

Field Update:

RMT field crews continued fall monitoring activities to include: Vaki Riverwatcher monitoring, biometric carcass sampling for Chinook salmon, Cormack-Jolly-Seber mark-recapture escapement surveys downstream of Daguerre Point Dam, temperature monitoring, and redd surveys in the EDR (for the US Army Corps of Engineers).

Juvenile habitat snorkel surveys were not conducted as a result of complications arising from staff illness and insufficient overall staffing levels to conduct this survey concurrently during the fall monitoring season. This survey will likely not resume until late-December or January when biometric/escapement sampling wanes. This survey will require a dedicated staff in the future to be completed during the fall spawning season, or standing down of other monitoring activities, as has been suggested by some RMT members in order to free up personnel.

The Vaki Riverwatchers observed many Chinook salmon passages during the month of October. The replacement of the onsite computer's hard disk drives with newer solid-state drives appears to have corrected the outages experienced during September. See below for the latest updated Vaki tables.

Biometric sampling of carcasses upstream of Daguerre Point Dam (DPD) has continued. Flows upstream of DPD during October have allowed use of motorized vessels in this reach once again, dramatically reducing the staff time required to conduct this sampling. See below for updated summary tables.

Mark-recapture surveys downstream of DPD have also continued. Kayaks are required in this section and are requiring a bit of ingenuity by field personnel to carry all of the equipment needed and to retrieve biological samples (e.g. CWT heads, scale and otolith samples).

All temperature loggers in the lower Yuba River were downloaded and data were integrated to the RMT flow/temperature database.

Redd monitoring in the Englebright Dam Reach has also continued weekly for the US Army Corps of Engineers. Since September 18, a total of 73 redds have been observed in this reach.

Loren Stearman has been working closely with Scott Burman and Greg Pasternack to create robust sampling protocols as part of the Juvenile Monitoring Subcommittee's efforts to develop a comprehensive juvenile fish monitoring plan. He will be presenting this work to the subcommittee soon for additional collaborative refinement of the methods. We plan to present this work to the RMT when the protocols are ready for more collaborative input.

Vaki Riverwatcher

(03/01/13-10/27/14)

		M	A	M	J	J	A	S	O	N	D	J	F	subtotal	total YTD	M	A	M	J	J	A	S	O	N	D	J	F	subtotal	total YTD
O.tshawytscha	N	11	3	269	833	801	808	1038	3164	1286	153	30	39	8435	9868	2	33	74	353	164	962	765	1803					4156	4456
	S	2	4	46	319	198	103	88	546	111	8	0	8	1433		1	1	2	8	23	109	21	135					300	
Ad-clip	N	0	0	9	43	36	38	166	482	246	36	1	0	1057	1229	1	11	18	38	15	86	98	403					670	713
	S	1	1	3	12	12	9	12	102	19	1	0	0	172		0	0	1	0	3	8	3	28					43	
Ad-undet.	N	0	0	0	15	7	6	7	103	64	6	1	2	211	231	1	1	0	4	0	8	6	37					57	57
	S	0	0	0	3	1	0	1	10	0	0	0	5	20		0	0	0	0	0	0	0	0					0	
Total	N	11	3	278	891	844	852	1211	3749	1596	195	32	41	9703	11328	4	45	92	395	179	1056	869	2243					4883	5226
	S	3	5	49	334	211	112	101	658	130	9	0	13	1625		1	1	3	8	26	117	24	163					343	
O.mykiss	N	85	33	26	19	21	11	32	36	10	2	33	25	333	444	30	27	30	33	22	19	11	55					227	307
	S	19	13	5	7	2	4	9	20	16	3	3	10	111		13	2	10	17	14	6	10	8					80	
Ad-clip	N	8	11	0	0	0	0	3	5	12	12	68	31	150	247	18	2	0	0	1	2	1	3					27	35
	S	16	4	3	3	3	9	15	8	19	7	4	6	97		3	0	0	0	2	0	0	3					8	
Ad-undet.	N	5	2	0	2	4	0	0	0	4	1	13	44	75	94	19	2	1	1	1	0	1	2					27	42
	S	1	1	0	0	0	1	0	0	2	0	0	14	19		11	1	1	1	0	0	0	1					15	
Unk. salmonid	N	0	0	1	0	0	4	3	2	4	1	1	0	16	24	0	0	2	1	0	0	0	3					6	6
	S	1	0	0	0	0	2	0	1	0	1	0	3	8		0	0	0	0	0	0	0	0					0	
O.gorbuscha	N	0	0	0	0	0	0	2	0	0	0	0	0	2	2	0	0	0	0	0	0	0	0					0	0
	S	0	0	0	0	0	0	0	0	0	0	0	0	0		0	0	0	0	0	0	0	0					0	
O. nerka	N	0	0	0	0	4	7	1	0	0	0	0	0	12	13	0	0	0	0	0	0	0	1					1	1
	S	0	0	0	0	0	1	0	0	0	0	0	0	1		0	0	0	0	0	0	0	0					0	
O. keta	N	0	0	0	0	0	1	0	0	0	1	0	0	2	2	0	0	0	0	0	0	0	0					0	0
	S	0	0	0	0	0	0	0	0	0	0	0	0	0		0	0	0	0	0	0	0	0					0	
Brown Trout	N	1	0	0	0	0	0	1	0	0	0	0	0	2	3	0	0	0	0	0	0	0	0					0	1
	S	0	0	0	0	0	0	0	0	1	0	0	0	1		0	0	0	0	1	0	0	0					1	
S. pikeminnow	N	44	97	27	12	3	3	0	1	0	0	0	2	189	210	69	65	43	11	5	8	1	3					205	209
	S	9	6	1	1	0	0	0	0	0	0	0	4	21		2	0	1	0	0	0	0	1					4	
S. sucker	N	201	179	26	33	25	16	1	0	1	0	0	21	503	576	124	122	41	12	10	3	1	2					315	388
	S	46	18	5	0	3	0	0	0	0	0	0	1	73		72	1	-1	0	0	1	0	0					73	
Hardhead	N	1	9	7	4	0	1	1	0	0	0	0	0	23	26	0	8	1	0	0	0	0	0					9	9
	S	1	1	0	0	1	0	0	0	0	0	0	0	3		0	0	0	0	0	0	0	0					0	
A.shad	N	0	0	0	0	11	1	0	0	0	0	0	0	12	12	0	0	0	0	0	1	0	0					1	1
	S	0	0	0	0	0	0	0	0	0	0	0	0	0		0	0	0	0	0	0	0	0					0	
Unident. (TL<35cm)	N	-12	0	18	23	1	3	0	6	1	2	0	7	49	89	42	0	2	0	-1	-1	2	-6					38	103
	S	5	0	-1	3	1	8	2	0	1	0	0	21	40		67	1	-1	1	-3	0	0	0					65	
Unident. (TL≥35cm)	N	0	0	0	0	0	4	0	2	1	0	0	1	8	10	0	-1	0	0	0	0	0	1					0	1
	S	0	0	0	0	0	1	0	0	1	0	0	0	2		0	1	0	0	0	0	0	0					1	
Mean % Op.	N	100	100	100	100	100	100	100	100	100	100	100	76	98	99	83	100	99	100	100	100	82	100					96	98
	S	100	100	100	100	100	100	100	100	100	100	100	100	100		99	100	99	100	100	100	100	100					100	

Carcass Survey

Biological Sampling (Narrows Pool to DPD)

Survey Week	Fresh Carcasses Observed	Ad-clips Observed	Female Carcasses Observed	Unspawned Females Observed	Otoliths Collected
09/15/2014	2	0	2	0	2
09/22/2014*	0	0	0	0	0
09/29/2014*	11	0	5	0	4
10/06/2014*	29	1	19	3	7
10/13/2014	91	6	67	2	25
10/20/2014	86	7	71	4	22
10/27/2014	83	8	58	4	19
Totals	302	22	222	13	79

* Survey conducted via kayak from UCD property to DPD as a result of insufficient conditions for motorized vessel travel

Modified CJS Mark-Recapture (DPD to Simpson Lane Bridge)

Survey Week	Marked Carcass Total	Marked Carcass Recoveries	Dead on Capture	Female Carcass Total	Unspawned Total	Otoliths Collected
09/15/2014	0	0	0	0	0	0
09/22/2014	0	0	0	0	0	0
09/29/2014	1	0	1	1	1	1
10/06/2014	2	0	1	1	1	2
10/13/2014	8	0	1	5	2	2
10/20/2014	13	2	7	2	1	5
10/27/2014	56	3	11	21	9	12
Totals	80	5	21	30	14	22