	5.85	1.6
WA-7 Lehigh Lake Arm Secchi 2.45 meters (8' 0")	6/28/2005	0	27.52	108	8.52	6.45	1
		5	26.38	104.3	8.41	6.37	1.1
		10	24.78	94.5	7.84	6.24	1.1
		15	23.26	79.6	6.79	6.13	0.8
		20	22.65	70	6.05	6.1	0.4
		25	22.23	65.8	5.73	6.08	0.6
		30	21.77	62.6	5.5	6.08	0.5
		35	21.33	61.1	5.41	6.09	0.5
		40	20.98	41.4	3.7	6.08	0.5
		45	20.81	26.5	2.37	6.11	0.5
50	20.57	12.8	1.15	6.21	1.2		

2005 Walter Stratification

Station	Date	Depth	Temp	DO%	DO Conc	pH	Chlorophyll
	M/D/Y	Feet	C		mg/L		ug/L
WA-7 Lehigh Lake Arm Secchi 2.35 meters (7' 9")	7/27/2005						
		0	26.77	88.2	7.06	6.41	1
		5	26.55	88.6	7.12	6.34	2
		10	26.02	80.5	6.53	6.22	1.1
		15	25.37	83.7	6.87	6.25	0.3
		20	24.57	72.6	6.05	6.03	1.1
		25	23.55	55	4.67	5.86	1.4
WA-7 Lehigh Lake Arm Secchi 2.2 meters	8/24/2005						
		0	24.27	87.2	7.31	6.71	1.5
		5	24.26	86.3	7.23	6.57	2.3
		10	23.92	84.2	7.09	6.49	4.4
		15	23.61	82.8	7.02	6.45	2.8
		20	22.06	83.6	7.3	6.44	1.6
WA-7 Lehigh Lake Arm Secchi 2.75 meters (9' 1")	9/20/2005						
		0	22.6	98	8.47	6.9	4.8
		5	22.62	97.8	8.45	6.87	4.6
		10	22.57	96.2	8.32	6.78	4.1
		15	22.38	90.5	7.86	6.67	1.6
		20	19.8	89.9	8.2	6.68	2.4