FDEP Toxicity Laboratory
Instrument Code Page

METER / DEVICE	ID	SOP	Parameter	Method	Benchsheet Code
YSI Model 58 Dissolved Oxygen Meter	90H018262	TA-06.04	Dissolved Oxygen	SM 4500 O G	DO1
Thermoscientific Orion Star A213	SN X49117 Probe: 019059	TA-06.39	Dissolved Oxygen	SM 4500 O G	DO2
Accumet AR-10 pH Meter	93312105	TA-06.23	pH	SM 4500 H+	PH1
Fisherbrand FE150	SN 2753630 Probe: 01X218988 Temp: S35934	TA- 06.37	pH	SM 4500 H+	PH2
Mettler-Toledo SevenMulti Conductivity Meter	SN: 1225117049 Probe: H04257	TA-06.25	Conductivity Salinity	SM 2510 B SM 2520 B	COND1
Traceable Bench Conductivity Meter	SN 170814827	TA-06.36	Conductivity Salinity	SM 2510 B SM 2520 B	COND2
Hach Ammonia Mid-Range Kit for freshwater	Kit Lot # A6070	TA-06.33	Ammonia	SM 4500 NH3	$NH_3$2
Hach Ammonia Kit NI-SA for saltwater	Kit Lot # A6055	TA-06.33	Ammonia	SM 4500 NH3	$NH_3$1
Hach Ammonia Nitrogen Pocket Colorimeter II	Kit Lot # A8051	TA-06.35	Ammonia	SM 4500 NH3	$NH_3$4
Traceable Thermometer	#15 - SN 210217416	TA-06.13	Temperature	SM-2530B modified & DEP SOP-001/01 FT1400	#15
Traceable Thermometer	#16- SN 210217465	TA-06.13	Temperature	SM-2530B modified & DEP SOP-001/01 FT1400	#16
Traceable Thermometer	#17- SN 210790518	TA-06.13	Temperature	SM-2530B modified & DEP SOP-001/01 FT1400	#17
Hach Chlorine Pocket Colorimeter II	#2-05050C026378	TA-06.22	Total Residual Chlorine	EPA 330.5 SM 4500 CL G	#2
Alkalinity (Hach Kit)	No SN	TA-06.08	Alkalinity	SM 2320 B	ALK1
Hardness (Hach Kit)	No SN	TA-06.08	Hardness	SM 2340 C	HARD1
Mettler Toledo XA105	B314195659	BB-36	Weight	-	BAL1
Mettler Toledo MS403TS/00	B815673069	TA-06.34	Weight	-	BAL3
Class 1 Weights	BIO-S-WEIGHTS-01	NA	Balance check	-	S01

SM-2503B modified to allow use of electrionic and non-mercury filled thermometers.
Insert other device information in blank spaces as needed.

FDEP Toxicity Laboratory
Instrument Code Page

METER / DEVICE	ID	SOP	Parameter	Method	Benchsheet Code
Fisher Scientific Timer	SN 80686096	-	Time	-	T-A
Fisher Scientific Timer	SN 80686202	-	Time	-	T-B
Fisher Scientific Timer	SN 200757674	-	Time	-	T-C
Fisher Scientific Timer	SN 20075766	-	Time	-	T-D
Mechanical Pipet - C. dubia 200 µL	M634224	TA-06.32	Volume	-	P1
Mechanical Pipet - Artemia 200 µL	GH41872	TA-06.32	Volume	-	P2
Mechanical Pipet - Artemia 1000 µL	F23899	TA-06.32	Volume	-	P3
Mechanical Pipet - AGP 100 µL	T50346	TA-06.32	Volume	-	P4
Mechanical Pipet - AGP 1000 µL	GH45893	TA-06.32	Volume	-	P5
Mechanical Pipet - AGP 200-1000 µL	V18439	TA-06.32	Volume	-	P6

FDEP Biology Laboratory-Toxicity Section
Chronic PT Bench Sheet

Method: EPA-821-R-02-013/-014

Start Date: _____ Time: _____
End Date: _____ Time: _____

Test Type
Definitive
Static

Circle one:

P. promelas (SOP:TA-07.09, Method: 1000.0)
M. beryllina (SOP: TA-07.04, Method: 1006.0)

PT Sample ID:_____
Chamber Size 1000 mL
Test Volume 500 mL

Light Intensity: 50-100 ft candles (recommended)
Photoperiod:16 hr light, 8 hr dark (recommended)

Diluent	Batch #/LIMS ID #	Days Used

Organism Age: _____
Batch #: _____

Feeding Times	
First	**Second**
Day 0 * _____	**Day 0_____**
Day 1 _____	**Day 1 _____**
Day 2 _____	**Day 2 _____**
Day 3 _____	**Day 3 _____**
Day 4 _____	**Day 4 _____**
Day 5 _____	**Day 5 _____**
Day 6 _____	**Day 6 _____**

*** Day 0 first feeding is 2 hours prior to test intiation.**

Artemia Batch #'s
Day 0 _____
Day 1 _____
Day 2 _____
Day 3 _____
Day 4 _____
Day 5 _____
Day 6 _____
***Artemia* Lot #**
_____

Concentrations prepared by:_____

Loaded by: _____

Verified by:_____

Randomizer #:_____

Stats run by/Date: _____
Stats verified by/Date: _____

Results	
Control % CV(%):	
Dunnetts PMSD(%):	
ICP25(%):	
Reproduction NOEC(%):	
Reproduction LOEC(%):	
Survival NOEC(%):	
Survival LOEC(%):	

Circle one:

P. promelas PMSD Bounds for Growth: Lower 12 Upper 30

M. beryllina PMSD Bounds for Growth: Lower 11 Upper 28

Test Validation		
Control Survival ≥ 80%:	**Yes**	**No**
Temperature Range ≤ 3° C:	**Yes**	**No**

LIMS upload:_____ Verified by:_____ **REVIEWER:_____**

Comments:

FDEP Biology Laboratory-Toxicity Section
PT Water Quality Information Sheet

Method: EPA-821-R-02-013/-014

Water Quality Parameters	MHW LIMS ID # _____ Batch # _____	MHW LIMS ID # _____ Batch # _____	ASW LIMS ID # _____ Batch # _____	ASW LIMS ID # _____ Batch # _____	Method	SOP	Measured By:	Transcription Checked by:
Lab Total Residual Cl_2 (mg/L)					HACH	TA-06.22		
Alkalinity (mg/L as $CaCO_3$)					HACH	TA-06.08		
Hardness (mg/L as $CaCO_3$)					HACH	TA-06.08		
Total Ammonia (mg/L as N)					HACH	TA-06.35 or TA-		
Conductivity □ µmhos □ mmhos					FISCHER	TA-06.36		
Salinity (ppt)					FISCHER	TA-06.36		
Days Used								

Temperature Range (°C)
Incubator #_____ **Min._____ Max._____**
Test **Min._____ Max._____**
Room B246 **Min._____ Max._____**

Comments:

FDEP Biology Laboratory- Toxicity Section
Chronic PT Survival Benchsheet

D = dead **M = missing**

Concentration: %			TEST DAY							
Concentration	**Replicate**	**Chamber**	**0**	**1**	**2**	**3**	**4**	**5**	**6**	**7**
Control	A		10							
	B		10							
	C		10							
	D		10							
6.25%	A		10							
	B		10							
	C		10							
	D		10							
12.5%	A		10							
	B		10							
	C		10							
	D		10							
25%	A		10							
	B		10							
	C		10							
	D		10							
50%	A		10							
	B		10							
	C		10							
	D		10							
100%	A		10							
	B		10							
	C		10							
	D		10							
Loaded by (0 hr): _____		**Checked by:**								
Verified by (0 hr): _____										
Concentrations prepared by:										

Comments:

FDEP Biology Laboratory-Toxicity Section
Chronic PT Parameter Page

parameter pg. 1

Conc = concentration **Rep = replicate** **Circle: µmhos or mmhos**

Test Day	Conc. (%)	Before Renewal						After Renewal					
		Test Rep.	pH (SU)	Temp (°C)	DO (mg/L)	Conductivity (umhos / mmhos)	Salinity (ppth)	Test Rep.	pH (SU)	Temp (°C)	DO (mg/L)	Conductivity (umhos / mmhos)	Salinity (ppth)
Day 0	Control	A											
		A											
		A											
		A											
		A											
		A											
		A											
		A											
	Measured by												
	Recorded by												
		Rep	pH	Temp	DO	Conductivity	Salinity	Rep	pH	Temp	DO	Conductivity	Salinity
Day 1	Control	B						B					
		B						B					
		B						B					
		B						B					
		B						B					
		B						B					
		B						B					
		B						B					
	Measured by												
	Recorded by												
		Rep	pH	Temp	DO	Conductivity	Salinity	Rep	pH	Temp	DO	Conductivity	Salinity
Day 2	Control	C						C					
		C						C					
		C						C					
		C						C					
		C						C					
		C						C					
		C						C					
	Measured by												
	Recorded by												
		Rep	pH	Temp	DO	Conductivity	Salinity	Rep	pH	Temp	DO	Conductivity	Salinity
Day 3	Control	D						D					
		D						D					
		D						D					
		D						D					
		D						D					
		D						D					
		D						D					
		D						D					
	Measured by												
	Recorded by												

Comments:

FDEP Biology Laboratory -Toxicity Section
Chronic PT Parameter Page

parameter pg. 2

Concentration: % **Conc = Concentration** **Rep = Replicate** **Circle: µmhos or mmhos**

Test Day	Conc.	Before Renewal: Test Rep.	pH (SU)	Temp (°C)	DO (mg/L)	Conductivity (umhos / mmhos)	Salinity (ppth)	After Renewal: Test Rep.	pH (SU)	Temp (°C)	DO (mg/L)	Conductivity (umhos / mmhos)	Salinity (ppth)
Day 4	Control	A						A					
		A						A					
		A						A					
		A						A					
		A						A					
		A						A					
		A						A					
	Measured by												
	Recorded by												
		Rep	pH	Temp	DO	Conductivity	Salinity	Rep	pH	Temp	DO	Conductivity	Salinity
Day 5	Control	B						B					
		B						B					
		B						B					
		B						B					
		B						B					
		B						B					
		B						B					
	Measured by												
	Recorded by												
		Rep	pH	Temp	DO	Conductivity	Salinity	Rep	pH	Temp	DO	Conductivity	Salinity
Day 6	Control	C						C					
		C						C					
		C						C					
		C						C					
		C						C					
		C						C					
		C						C					
	Measured by												
	Recorded by												
		Rep	pH	Temp	DO	Conductivity	Salinity	Rep	pH	Temp	DO	Conductivity	Salinity
Day 7	Control	D											
		D											
		D											
		D											
		D											
		D											
		D											
	Measured by												
	Recorded by												

Comments:

FDEP Biology Laboratory-Toxicity Section
Chronic PT Weight Benchsheet

wt.= Weight Conc. = Concentration

			Mean wt. = Fish wt. divided by 10					
Concentration (%)	**Replicate**	**Pan #**	**Pan wt.** (g)	**Pan + Fish** (g)	**Fish wt.** (g)	**Original # of fish**	**Mean wt.** (mg)	**Mean wt./Conc.** (mg)
Control	A					10		
	B					10		
	C					10		
	D					10		
	A					10		
	B					10		
	C					10		
	D					10		
	A					10		
	B					10		
	C					10		
	D					10		
	A					10		
	B					10		
	C					10		
	D					10		
	A					10		
	B					10		
	C					10		
	D					10		
	A					10		
	B					10		
	C					10		
	D					10		
	Weighed by initials:							

Comments:

FDEP Biology Laboratory-Toxicity Section
Chronic PT Weight Quality Control

Empty Pan Weights **Date: _____** **Weighed by: _____**

Weights in grams	Pan 1 wt.	Pan 1 initial wt.
after Pan 5	@	
after Pan 10	@	
after Pan 15	@	
after Pan 20	@	
after Pan 25	@	

	Measured Value (g)	S-weight Value (g)
S-weights	@	
	@	

S-Weights: BIO-S-WEIGHTS-01
Balance: Mettler Toledo XA105
Ser# B314195659

Fish + Pan Weights **Date: _____** **Weighed by: _____**

Weights in grams	Pan 1 wt.	Pan 1 initial wt.
after Pan 5	@	
after Pan 10	@	
after Pan 15	@	
after Pan 20	@	
after Pan 24	@	

	Measured Value (g)	S-weight Value (g)
S-weights	@	
	@	

Drying Oven ID: _____
Temperature °C: _____
Drying Hours: _____
Date/Time Organisms in oven: _____
Date/Time Organisms out of oven: _____

Note: Pan number (5, 10, etc.) refers to sequence of weighing as actual Pan #s may differ.

Comments:

FDEP Biology Laboratory-Toxicity Section
Chronic PT Instrument Code Page

Test ID: **Dates:**

METER / DEVICE	Instrument Code
DO Meter	
pH Meter	
Conductivity Meter	
Ammonia Kit	
Traceable Thermometer	
Chlorine Kit	
Alkalinity Kit	
Hardness Kit	
Balances used	
Weights used	
Entered by and date:	