Garcia and Associates

2010 LAKE ALOHA Mountain Yellow-legged Frog Surveys

El Dorado County, California El Dorado Hydroelectric Project (FERC No. 184)









January 2011

PREPARED FOR:

El Dorado Irrigation District 2890 Mosquito Road Placerville, CA 95667

PREPARED BY:

Garcia and Associates 1 Saunders Avenue San Anselmo, CA 94960



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Submitted to:

El Dorado Irrigation District 2890 Mosquito Road Placerville, CA 95677

Submitted by:



Garcia and Associates 1 Saunders Avenue San Anselmo, CA 94960 Phone: (415) 458-5803

Fax: (415) 458-5829

January 2011

TABLE OF CONTENTS

1.0	INTRODUCTION	1
1.1	Project Background	1
2.0	METHODS	1
2.1	Study Area	
2.2	MYLF/Herpetofauna Surveys	
3.0	RESULTS	
3.1	MYLF/Herpetofauna Observations	3
4.0	DISCUSSION	
5.0	REFERENCES	4
Figure	f Figures e 1. Sampling locations and results of 2010 MYLF surveys below Lake loha auxiliary dams	5
List o	f Tables	
	1. Summary of 2010 MYLF observations from the ponds below Lake loha	6
A PPF	NDICES	

Appendix A – 2010 Site Photos and Herpetofauna Photos

1.0 INTRODUCTION

1.1 Project Background

The El Dorado Irrigation District (District) owns and operates the El Dorado Hydroelectric Project (Project 184), which is licensed by the Federal Energy Regulatory Commission (FERC). As a requirement of the FERC Project 184 license, the District is required to conduct surveys for Mountain Yellow-legged Frog (MYLF)¹ and remove trout from the ponds and habitats downstream of Lake Aloha auxiliary dams following a spill event. Lake Aloha spilled during spring runoff between June 5 and 12, 2010, and again from June 25 – July 3, 2010 (EID 2010); therefore, under the provisions of the FERC Project 184 license requirements, MYLF surveys and trout removal were required in 2010. The District contracted with Garcia and Associates (GANDA) to conduct protocol surveys for MYLF concurrently with trout removal efforts in the ponds below the auxiliary dams. Results of the 2010 MYLF surveys are reported herein. Results of the 2010 trout removal efforts are reported under separate cover.

2.0 METHODS

2.1 Study Area

The study area consisted of the vicinity of the spillway path below the seven auxiliary dams at the southeast end of Lake Aloha downstream to the confluence with Channel Lake (see Figure 1). All surface waters in the auxiliary spillway path were surveyed, along with several ponds in the immediate vicinity that could be connected to the spillway path during high flows (i.e., ponds or other potential frog habitat located just above the spillway path where fish passage may occasionally be possible). The ponds surveyed in 2010 are the same as were surveyed in 2007 (GANDA 2007).

Each surveyed pond was described according to the CDFG Sierra Nevada Fish and Amphibian Survey Protocol (CDFG 2009). The perimeter of each pond was

¹ In 2008, the Society for the Study of Amphibians and Reptiles recognized the Mountain Yellow-legged frog as two distinct species, *Rana muscosa* - Southern Mountain Yellow-legged

Frog (MYLF) and *Rana sierrae* - Sierra Nevada Yellow-legged Frog (SNYLF). SNYLF is the species native to the SF American River watershed that is addressed in this report; however, this report uses the nomenclature MYLF to be consistent with the terminology used in the Project 184 license documents.

mapped using a handheld GPS unit and a sketch was also made in the field notes. The auxiliary spillway path was mapped using a GPS track. Pond characteristics such as water temperature, color, turbidity, depth, and littoral/shoreline zone substrate composition were recorded along with survey conditions (e.g., wind and weather conditions) on the Amphibian and Fish Inventory Datasheet (i.e., the CDFG protocol standard).

2.2 MYLF/Herpetofauna Surveys

Protocol surveys for MYLF were conducted throughout the study area following the CDFG Sierra Nevada Fish and Amphibian Survey Protocol (CDFG 2009). This procedure focuses on visual encounter surveys (VES) for various amphibian and reptile species; our primary focus was on the life stages of MYLF potentially present during our survey: larvae (i.e., hatch-year and over-winter tadpoles), juveniles (i.e., metamorphs and subadult frogs), and adults (i.e., frogs of breeding age).

VES was conducted by a minimum of two biologists walking slowly around the perimeter of each pond. Observers paused often to look ahead for basking animals. Dip nets were used to sweep habitat and banks in an effort to spook animals as well as to catch animals for identification (specimens were also captured by hand). The total number of individuals observed by species and life stage was recorded in the appropriate field on the standard CDFG inventory datasheet. Adult (≥40 mm snout-urostyle length, SUL) and juvenile (<40 mm SUL) MYLF specimens were measured to the nearest millimeter of snout-vent length (SVL); larval MYLF specimens were measured to the nearest millimeter of total length (TL).

In addition to MYLF, all other herpetofauna observations were recorded. All snakes that were captured were palpated in order to determine which species were readily being preyed upon, then released.

3.0 RESULTS

In 2010, a total of 24 ponds (labeled Ponds A through X) were surveyed in the study area. MYLF were observed in 19 of these ponds (MYLF were observed in 16 ponds in 2007; GANDA 2007). Other herpetofauna observed in 2010 included Sierran tree frog (*Pseudacris sierra*; formerly Pacific tree frog [*Hyla regilla*]) and western terrestrial garter snake (*Thamnophis elegans*). Fairy shrimp (*Streptocephalus sealii*) were found in eight of the ponds in 2010. Site photos for

each pond are provided in Appendix A. Inventory datasheets and field notes are located in Appendix B.

3.1 MYLF/Herpetofauna Observations

MYLF observations are summarized in Table 1. A total of 21 adult MYLF, 29 juveniles (subadults), and 34 larvae (over-winter tadpoles) were observed during the 2010 surveys. No MYLF egg masses, hatch-year tadpoles, or metamorphs were observed during the surveys. Locations of each MYLF observation are noted in Figure 1. Adult MYLF ranged from 40 to 70 mm SVL and juvenile (subadult) MYLF ranged from 28 to 39 mm SVL. Most MYLF were observed while basking near the edges of the ponds. Over-winter tadpoles ranged in size from approximately 70 to 80 mm TL.

Tree frog tadpoles were common and often abundant in the survey ponds (no adult tree frogs were observed). Tree frog tadpoles were observed in 13 of the 24 survey ponds (approximately 1200 individuals total). A total of 21 western terrestrial garter snakes were observed at nine of the 24 ponds (11 adult and 10 subadult snakes). Most snakes that were palpated had empty stomachs, but one had been feeding on tree frog tadpoles. Photos of various herpetofauna observed are provided along with site photos in Appendix A.

4.0 DISCUSSION

Overall, 2010 observations indicate that the MYLF population in the study area is fairly robust. Similar numbers of adult and subadult frogs were observed in 2010 as in 2007, which was significantly more than was observed in the initial herpetofauna survey conducted in 2004. However, many more overwinter tadpoles were observed in 2010 than were in 2007. It is unclear whether the increased number of observations is a result of surveying later in the season (August 2010 as opposed to July 2007) or if the increase reflects improved breeding conditions and/or recruitment during 2009 as compared to 2006.

In 2010, MYLF were observed in Pond J (the same location where 12 brook trout were captured in 2010, and where 2 brook trout were captured in 2007), in Pond I (where 4 brook trout were captured in 2010), and in Pond A (where brook trout were captured in 2004).

5.0 REFERENCES

California Department of Fish and Game (CDFG) 2009. Sierra Nevada Fish and Amphibian Inventory Data Sheet Instructions. California Department of Fish & Game Fish/Amphibian Survey Protocols - Version 2.4, April 10, 2009.

El Dorado Irrigation District (EID). 2010. Federal Energy Regulatory Commission Project 184-CA 2010 Lake Aloha Spill Monitoring Report. 5 pp.

EN2 Resources Inc. (EN2) 2004. Lake Aloha 2004 Initial Trout Survey and Removal Report. El Dorado Hydroelectric Project (FERC Project No. 184). October 2004.

GANDA 2007. Final Report 2007 Lake Aloha Mountain Yellow-Legged Frog Surveys El Dorado Hydroelectric Project (FERC No.184). February 2008.

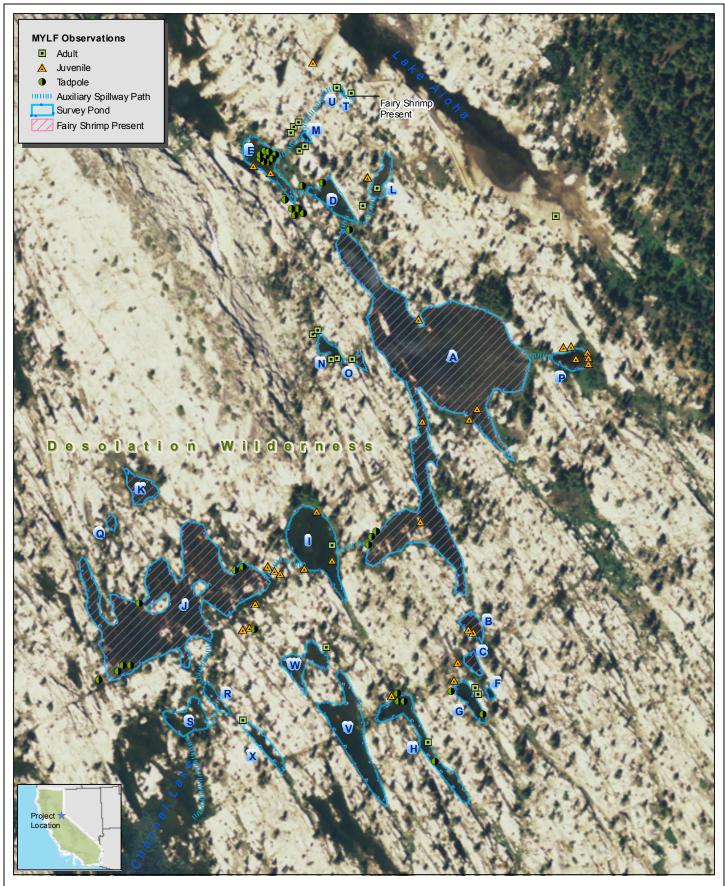


Figure 1. Sampling Locations and Results of 2010 MYLF Surveys below Lake Aloha Auxiliary Dams

El Dorado County, California







Table 1. Summary of 2010 MYLF observations from the ponds below Lake Aloha.

POND	DATE	LENGTH	LIFE	SEX	UTM (NAD 27)					
TOND	DATE	(mm)	STAGE	SEA	EASTING	NORTHING				
A	5-Aug	34	subadult	_	749104	4304760				
A	5-Aug	50	adult	female	749297	4304637				
A	5-Aug		tadpole	_	749150	4304382				
A	5-Aug		tadpole	_	749150	4304382				
A	5-Aug		tadpole	_	749150	4304382				
A	5-Aug	35	subadult	_	749189	4304394				
A	5-Aug	38	subadult	_	749191	4304474				
A	5-Aug	32	subadult	_	749228	4304476				
A	5-Aug	33	subadult	_	749234	4304484				
A	5-Aug	28	subadult	_	749188	4304555				
В	5-Aug	32	subadult	_	749231	4304306				
В	5-Aug	35	subadult	_	749231	4304306				
С	5-Aug	36	subadult	_	749219	4304282				
D	8/3	70	tadpole	_	749095	4304661				
D	8/3	70	tadpole	_	749111	4304664				
D	8/3	35	tadpole	_	749133	4304626				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole		749066	4304684				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole	_	749066	4304684				
Е	8/3		tadpole	_	749046	4304638				
E	8/3	35	subadult	_	749056	4304677				
Е	8/3	31	subadult	male	749070	4304672				
Е	8/3		tadpole		749092	4304643				
Е	8/3		tadpole	_	749092	4304643				
Е	8/3		tadpole		749092	4304643				
E	8/3		tadpole		749092	4304643				
F	5-Aug	47	adult	female	749233	4304262				
F	5-Aug	48	adult	male	749233	4304262				
G	5-Aug	39	subadult		749216	4304268				
G	5-Aug		tadpole		749214	4304259				

Table 1 continued. Summary of 2010 MYLF observations from the ponds below Lake Aloha.

POND	DATE	LENGTH	LIFE	CEV	UTM (NAD 27)				
FOND	DATE	(mm)	STAGE	SEX	EASTING	NORTHING			
G	5-Aug	30	tadpole	1	749239	4304240			
Н	5-Aug	70	tadpole	1	749201	4304203			
Н	5-Aug	66	adult	female	749195	4304218			
Н	5-Aug	65	tadpole	1	749172	4304251			
Н	5-Aug		tadpole	1	749172	4304251			
Н	5-Aug		subadult	1	749166	4304256			
Н	5-Aug		tadpole	-	749166	4304256			
I	4-Aug	35	subadult	_	749097	4304357			
I	4-Aug	30	subadult	_	749107	4304402			
I	4-Aug	35	subadult	_	749119	4304363			
I	4-Aug	40	adult	_	749119	4304375			
J	4-Aug		tadpole	_	748952	4304279			
J	4-Aug		tadpole	_	748952	4304279			
J	4-Aug		tadpole	_	748952	4304279			
J	4-Aug		tadpole	_	748933	4304268			
J	4-Aug		tadpole	_	748965	4304329			
J	4-Aug		tadpole	_	749042	4304355			
J	4-Aug		tadpole	1	749042	4304355			
J	4-Aug	35	subadult	_	749073	4304355			
J	4-Aug	35	subadult	_	749073	4304355			
J	4-Aug	35	subadult	_	749073	4304355			
J	4-Aug	31	subadult	_	749058	4304329			
J	4-Aug	30	subadult	1	749053	4304310			
J	4-Aug	30	subadult	1	749053	4304310			
J	4-Aug		tadpole	1	749053	4304310			
L	3-Aug	49	adult	female	749155	4304659			
L	3-Aug	52	adult	male	749143	4304645			
L	3-Aug	33	subadult	_	749147	4304668			
M	3-Aug	46	adult	male	749088	4304708			
M	3-Aug	48	adult	male	749088	4304708			
M	3-Aug	50	adult	_	749088	4304708			
M	3-Aug	51	adult	male	749093	4304689			
M	3-Aug	70	adult	female	749093	4304689			
N	5-Aug	47	adult	male	749123	4304524			

Table 1 continued. Summary of 2010 MYLF observations from the ponds below Lake Aloha.

N	5-Aug	45	adult	male	749104	4304543
N	5-Aug	42	adult	female	749104	4304543
О	5-Aug	43	adult	male	749135	4304523
P	4-Aug	30	subadult	1	749393	4304521
P	4-Aug	33	subadult	1	749393	4304521
P	4-Aug	35	subadult	1	749393	4304521
P	4-Aug	35	subadult		749303	4304533
P	4-Aug	31	subadult	1	749303	4304533
P	4-Aug	32	subadult	1	749313	4304524
T	3-Aug	41	adult	female	749134	4304739
U	3-Aug	47	adult	female	749123	4304739
W	5-Aug	43	adult	male	749114	4304294
Х	5-Aug	46	adult	female	749048	4304236

Appendix A:

2010 Site Photos and Herpetofauna Photos

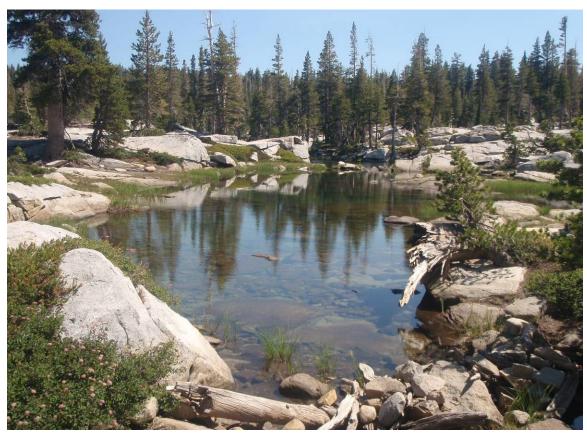


Photo 1. Pond A, view from west end looking east.



Photo 2. Pond B, view from east end of pond looking west.



Photo 3. Pond C, view from east end of pond looking west.



Photo 4. Pond D, view from southeast end of pond looking northwest.

8/03/10



Photo 5. Pond E, view from north end of pond looking south.

8/03/10



Photo 6. Pond F, view from south end of pond looking north.



Photo 7. Pond G, view from north end of pond looking south.



Photo 8. Pond H, view from southeast end of pond looking northwest.



Photo 9. Pond I, view from northwest end of pond looking southeast.

8/04/10

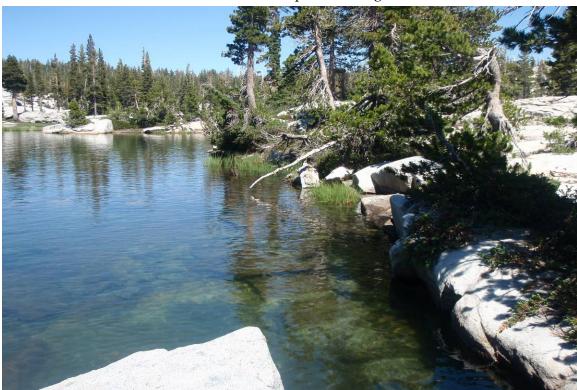


Photo 10. Pond J, view from southeast end (midsite) looking northwest.

8/04/10

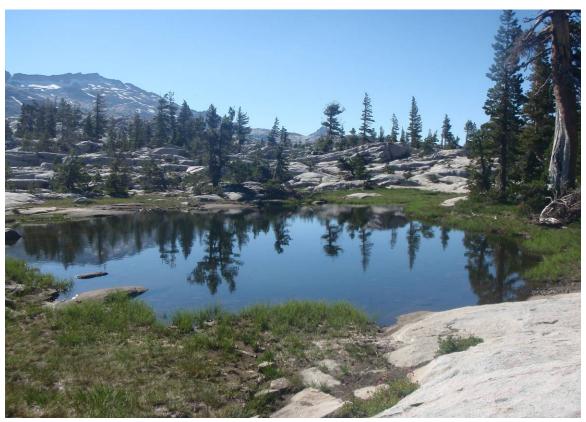


Photo 11. Pond K, view from southeast end looking northwest.

8/04/10



Photo 12. Pond L. 8/03/10



Photo 13. Pond M, view from north end looking south.

8/03/10



Photo 14. Pond N, view from southeast end looking northwest.



Photo 15. Pond O, view from east end looking west.



Photo 16. Pond P, view from east end looking west.

8/04/10



Photo 17. Pond Q, view from northwest end looking southeast.

8/04/10

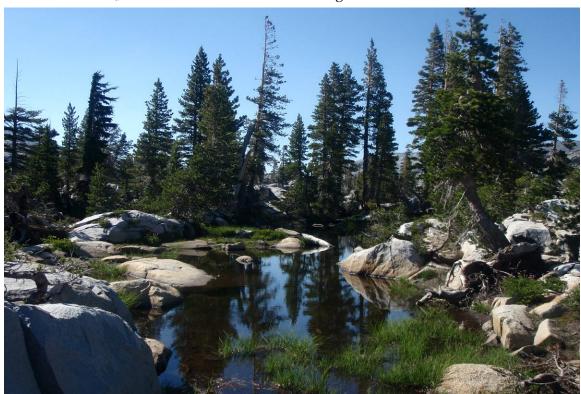


Photo 18. Pond R, view from southeast end looking northwest.

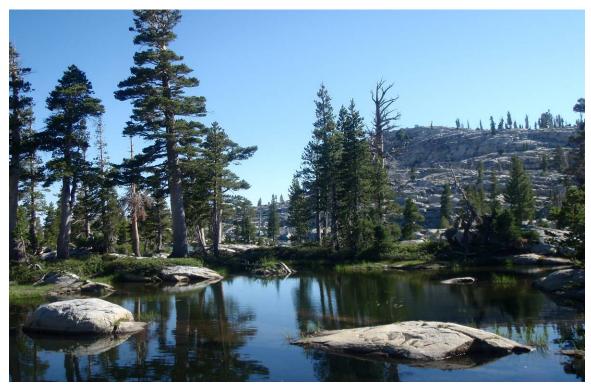


Photo 19. Pond S, view from north end looking south.



Photo 20. Pond T, view from south end looking north towards Lake Aloha.

8/03/10

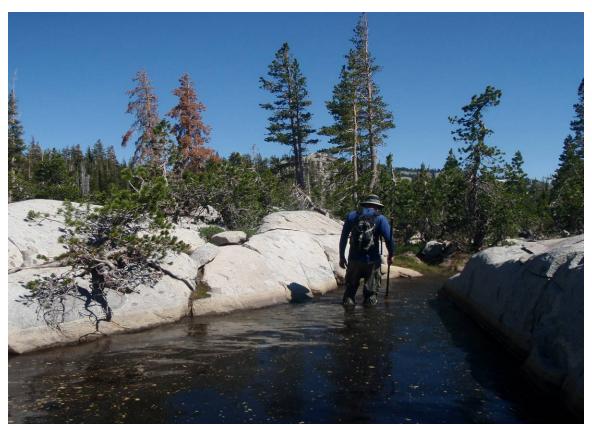


Photo 21. Pond U, view from north end looking south.

8/03/10

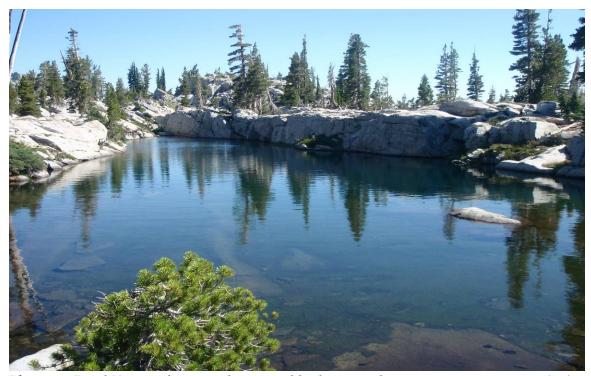


Photo 22. Pond V, view from northwest end looking southeast.



Photo 23. Pond W, view from south end looking north.



Photo 24. Pond X, view from north end looking south.



Photo 25. MYLF tadpole observed in Pond J.

8/04/10



Photo 26. Typical MYLF tadpole microhabitat (shown at bottom right).

8/03/10



Photo 27. Juvenile MYLF observed in Pond E.

8/03/10



Photo 28. Adult female MYLF observed in Pond N.



Photo 29. Adult MYLF captured in Pond L.

8/03/10



Photo 30. Surveying the ponds near Lake Aloha .

8/03/10



Photo 31. Surveying for MYLF.

8/03/10



Photo 32. Surveying for MYLF.

8/05/10



Photo 33. Adult MYLF captured in Pond L.

8/03/10

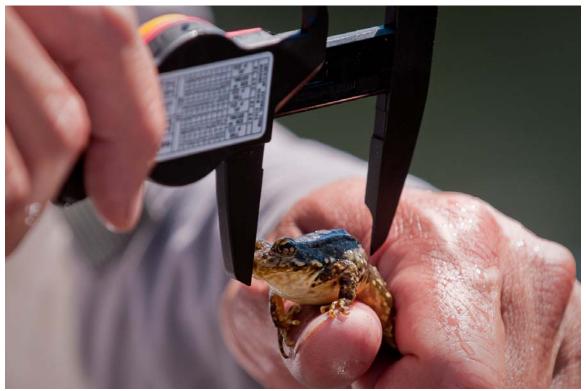


Photo 34. Measuring an adult MYLF captured in Pond L.

8/03/10



Photo 35. Adult MYLF along the margin of Pond G.



Photo 36. Adult MYLF captured in Pond L.

8/03/10



Photo 37. Overview of Auxiliary Spillway: Ponds below dams. Pond E is the nearest pond. 8/04/10

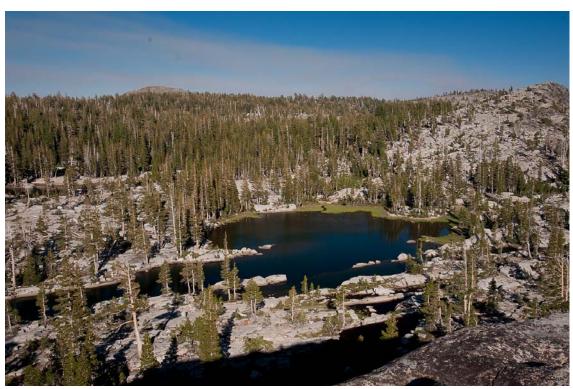


Photo 38. Overview of Auxiliary Spillway: Pond A.

8/04/10



Photo 39. Overview of Auxiliary Spillway: Downstream portion of Pond A. 8/04/10



Photo 40. Overview of Auxiliary Spillway: Pond J and southern ponds. Channel lake is in the distance. 8/04/10

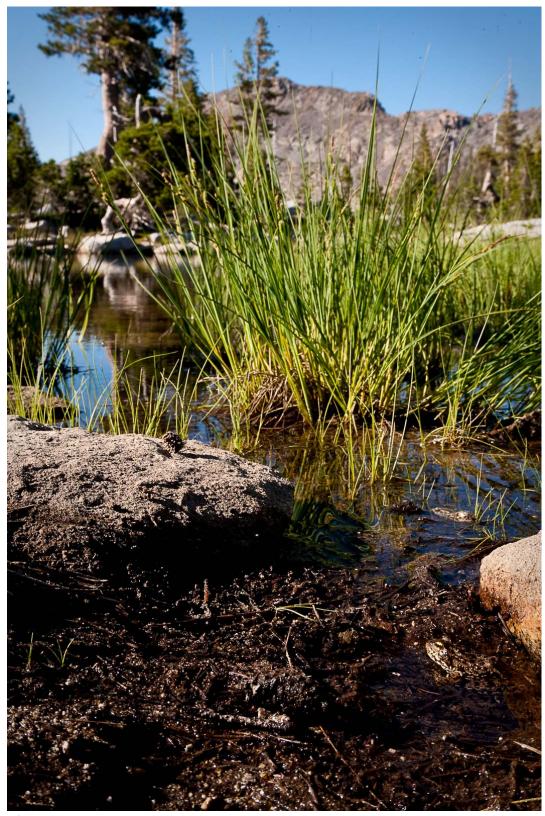


Photo 41. Adult MYLF in pond Margin Habitat.

8/03/10

Appendix B:

2010 Amphibian and Fish Inventory Datasheets and Field Notes

Incidental SNYLFs in lake Aloha; 08-05-10, 1 jun 165. Ly 1. Cham, ~34mm UTMS: 074910H = 4304760; 08-05-10, 19 aduct, abs. (cause) by K. Wiseman & R. Aramayo

SNYLF Amphibian Data Sheet - 2009 arms: 07 49 297 - 4304 637

	Date: (8-05-1	0	Water ty	/pe: Lak	e Unmappe	d por	id Stream	Mars	sh Spr	ing seep	Perennia	al E	Ephemeral
rond A-	(mmm-d	d-yy)		If not sar	npled, re	ason: stream	n wide	ening frozen, dry, or not found part of another water body						
Lake Name:	y Watersh	ed:		Location (use common language)										
(from map) (from "La				akes Che	cklist")									
County:		Elevation	1;		East UT	M:			North UT	M:				
		m ft					(0	only for lakes w/o a site ID; obtain from GPS unit)						
Topographic Map	(7.5'):	Weather: Clear Overd		Overcast	vercast Wind: Calm Light Strong		pH: Max. lake depth		e depth	Team membe	s: Avo	energy,		
	-		Rain	Snow	Snow			source:		(m): ~ 나 · O		1. Cham, Entersemon, C. Set		
Amphibian observ	er(s): k	Wisele	ou,	Survey s	tart time:	1112		Total survey d			Weather	: Clear Ove	rcast	Rain Snow
C. Scott				End time				(min)	25 W	V11115	Wind:	Calmo Light	Stror	ng
Stream Start East UTM North UT only:				M End East UTM Nor			rth UTM Stream order:		rder:	Color: Gear Stained Turbidity: Clear Cloudy				
Amphibian/reptile species # adults				# sub	adults	# larvae	:	# egg masses		Comments		Survey Method		
Calling? Y N Voucher? Y N #			JHT = 5		111 = 3			4	Sourcester hads Figure 1991-22 livelyw		Visual> Aural Dip Net/Seine	Tra	apped and Collected	
Calling? Y AP		111/44 cm 11/89 cm 3 = 25	SVE)	no.strive	5 (A2) 707 m; 644 957 2-1				1	the simplify A. Contract Findults 1 404		Visual> Aural Dip Net/Seine		apped ind Collected
Calling? Y N #					##- 25 10	io.			70 tra	1 5	Visual Aural Dip Net/Seine		apped and Collected	
Calling? Y N Voucher? Y N #											Visual Aural Dip Net/Seine		apped ind Collected	
Calling? Y N Voucher? Y N #										Visual Aural Dip Net/Seine		apped nd Collected		
Water Temp. (.5m	from sho	ore, 10cm	deep): {	7.5 ° (0) edi	D @ 18	Comped	гF	Air Temp. (1m	abov	ve water)	24	@	navo	ve Gor F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

PARS:

KN 499-502-RNSI 5

KN 503-04-RRSI 0

KN 505-04-RRSI 7

IC 1: RRSI 8

KN 50448-1501-Youd A SIX PLOTO

RASI 1-2: TWILS, 63 ETT (CHS, by 1.62 on 8-4-10)

RASI 4: july 35 mm, mashing

RASI 6: july 32 mm, mashing

RASI 7: july 25 mm, n. 11:0

RASI 7: july 25 mm, n. 11:0

RASI 8: july 25 mm, n. 11:0

SNYLF Amphibian Data Sheet - 2009

Site ID:	Date:	08-05-1	Ø; V	Nater ty	pe: La	ake (Unmapped po	nd / Strea	m Ma	arsh Spi	ing seep	Perennia	l Epheme	ral
Pond B	(mmm-d	ld-yy)	lf	not san	ampled, reason: stream widening frozen, dry, or not found part of							er body	
Lake Name:		Pla	anning V	Vatersh	ed:		Location (Location (use common language)					
(from map) (from "Lakes Chec					klist")								
County:		Elevation:		East UTM:				North UTM;					
		m ft					only for lakes w/o a site ID; obtain from GPS unit)						
Topographic Map	(7.5'):	Weather: Clear Ov		Overcast Wind: Calm Light Strong		pH:				Team member			
		R	ain Sno	ow			source;		(m): }.	5	K. Wiseman	R. Avamai	13
Amphibian obser	ver(s): K	. Wishokan	s	urvev s	tart time	e: 1444	Total surv	ev dura	tion:	Weathe	: [Clear] Ove	rcast Rain	Snow
ErScott, I Chain	1 / AVA	CANERCOLT	É	nd time		1): 1453		9		Wind:	Calm Light		
Stream Start	East UTN	⁄/ Nor	th UTM				orth UTM		Stream d	rder:	Color: Cle		d)
only:											Turbidity: (le	ar Cloudy	y
Amphibian/reptile	e species	# adult	S	# subadults # larvae			# egg mas	sses	Comments		Survey Method		
RASI				11					2 Jim		Visual 7	Trapped	
Calling? Y W				. (0. 3		0. 3		Aural	Rand Coll	ected >
Voucher? Y (N)	#								SPAN	atta	Dip Net/Seine		
											Visual	Trapped	
Calling? Y N											Aural	Hand Coll	ected
Voucher? Y N	#										Dip Net/Seine		
											Visual	Trapped	
Calling? Y N											Aural	Hand Colle	ected
Voucher? Y N	<u>#</u> _		-								Dip Net/Seine		
L											Visual	Trapped	
Calling? Y N							-				Aural	Hand Colle	ected
Voucher? Y N	#										Dip Net/Seine		
											Visual	Trapped	
Calling? Y N	,,		1								Aural	Hand Colle	ected
Voucher? Y N		<u> </u>					A : -		<u> </u>		Dip Net/Seine	بر <i>بر</i>	
						g, standard (BOO)					.0° @		∑or F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos.

KW 534-351 RASI 1 KW 533: Pond Blomb. KASI HXO749231-4304306

RAST 21 jeun ~ 35mm

Site ID:	Date: (18-05-1	0	Water ty	/pe: L	ake (Unmar	ped por	g Stream	Ma	ırsh Sp	ring seep	Perennia	l Ephemeral
Ponde	(mmm-c	ld-yy)		If not sar	mpled,	reason: stre	eam wide	ning frozen	, dry	or not fo	und pai	t of another wat	er body
Lake Name:			Planning	y Watersh	ed:			Location (use	e con	nmon lan	guage)		
(from map)			(from "La	akes Che	cklist")								
County:		Elevation	r:		East L	JTM:				North U	TM:		
		m ft					(0	only for lakes v	w/o a	site ID; o	obtain from	m GPS unit)	
Topographic Ma	ıp (7.5');	Weather:	Clear	Overcast	Wind:	Calm/Light	Strong	pH:		Max. lak	e depth	Team member	s: C-S ett, 1 C
			Rain S	Snow				source:		(m):	175	R. Kramay	o, k.W. sema
Amphibian obse	rver(s):	Chan;	a South	Survey s	tart tim	e: 1455		Total survey	dura	tion:	Weathe	: Clear Ove	rcast Rain Sno
K. Wiscon	MAL			End time	(hhmr	n): /501		(min)	0		Wind:	Calm (Light)	Strong
Stream Start	t East UTI	N N	North UT	М	End E	ast UTM	No	rth UTM		Stream (order:	Color: Cle	ar Stained
only:					<u> </u>							Turbidity: Cle	ar Cloudy
Amphibian/repti	ile species	# ad	lults	# sub	adults	# lan	vae	# egg masse	s	Comm	ents	Surve	ey Method
PS51						45				N5 1	dr	Visual	Trapped
Calling? Y (N)	m.									(Small	15	Aural	Hand Collected
Voucher? Y N	<i>)</i> #									11500-117-		Dip Net/Seine	
RASI.				1						1 INV		Visual	Trapped
Calling? Y 🕅										100		Aurai	Hand Collected
Voucher? Y N										SULL	Ton	Dip Net/Seine	
												Visual	Trapped
Calling? Y N								ii .		iii ii		Aural	Hand Collected
Voucher? Y N				·								Dip Net/Seine	
												Visual	Trapped
Calling? Y N												Aural	Hand Collected
Voucher? Y N	<u>#</u>											Dip Net/Seine	
												Visual	Trapped
Calling? Y N												Aural	Hand Collected
Voucher? Y N												Dip Net/Seine	<u> </u>
Water Temp. (.5	m from sh	ore, 10cm	deep): 🙎		6°@	19 00.75	or F	Air Temp. (1r	n ab	ove water): 250	C_ @ /n	∠ /Gor F
amphibians: Sierr	ra Nevada	veilow-le	aged fro	oa (RASI)). Sierr	an treefrog	(PSSI).	CA newt (TA	(OT	. bullfroa	(LICA).	ong-toed salar	mander (AMMA)

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

KW 536 Pand Chab. KW 537: RASI RASI 1: 0749219-4304-282

(BK), hybrids (GT x RT, CT x RT) + fung swimp present
Notes

(S. senein)

RASIT / Juv. 36 Mm, loasting

Site ID:	Date:	08-03-	10	Water ty	/pe: Lak	e Unmappe	ф рог		Mars	sh_Sp	ring seep	Perer	ınial	Ephem	eral
Pond D	(mmm-d			If not sar	mpled, rea	ason: stream	ı wide	ning frozen	i, dry, c	or not fo	und pai	rt of another	water t	oody	
Lake Name:		F	Planning	Watersh	ed:			Location (use	e comr	non lang	guage)				
(from map)		((from "La	akes Che	cklist")										
County:		Elevation:			East UT	M:			1	North U1	ΓM:				
		m ft					(0	niy for lakes v	w/o a s	site ID; c	btain from	m GPS unit)			
Topographic Map	(7.5'):	Weather:	<u>Etear</u>	Overcast	Wind: &	রাল্টি Light St	rong	pH:			e depth	Team mem	bers: }	C.WISEWI	an,
			Rain S	now				source:	((m): 1.5	5	I. Chan, C.	Scott	R AVILLE	11400
Amphibian observ	/er(s): (, Scott, 1	Cinari	Survey s	tart time:	1649		Total survey	duratio			r: Clear C)verca:	st Rain	Snow
				End time	: (hhmm):	1705		(min) 🕼					ht St		
	ream Start East UTM Nort by:				End Ea	st UTM	No	rth UTM	5	Stream o	order:		Cléar	Staine	
only:			7.0					_				Turbidity: <		Cloud	iy
	phibian/reptile species # adults				adults	# larvae	:	# egg masse:		Comm			ırvey M	lethod	
THEL	IEL 1 (107cm SV]							3 (56)	Visual)		Trapped	
Calling? Y									17	805 m =	tomacia	Aural		Hand Col	lected
Voucher? Y N	#				_				_		_	Dip Net/Sei			
PSSI						85			- 4			VisuaP		Trapped	لمصلمماا
Calling? Y (1)	ш					L.						Aural Dip NewSei		Hand Col	lected
Voucher? Y (N)	#				_	0			- 4		1 to 20 M			Trapped	
RASI Calling? Y 0						2			- 12	SEC LE	CERV	Visual Aural		Hand Col	hostod
Voucher? Y (N)	#											Dip Net/Sei		Maild Col	iecten
Vodenci: 1 (1)	<i>n</i>											Visual		Trapped	
Calling? Y N												Aural		Hand Col	lected
Voucher? Y N	#											Dip Net/Sei			
												Visual		Trapped	
Calling? Y N												Aural		Hand Col	lected
Voucher? Y N	#											Dip Net/Sei			->.
Water Temp. (.5m	from sho	ore, 10cm o	deep): 2	3.5°@ 200	f - @ q	(P1.5M C)0	rF	Air Temp. (1n	n abov	e water): 28°	@	LVV	- 1	Ĉ ør F
aman hilbinana. Ciauma								A	TOL		"			(4.54	

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos: KW435: RASI | RASI 1: 0749095 - 4304661 KW436: RASI fred Novint RASI 2: 0749111 - 4304664 KW437-438: RASI 2. RASI 3: 0749133 - 4304626 KW439: Pona D Notes: *RASI overwinter tals appear to be in grassy, shallow shovelines
RASI 11 taapole, 70 mm, GS: 541 (hindlegsonly)

RASI 2: taapole, N 70 mm, GS: 541

RASI 3: a woodult, ~ 35 mm, basking

SWEW S

SNYLF Amphibian Data Sheet - 2009

Site ID:	Date: (08-03-	ID	Water ty	/pe: La	ake Unmap	ped por	Stream I	Marsh Sp	ring seep	Pere	ennial	Ephemeral
Pond E	(mmm-d	d-yy)		If not sar	mpled,	reason: stre	am wide	ening frozen, d	ry, or not fo	und pa	rt of anothe	r water b	ody
Lake Name:			Planning	3 Watersh	ed:			Location (use c	ommon lanç	guage)			
(from map)		ı	(from "L	akes Che	cklist")								
County:		Elevation	:		East U	TM:			North UT	ΓM:			
		m ft					(0	only for lakes w/o	a site ID; c	btain fro	m GPS unit	:)	
Topographic Map	(7.5'):	Weather:	Clear	Overcast	Wind:	Calm Light	Strong	pH:	Max. lak	e depth	Team me	mbers: 🏄	mm=go, Chan,
	`		Rain S	Snow				source:	(m): 1-1	25	Wistma	a, Scott	
Amphibian observ						e: 1616 n): 1645		Total survey du	ration:	Weather		Overcas	
		A N	lorth UT			ast UTM	No	rth UTM	Stream o		Color: Turbidity:	Clean	Stained Cloudy
Amphibian/reptile	species	# ad	ults	# sub	adults	# larv	/ae	# egg masses	Comm	ents		Survey M	ethod
THEL Calling? Y N 3 Voucher? Y N 3	nphibian/reptile species # adults E								NO STON	SPICE!	√isual> Aural Dip Net/S	1	Trapped Hand Collected
Calling? Y (N Voucher? Y N s	alling? Y N #					House	enpowe)		OF TO	MANA:	Visual Aurai Dip Net/Se	H	Trapped Hand Collected
Calling? Y N +	#					61		A.			Visual Aural (Dip Ne/Se	ŀ	Trapped Hand Collected
Calling? Y N Voucher? Y N #	oucher? Y N #										Visual Aural Dip Net/Se	ł	Trapped Hand Collected
Calling? Y N Voucher? Y N #	oucher? Y N #										Visual Aural Dip Net/Se	eine	Frapped Hand Collected
Water Temp. (.5m	from sho	ore, 10cm o	deep): 2	4 CELector	exilate.	+ 200 m	Jor F	Air Temp. (1m a	above water): 27.5	°6 Im €	A-MOV	H ₁ O Cor F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

NOTE:

Photos KW430-432 RASI tadpole 10: 0749066/430+684

Photos KW430-432 RASI tadpole 10: 0749046/4304683

KW433 Pond E showing area where RASI tads found

KW434 Thioro habitat for RASI tadpole 10

- RASI tadpoles (1-9), all at Gosnerstage & 41, all we back leas + 100 front leas; I measured at 76mm (aug of RASI tadpole #10, same stage at 1-9, temp - 170 m edgewater where found - RASI II: -55 mm, bashing (Subadult) - RASI II: -55 mm, bashing (Subadult) - RASI II: 07, 31mm, photos KW 381-84 (Subadult)

Site ID:	Date: 8	8-05-	10	Water ty	/pe: L	ake Unmapped po	nd Stream	n Ma	rsh Sp	ring seep	Pere	ennial	Epheme	eral
rmdt	(mmm-d	d-yy)		If not sar	npled,	reason: stream wid	lening froz	en, dry,	or not fo	und pai	t of anothe	r water b	ody	
Lake Name:			Planning	Watersh	ed:	·	Location (u	ise con	nmon lanç	guage)				
(from map)			(from "La	akes Che	cklist")									
County:		Elevation	1:		East L	JTM:			North UT	M:				
		m ft					only for lake	s w/o a	site ID; o	btain froi	n GPS unit)		
Topographic Map	(7.5'):	Weather:	(Clear/	Overcast	Wind:	Calm /Light/Strong	рН: —		Max. lake		Team mei	mbers:	-Scott	A Casa
			Rain S	Snow			source:		(m): 0,	3 M	K. Wise	man,	Aran	ano
Amphibian obser	ver(s):	Scott K. V	Vision When	Survey s	tart tim	e: 1518	Total surve	ey durat	tion:		: Clear			,
1. Chan						n): 1524	(min)	6		Wind:	Calm \ti	ght 7 St	rong	$\neg \neg$
Stream Start only:	East UTN	1 N	North UTI	И	End 8	East UTM N	orth UTM		Stream o	order:	Color: Turbidity:	Clear	{ Staine	
	e species	# ad	ults	# sub	adults	# larvae	# egg mas	ses	Comm	ents	•	Survey M	ethod	
Calling? Y (N) Voucher? Y (N)	nibian/reptile species # adults								See	tu	Visual Aural Dip Net/Se	5	Trapped Hand Coll	ected
Calling? Y N Voucher? Y N	#										Visual Aural Dip Net/Se		Trapped Hand Coll	ected
Calling? Y N Voucher? Y N	#										Visual Aural Dip Net/Se		Trapped Hand Coll	ected
Calling? Y N Voucher? Y N	#										Visual Aural Dip Net/Se		Trapped Hand Coll	ected
Calling? Y N Voucher? Y N											Visual Aural Dip Net/Se		Trapped Hand Coll	ected
Water Temp. (.5r	n from sho	ore, 10cm	deep): 2	0° (8° 40)	GC @	OG WAM COFF	Air Temp. ((1m abo	ove water): 24.	5 @) In	((∫or F
			1.6	(5.4.00)		an transform (DCCI)	<u> </u>	*****	1 156	(1.10.1)				

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos KW5421 Pond F Mindet KW543, RASI I KW 544: RASI 2

Notes.

RASINE 0749233-4304362 RASIN F. F. N7mm, basing in shade.

RASI #: 87, 48mm, basing in shade.

Site ID:	Date: 0	8-05-11	>	Water ty	/pe: L	ake Unmapped	pond/	Stream	Mars	sh Sp	ring seep	Perennia	Ephem	eral
Fond G	(mmm-d			If not sar	mpled,	reason: stream v	wideni	ng frozen,	, dry, o	or not fo	und pai	rt of another wate	er body	
Lake Name:			Planning	g Watersh	ed:		L	ocation (use	comi	mon lan	guage)			_
(from map)			(from "L	akes Che	cklist")									
County:		Elevation	1:		East L	DTM:				North U	ГМ:			
		m ft					(onl	y for lakes v	w/o a s	site ID; d	btain fro	m GPS unit)		
Topographic Map	(7.5'):	Weather:	Clear	Overcast	Wind:	Calm Light Stro	ong pl	H:		Max. lak	e depth	Team members		The second second
			Rain	Snow			so	ource:		(m): 🊄	-0	R. Avamano	K. MASEMA	an
Amphibian observ				Survey s	tart tim	e: 1506	Т	otal survey	duratio	on:	Weathe	r: Ctear Over	cast_ Rain	Snow
CiScar 1.0				1	(hhmr	n): 515	(n	nin)	1		Wind:	Calm (Light)	Strong	
1	am Start East UTM No				End E	ast UTM	North	ı UTM .	. (Stream (order:	Color: Clea	Staine	ed .
only:					i i							Turbidity: Clea	T/ Cloud	y
	species	# ac	lults		adults	# larvae	#	egg masses	s (Comm	ents		y Method	
RAST	nibian/reptile species # adu					1				2 500 00		Wisual?	Trapped	
Calling? Y N				10						1 +		Aural	Hand Col	lected*
Voucher? Y (N)	#			ļ ' <u> </u>						See he	lan.	Dip Net/Seine		
												Visual	Trapped	
Calling? Y N												Aural	Hand Col	lected
Voucher? Y N	#											Dip Net/Seine		
												Visual	Trapped	
Calling? Y N												Aural	Hand Col	lected
Voucher? Y N	#	ļ										Dip Net/Seine		
												Visual	Trapped	
Cailing? Y N												Aural	Hand Col	lected
Voucher? Y N	#											Dip Net/Seine		
												Visual	Trapped	
Calling? Y N												Aurai	Hand Col	ected
Voucher? Y N												Dip Net/Seine		***
Water Temp. (.5m	from sho	ore, 10cm	deep):	1317 EC	(@	8/5€ 24 (C)or l	F Ai	ir Temp. (1m	n abov	ve water): 2395	<u></u>		g or F
hihiana. Cia			1.6	(5.40)							0.10.11			

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Fluctos:

Kmi 541: Pond & Justitus

RA frok laised photose, RASI 1

RHS) 1: 0749216-4304268
RMS) 2: 0749214-4304251
RAS) 3: 0749239-4304240

Notes: RASI I: juv. 0°, 39mm; Dasking in Water RASI ZICUMUMICE ton, we65 41 RASI 3: juv., 30 mm

Site ID: Dat	te: pq	8-05-10	Water ty	/pe: La	ake (Unmapped por	nd) Stream M	Marsh Sp	ring seep	Perennial	Ephemeral
	mm-dd-		If not sar	npled, i	eason: stream wide	ening frozen, dr	y, or not fo	und par	t of another water	r body
Lake Name:		Planning	Watersh	ed:		Location (use co	ommon lan	guage)		
(from map)		(from "L	akes Che	cklist")						
County:	E	Elevation:		East U	TM:		North U	TM:		
	n	n ft			(0	only for lakes w/o	a site ID;	obtain fror	n GPS unit)	
Topographic Map (7.5	5'): V	Veather: Clear	Overcast	Wind:	Calm Light Strong	рН:	Max. lak	e depth	Team members:	P. Machetacy of
		Rain S	now	114-		source:	(m): 2.	0.44	1 Chan EW	SEWARIN C. Scott
Amphibian observer(s): Exc	ott, Chan,			e. 1530	Total survey dur	ration:		: Clear Overc	ast Rain Snow
Wildingen					1): [55]	(min)		Wind:		Strong
Stream Start East only:	t UTM	North UT	М	End E	ast UTM No	orth UTM	Stream	order:	Color: Clear Turbidity: Clear	
Amphibian/reptile spe	ecies	# adults	# sub	adults	# larvae	# egg masses	Comm	ents	Survey	Method
KASL		12	1		33.13			(Visual	Trapped
Calling? Y \\DP	- 1				7171717				Aural	Hand Collected:
Voucher?Y 🚯 #	_								Oip Net/Seine	
									Visual	Trapped
Calling? Y N									Aural	Hand Collected
Voucher? Y N #	_								Dip Net/Seine	
									Visual	Trapped
Calling? Y N									Aural	Hand Collected
Voucher? Y N #	_						4		Dip Net/Seine	- .
									Visual	Trapped
Calling? Y N									Aural	Hand Collected
Voucher? Y N #	_ +								Dip Net/Seine	
									Visual	Trapped
Calling? Y N		•							Aural	Hand Collected
Voucher? Y N #		- 40 d	// *** 0 '	0	1 0 h 1	Air Tanan (day a			Dip Net/Seine	(A) = 5
Water Temp. (.5m from						Air Temp. (1m a			41C @ =	✓ Cor F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

KW5HU: And H habited TAC75 RASI 2 Chin lbst TAC76: RASI 2 KW 550-551 RASI 3

(NTMS)
RASI 110749201- 4304263
RASI 2: 0749195- 4304218
KIM 3+4: 0749172-4304251
RASIGNO 0749144-4304254

Notes!

RASIZI & blomm / 25 glocks, basking on share

RASIZI & blomm / 25 glocks, basking on share

RASIZI & blomm / 25 glocks, basking on share

RASIZI & blomm / tad ting backlan (65: ~34)

FASIZI & blomminter tod, 65 = ~40

RASIZI & blomminter tod, ~65 40

Site ID:	Date:	08-0	4-10	Water ty	pe: L	ake Unmapped	1.pen	d Stream M	Marsh Sp	ring seep	Perennia	l Epheme	eral
find I	(mmm-d			If not sar	npled,	reason: stream	wide	ning frozen, d	ry, or not fo	und pai	rt of another wat	er body	
Lake Name:		Pla	anning '	Watersh	ed:			Location (use c	ommon lan	guage)			
(from map)		(fro	om "Lal	kes Chec	cklist")								
County:		Elevation:			East L	ITM:			North U	TM:			
		m ft					(0)	nly for lakes w/c	a site ID;	obtain froi	m GPS unit)		
Topographic Map ((7.5'):	Weather: 8	tear C	Overcast	Wind:	Calm Light Str	ong	pH:	Max. lak	e depth	Team member	SI KINISEN	1994
		R	ain Sr	now				source:	(m): 🍮	0	C.SCOT, I.C.	MAN, A ARC	AMMYD
Amphibian observe		MISE MAN		-		e: 1453		Total survey du	ration:	Weathe			Snow
1. CHARL, C.	Siell				•	n): / 704		(min) / (Wind:	and the state of t	Strong	
Stream Start E only:	East UTN	/I Nor	th UTM	1	End E	ast UTM	Nor	th UTM	Stream	order:	Color: Clear Turbidity: Clear		
Amphibian/reptile	species	# adult	s	# sub	adults	# larvae	-	# egg masses	Comm	ents	Surve	y Method	
八 <i>伟</i> Calling? Y 似 Voucher? Y 蚁 #	hibian/reptile species # adults // Hall g? Y N her? Y N # (1-21-1)								3 mm		Aural Dip Net/Seine	Trapped Hand Coll	ected
Calling? Y N Voucher? Y N #	ing? Y N # (745141) ther? Y N # (745141) ing? Y N #										Visuat Aural Dip Net/Seine	Trapped Ḥand Coll	ected- ,
Calling? Y N Voucher? Y N #	‡					~10					Visual . Aural Dip Net/Seine	Trapped Hand Coll	ected
Calling? Y N Voucher? Y N #	ing? Y N										Visual Aural Dip Net/Seine	Trapped Hand Coll	ected
Calling? Y N Voucher? Y N #	cher? Y N # ing? Y N cher? Y N #										Visual Aural Dip Net/Seine	Trapped Hand Coll	
Water Temp. (.5m	from sho	ore, 10cm de	ep): 🛭	0.500	rije@+	20°@ 10m @pr	F /	Air Temp. (1m a	above water) 25	~ C @ /	n Program (or F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos: KW485 Pond I Walletot EW428 441 Adult THER

RASI 1:0749097-4304357 RASI 2:0749107-4304402 RASI 3:0744119-4304503 RASI 4:4749119-4304315 RASI 1: July = 35mm RASI 2: July 30 mm RASI 3: July = 35mm RASI 4: adult, = 40mm

Site ID:	Date:	D8-04-10	Water ty	/pe: Lak	ke Unmapped po	nd) Stream Ma	arsh Spring seep	Perennial	Ephemeral
Pond J	(mmm-d		If not sar	mpled, re	ason: stream wid	ening frozen, dry	, or not found pa	rt of another wate	r body
Lake Name:	<u> </u>	Plannin	g Watersh	ed:		Location (use cor	nmon language)		
(from map)		(from "L	akes Che	cklist")					
County:		Elevation:		East UT	M:		North UTM:		
	•	m ft			(only for lakes w/o a	a site ID; obtain fro	m GPS unit)	
Topographic Map	(7.5'):	Weather: Clear	Overcast	Wind: C	alm €ight Strong	pH:	Max. lake depth	Team members	The state of the s
		Rain	Snow			source:	(m): 3.5 _M	L'Chenn K. K	Senso, C. Scott
	ver(s):	Wiseman +	Survey s	tart time:	1355-1500			r: Clean Overd	ast Rain Snow
Gr Zan 42			End time	(hhmm)	:1520-1630	(min) 2 hvs	. 5 Min Wind:	Calm (Light)	Strong
Stream Start only:	East UTN	M North UT	M	End Ea	est UTM No	orth UTM	Stream order:	Color: Clear Turbidity: Clear	
Amphibian/reptil	e species	# adults	# sub	adults	# larvae	# egg masses	Comments		Method
RASI	-		44		ILLI (overwiette)		Sealista	Visual	Trapped
Calling? Y N			1 = 6	Ó	111 = 8		HITOTAL	Aural	Hand Collected
Voucher? Y Ŋ	#						(bju , 6 aa)	Dip Net/Seine	
PSSI					111-111 15		70 mm	Visual	Trapped
Calling? Y 🕅					HH HT HT		+6.4.5	Aural	Hand Collected
Voucher? Y 🐧	#				MI 11 20=70	,		Dip Net/Seine	
0-150 V N								Visual	Trapped
Calling? Y N	п							Aural	Hand Collected
Voucher? Y N	#		 		1			Dip Net/Seine Visual	Transad
Calling? Y N								Aural	Trapped Hand Collected
Voucher? Y N	#							Dip Net/Seine	rianu Conecteu
VOGORIOT: 1							-	Visual	Trapped
Calling? Y N								Aural	Hand Collected
Voucher? Y N	#							Dip Net/Seine	concotod
		ore, 10cm deep): 1	0.5'= 101	1 B 19	° @ 1m CorF	Air Temp. (1m ab	ove water): 글넉,⊙	•	/(C) or F
amphibiana: Clare									

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

PHOTOS: KW 465-66: RASIZ KW 468: Paul J hab KW 468: Paul J hab KW 478-81: RASI8+9 RASINS: 0748952/4304279
RASINS: 0748952/4304279
RASIN : 0748952/4304279
RASIN : 0748965-4304329
RASING: 0749042-4304355
RASING: 0749042-4304355

RASIII AN SIMM SIMM SIMM SIMM RESIDENCES TO THE RESIDENCES AND THE RES

R. P.S. 1 12-14 10 7449053 - 4704 310

CPS112-W

Site ID:	Date:	08-0	4-10	Water ty	/pe: La	ke Unmapped	pond	Stream	Mars	sh Spi	ring seep	Per	ennial	Ephem	eral
Ponde	(mmm-d	ld-yy)		If not sar	mpíed, r	eason: stream	wideni	ng frozen	, dry, c	or not for	und pai	rt of anothe	er wate	r body	
Lake Name:			Planning	y Watersh	ed:		Lo	ocation (use	comn	mon lang	guage)				
(from map)			(from "La	akes Che	cklist")										
County:		Elevation	i:		East U	TM:			1	North U7	M:				
		m ft				90 -	(only	y for lakes v	wo a s	site ID; c	btain from	m GPS un	it)		
Topographic Map	(7.5'):	Weather:	Clear	Overcast	Wind:	(calm) Light Stro	ong ph	H:	- 1	Max. lake	e depth			R. Syama	
			Rain S	Snow			sc	ource:	((m): O	H	t. Chan	K-34	Eman, E.	244
Amphibian obser	ver(s):	Chan, L.	N15thyan	Survey s	tart time	1637	Т	otal survey	duratio	on:	Weather	: Cléar	Overc	ast Rain	Snow
C.Sutt				End time	hhmm): [G42	(n	nin)	5		Wind:	Çaim L	ight	Strong	
Stream Start	East UTN	/ N	North UT	М	End E	ast UTM	North	UTM	5	Stream o	order:	Color:	Clear	Stain	ed
only:												Turbidity:	Clea	5 Clou	dy
Amphibian/reptile	e species	# ad	lults	# sub	adults	# larvae	#	egg masse	s (Comm	ents			Method	
ρ551						75						Visual -		Trapped	
Calling? Y												Aural		Hand Co	llected
Voucher? Y 🕅	#						_					Dip Net/S	Seine		
												Visual		Trapped	
Calling? Y N												Aural		Hand Co	llected
Voucher? Y N	#											Dip Net/S	Seine		
												Visual		Trapped	
Calling? Y N												Aural		Hand Co	llected
Voucher? Y N	#						_					Dip Net/S	<u>Seine</u>		
												Visual		Trapped	
Calling? Y N						•						Aural		Hand Co	llected
Voucher? Y N	#											Dip Net/S	eine		
												Visual		Trapped	
Calling?, Y N												Aural		Hand Co	llected
Voucher? Y N												Dip Net/S			
Water Temp. (.5n	n from sho	ore, 10cm	deep): 💃	5°() 20 =	value 1	HO OHMO OF	F Ai	r Temp. (1n	n abov	e water): 21	40 (D //	<u> </u>	Ć∂r F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos: KW483: Pand K Inab X-Fairy shrimp present (Streptocephalus realit

Site ID:	Date:	08-03-10	Water ty	/pe: Lak	e Unmapped poi	nd Stream	Marsh Sp	oring seep	Perennial	Epheme	eral
Pond L	(mmm-c		If not sar	mpled, rea	ason: stream wid	ening frozen,	dry, or not fo	ound pai	rt of another wate	er body	
Lake Name:		Planning	Watersh	ed:		Location (use	common lan	guage)			
(from map)		(from "L	akes Che	cklist")							
County:		Elevation:		East UTI	M:		North U	TM:			
		m ft			(0	only for lakes w	/o a site ID;	obtain froi	m GPS unit)		
Topographic Ma	p (7.5'):	Weather: Clear	Overcast	Wind: C	alm Light Strong	pH:	Max. lak	ke depth	Team members	s: R. Arramay	0,
		Rain S	now			source:	(m): 0	0	1. Chan, C. Scot	t, K Wiser	MAN
Amphibian obse	rver(s): K	Wiseman	Survey s	tart time:	1709	Total survey d	furation:	Weather	r: Glear Oven	cast Rain	Snow
				(hhmm):		(min) 17		Wind:	Calm (ight)	Strong	
		M North UT	М	End Ea	st UTM No	orth UTM	Stream	order:	Color: Clea		ed .
only:] 			<u> </u>		Turbidity: Clea	Cloudy	y
Amphibian/repti	le species	# adults	# sub	adults	# larvae	# egg masses	Comm	ents	Surve	y Method	
THEL		1 (46cm SVL)					NO STON		Visual	Trapped	
Calling? Y 🕅							CONTE	312	Aural	Hand Coll	ected
Voucher? Y (i)	#								Dip Net/Seine		
RASI		12]]						Visual	Trapped	
Calling? Y		107			,				Aural	< Hand Coll	ected
Voucher? Y 🛍	#	10	ļ						Dip Net/Seine		
PSSI					125				Visual	Trapped	
Calling? Y									Aural	Hand Coll	ected
Voucher? Y (N	#								Dip Net/Seine		
									Visual	Trapped	
Calling? Y N									Aural	Hand Colle	ected
Voucher? Y N	#								Dip Net/Seine		
									Visual	Trapped	
Calling? Y N									Aurai	Hand Colle	ected
Voucher? Y N									Dip Net/Seine		
Water Temp. (.5	m from sh	ore, 10cm deep): 2	2°@ 10	15 @ 2N	C or F	Air Temp. (1m	above wate	r): 2 ?	% 5	m /0	C)or F
		Il I				O A /T A 3	TO\ 1166	(1.10.4)	lana taad aalan		

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LiCA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

PHOTOS: KW440-442: RASI 1 KW443-4: RASI 2

RASI 2: 0749155 - 4304659 RASI 2: 0749143 - 4304645 RASI 3: 0749147 - 4304645 RASI 2: 8, 49mm/NOWET, BASKING
RASI 2: 8, 52 mm/NW, Basking, half in Hao
RASI 3: JUV, w33 mm, basking

Site ID:	Date: 0	8-03-	-10	Water ty	pe: La	ake Ür	mapped por	nd Stream	Mar	rsh Spi	ing seep	Perenr	nial	Ephemera	al
Pora M	(mmm-d	d-yy)		If not sar	npled,	reason:	stream wide	ening frozen	, dry,	or not for	und par	t of another w	ater b	ody	
Lake Name:			Planning	y Watersh	ed:			Location (use	e com	mon lang	juage)				
(from map)			(from "L	akes Ched	cklist")										
County:		Elevation	:		East U	TM:				North UT	M:				
		m ft					(0	only for lakes v	w/o a	site ID; o	btain fror	m GPS unit)	_		
Topographic Map	(7.5'):	Weather:	Clear	Overcast	Wind:	Calm L	ight Strong	рН: —		Max. lake	e depth	Team memb	ers: f	2. Amuray	ō,
			Rain S	Snow				source:		(m): ()	D	1. Chum, R	wis	esthan, Ci	Scot
Amphibian observ	er(s):	Cham, C	. Stot	Survey s	tart tim	e: 15	56	Total survey	durati	ion:	Weathe	: Clear O	/ercas	t Rain S	Snow
K. Wiseman				End time	(hhmn	1): 16	[]	(min) 15			Wind:	Calm Ligh	t St	rong	
Stream Start only:	East UTM	1 N	lorth UT	M	End E	ast UTN	/I No	rth UTM		Stream c	order:	Color: C Turbidity: <Ĉ	lear lear	Stainea Cloudy	
Amphibian/reptile	species	# ad	ults	# sub	adults		# larvae	# egg masse:	s	Comme	ents			ethod	
RASI	•	38								See Wel		∀isual		Trapped	
Calling? Y 🕥			consider							(5 101	Carl	Aural		Hand Collec	ted,
Voucher? Y N a	#	1 4NK	08-66)								(Dip Net/Sein	е	- Control of the Cont	WHEEL COMPANY
												Visual		Trapped	
Calling? Y N												Aural		Hand Collec	cted
Voucher? Y N i	#											Dip Net/Sein			
												Visual		Trapped	
Calling? Y N									-11			Aural		Hand Collec	cted
Voucher? Y N ;	#					.						Dip Net/Sein			
												Visual		Trapped	
Calling? Y N												Aural		Hand Collec	cted
Voucher? Y N #	#											Dip Net/Sein	е		
												Visual		Trapped	
Calling? Y N												Aural		Hand Collec	cted
Voucher? Y N #												Dip Net/Sein			
Water Temp. (.5m	from sho	re, 10cm	deep): ュ	2°@ edg	E @ -	-15.5°	.5. Cor F	Air Temp. (1n	n abo	ve water)	2	8.5" @1	510	Co	or F
anahihiana. Ciawa					<u> </u>		(5000)	C A /T A	T-0\						

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos:

KW HIM: PIVID M KWH25-29 RASIS

KW 420: RASI 1

KW HZI: RASEZ

KW 422-24: RASE 4

RASI 1: 07 46mm/139, basking
RASI 2: 08, 48 mm/119, basking
RASI 3: UNK, "Sumy No Weight, Floating
RASI 4: 07 51 mm/17.5% basking
RASI 5: 4, 70 mm/32 grams, basking

UTMS for PRAST: 1-3: 0749 D&& H30H708 UTMS for RASISH+5. 0749 093 H304098

Site ID:	Date:	18-15-10	Water t	/pe: L	ake Unmapp	ed por	Stream	Marsh Sp	ring seep	Perennial	Ephem	eral
Port	(mmm-d	ld-yy)	If not sa	mpled,	reason: strea	m wide	ening frozen,	dry, or not fo	ound pa	rt of another wate	er body	
Lake Name:		Plann	ing Watersh	ed:			Location (use	common lan	guage)			
(from map)		(from	"Lakes Che	cklist")								
County:		Elevation:		East U	ITM;			North U	TM:			
		m ft				(0	only for lakes w	o a site ID;	obtain froi	m GPS unit)		
Topographic Map	(7.5'):	Weather: Clea	r Overcast	Wind:	Calm Light S	Strong	pH:	Max. lak	e depth	Team members	s. CAR. IV	Service.
		Rain	Snow				source:	(m): 0	6	Sett, Amon	day ill	
Amphibian observ	ver(s):	South	Survey s	tart tim	e: [356		Total survey d	uration:	Weathe	r: Œar Over	cast Rain	Snow
	K	Wiseman.	End time	e (hhmn	n): 1220		(min)	,	Wind:	Calm Light	Strong	
Stream Start	East UTM	// North	JTM	End 8	ast UTM	No	rth UTM	Stream	order:	Color: Clea	ır <u>(Ştaine</u>	⊋d >
only:				<u> </u>						Turbidity: - etea	ந் Cloud	ıy
Amphibian/reptile	e species	# adults	# sub	adults	# larva	e	# egg masses	Comm	ents	Surve	y Method	
RASI		1 4 107						A TOTA	L (ADUT)	Visual	Trapped	
Calling? Y (N		1 07						(27)	2-9)	Aural	Hand Col	fected.
Voucher? Y 🐧	#	19						Sec 1	etes	Dip Net/Seine		
										Visual	Trapped	
Calling? Y N										Aural	Hand Col	lected
Voucher? Y N	#	-								Dip Net/Seine		
							•			Visual	Trapped	
Calling? Y N										Aural	Hand Col	lected
Voucher? Y N	#							1100		Dip Net/Seine		
			'							Visual	Trapped	
Calling? Y N										Aural	Hand Col	lected
Voucher? Y N	#									Dip Net/Seine		
										Visual	Trapped	
Calling? Y N										Aural	Hand Col	lected
Voucher? Y N										Dip Net/Seine		
Water Temp. (.5n	n from sho	ore, 10cm deep)	20°(€ @	10 Q	19580509	or F	Air Temp. (1m	above water	r): 210	C @		C)or F
amphibians: Sierra	Nevada	vellow-leaged	frog (RASI	Sierr	an treefrog /P	2551)	CA newt (TAT	(O) hullfroo	(LICA)	long-foed salan	nander (AM	ΜΔΙ

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

KW 512: Poul NIME KW 513-517: RASI I KW 518-20: RASI Z KW 524-21 FASI I WHATERWEER KW 623-25: RASI 3 KW 526-28: RASI 4

Photosi

KHS1142:0749125-4304524 KHS1344:074910H-4304545

RASI 2: 07 A7mm, bashing, 20,5 grams RASI 2: 07 A7mm, bashing, 11,5 grams RASI 3: 2, Hamm / Topama, bashing RASIH: 07 45mm/ 10.5 gram, bashing

	Date:	08-05	10	Water ty	/pe: La	ke Unmap	pped por	¥eb⊳ Stream	m Ma	rsh Sp	oring seep	Pe	rennial	Ephemeral
. Pond. O	(mmm-d	d-yy)		If not sar	mpled, r	eason: stre	am wide	ening froz	zen, dry,	or not fo	ound par	t of anoth	ner wate	r body
Lake Name:			Planning	3 Watersh	ed:			Location (use com	ımon lan	guage)			
(from map)			(from "La	akes Che	cklist")									
County:		Elevation	:		East U	East UTM: North UTM:								
		m ft			(only for lakes w/o a site ID; obtain					obtain fror	m GPS ur	nit)		
Topographic Map ((7.5'):	Weather:	Clean	Overcast	Wind:	Calm Light	Strong	рН:		Max. lak	ce depth			P. Anderson
			Rain S	Snow				source:		(m): 으	2 24	K 11/2 10	20231	South + I. Cherry
Amphibian observer(s): 🐧 🕍 🔭 🖟 Miscon												: Clear	Overd	ast Rain Snow
				End time	•	, ,		(min) P	£		Wind:		<u>Light</u>	To be but of
Stream Start E	East UTN	V V	North UT	M	End E	ast UTM	No	rth UTM		Stream	order:	Color:	Clear	AND THE PERSON NAMED IN
only:					<u> </u>							Turbidity		
Amphibian/reptile	species	# ad	ults	# sub	adults	# lan	vae	# egg mas	sses	Comm	ents	l. a. a.	Survey	Method
RAS!		19										Visual		Trapped
Calling? Y Ñ	,,											Aural		Hand Collected
Voucher? Y 🕅 #	 _					-	_					Dip Net/	Seine	
Calling 2 V N												Visual		Trapped
Calling? Y N	ц											Aural	Caina	Hand Collected
Voucher? Y N #	<u>+</u>					1						Dip Net/: Visual	Seme	Trapped
Calling? Y N						1						Aural		Hand Collected
Voucher? Y N #	4											Dip Net/	Seine	Harid Collected
Voucilei: 1 14 #	<u></u>	l										Visual	Ociric	Trapped
Calling? Y N												Aural		Hand Collected
Voucher? Y N #	¥											Dip Net/s	Seine	Tidila Solioctoa
	·					_						Visual		Trapped
Calling? Y N												Aural		Hand Collected
Voucher? Y N #	#											Dip Net/s	Seine	
Water Temp. (.5m	from sho	ore, 10cm	deep): 2	41500	4.4 . 0/1	15 (60.15m	©ог F	Air Temp.	(1m abo	ove wate	r): 🚚	J C	@	© or F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) * Faunthing resent fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

170402

KW 508. Site Photo Pond O KW 504-11: RHS1

RASI 1: 0749135-4304523

RASI 1: 43mm, & basking, 9 grama

Date:	08-04-14	Water ty	/pe: L	ake Unmapped p	ond Stream M	Marsh Spring see	Perennial	Ephemeral			
(mmm-de	d-yy)	If not sai	mpled,	reason: stream wi	dening frozen, d	ry, or not found pa	art of another wate	er body			
	Planning	Watersh	ed:		Location (use co	ommon language)					
	(from "La	kes Che	cklist'')								
	Elevation:		East L	JTM:							
	m ft			(only for lakes w/o a site ID; obtain from GPS unit)							
		Overcast Wind: Calm Light Strong			g pH:	Max. lake depth	Team members	Chesn, Sent,			
		now			source:	(m): 0,3	Wiseman +	ATKHIRY O			
Amphibian observer(s): 1. Chan					1 , 1						
								Strong			
East UTM	North UTM	И	End E	ast UTM N	lorth UTM	Stream order:					
species	# adults	# sub	adults	# larvae	# egg masses	Comments	Survey	Method			
		111	=6			Utotal See below	Visual Aural Dip Net/Seine	Trapped Hand Collected			
*	1 (45 cm SVL) No STOM CONTEND						Visual Aural Dip Net/Seine	Trapped Hand Collected			
'							Visual Aural Dip Net/Seine	Trapped Hand Collected			
 #							Visual Aural	Trapped Hand Collected			
							Visual Aural Dip Net/Seine	Trapped Hand Collected			
	(mmm-d (7.5'): er(s): 1.0	Elevation: m ft (7.5'): Weather: Clear Rain S er(s): I. Char East UTM North UTM species # adults #	If not sain Planning Watersh (from "Lakes Chern Elevation: m ft (7.5'): Weather: Ctear Overcast Rain Snow End time East UTM North UTM Species	(mmm-dd-yy) If not sampled, Planning Watershed: (from "Lakes Checklist") East U m ft (7.5"): Weather: Overcast Wind: Rain Snow East UTM North UTM End time (hhmn End time (hhmn	If not sampled, reason: stream wide Planning Watershed: (from "Lakes Checklist") Elevation: m ft East UTM: End time (hhmm): 1 East UTM: End East UTM: End East UTM: Ea	If not sampled, reason: stream widening frozen, decision Planning Watershed: Location (use of (from "Lakes Checklist") Elevation: East UTM: (only for lakes w/o (7.5'): Weather: @tear Overcast Wind: @atm Light Strong pH: source:	If not sampled, reason: stream widening frozen, dry, or not found properly frozen (from "Lakes Checklist") Location (use common language)	If not sampled, reason: stream widening frozen, dry, or not found part of another water Planning Watershed:			

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos KWN87: Pond Phasitat

RASI 6: 0749313-4304524 RASI 6: 0749313-4304523

Notes: RASI 1-3: juvs, all +30-35 mm RASI 4-5: ONE +35mm, one +31mm, juvs. RASI 6: juv, 32mm

	Date:	OC-OH	-10	Water ty	/pe: La	ke Unmapped po	nd Stream	Marsh S	pring seep	Perennial	Ephemeral	
Pard a	(mmm-d	d-yy)		If not sar	npled, re	eason: stream wid	ening frozen, o	dry, or not f	ound par	t of another water	er body	
Lake Name:			Planning	, Watersh	ed:		Location (use	common lar	nguage)			
(from map)		_	(from "La	akes Che	cklist")							
County:		Elevation	:		East U7	M:		North L	JTM:			
		m ft		(0			only for lakes w/	o a site ID;	obtain fror	m GPS unit)		
Topographic Map	(7.5'):	Weather:	Clear	Overcast	Wind: ا	CalmoLight Strong	рН:				S. Aranny O.	
	Rain			Snow			source:	(m): <i>(</i>	2.5	Chan, Wish	Wall Story	
Amphibian observ		han				1644	Total survey du	ıration:			cast Rain Snow	
WISLARY!	>cult				,	1648	(min)			Calm Light		
Stream Start	East UTN	V V	North UT	М	End Ea	st UTM N	orth UTM	Stream	order:	Color: Clea	The same of the sa	
only:					<u> </u>					Turbidity: Clea		
Amphibian/reptile	species	# ad	ults	# sub	aduits	# larvae	# egg masses	Comn	nents		y Method	
THEL				1						Visual	Trapped	
Calling? Y (N)										Aural	Hand Collected	
Voucher? Y N #	#									Dip Net/Seine		
P 951						60				Visual	Trapped	
Calling? Y W										Aural	Hand Collected	
Voucher? Y N, #	#									Dip Net/Seine	F.7.4	
										Visual	Trapped	
Calling? Y N										Aural	Hand Collected	
Voucher? Y N #	#									Dip Net/Seine	_	
										Visual	Trapped	
Calling? Y N										Aural	Hand Collected	
Voucher? Y N #	¥									Dip Net/Seine		
										Visual	Trapped	
Calling? Y N										Aural	Hand Collected	
Voucher? Y N #										Dip Net/Seine		
Water Temp. (.5m	from sho	re, 10cm	deep): උ	400 1446	@ A	C)or F	Air Temp. (1m	above wate	er): 210	(@ 1	un (C)or F	

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos: KW484: Pond Q'hab. + Fairy shring present (Grephocephalus sealii)

Site ID: Date:	08-05-10	Water ty	/pe: La	ake ∮nmapped por	od Stream	Marsh Sp	ring seep	Perennial	Ephemeral
Pond & (mmm-d	d-yy)	If not sar	mpled, r	eason: stream wide	ening frozen,	dry, or not fo	und par	t of another wate	r body
Lake Name:	Planning	Watersh	ed:		Location (use	common lan	guage)		
(from map)	(from "La	akes Ched	cklist")						
County:	Elevation:		East U	TM:		North U	ГМ:		
	m ft			(0	only for lakes w	/o a site ID; o	btain fror	n GPS unit)	
Topographic Map (7.5'):	Weather: Clean	Overcast	Wind:	Calm/Light/Strong	pH:	Max. lak	e depth	Team members:	1. Chan, X Wishness
	Rain S	Snow			source:	(m): /.	OFT	Rifframay . C	Secti
Amphibian observer(s): ≤	Mar et 1	Survey s		36 7	Total survey d	luration:	Weather		
	an incompers			1): 1645	(min) [\		Wind:	Calm Light	
Stream Start East UTN only:	North UT	М	End E	ast UTM No	orth UTM	Stream	order:	Color: Clear Turbidity: Clear	
Amphibian/reptile species	# adults	# sub	adults	# larvae	# egg masses	Comm	ents	Survey	Method
<i>P5</i> 51 Calling? Y № Voucher? Y № #				70 25 = 95		95 4	TAS	Visual Aural Dip Net/Seine	Trapped Hand Collected
Calling? Y N Voucher? Y N #								Visual Aural Dip Net/Seine	Trapped Hand Collected
Calling? Y N Voucher? Y N #								Visual Aural Dip Net/Seine	Trapped Hand Collected
Calling? Y N Voucher? Y N #								Visual Aural Dip Net/Seine	Trapped Hand Collected
Calling? Y N Voucher? Y N #								Visual Aural Dip Net/Seine	Trapped Hand Collected
Water Temp. (.5m from sho	ore, 10cm deep):	246	alike)	21.5 Win COFF	Air Temp. (1m	above water	1: 22.5		(Ĉ)or F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos: NW 557; Pard R. Walnutat

(X73115)

Note C:

Site ID:	Date:	08-05-1101	Water ty	/pe: Lak	e Dnmapped po	ond Stream M	Marsh Sp	oring seep	Perennial	Ephemeral
Hond -	(mmm-c	ld-yy)	If not sar	mpled, rea	ason: stream wid	dening frozen, d	ry, or not fo	ound pa	rt of another wate	r body
Lake Name:		Planning	Watersh	ed:		Location (use c	ommon lan	guage)		
(from map)		(from "L	akes Che	cklist")						
County:		Elevation:		East UT	VI:	_	North U	TM:		
		m ft				(only for lakes w/c	a site ID;	obtain fro	m GPS unit)	
Topographic Mar	p (7.5'):	Weather: Clear	Overcast	Wind: C	alm /Light/ Strong	g pH:	Max. lal	e depth	Team members:	
		Rain	Snow			source:	(m): /,	5m	Tickan, Killise	Man, Calent
Amphibian obser	rver(s): 5	ame of	Survey s	tart time:	1647	Total survey du	ration:	Weathe	r: (Clear Overo	ast Rain Snow
	te	in members			1653	(min)		Wind:	Calm / Light)	Strong
Stream Start				End Ea		lorth UTM	Stream	order:	Color: Clear	
only:	-			!			- 1		Turbidity: Clear	Cloudy
Amphibian/reptil	le species	# adults	# sub	adults	# larvae	# egg masses	Comm	ents	Survey	Method
P551					350		390 10	HAR	Visual	Trapped
Calling? Y M							120		Aural	Hand Collected
Voucher? Y 🔱	#								Dip Net/Seine	
THEL		1 (45 cm SVI-)			٠				Visual	Trapped
Calling? Y N		NO STOM CONTS							Aural	Fland Collected
Voucher? Y 🐠	#								@ip Net/Seine	
									Visual	Trapped
Calling? Y N									Aural	Hand Collected
Voucher? Y N							-31		Dip Net/Seine	
									Visual	Trapped
Calling? Y N		•	-						Aural	Hand Collected
Voucher? Y N	#	•							Dip Net/Seine	
									Visual	Trapped
Calling? Y N									Aural	Hand Collected
Voucher? Y N									Dip Net/Seine	, non
Water Temp. (.5	m from sho	ore, 10cm deep): 🛭	0.501	M @22	.5 Dedgel Cor F	Air Temp. (1m a	above wate	r): 20°	· @	/ (C))or F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT).

Notes:

Photos: Kw 558: Pand Shubitat

Site ID:	Date:	08-03-	lð Wa	ater ty	pe: Lake	Unmapped po	nd Stream	Marsh :	Spring seep	Perennia	Ephemeral
Pand T	(mmm-d			ot sam	pled, rea	son: stream wide	ening frozen, d	lry, or not	found par	t of another wat	er body
Lake Name:		PI	anning Wa	tershe	ed:		Location (use o	ommon la	anguage)		
(from map)		(fr	om "Lakes	Chec	klist")						
County:		Elevation:			East UTM	1:		North	UTM:		
		m ft_									
Topographic Map	ppographic Map (7.5'): Weather: Clear			rcast	Wind: Ca	Light Strong	pH:	Max. I	ake depth	Team members	s: I. Chan, R. Ara
Rain			Rain Snow	v			source: -	(m): (15	K.Wishman	, C. Seen
Amphibian observ	ume da	Sur	vey st	art time:	1525	Total survey du	Clear Over	cast Rain Snow			
team			Enc	d time	(hhmm):	1542	(min) 17		Wind:	Calm Light	Strong
Stream Start only:	East UTM	1 No	rth UTM		End Eas	t UTM No	orth UTM	Strear	n order:	Color: Clear	
Amphibian/reptile	species	# adul	ts 7	# suba	adults	# larvae	# egg masses	Com	ments		y Method
PS/1 Calling? Y Ø						35			(Visual Aural	Trapped Hand Collected
Voucher? Y N	#									Dip Net/Seine	
ΩΑSI Calling? Y Ø Voucher? Y N :	#	13						belan	~ (Visual Aural Dip Net/Seine	Trapped Hand Collected)
Calling? Y N Voucher? Y N	#							1		Visual Aural Dip Net/Seine	Trapped Hand Collected
Calling? Y N Voucher? Y N	#									Visual Aural Dip Net/Seine	Trapped Hand Collected
Calling? Y N Voucher? Y N :										Visual Aural Dip Net/Seine	Trapped Hand Collected
Water Temp. (.5m	from sho	ore, 10cm de	ep): 25	والو	@216	Bar Dor F	Air Temp. (1m a	above wat	er):	28 @	⊘ òr F

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

* Fairy shrimp precent

RASI 1: 9,41mm/ 7g, KW 414-415, bashing

photos: KWA12 fairyshring KWA13: PMLT KWA14-65-

Site ID: Date:	08-03-10	Water ty	/pe: Lake	Uamapped por	nd-Stream Ma	arsh Spring seep	Perennial	Ephemeral	1
Pond U (mmm-d	ld-yy)	If not san	npled, rea	son: stream wide	ening frozen, dry	, or not found pa	rt of another water	body	
Lake Name:	Planning	Watersh	ed:		Location (use cor	nmon language)			
(from map)	(from "La	akes Ched	cklist")						1
County:	Elevation:		East UTM	1:		North UTM:	-		
	m ft			(0	only for lakes w/o a	site ID; obtain from	m GPS unit)		
Topographic Map (7.5'):	Weather: (clear)	Overcast	Wind: Ca	Light Strong	pH:	Max. lake depth	Team members:	1. Chair	
	Rain S	now			source:	(m): 0.8	C. Switt, K. W	liseman R. Ara	Mayo
Amphibian observer(s):	h Wiseman,		tart time: (hhmm):		Total survey dura	tion: Weather	r: Clear Overca	ast Rain Snow Strong	,
Stream Start East UTN only:	M North UTI		End Eas		orth UTM	Stream order:	Color: Clear Turbidity: Clear	Stained>	pollen
Amphibian/reptile species	# adults	# sub	adults	# larvae	# egg masses	Comments	Survey	Method	19
'(A	19					See below	Visual Aural Dip Net/Seine	Trapped Hand Collected	
Calling? Y N Voucher? Y N #							Visual Aural Dip Net/Seine	Trapped Hand Collected	
Calling? Y N Voucher? Y N #							Visual Aural Dip Net/Seine	Trapped Hand Collected	
Calling? Y N Voucher? Y N #							Visual Aural Dip Net/Seine	Trapped Hand Collected	
Calling? Y N Voucher? Y N #							Visual Aural Dip Net/Seine	Trapped Hand Collected	
Water Temp. (.5m from sho	ore, 10cm deep): 2	2 Cedge	@196	OFF CorF	Air Temp. (1m ab	ove water): 2	7.5 @	(°C)or F	

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos: KW 416 : PANDU KW 417: RASI 1 -418

RASI 1: 9, 47mm/12g, basking, photos KW 417-418

Site ID:	Date: 0	8-115-	1:12	Water ty	/pe: La	ke Unmapped poi	nd/ Stream	Marsh S	oring seep	Perennial	l Ephemeral				
Pond V	(mmm-d	d-yy)		If not sar	mpled, re	eason: stream wide	ening frozen, o	dry, or not fo	ound pa	rt of another wat	er body				
Lake Name:			Planning	3 Watersh	ed:		Location (use	common lar	iguage)						
(from map)			(from "La	akes Che	cklist")										
County:		Elevation	n:		East U	East UTM: North UTM:									
		m ft				(0	only for lakes w/	o a site ID;	obtain from GPS unit)						
Topographic Ma	p (7.5'):	Weather	Clear	Overcast	Wind:	Calm Light/Strong	V3 A	s: 1. Chan in wife-							
			Rain S	Snow			source:	(m): 3	Day	mart, is Antie	MULL C. STORT				
Amphibian obse	rver(s):	Chan, GS	4件	Survey s	tart time	1600	Total survey du	rcast Rain Snow							
	K Wiseman, K Aramayo): [6]5	(min)	Calm Light,							
Stream Start			North UT	М	End E	ast UTM No	orth UTM	Stream	order:	Color: Clea					
only:										Turbidity: Clea					
Amphibian/repti	le species	# ac	dults	# sub	adults	# larvae	# egg masses	Comn	nents	Surve	y Method				
										Visual	Trapped				
Calling? Y N										Aural	Hand Collected				
Voucher? Y N	#									Dip Net/Seine					
										Visual	Trapped				
Calling? Y N										Aural	Hand Collected				
Voucher? Y N	#									Dip Net/Seine					
										Visual	Trapped				
Calling? Y N										Aural	Hand Collected				
Voucher? Y N	#									Dip Net/Seine					
										Visual	Trapped				
Calling? Y N										Aural	Hand Collected				
Voucher? Y N	#									Dip Net/Seine					
										Visual	Trapped				
Calling? Y N										Aural	Hand Collected				
Voucher? Y N										Dip Net/Seine					
Water Temp. (.5	m from sho	ore, 10cm	deep):🐊	000	@ 11	8 5 0 5 0 or F	Air Temp. (1m	above wate	r): <u>2</u> 2 °	1 Inc. @ha	(C)or F				

amphibians: Sierra Nevada yellow-legged frog (RAŠI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

ATVAS

KW552- Pond V Meditat

Mates:

Site ID:	Date:	08-05-10	Water ty	pe: La	ke Ønmapped poi	ີງ¢ Stream	Marsh S	pring seep	Perennia	l Ephemeral		
tand W	(mmm-d	d-yy)	If not san	npled, r	eason: stream wide	ening frozen,	dry, or not f	ound pai	t of another wat	er body		
Lake Name:		Planning	Watershe	ed:		Location (use	common la	nguage)				
(from map)		(from "La	skes Chec	klist")								
County:		Elevation:		East U	ΓM:	North UTM:						
ı		m ft			(only for lakes w/o a site ID; obtain from GPS unit)							
Topographic Map (7.5'): Weather: Clea		Weather: Clear	Overcast	Wind:	Calm Light Strong	pH:	Max. la	ke depth	Team member	s: Rollramayo,		
	Rain		Snow			source:	(m): /	25 m	C.Jutt. I.C.	AT I VIEW		
Amphibian obser	ver(s):	hai	Survey st	tart time	14/5	Total survey d	uration:	Weather	r: (Clear Over	cast Rain Snow		
MISSHAL	511 55 57	+ Aretmano	End time	(hhmm): 1628	(min) (3)		Wind:	Calm / Light/	Strong		
Stream Start only:	East UTM	North UTI	И	End E	ast UTM No	orth UTM	Stream	order:	Color: Clear			
Amphibian/reptile	e species	# adults	# suba	adults	# larvae	# egg masses	Comn	nents		y Method		
045					35			MAL	Visual	Trapped		
Calling? Y N Voucher? Y N	#				75 = 110		TAD		Aural Dip Net/Seine	Hand Collected		
Calling? Y N Voucher? Y N	#		(A)				Sec 10		Visual Aural Bip Net/Seine	Trapped Hand Collected		
Calling? Y W	#	(n+12cmSVL)	1 (37)	SVL)		*	200	just)	Visual Aural Dip Net/Seine	Trapped Hand Collected		
Calling? Y N Voucher? Y N	#								Visual Aural Dip Net/Seine	Trapped Hand Collected		
Calling? Y N Voucher? Y N	#								Visual Aural Dip Net/Seine	Trapped Hand Collected		
		ore, 10cm deep): 2	2400 01	@ 2	را در در Cor F	Air Temp. (1m	above water	er): 🗸 🛴		(Cor F		
				ALC: UNKNOWN	n treefrog (DSSI)					1 (014110)		

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

KW 554: RASI

MTMS: DASI 1: 0-749114-4304294 THELZ: 0749100-4304300 MAST 1- 07 43mm, lossking

Site ID: Date:	08-05-10	Water ty	ype: La	ke Unmapped por	nd Stream M	larsh Sp	ring seep	Perennial	Ephemeral]		
Port X (mmn	n-dd-yy)	If not sar	mpled, re	eason: stream wide	ening frozen, do	y, or not fo	und pa	rt of another water	r body]		
Lake Name:	Plannin	g Watersh	ed:		Location (use co	mmon lan	guage)]		
(from map)	(from "L	akes Che	cklist")									
County:	Elevation:		East U	TM:		North U	TM:					
	m ft			(0	only for lakes w/o	a site ID;	obtain fro	m GPS unit)				
Topographic Map (7.5'):	Dec.		Wind:	Calm Light/Strong		Max. lak		Team members:				
	Rain	Snow			source:	(m): /	5	1. Chan. K.W.	SOMAN, C- Scott	1		
Amphibian observer(s):	3×1116 23	Survey s	tart time	1433	Total survey dura	ation:	Weathe	r: LClear Overc	ast Rain Snow			
team membe	13	End time	(hhmm): 1638	(min) 5		Wind:	Calm Light	Strong	1		
Stream Start East U		M	End E	ast UTM No	orth UTM	Stream	order:	Color: Clear Turbidity: Clear		yello		
Amphibian/reptile speci	es # adults	# sub	adults	# larvae	# egg masses	Comm	ents	Survey	Method	ľ		
Calling? Y N	19		_			seen	etes	Visual Aural Dip Net/Seine	Trapped dand Collected			
Calling? Y N Voucher? Y N #							1	Visual Aural Dip Net/Seine	Trapped Hand Collected			
Calling? Y N Voucher? Y N #								Visual Aural Dip Net/Seine	Trapped Hand Collected			
Calling? Y N Voucher? Y N #								Visual Aural Dip Net/Seine	Trapped Hand Collected			
Calling? Y N Voucher? Y N #								Visual Aural Dip Net/Seine	Trapped Hand Collected			
Water Temp. (.5m from	shore, 10cm deep):	11/20	@/	9.501.451.(C) or F	Air Temp. (1m at	bove water): QZ. 5	@ /@ ma	brue Hzc Gor F]		

amphibians: Sierra Nevada yellow-legged frog (RASI), Sierran treefrog (PSSI), CA newt (TATO), bullfrog (LICA), long-toed salamander (AMMA) reptiles: W. aquatic garter snake (THCO) W. terrestrial garter snake (THEL) common garter snake (THSI) W. pond turtle (CLMA) fish: rainbow trout (RT), golden trout (GT), cutthroat trout (CT), brown trout (BN), brook trout (BK), hybrids (GT x RT, CT x RT)

Photos: KW555 Panka harbitat RD alunes of RASI 1

RHS11,0749048-4304236

Notes: RASI 1: \$ Howm/12gmagbas Mang