

1 STUDY PURPOSE/PROJECT DESCRIPTION

Under an agreement with the Federal Energy Regulatory Commission, the California Department of Water Resources (DWR) maintains a year round trout fishery in Piru Creek between Pyramid Dam and Frenchman's Flat, located in the Angeles National Forest. To implement this agreement the California Department of Fish and Game releases a total of 3,000 pounds of hatchery raised fish into Piru Creek at Frenchman's Flat between November and May. Trout reproduce naturally upstream of Frenchman's Flat and portions of the stream in this location are considered a catch and release area.

The purpose of this study is to conduct four mid-week and four weekend creel census surveys on randomly selected dates at middle Piru Creek and Frenchman's Flat from October 2003 through April 2004. Creel census surveys were undertaken to determine angler usage of the area and quantify the number and species of fish caught at each location. Surveys were conducted in the middle section of Piru Creek and Frenchman's Flat which are located approximately two miles downstream of Pyramid Dam.

2 SURVEY DATES AND CENSUS PERSONNEL

Creel census surveys were scheduled on the following dates during February 2004. Five mid-week surveys were scheduled on February 5th, 9th, 13th, 23rd and 27th, and four weekend dates were scheduled on February 21st, 22nd, 28th, and 29th. One additional weekend day was added to the February survey schedule to replace the last remaining survey days delayed as a result of forest closures during the October brush fires. As of February 2004, all outstanding surveys days have been completed. Aspen biologists conducted creel census training with the CDFG prior to deploying to the field. Field data were recorded for each angler present during the survey dates and included information including the type and number of fish caught, length and mass of the fish if not released, angler satisfaction, and age demographics. Creel census surveys in Piru Creek were conducted during the month of February 2004 by Lynn Stafford, and Christopher Meyer of Aspen Environmental Group, a DWR contractor.

3 SUMMARY

Male anglers continue to comprise the majority of fisherman at both Piru Creek and Frenchman's Flat. Of the ninety-three anglers identified during the survey period, only three women were noted fishing in the project area. All female anglers were identified in the company of other male anglers. Of the anglers interviewed, 82% indicated they were satisfied with their general fishing experience despite the rainy weather experienced during February. However, only 29% of the anglers were satisfied with the size of the fish caught and only 22% indicated they were satisfied with the number of fish captured. These values are lower than observed in any previous months with the exception of angler satisfaction, where most anglers remain pleased with their fishing experience. Most anglers were unhappy by the heavy rainfall and lower numbers of anglers were observed at the site compared to January's record high numbers of anglers. However, despite the poor weather and turbid conditions observed in the creek, February still had the second highest angler usage to date. Similarly, although large numbers of anglers were present during the subject month, February recorded the lowest numbers of fish captured (63) compared to any other month. This reduction may be the result of the heavy storm flows and increased turbidity that occurred for several weeks in February. Another alternative reason for the reduced numbers of fish captured may be the increased level of illegal fishing activity observed in Piru Creek. The creel census monitor recorded two such events where poachers utilized seine and dip nets to remove trout from both upper Piru Creek and Frenchman's Flat. In addition, on several occasions, anglers reported illegal fishing to the creel census monitor and the California Department of Fish and Game.

See Figure 1 at the end of this report to compare angler satisfaction responses for creel census surveys conducted from October 2003 to February 2004.

Fly fisherman continue to comprise the majority of anglers utilizing both Frenchman's Flat and Piru Creek upstream of Frenchman's Flat. However the number of fish released was down slightly from the previous month. During the February survey period approximately thirty-eight fish were released by anglers (approximately 60% of all fish captured during the survey period), most of which were captured and released from the upper Piru Creek area. Few fish were captured and none were released from Frenchman's Flat during the February creel survey period. Angler usage remains slightly higher during weekend periods by a factor of approximately two to one. Day use appears to fluctuate with many mid-week anglers using the site during lunch hours and early evening periods.

Litter and refuse remain the main source of angler concern and is a common complaint addressed to the census monitor. However, poaching appears to be a growing problem and has been recorded several times during the census period. Numerous anglers have complained to the creel census monitor that illegal fishing with the use of nets has occurred. Several "ice-chests" full of trout have been removed from Piru Creek during February alone.

Some anglers have offered that they would volunteer their time as a docent if the USFS would place a Kiosk near the entrance. Interestingly, while many anglers requested additional flow in Piru Creek and the removal of the rock weirs placed in Frenchman's Flat, several anglers indicated their concern that too much water was being released and requested additional deep pools be created to enhance trout fishing.

Additional comments received by anglers during the survey period include:

- Illegal and un-licensed fishing, and hunting occurring in catch and release areas on a regular basis
- Poachers removing "ice-chests" of fish from Piru Creek
- Request sign indicating the best location to purchase a USFS Adventure Pass
- Provide additional enforcement of CDFG game laws and maintain law enforcement presence to reduce gang activity, and poaching
- Trash remains a major concern at Frenchman's Flat
- Need better signage demarcating the catch and release area
- Fishing is only good after stocking
- The area requires a full time Kiosk at Frenchman's Flat during weekend periods
- Several anglers have asked how to contact USFS to join docent program for Piru Creek

Rainbow trout were the primary species sought by all the anglers surveyed and were the only fish species caught and kept during the February survey period. Of the 63 fish captured, measurements were obtained for only 21 fish. No hatchery marks were identified by the monitor and all fish observed had intact adipose fins. In addition, most fish were caught and released by the anglers prior to inspection by the monitor. A brief summary of the creel census survey results for each site is located below. Table 1 and Table 2 summarize the creel census data, including statistics on measured fish, for the month of February 2004.

Table 1 Creel Census Data at Piru Creek and Frenchman's Flat February 2004.

Creel Census Location	Number of Anglers Per Site	Sex/Age Distribution of Anglers		Hours Fished Per Location	Number of Fish Caught	Number of Fish Released	Percent of Anglers Satisfied with Experience		
							Fishing Experience	Size of Fish	Number of Fish
Frenchman's Flat Mid-week	16	<16		42	4	0	75%	31%	25%
		16-30	1 (m)						
		31-45	1 (m)						
		46-55	7 (m)						
		56-65	4 (m)						
>65	3 (m)								
Frenchman's Flat Weekend	19*	<16		66	11	0	90%	32%	20%
		16-30	6 (m)						
		31-45	6 (m)						
		46-55	5 (m)						
		56-65	2 (m)						
>65									
Piru Creek Mid-week	26*	<16		63.5	13	13	70%	15%	15%
		16-30	7 (m)						
		31-45	2 (f) 6 (m)						
		46-55	8 (m)						
		56-65	1 (m)						
>65	2 (m)								
Piru Creek Weekend	32	<16		103.5	35	25	93%	38%	28%
		16-30	6 (m)						
		31-45	1 (f) 12(m)						
		46-55	8(m)						
		56-65	2 (m)						
>65	3 (m)								
Totals	93	<16	20 (m)	275	63	38	82%**	29%**	22%**
		16-30	3 (f) 25 (m)						
		31-45	52 (m)						
		46-55	28 (m)						
		56-65	9 (m)						
>65	6 (m)								

*Some anglers fished at two locations.

**Total number of anglers combined for both areas.

Table 2 Summary of Fish Size and Length by Area for Frenchman's Flat and Upper Piru Creek.

Creel Census Location	Number of Fish Caught	Number of Fish Measured	Average Length mm	Standard Deviation	Range mm	Average Mass grams	Standard Deviation	Range grams	Hatchery Marks
Frenchman's Flat Mid-week	4	4	277.5	33	(250-310)	Mass not taken	N/A	N/A	Not observed
Frenchman's Flat Weekend	11	9	216	59	(160-320)	Mass not taken	N/A	N/A	Not observed
Piru Creek Mid-week	13	0	--	--	--	--	--	--	Not observed
Piru Creek Weekend	35	9	178	17	(160-200)	Mass not taken	N/A	N/A	Not observed

4. SURVEY RESULTS FRENCHMAN'S FLAT

Frenchman's Flat Mid-Week

- A total of sixteen (16) anglers were identified fishing at Frenchman's Flat
- Four (4) fish were caught and zero (0) fish were kept by anglers during the midweek census period
- Average size of trout was 277.5 mm.
- No mass data was available as all anglers declined to have their fish weighed
- Of the sixteen (16) anglers, twelve (12) were satisfied with their fishing experience
- Five (5) of sixteen (16) anglers were satisfied with the number of fish caught
- Five (5) of sixteen (16) anglers were satisfied with the size of the fish caught
- All anglers were male
- One (1) angler was between 16-30, one (1) angler was between 31-45, seven (7) were between 46-55, four (4) were between 56-65, and three (3) were over 65 years of age.

Frenchman's Flat Weekend

A brief summary of creel census survey results is located below:

- A total nineteen (19) anglers were identified fishing at Frenchman's Flat
- Eleven (11) fish were caught and nine (9) fish were kept during the weekend census period
- Average size of trout was 216 mm
- No mass data was available as all anglers declined to have their fish weighed
- Seventeen (17) of nineteen (19) anglers polled were satisfied with their fishing experience
- Six (6) of nineteen (19) anglers were satisfied with the number of fish caught
- Five (5) of nineteen (19) anglers were satisfied with the size of the fish caught
- All anglers were male
- Six (6) anglers were between 16-30, six (6) anglers were between 31-45 years of age, five (5) anglers were between 46-55 years of age, and two (2) were between 56-65 years of age.

5. SURVEY RESULTS PIRU CREEK

Piru Creek Mid-Week

- A total of twenty-six (26) anglers were identified fishing in Piru Creek
- Thirteen (13) fish were caught and thirteen (13) released during the midweek census period
- No length or mass data was obtained from the anglers in the catch and release area
- Twelve (12) of twenty-six (26) anglers were satisfied with their fishing experience
- Five (5) of twenty-six (26) anglers were satisfied with the number of fish caught
- Four (4) of twenty-seven (27) anglers were satisfied with the size of the fish caught
- With the exception of two (2) female anglers between 31-45 years of age accompanied by other anglers, all other anglers were male
- Seven (7) anglers were between 16-30 years of age, eight (8) were between 31-45, eight (8) were between 46-55 years, one (1) was between 56-65 years of age, and two (2) were over 65 years of age.

Piru Creek Weekend

- A total of thirty-two (32) anglers were identified fishing in Piru Creek
- Thirty-five (35) fish were caught and twenty-five (25) fish were released during the weekend census period
- Average size of trout taken was 178 mm
- No mass information was obtained
- Thirty (30) of thirty-two (32) anglers were satisfied with their experience
- Twelve (12) of thirty-two (32) anglers were satisfied with the number of fish caught
- Nine (9) of thirty-two (32) anglers were satisfied with the size of the fish caught
- With the exception of one (1) female between 31-45 years of age, all other anglers were male
- No single female anglers were observed in the area
- Six (6) anglers were between 16-30 years of age, thirteen (13) anglers were between 31-45, eight (8) were between 46-55, and two (2) anglers were between 56-65 years of age.

Figure 1. Angler Satisfaction (%) and Total Number Fish Caught/Number of Anglers Present from October 2003 to February 2004

