

**Steelhead Tagging Project  
at  
Moricetown Canyon**

**JULY TO OCTOBER 2005**

by  
Wet'suwet'en Fisheries

**Data Analysis and Recommendations**

by

SKR Consultants Ltd.  
Smithers, B.C.

for

Pacific Salmon Foundation  
Vancouver, B.C.  
And  
Ministry of Environment  
Smithers, B.C.

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## Executive Summary

During the summer and fall of 2005, the Wet'suwet'en Fisheries continued the Moricetown Canyon steelhead tagging program that was initiated in 1999, in conjunction with an ongoing coho, sockeye and Chinook tagging program. Coho, sockeye and Chinook data were analysed separately by Fisheries and Oceans Canada. The data collected for steelhead migrating from June to October 2005 are summarized in this report. Catch per unit effort information was summarized in a separate report prepared by Wet'suwet'en Fisheries. The continued objectives of this steelhead tagging program have been to standardize sampling methodologies, develop and evaluate in-season population estimates or indices and to monitor the run-timing and relative annual returns of steelhead migrating upstream of Moricetown Canyon.

Between July 7<sup>th</sup> and October 3<sup>rd</sup>, 2005, 527 steelhead were tagged by beach seining and 1426 steelhead were tagged in the dipnet fishery. Steelhead catch rates obtained from dipnet and beach seine samples exhibited less temporal differences in 2005 than in the initial two years of the study (1999 and 2000), when capture rates by dipnetting decreased notably after September 1<sup>st</sup> (Labour Day). Catch rates indicate that the tagging program encompassed the beginning and peak time of steelhead migration through Moricetown Canyon, but that a later portion of the migration period may not have been sampled. A comparison of sex ratios was not conducted because gender identification of steelhead in the fall is notoriously difficult, and was found to be inconsistent during previous years of the study (1999, 2000 and 2001). Fork lengths were compared between dipnet and beach seine catches to investigate potential size biases in sampling gear. Fork lengths were not found to be significantly different, similar to previous years of the study except 2004 where steelhead captured in the dipnet fishery were significantly larger than the steelhead captured by beach seining.

The number of steelhead tagged in 2005 is lower than the targeted number (600-1,000) for a mark-recapture estimate, assuming a population size between 10,000 and 30,000 steelhead, and the recapture rates in 2005 were intermediate to recapture rates in previous years of the study, with 3.3% the steelhead examined in the dipnet fishery having been tagged by beach seining (54 of 1,636). Since 1999, the highest proportion of recaptures in the dipnet fishery was achieved in 2003, where 5.5% of the steelhead sampled by dipnetting were recaptures initially tagged in the beach seine fishery (100 of 1805). The lowest proportion of recaptures was 0.5% in 1999, where only eight steelhead were recaptured in a sample of 1555 steelhead examined in the dipnet fishery. The varying proportions of recaptured steelhead in the dipnet fishery is in large part due to the varying number of tags applied in the beach seine fishery, with a low of 164 (in 1999), and a high of 834 (in 2002). The second highest number of tags applied in the beach seine fishery (656 tags) was in 2003, which corresponds to the highest proportion of recaptures. In 2005, 527 steelhead were tagged in the beach seine fishery downstream of Moricetown Canyon. The number of steelhead tagged in the beach seine fishery in 2005 was lower than the number tagged in 2003, and 2002, but was higher than the number of steelhead tagged in the beach seine fishery in 1999, 2000, 2001 and 2004.

Fifty-four of the 527 steelhead tagged downstream of the canyon were recaptured in a sample of 1700 steelhead examined for tags at the canyon. A 5% tag loss was assumed, based on tag loss estimates for beach seine and dipnet capture steelhead in 2005, and in previous years of the study. The adjusted Petersen estimate for steelhead moving through Moricetown Canyon between July 7<sup>th</sup> and October 3<sup>th</sup>, 2005 determined for this mark-recapture data is 14,912 steelhead (95% confidence interval = 11,289-18,535). In addition, a Schaeffer estimate was calculated for steelhead migrating through Moricetown Canyon for the duration of the tagging project. The Schaeffer estimate for the tagging project was 15,567 steelhead. The ML Darroch estimate for the Moricetown tagging project was 18,126 steelhead (95% confidence interval = 5,696-30,284). These estimates should be viewed in light of constraints of the study, including low recapture rates (3.3%), incomplete sampling of the steelhead run, and non-random sampling at the beach seine and dipnet locations. The estimated number of steelhead moving through

Moricetown Canyon in the study period is similar to the estimate for the same period in 2003 and 2004, and appears lower than the population estimates determined in 1999 to 2002. The population estimates for 2000 (Petersen estimate = 43,428; 95% confidence interval = 18,876-103,819) and 2001 (25,289; 95% confidence interval = 20,596-33,941) are significantly higher than the steelhead population estimates for 2003 (14,963; 95% = 12,390-17,535) and 2005 (14,912, 95% confidence interval = 11,289-18,535) as indicated by the lack of overlap in the confidence intervals. No further studies (e.g. snorkel counts) were conducted upstream of Moricetown Canyon in 2005.

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## Acknowledgements

We wish to thank Wet'suwet'en Fisheries, in particular Walter Joseph and the Wet'suwet'en Rangers for providing the databases, information, clarification, and input for this report. Thanks go to Brian Michelle for his help in gathering historical hardcopy and digital data. Walter Joseph (Wet'suwet'en Fisheries) and Mark Beere (Ministry of Environment) reviewed a draft version of the report. Funding for data analysis and reporting was provided by the Pacific Salmon Foundation, Vancouver BC.

## 1.0 Introduction

Wet'suwet'en Fisheries conducted a steelhead tagging program on the Bulkley River at Moricetown Canyon (about 30 km north of Smithers, B.C.) in 2005 to monitor run timing and abundance of steelhead (*Oncorhynchus mykiss*) moving through Moricetown Canyon. This study is a continuation of previous tagging efforts at Moricetown Canyon since 1999 (SKR 2000a, 2001a, 2002a, 2003, 2004, 2006). Steelhead tagging at Moricetown Canyon is conducted in conjunction with an extensive adult coho (*Oncorhynchus kisutch*) tagging program, and an adult sockeye salmon (*Oncorhynchus nerka*) tagging program; data for these species are analysed separately by the Department of Fisheries and Oceans Canada (Joseph pers. comm.). In addition, Chinook salmon have been tagged at Moricetown since 2002 (SKR 2003a, 2004, 2006). The steelhead tagging program at Moricetown Canyon was designed by Wet'suwet'en Fisheries, incorporating input from B.C. Environment (MoE) and the Department of Fisheries and Oceans (FOC). The initial three years of the program were jointly funded by Fisheries Renewal B.C. and the FOC. The fourth, fifth, sixth and seventh years of the project were funded by FOC. SKR Consultants Ltd. was retained by Wet'suwet'en Fisheries to monitor data collection for 2005. Budgetary constraints in 2005, 2006 and 2007 prevented Wet'suwet'en Fisheries to fund quality assurance monitoring in 2006 and 2007, as well as data analysis and reporting for steelhead data collected in 2005 to 2007. The Ministry of Environment retained SKR Consultants Ltd. to conduct cursory data analysis and reporting of data collected after 2005 to follow recommendations number 15 of the Independent Science Panel (Walters et al 2008). This report summarizes steelhead data collected from July 7<sup>th</sup>, 2005 to October 3<sup>rd</sup>, 2005. Subsequent reports will summarize data collected for 2006 and 2007 (SKR 2009a, 2009b).

The main objectives of this project were:

- to monitor timing of steelhead migrations through Moricetown Canyon;
- to review, check, and summarize steelhead data collected at Moricetown Canyon; and
- to estimate the number of steelhead in the Bulkley River upstream of Moricetown Canyon in the fall/winter 2005.

## 2.0 Materials and Methods

The adult steelhead tagging program at Moricetown was designed by Wet'suwet'en Fisheries, MoE and FOC, and was conducted in conjunction with an extensive adult coho and sockeye tagging program, and a coincidental Chinook tagging program. Methodologies employed in July to October 2005, were generally similar to those employed in previous years.

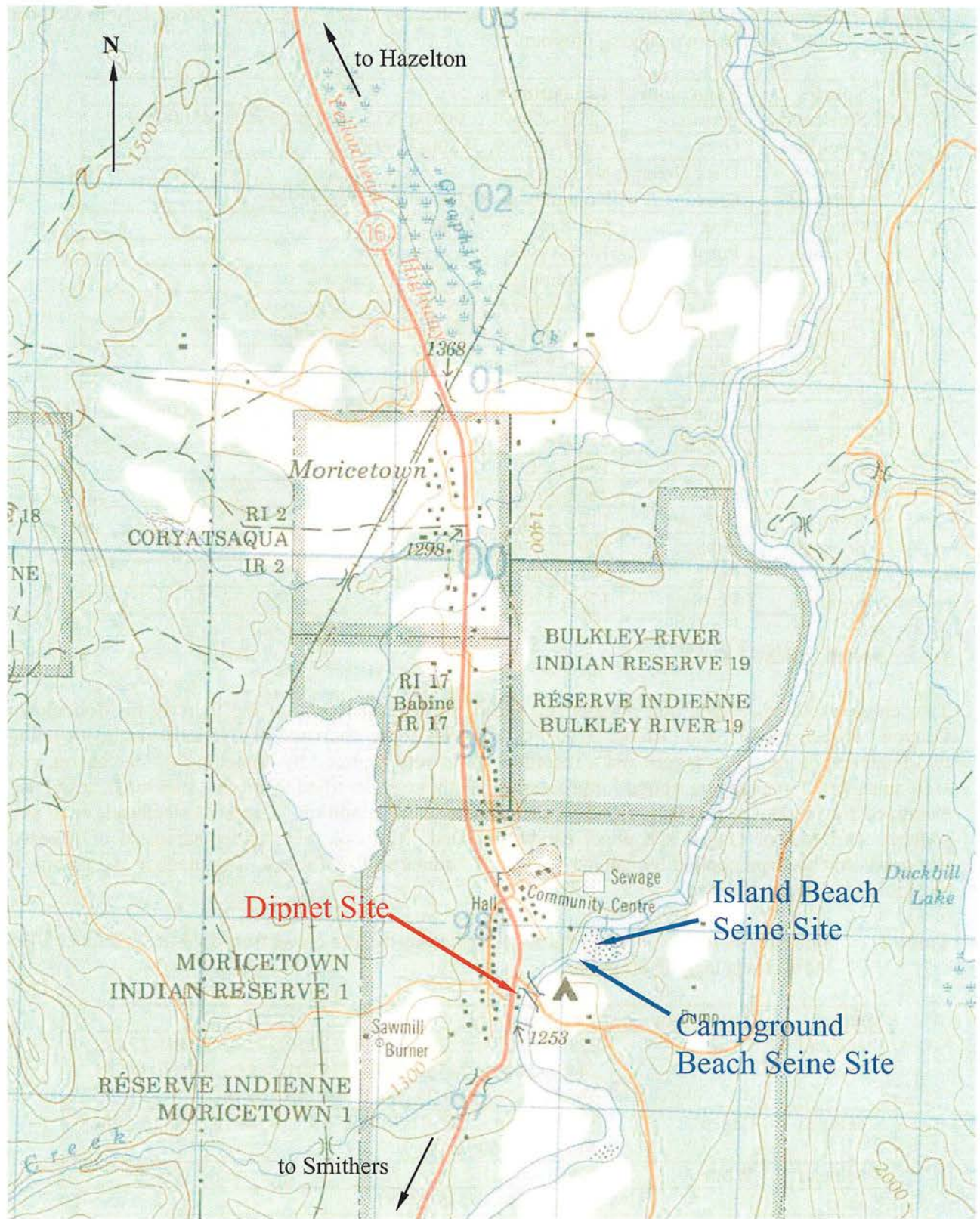
### 2.1 Data Collection

Steelhead were captured using beach seines and dip nets. Beach seining was conducted just downstream of the Moricetown Canyon, while sampling by dipnet was conducted in Moricetown Canyon (Figure 1), using similar methods to those employed since 1999 (Wet'suwet'en Fisheries 2000, 2001, 2002, 2003, 2006). Steelhead captured by beach seining and by dipnetting at the fishway were tagged using a combination of anchor tags and hole punches of the caudal fin. Methodologies employed for tagging and data collection between July 7<sup>th</sup> and October 3<sup>rd</sup>, 2005 are described in detail below.

#### 2.1.1 Beach Seine Tagging

Two beach seine crews tagged steelhead captured at the island or shore side immediately downstream of "Idiot Rock", located directly below the campground in Moricetown between July 7<sup>th</sup> and October 3<sup>rd</sup>, 2005. Beach seine crews generally consisted of five individuals, and the two crews captured and tagged fish from sunrise to sunset. A trail leading from the campground to the beach was used to access the beach seine area on foot. A boat launch located downstream of the campground was utilized to access the beach seine area by boat. A 90 m long by 8 m deep net with a 5 cm (2") diagonal mesh size was used for beach seining purposes (Wet'suwet'en 2006, Michell pers. com.). The upstream side of the net was tied off to shore, and the net was spread out in a semicircle along the beach shore, and pulled into shore. A jet boat was used to set the net. The net was pulled into shore, ensuring that the lead and float lines did not tangle. Captured fish were identified to species. Steelhead, coho, Chinook and sockeye were measured (fork length), checked for tags (anchor tags, fin clips or punches), and their condition and gender was recorded. Steelhead, coho, Chinook and sockeye were tagged using tag numbers summarized in Table 1. A secondary tag consisting of a lower caudal punch was also applied to assess tag loss. Tag colour and number of all recaptured fish were recorded. The beach seine location was allowed to rest for a minimum of 15 minutes between consecutive sets. The daily number of successful beach seine sets varied, and depended on several factors including day length, weather conditions, number of species caught (i.e. handling time), mending requirements, and potential twisting, tangling or snagging during individual sets.





**Figure 1.** Locations of beach seine and dipnetting operations in the Moricetown Canyon. The map is an excerpt of 093M/03 NTS map (scale is 1:50,000).

**Table 1.** Summary of tag colours and numbers applied by beach seine crews from July to October 2005, Moricetown tagging program.

Species	Tag colour	Tag Numbers
Steelhead	Brown	22550-22649, 22850-22875, 23828-23949, 24800-24932
Steelhead	Grey	33600-33749, 33800-33997
Chinook	Dark Green	No numbers
Chinook	Grey	No numbers; 8330-8412, 32993-32999
Chinook	Pink	608-825, 1801-2000
Chinook	Purple	1388-1996
Chinook	Red	No numbers
Chinook	White	No numbers; 3138-3150
Chinook	Yellow	No numbers; 1399-1400, 4376-4500
Chinook	Blue	6641, 6642
Coho	Blue	3065-3123, 32159-32161
Coho	Lime Green	1301-1500, 4951-5000, 20001-24000, 40004-44499
Coho	Orange	61301-61800
Coho	Pink	1640-1800
Coho	Red	2601-2650
Coho	Yellow	1101-2000
Sockeye	Orange	60019, 61001-61818
Sockeye	Pink	501-1000
Sockeye	Purple	1701, 1702

### 2.1.2 Canyon Dip Net Census

Two crews captured, tagged and released steelhead, sockeye and coho at the fishway in Moricetown Canyon between July 7<sup>th</sup> and October 3<sup>rd</sup>, 2005. Canyon crews consisted of five individuals, including two fishermen, a runner, a tagger and a recorder. Fish were captured by dipnetting in the canyon, and were transported to a tagging trough for processing. Fish were identified to species, measured, sexed and examined for marks (anchor tags, fin clips and punches) and condition. Captured steelhead, coho and sockeye were anchor tagged and upper caudal punched. Chinook were either harvested or released untagged. Anchor tags applied by canyon crews are summarized in Table 2. Tag number and colour of recaptured fish were recorded.

**Table 2.** Summary of tag colours and numbers applied by canyon crews from July to September 2005 Moricetown tagging program.

Species	Tag colour	Tag Numbers
Steelhead	Grey <sup>†</sup>	22100-22124, 22200-22223, 22250-22399, 22451-22498, 24450-24499, 24550-24798, 38101-38106, 38503-38554, 38694-38709, 39629-39643, 40390-40648
Steelhead	Green <sup>†</sup>	38107-38145, 38501-38509, 38526-38999, 39626-39628, 34013, 37760
Steelhead	White	40251-40661
Coho	Blue	2953-7000, 30145-34481
Sockeye	Yellow	90001-90450

### 2.1.3 Quality Assurance/Quality Control

SKR Consultants Ltd. was retained by Wet'suwet'en Fisheries to monitor the field portion of the project. Dipnet and beach seine crews were visited at least once per week in July and August, and at least biweekly in September. Regina Saimoto (SKR Consultants Ltd.) conducted all of the site visits. Field data was submitted to SKR on a weekly basis for review. A training session developed and provided for both beach seine and dipnet crews in previous years was not provided for tagging crews in 2005.

## **2.2 Data Entry**

Wet'suwet'en Fisheries entered all data collected in the 2005 field season into a Microsoft Access 2000 data entry tool designed by Walter Joseph (Wet'suwet'en Fisheries). Newly marked fish and recaptured fish were differentiated in the database. "Applied tag" was the tag status entered for all newly tagged fish, "recaptured" was the tag status entered for recaptured fish. Recaptured fish that had lost their tag, as identified by the presence of a caudal punch, were identified in the database with "lost" entered as the tag status. Entered data was compared to original field data where possible during the QA/QC portion of the project conducted by Regina Saimoto of SKR Consultants Ltd.

## **2.3 Data Analysis**

Wet'suwet'en Fisheries conducted some data analysis for catch per unit effort and daily run timing for their final summary report (Wet'suwet'en Fisheries 2006). Data provided to SKR did not include effort information, and we therefore limited this analysis to mark-recapture estimates.

### 2.3.1 Migration

While effort data was not available from the data set provided, the number of steelhead captured by beach seine and dipnet on each day could be determined. The number of fish captured by beach seine and dipnetting was compared graphically. In addition, the distribution of recaptured steelhead among the marked and censused sample was compared. These comparisons allowed for a subjective assessment of temporal biases in sampling. If the number of fish captured over time is similar between the two capture methods, temporal biases or differences in temporal biases between capture gears are likely small. Conversely, differences in capture rates over time between the two sampling methods may indicate temporal biases between capture methods in the data, and provide insight into which capture method is a better indicator of migration rates, for future development as a catch per unit effort index of population size.

### 2.3.2 Population Estimates

The number of fish migrating upstream through Moricetown Canyon from July 7<sup>th</sup> to October 3<sup>rd</sup> 2005 was determined using a Schaeffer estimate and an ML Darroch estimate, which are suitable for open populations. A computer program designed by Arnason *et al.* (1996) for population analysis was used to calculate the Schaeffer estimate. To calculate the Schaeffer and the ML Darroch estimate, the study period was divided into weeks (Table 3). A pooled Petersen estimate was also calculated for comparison. If the marking sample or the census sample is random, a Petersen estimate can provide an unbiased estimate of the population size. However, both the mark sample (beach seine), and the census sample (dipnet) were obtained in a non-random fashion (sampling days and times were not determined randomly, sampling period did not encompass entire migration period), thus the population estimates for this sample are biased.

**Table 3.** Temporal stratification for the Moricetown steelhead data.

Week Number	Start Date	End Date
Week 1	July 4	July 10
Week 2	July 11	July 17
Week 3	July 18	July 24
Week 4	July 25	July 31
Week 5	August 1	August 7
Week 6	August 8	August 14
Week 7	August 15	August 21
Week 8	August 22	August 28
Week 9	August 29	September 4
Week 10	September 5	September 11
Week 11	September 12	September 18
Week 12	September 19	September 25
Week 13	September 26	October 3

### 3.0 Results and Discussion

#### 3.1 Data Collection

Data collection generally proceeded with few problems during the 2005 field season. The field staff were generally aware of the objectives of the study, data collection procedures, and transfer of information due to their participation in previous years of the study and in the training session conducted in 2001 (SKR 2002a), 2002 (SKR 2003a), and 2004 as well as on site training conducted in 2003 and 2004 (SKR 2004, 2006). As in the 2003 and 2004, capture methods used in 2005 were limited to dipnetting and beach seining. In some previous years (2001 and 2002), a fishwheel was installed downstream of the Telkwa High Road Bridge, but capture efficiency of the fishwheel was low, and the fishwheel was not installed in subsequent years. Logistical problems encountered during the field season are summarized for each of the capture methods used during the study.

##### 3.1.1 Beach Seine Tagging

A total of 522 steelhead were marked during beach seining. In addition, one steelhead died in the beach seine fishery (not included in totals), and five steelhead tagged in previous years were recaptured during beach seining, and while these fish were not re-tagged, tag numbers were recorded, and were included in the total number of steelhead marked by beach seining in 2005 (total marked is 527). This is an increase from the number of tags applied in 2004 (321 steelhead), 2001 (323 steelhead), 2000 (225 steelhead) and 1999 (164 steelhead), but a decrease of the number of tags applied in 2003 (656 steelhead) or 2002 (835 steelhead) (Table 4). The number of steelhead tagged in 2005 falls below the recommended number of steelhead to be tagged, following the 1999 and 2000 seasons of the project (SKR 2000, 2001a). The minimum number of steelhead recommended for tagging at the start of the 2001 field season was 600 to 1000, assuming a steelhead population size of between 10,000 and 30,000. These numbers are the minimum number of steelhead required to be marked to arrive at a Peterson estimate with an error of 25% of the true population (Ricker 1975).

**Table 4.** Comparisons of sample sized obtained at the beach seine, dipnet and fishwheel locations during the steelhead tagging program conducted at Moricetown Canyon in 1999-2005 (see SKR 2000a, 2001a, 2002a, 2003a, 2004, 2006).

Year	Number of steelhead		
	Beach seine <sup>1</sup>	Dipnet <sup>3</sup>	Fishwheel
1999	164	1555	n.a.
2000	225	1010	11
2001	323	1183	18
2002	835	1933 (incl. 3 steelhead with lost tags)	None reported
2003	656	1805	n.a.
2004	321 <sup>2</sup>	1568	n.a.
2005	527 <sup>2</sup>	1634	n.a.

<sup>1</sup> excludes recaptures from this study

<sup>2</sup> includes 3 steelhead for 2004, and 5 steelhead for 2005 tagged in previous years of the study

<sup>3</sup> excludes recaptures initially tagged at dipnet location; includes 32 steelhead originally tagged by beach seine

The increased number of tags applied in 2005 when compared to 1999 and 2000 is in part attributable to more consistent tagging effort due to the availability of back up equipment (jet boat and beach seine). In the initial three years of the study, no back up equipment was available, resulting in the reduction of tagging effort due to equipment failure. The new boat used by Wet'suwet'en Fisheries beach seine crews handled much better, and was more maneuverable than the boat used previously, resulting in better seine sets, and higher catches. Fewer steelhead were tagged in the beach seine fishery in 2005 when compared to 2002, and 2003, despite a longer duration of the tagging project in 2005 (July 7 – October 3; 89 days) when compared to 2002 (August 2 – September 27; 57 days) and 2003 (July 17 – September 19; 65 days). Physical changes in the river (e.g. shifting gravel bars), fewer steelhead in the river, and abundance of other species in the catch are possible factors resulting in fewer steelhead captured than in 2002 and 2003. Data provided was insufficient to investigate these potential causes of the overall reduced steelhead catch.

No logistical problems for the beach seine fishery were recorded in the datasheets provided.

Beach seine crews were generally diligent and careful in handling fish, and examining fish for marks. Beach seine crews were aware of, and implemented, handling techniques to reduce stress on fish, and were thus efficient at tagging, measuring and examining fish prior to their release. Beach seine crews were instructed to hold the fish in their natural position, and support the visceral organs of the fish on release rather than holding fish by their caudal peduncle, and crews generally complied with this suggestion. Beach seine crews were generally receptive and cooperative with suggestions made during QA visits, which facilitated the QA process.

### 3.1.2 Canyon Dip Net Census

A total of 1694 steelhead were captured by the dipnet crews between July 7<sup>th</sup> and October 3<sup>rd</sup>, 2005. Fifty-eight of these steelhead were originally tagged by dipnetting and recaptured by dipnetting. These repeat recaptures were excluded from the number of steelhead examined since they represent the same fish. Therefore, the number of steelhead examined for tags by dipnetting was reduced to 1636. This number is 10.3% lower than for 2003 (1805), and 18.1% lower than for 2002 (1,933), despite a longer field season in 2005. However, the number of steelhead captured by dipnetting in 2005 is 5.0% higher than in 1999 (1555), 38.3% higher than in 2000 (1010), 27.7% higher than in 2001 (1183), and 4.2% higher than in 2004 (1,568) (Table 4). The minimum number of steelhead that should be examined for tags to arrive at a Petersen estimate with a 25% error from the true population size is 1,000 to 2,000 with an expected population size between 10,000 to 30,000 steelhead (SKR 1999, 2000, Ricker 1975). The number of steelhead examined falls within the range recommended if the actual population size is between 10,000 and 30,000 steelhead.

### 3.1.3 Quality Assurance/Quality Control

Wet'suwet'en staff were cooperative during Quality Assurance (QA) visits, which greatly facilitated the QA process. A work schedule for different crews was not readily available, which resulted in a disproportionate number of visits with some crews relative to other crews. However, the work schedule was more consistent, and the QA visits were more even between crews than in the two initial years of the study (SKR 2001a). cursory review of hardcopy data sheets during the field portion of the project, and detailed comparison of field data sheets with digital data is important in ensuring data accuracy and fidelity. Field forms available for QA were generally complete, legible, and provided few problems in terms of duplicate records. The training session in previous years, QA process, and frequent communications between field crews and the QA monitor stressed the importance of diligent record keeping, and demonstrated that the data sheets and data entry were checked by an independent monitor. The QA process was valuable in ensuring accurate and complete data collection in the field, and can work well in conjunction with the project manager toward ensuring that the project proceeds smoothly throughout the field season.

### **3.2 Data Entry**

Data entry conducted by Wet'suwet'en Fisheries staff were submitted digitally for QA. Comparisons of field data forms and digital data revealed that few data entry problems were present. The number of duplicate tags in the raw data and database was higher in 2005 (54 of 2298; 2.3%) than in 2004 (0.35%), 2003 (1.6%), 2001 (1.2%), or 2000 (0.13%). Most of the duplicate could be resolved after comparison of the digital data with field datasheets, but 12 duplicate records remain in the dataset (0.5%).

The QA process found problems with an additional 93 records (4.05%), excluding simple spelling mistakes or inconsistent coding for tag colours. Common errors included wrongly entered dates (56 records), tag status (3 records), tag numbers (7 records), tag colour (24 records), length and sex data (1 record), and missing records (2 records). The success of the QA process may have resulted from field crews and data entry staff being more diligent in data collection and data entry simply because a QA process was in place. In addition, the training session and field visits by the QA stressed the importance of accurate record keeping.

### **3.3 Data Analysis**

Wet'suwet'en Fisheries handled a total 2,163 steelhead in July to October 2005. The majority of these steelhead (1,636) were captured at Moricetown Canyon in the dipnet fishery, and included 1,426 that were tagged by dipnet crews, 88 were recaptures from this or previous years of the study, 2 were recaptures that had lost their tags, 50 were harvested, and 70 were released untagged. The 527 steelhead that were tagged just downstream of Moricetown Canyon were considered to be the number of marked fish (M) for the calculation of the adjusted Petersen estimate. Of the 527 steelhead tagged by beach seining, 54 were recaptured in the canyon dipnet fishery (Table 5).

In addition to recaptures used for population estimates (Table 5), 41 other tagged steelhead were recaptured in this study. Most of these steelhead originated from other tagging studies, including 36 from previous years of the project (Appendix 3). Tag number from five recaptured steelhead could not be matched to applied tag records of this or previous years of the study, and it is unclear when these tags were applied. Of the 193 steelhead recaptured in the study, 11 steelhead had lost their tags, but the initial capture location could be identified by the secondary mark (caudal punch). This indicates that approximately 5.6% of the tagged steelhead lost their tags. Tags from other studies, or tags with incomplete initial tagging data or recapture data were not used in the calculation of the population estimate.

**Table 5.** Applied and recaptured steelhead tags for the 2005 Moricetown steelhead tagging program.

	<b>Beach Seine Tags (d/s of the canyon)</b>	<b>Dipnet Tags (in canyon)</b>
Applied	527 <sup>1</sup>	1634 <sup>3</sup>
Recaptured by Dipnet (in canyon)	54 <sup>2</sup> (excl. 2 steelhead that lost tag)	58 (excl. 0 steelhead that lost tags)
Recaptured by beach seine (d/s of canyon)	25 (excl. 1 steelhead that lost tag)	45 (excl. 8 steelhead that lost tags)

- 1 The number of tags applied by beach seine equals M in equation 1
- 2 The number of beach seine tagged steelhead recaptured by dipnetting equals R in equation 1 (note 2 recaptured steelhead had lost their tags; these fish were excluded from "R" because it could not be determined if these fish were repeat recaptures or not)
- 3 This number includes 120 steelhead not tagged at the dipnet location, of which 50 were harvested, and excludes 2 recaptured steelhead that had lost their tags

In total, 59 steelhead were harvested during the 2005 Moricetown steelhead tagging project. Most of these steelhead were harvested at the dipnet fishery (58, 98.3%), and only one untagged steelhead was harvested in the beach seine fishery (1.7%). Of the 58 steelhead harvested in the dipnet fishery, eight (13.8%) were recaptures initially tagged in the beach seine or the dipnet fishery, and 50 (1.2%) were untagged steelhead.

### 3.3.1 Timing of Migration

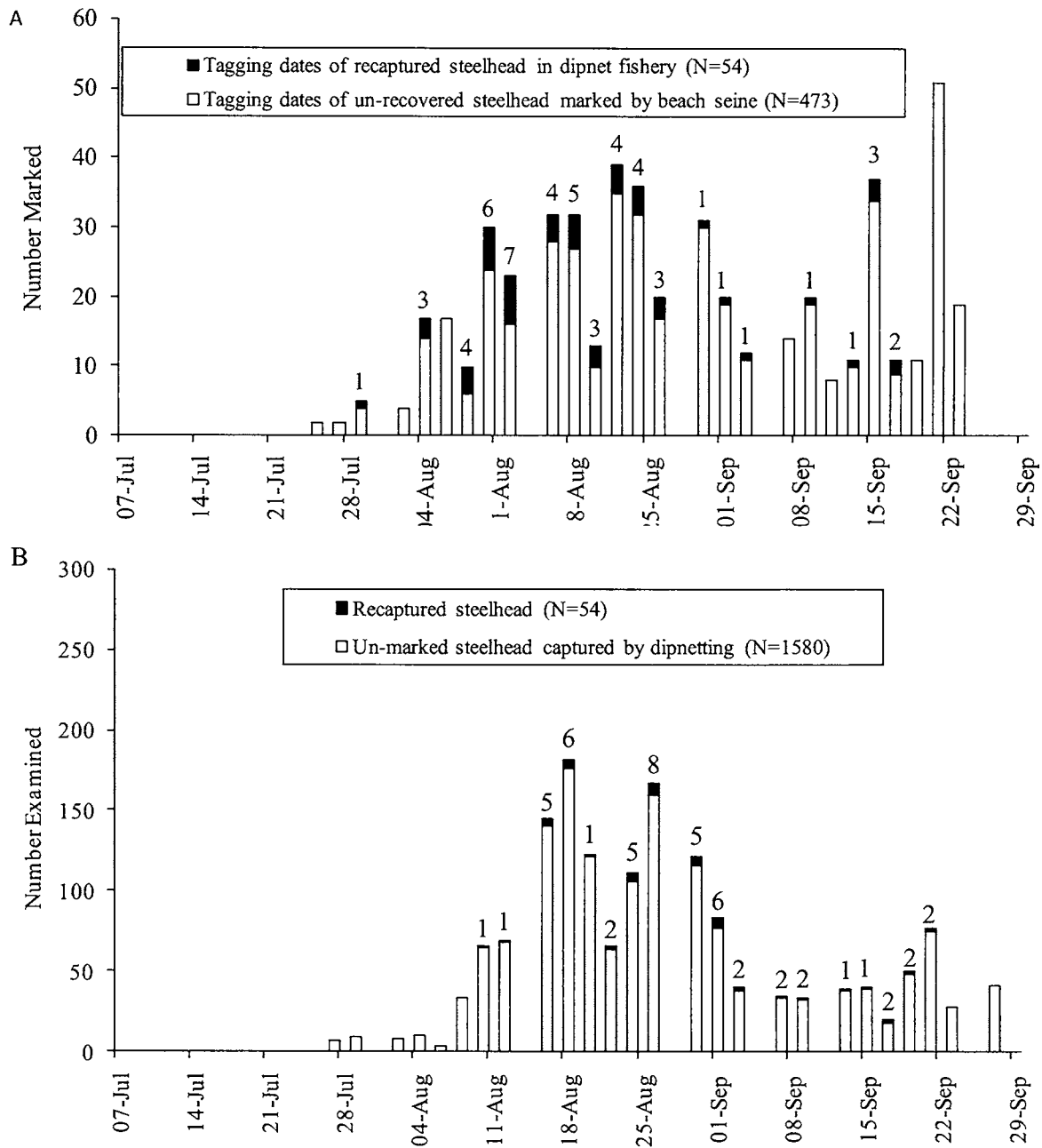
The number of steelhead captured by beach seine and dip netting throughout the study period were compared graphically (Figure 2). The first steelhead was captured on July 25<sup>th</sup> in the beach seine fishery, and the first steelhead in the canyon was captured by on the same day in the dipnet fishery. The tagging program started well in advance of these dates, with the first Pacific salmon captured in early July (July 7<sup>th</sup> for beach seine fishery, and July 12<sup>th</sup> for dipnet fishery). This indicates that the timing of the mark-recapture study at Moricetown canyon encompassed the start of the steelhead migration period.

Capture dates for steelhead at the start of the migration season in 2005 coincide with capture dates in previous years of the study (usually the last week of July or first week of August). Daily beach seine catch increased gradually at the end of July and the first week in August, to a peak of 17 on August 5<sup>th</sup>, then fluctuated between 9 and 21 until a second peak of 38 steelhead on August 22<sup>nd</sup>. Daily steelhead capture rates gradually declined to less than ten steelhead per day in the first week in September, then increased again to a third peak on September 20<sup>th</sup>, 2005 of 27 steelhead. Fluctuating catch rates may be due to varying catch efficiencies due to environmental factors (e.g. water level, water clarity), or effort by individual crews (contingent on day length, catch of other species etc), or they may be indicative of fluctuating migration rates or travel routes.

Steelhead catch in the canyon peaked on August 17<sup>th</sup> and 19<sup>th</sup> (108 and 124 steelhead respectively). This is similar to the timing of peak capture rates for 2004 (August 18<sup>th</sup> and August 19<sup>th</sup>) (SKR 2006), and 2003 (August 23<sup>rd</sup> and 28<sup>th</sup>) (SKR 2005). A second, minor peak in daily steelhead catch rate was noted on September 19<sup>th</sup> and 22<sup>nd</sup>, 2005 (47 steelhead and 40 steelhead respectively), similarly to a second, minor peak in steelhead captured rates noted between September 16<sup>th</sup> and 18<sup>th</sup>, 2002. The pattern in the number of steelhead caught in the dipnet are similar to the beach seine fishery for July and August 2007, however, the second peak in steelhead catch observed in mid to late September in the beach seine fishery was not observed in the dipnet fishery in 2007.

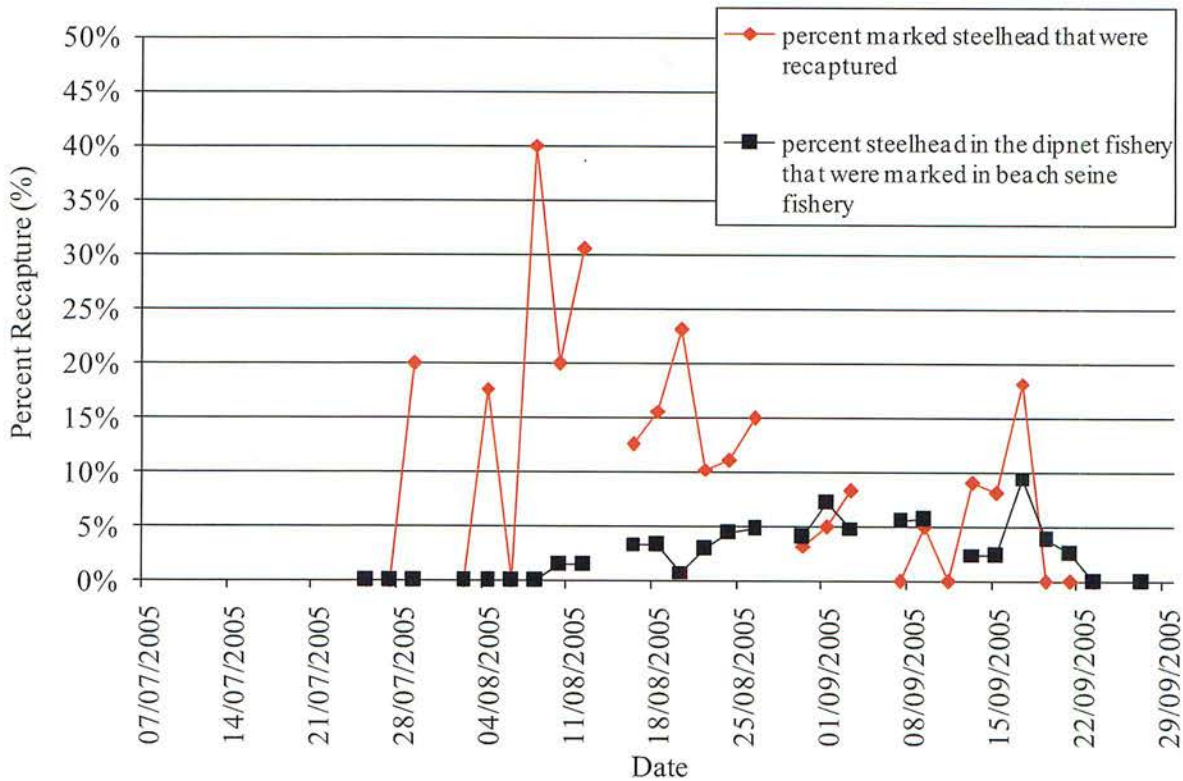
Overall, the low capture rates for steelhead in both the beach seine and the dipnet fishery at the start of the study suggests that the sampling protocol was successful in encompassing the early part of the steelhead migration period, but the continued capture of steelhead to the termination of the study implies that the late part of the run was not sampled during the tagging study.





**Figure 2.** Temporal distribution of tag application during beach seining (A), and of examination for tags during dipnetting (B) during the 2005 steelhead population estimate study. Data labels in the graphs indicate the number of recaptured steelhead.

The early termination of the study resulted in incomplete sampling of the steelhead run. A greater proportion of steelhead tagged early in the beach seine fishery were recaptured in the dipnet fishery (Figure 3). The percent of recaptures in the dipnet fishery was generally greater towards the end of the study than at the beginning. These two trends are speculated to reflect the lag time between mark dates and recapture dates as steelhead move upstream through Moricetown Canyon. The different proportions of recaptures in the study indicates that steelhead tagged earlier in the study are more likely to be recaptured than steelhead tagged later in the study, which introduces bias to the population estimate.



**Figure 3.** Percent recapture rate for steelhead tagged in the beach seine fishery (♦) and for steelhead examined in the dipnet fishery (■).

Of the 1634 steelhead captured by dipnet crews, tags were applied to 1426, while 54 steelhead were recaptures from the beach seine fishery (excluding 2 that had lost their tags), 34 were recaptures from previous years of the study, 50 were harvested and 70 were released untagged (steelhead escaped prior to tagging, insufficient tags available on some tagging dates). Recaptures in the dipnet fishery and the beach seine fishery resulted in the capture of 58 and 45 steelhead originally tagged in the dipnet fishery, respectively. This indicates that some steelhead drop back after handling and tagging. The 2005 recapture rate of drop backs (7.2%) is higher than the recapture rates of drop back rate estimates for 2004 (5.6%), 2003 (6.1%), 2002 (4.3%), 2001 (5.4%) or 2000 (4.4%) (SKR 2001a, 2002a, 2003a, 2004, 2005). The actual drop back rate is higher than the recapture rate since catchability must be taken into account. Catchability of tagged steelhead in the dipnet fishery is estimated as 10.2% (54 recaptures of 527 tagged fish from beach seine fishery), and the actual drop back rate for 2005 is likely around 37.1%. Steelhead tagged during dipnetting and falling back, were recaptured within 0 to 35 days by beach seining (mean = 8.1 days, SD = 7.813), while steelhead tagged during dipnetting were recaptured by dipnetting within 0 to 29 days (mean = 10.6 days; SD = 8.379). Steelhead tagged in the beach seine fishery were recaptured between 1 and 36 days in the dipnet fishery (mean 8.6 days, SD = 6.834), and between 0 and 20 days in

the beach seine fishery (mean = 6.3, SD = 6.490). Since it is unknown what the natural frequency of drop backs at Moricetown Canyon is, it is difficult to speculate on how much of the observed drop back is due to tagging and handling of the fish. Increased drop back of steelhead tagged in the beach seine fishery compared to natural drop back rates can affect the population estimates since steelhead that drop back are less likely to be recaptured in the dipnet fishery, thus resulting in a lower recapture rate, and a higher population estimate.

### 3.3.2 Schaeffer and ML Darroch Estimates

The Moricetown mark-recapture study takes advantage of the fact that steelhead are moving through Moricetown Canyon. Therefore, the levels of immigration and emigration are significant, and a Petersen estimate may not be the most appropriate mark-recapture estimate. A Schaeffer estimate, suitable for migrating fish, was calculated for this study (Ricker 1975). In addition, an ML Darroch estimate was computed, since confidence intervals can be determined for the ML Darroch estimate, while no confidence intervals are associated with the Schaeffer estimate (Arnason *et al* 1996). For these estimates, the study was broken into weekly intervals, with tagging and recovery determined for each week (Appendix 4). Due to low sample sizes in the initial three weeks of tagging at the beach seine location, the data for the initial three weeks were pooled. A 5% tag loss was applied to the estimate to compensate for steelhead that had lost their tags, as in previous years of the study. Tag loss may be slightly lower than 5% in 2005, as indicated by the estimate of 3.6% tag loss from recaptured steelhead initially tagged in the beach seine fishery, however overall tag loss for steelhead tagged in the beach seine and dipnet fishery is higher than 5% (6.0%). Three of the 72 recaptured steelhead initially tagged by beach seine had lost their tag (3.7%). Eight of the 111 steelhead initially tagged in the dipnet fishery and recaptured in either the beach seine or the dipnet fishery had lost their tag (7.2% tag loss). Tag loss estimates in this study may be overestimates of true tag loss because steelhead handled in previous years, which were also identified by both, an anchor tag and a secondary tag (lower or upper caudal punch), may be mistaken for steelhead tagged in this season that have lost their tags. It is possible that some of the three steelhead with lower caudal punches are repeat spawners, and not steelhead tagged in the beach seine fishery in 2005.

To arrive at the Schaeffer estimate, data for tag weeks 1 and 2 were pooled as none of the steelhead tagged in week 1 were recaptured. Similarly, tag week 8 was pooled with tag week 7 because none of the fish tagged in week 8 were recaptured. In addition, data for recapture weeks 6 and 8 were pooled as none of the steelhead sampled in week 8 were marked. Recapture week 8 was pooled with week 6 rather than week 7 because the proportion of marked fish in the sample was more similar between weeks 6 and 8 than between weeks 7 and 8. The Schaeffer estimate was calculated as 15,567 steelhead moving through Moricetown Canyon between July 7<sup>th</sup> and October 3<sup>rd</sup>, 2005. The ML Darroch estimate was 18,126 (SE = 6,203) with a 95% confidence interval ranging between 5,969 and 30,284 steelhead upstream of Moricetown Canyon. The broad confidence interval, could not be reduced by further pooling of the data. The ML Darroch estimate is higher than the Schaeffer estimate, and the confidence interval for the ML Darroch estimate brackets the Schaeffer estimate. Since the study was terminated on October 3<sup>rd</sup>, 2005, the rate or proportion of steelhead migrating through Moricetown Canyon after October 3<sup>rd</sup>, 2005 is unknown. Because the tagging project did not encompass the entire migration period for steelhead, both the ML Darroch (18,126; 95% CI = 5,969-30,284) and the Schaeffer estimate (15,567) exclude the number of steelhead moving through Moricetown Canyon after October 3<sup>rd</sup>, 2005.

### 3.3.3 Petersen Estimate

Due to low proportions of recaptures in the initial three years of the study, an adjusted Petersen estimate was used to estimate the number of steelhead migrating through Moricetown canyon in 1999, 2000 and 2001. For comparisons to previous years, an adjusted Petersen estimate was generated for steelhead migrating through Moricetown Canyon between July 7<sup>th</sup>, 2005 and October 3<sup>rd</sup>, 2005. Two sets of tags (anchor tags and caudal punch) were used to evaluate the proportion of tag loss. Since steelhead captured in the beach seine fishery were both anchor tagged and lower caudal punched, tag loss for steelhead tagged downstream of the dip net location could be evaluated. As for the ML Darroch and Schaeffer estimates, a 5% tag loss was assumed, which is slightly higher than the 3.6% tag loss estimated from secondary tags applied at the beach seine fishery. The pooled Petersen estimate was calculated as 14,912 steelhead (SE = 1,848, 95% confidence interval = 11,289-18,535), which moved through Moricetown Canyon during the fall tagging program. Petersen estimates for the number of steelhead moving through Moricetown Canyon in 1999 to 2005 are summarized in Table 6. The number of marked and recaptured steelhead is a notable improvement from the 1999, 2000, 2001 and 2004 field seasons, but is lower than the sample size in the 2002 or 2003 field seasons (Table 4). The lower number of recaptures in 2005 when compared to 2003 is largely attributable a lower number of steelhead marked in the beach seine fishery, and results in a larger confidence interval around the population estimate for 2005.

**Table 6.** Comparisons of adjusted Petersen Population estimates calculated for steelhead migrating upstream of Moricetown Canyon in 1999, 2000, 2001 (Mitchell 2001, SKR 2000, 2001a), 2002 (SKR 2003a), 2003 (SKR 2004), 2004 (SKR 2006) and 2005. For studies with multiple estimates, the most conservative estimate is summarized here.

Study	Sample size			Adjusted Petersen Estimate	95% Confidence Interval <sup>5</sup>	
	# marked	# examined	# recaptured		Lower	Upper
Moricetown tagging 1999 <sup>1</sup>	164	1555	8	28,527	16,250	58,350
Sport fish estimate spring 2000 <sup>2</sup>				27,005	22,261	35,479
Moricetown tagging 2000 <sup>3</sup>	225	734	3	41,428	18,876	103,819
Sport fish estimate autumn 2000 <sup>2</sup>	1161	831	42	22,627	17,200	32,135
Moricetown tagging 2001 <sup>4</sup>	323	1182	18	20,173	13,820	31,477
Moricetown tagging 2002 <sup>6</sup>	834	1998	65	25,289	20,596	33,941
Moricetown tagging 2003 <sup>6</sup>	656	1805	100	14,963	12,390	17,535
Moricetown tagging 2004 <sup>5,6</sup>	321	1568	32	14,581	11,054	23,228
Moricetown tagging 2005	527	1636	54	14,912	11,289	18,535

<sup>1</sup> (SKR 2000) based on 8 recaptures; <sup>2</sup> (Mitchell 2001), <sup>3</sup> (SKR 2001a) based on 3 recaptures, <sup>4</sup> SKR 2002a

<sup>5</sup> Confidence intervals (CI) for the sport fish estimates and the Moricetown 2002, 2003 and 2005 estimate are based on the normal approximation; all other CI calculations were determined using the Poisson Frequency distribution (Krebs 1999)

<sup>6</sup> the 2002 (SKR 2003a), 2003 (SKR 2004a) and 2004 tagging projects did not encompass the entire steelhead migration period, since the studies were terminated earlier than previous years of the study, and did not sample the later portion of the steelhead migration.

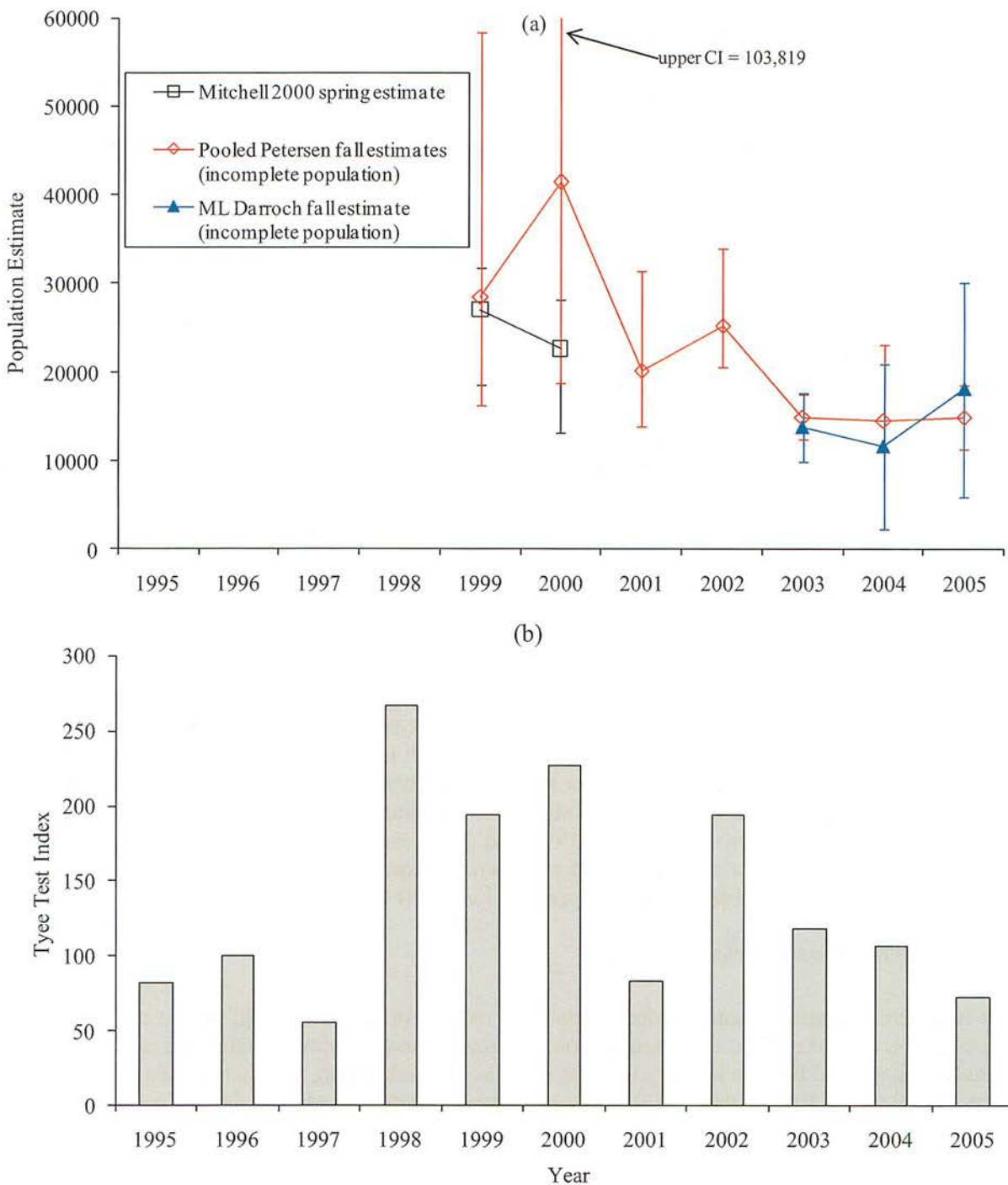
In previous years, mis-identification of steelhead that were recaptured accounted for up to 2.2% of the recaptured steelhead in the study. These fish were identified as steelhead by one crew (either beach seine or dipnet crews), but they were identified as a different species (usually coho) by another crew. In 2003 and 2004, only one fish was identified inconsistently. In 2003, the fish was initially tagged as a steelhead, but recorded as a sockeye upon recapture, and in 2004 a fish was initially tagged as a coho but identified as a steelhead upon recapture. In 2005, two recaptures were initially identified as a coho, but were identified as a steelhead upon recapture. In the last three years, these records were excluded from the data analysis.

When compared to the steelhead adult tagging project at Moricetown Canyon conducted in 1999 (SKR 2000, Mitchell 2000, 2001), 2000 (SKR 2001a), 2001 (SKR 2002a), and 2002 (SKR 2003a), the steelhead population estimates for 2003 to 2005 are lower than any of the other estimates, though these annual differences are largely not statistically significant due to the large confidence intervals. Estimates for 2003, 2004 and 2005 are relatively similar, with the 2004 estimate being slightly smaller than the 2003 or 2005 estimates, however, overlapping confidence intervals indicate that the estimates are not statistically different. The lower population estimates for steelhead at Moricetown Canyon in 2003 and 2004 is partly attributable to the earlier termination of the study than in any of the other years. The population estimate for 2005 is slightly higher than those for 2003 and 2004, which is likely in part due to the longer duration of the study in 2005, encompassing more of the steelhead run, but the estimate for 2005 is also associated with a broad confidence interval for the ML Darroch estimate. By comparison, the confidence interval of the pooled Petersen estimate is relatively narrow. The 2005 Petersen estimate is significantly smaller than the Petersen estimates for 2000 and 2002, as indicated by the lack of overlap in the confidence intervals of those years.

Trends in estimated steelhead population size from the Moricetown tagging study are similar to those of the tyee test index for steelhead. Years with a higher tyee test index correspond to years with a higher mark-recapture estimate. However, the slight decline in the tyee test index from 2003 to 2005 was not observed in the mark-recapture estimates at Moricetown, which is speculated to be in part due to a longer tagging season in 2005 compensating for lower steelhead numbers. Catch rate data were not available for Moricetown to collaborate this hypothesis. While the confidence intervals around the estimated steelhead population sizes at Moricetown Canyon in 1999 and 2000 make comparisons difficult, the trends in estimated population sizes for steelhead at Moricetown Canyon correspond to trends in the cumulative steelhead escapement index observed in the Tyee Test Fishery (FOC 2004).

#### *3.3.3.1 Assumptions of the Petersen Estimate*

Mark-recapture estimates assume random samples of marked or unmarked fish, or that marked fish mix randomly with unmarked fish, that immigration, emigration, mortality and natality are negligible during the study, that marked fish are in every way the same as un-marked fish, and that marked fish do not lose their marks (Bagenal 1978, Krebs 1999). Almost all mark recapture studies violate at least some of these assumptions to some degree, which results in decreased accuracy of the estimate. If violations are severe, resulting estimates can be misleading. Therefore, it is important to evaluate to what extent the underlying assumptions of the mark-recapture study are violated, and if adjustments can be made to compensate for these violations. The potential presence of sampling biases and low recapture ratios (3.3% of censused fish) affects the accuracy and precision of the Petersen Estimate, and must be taken into consideration when refining this study.



**Figure 4.** Estimated population size for steelhead upstream of Moricetown Canyon (a), and Tyee test fishery index (b). Error bars in (a) indicate 95% confidence intervals. Please note that the tagging project in 2002, 2003 and 2004 was terminated earlier than in previous years of the study, with the last date of sampling September 27<sup>th</sup>, 2002, September 19<sup>th</sup>, 2003, and September 13<sup>th</sup>, 2004 respectively.

Differences in capture rates of sampling gear over time, fork length and sex ratio comparisons can indicate selectivity in capture methods, which influence the validity of population estimates (Ricker 1975, Bagenal 1978, Krebs 1999). As in previous years, some temporal and gear biases may exist in the data obtained for the 2005 Moricetown tagging program, but these biases were less severe than in the initial two years of the study. While temporal biases in capture rates between dip net and beach seine sampling observed in 1999 and 2000 were reduced in 2001, to 2005, systematic sampling on weekdays for dipnet crews and beach seine crews results in non-random sampling, which violates assumptions for the Petersen estimate. Sampling on weekends can be achieved by adding one extra beach seine crew, and rotating crews on work schedules that would cover weekday and weekend days (e.g. 4 days on, 2 days off). Alternatively, sampling times could be selected by randomly choosing sampling blocks during the study period. Gender biases were observed between steelhead data collected in the beach seine and dipnet fishery in previous years (SKR 2000, 2001a, 2002a), but these are speculated to be due to difficulties in sex determination due to the lack of clear secondary sexual characteristics, and are assumed to stem from biases between crews rather than biases between gear. Because gender was not consistently and accurately assigned, fork length of steelhead captured at the dipnet and beach seine location for both males and females were grouped together. Fork lengths of steelhead captured in the beach seine fishery (Mean = 64.6, SE = 0.407) did not differ significantly from fork lengths of steelhead captured in the dipnet fishery (Mean = 64.6, SE = 0.245; Mann Whitney U statistic = 508791.5,  $p=0.935$ ). The lack of significant difference in fork length between capture locations is contrary to findings in 2004, where steelhead were significantly larger at the dipnet site when compared to the beach seine site ( $U=265386$ ,  $p=0.005$ ) (SKR 2006), but is similar to findings in 2003 and 2001, where fork lengths did not differ significantly between gear type (SKR 2002a).

The use of multiple tags during the Moricetown steelhead tagging study allowed for an assessment of the frequency of tag loss. The low tag loss rate indicates that tagging methods are adequate for mark-recapture studies in the canyon. However, the study was not designed to determine the extent of mortality during the study period. Mortality, resulting from predation, unknown harvest levels, or other causes, was not accounted for in the data. In addition, the effect of capture and tagging on survival rates or behaviour of steelhead was not determined in the study. Some reduction in the survival of steelhead after capture and tagging may exist, and if this reduction is significant, the population size would be overestimated. Survival of captured and tagged fish could be evaluated to some degree by retaining a sub-sample of fish overnight, and determining their survival within 24 hours of capture and tagging. In addition, mark-recapture ratios could be evaluated upstream through angling, snorkel counts, fence counts (e.g. Toboggan Creek) or other methods to determine if the mark-recapture ratio changes. A change in mark-recapture ratio would indicate that differential mortality may be occurring between the un-marked and marked group of steelhead.

## **4.0 Recommendations**

Detailed recommendations for this study were provided in the previous years' reports (SKR 2000, 2001a, 2002a, 2003a, 2004), and only recommendations found in addition to those mentioned previously are listed below. For a complete set of recommendations, the reader should also consult the 1999 summary report (SKR 2000) as well as communications regarding the QA portion of the project (SKR 2001b, 2002b) and the summary report for the 2002 Moricetown tagging project (SKR 2003a).

### **4.1 Increasing Beach Seine Steelhead Catch and Recapture**

If the true steelhead population is assumed to range between 10,000 and 30,000, the minimum number of steelhead tagged in the beach seine fishery should be between 600 and 1,000. In 2005, the number of steelhead tagged in the beach seine fishery fell slightly short of this target. To increase the number of steelhead tagged, the following should be attempted:

- Extend the study to encompass the main portion of the steelhead migration period. Early termination of the study will not provide a complete population estimate.
- Investigate other potential sites that could be used for beach seining where steelhead capture rates may increase. Physical changes to the river bottom may render previously productive steelhead fishing areas less productive. Other potentially suitable beach seine locations may exist between the boat launch and the canyon. These sites should be investigated using a sounder, and the older beach seine.
- Crews may need to shift to various beach seine locations as river levels change during the tagging period.
- Add an additional crew to allow for sampling on weekends and statutory holidays, and/or to let crews work additional hours during peak migration times.

To increase the potential recapture of steelhead tagged late in the season on the beach seine fishery, consideration should be given to extending the dipnet fishery one week past the end of the beach seine fishery. This would provide steelhead tagged on the last few days in the project a higher probability of being recaptured and decrease some of the bias in the population estimate.

### **4.2 Record Keeping for Sport Fish Recaptures**

Since 2002, Wet'suwet'en Fisheries used their own tags, which were labeled with the Wet'suwet'en Fisheries address. It is strongly suggested the Wet'suwet'en Fisheries continues the collection of steelhead recapture information from the sport fishery.

### **4.3 Future Studies**

A large number of steelhead are tagged at Moricetown Canyon each year. The value of tagging such a large number of fish is primarily for estimation of population sizes. Indices of population sizes can be developed through comparisons of catch per unit effort data to estimated population size. Currently, the mark recapture data and the catch per unit effort data are analysed separately. A comprehensive report summarizing the last five years of mark recapture and CPUE data should be prepared to evaluate if a CPUE index can be derived for the Moricetown Canyon project.



In-season estimation of population sizes is valuable for management decision-making in season. Currently, data collected during the field season are not entered until the winter, when more time is available for Wet'suwet'en Fisheries staff. It would be valuable to try to enter data in-season so that periodic estimates on run sizes can be conducted.

The steelhead tags applied at Moricetown canyon are not utilized for further studies on steelhead life history and population dynamics. Until the spring of 2003, an adult steelhead fence was operated on Toboggan Creek. Marked to unmarked ratios of steelhead tagged at Moricetown and captured at Toboggan Creek could be used to estimate population size, and resulted in the ability to compare population estimates in more than one location. In addition, data collected was used to estimate the contribution of the Toboggan Creek steelhead population to the number of steelhead upstream of Moricetown Canyon. Other studies, such as marked to unmarked ratios at spawning locations, which could be determined using a variety of methods (e.g. angling, snorkel counts) have not been developed, but could be valuable in increasing our understanding of steelhead population dynamics in the Bulkley River and tributaries.

A large number of steelhead are captured during the Moricetown tagging project, and the study can be used as a site for other studies on steelhead in the Skeena Region. For example, DNA, fish health sampling, and age structure projects could build on the Moricetown tagging project.

Since steelhead have been tagged since 1999, and because of the relatively large number of steelhead sampled at Moricetown, this study can provide useful data on the proportion of steelhead that are repeat spawners in consecutive as opposed to alternate years, and on the proportion of spawners that are repeat spawners.

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**Appendix 1. Steelhead data obtained by beach seining.**

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
25-Jul-05	kevin	N	Applied	Grey	33600			0 Male	53		
25-Jul-05	kevin	N	Applied	Grey	33602			0 Female	66		some claw mrks
26-Jul-05	Brian:	N	Applied	Grey	33603			0 Female	53		electro burned
26-Jul-05	kevin	N	Applied	Grey	33605			0 Male	52		
28-Jul-05	Brian:	N	Applied	Grey	33608			0 Female	80.5		
28-Jul-05	Brian:	N	Applied	Grey	33610			0 Female	75.5		scales, left pec
28-Jul-05	kevin	N	Applied	Grey	33611			0 Male	55.5		set net
29-Jul-05	Brian:	N	Applied	Grey	33612			0 Female	54		
29-Jul-05	kevin	N	Applied	Grey	33613			0 Male	68		
01-Aug-05	kevin	N	Applied	Grey	33614			0 Female	66		
02-Aug-05	Brian:	N	Applied	Grey	33616			0 Female	55		spot throat
02-Aug-05	kevin	N	Applied	Grey	33617			0 Female	54		set net
02-Aug-05	kevin	N	Applied	Grey	33619			0 Female	52		
03-Aug-05	Brian:	N	Applied	Grey	33620			0 Male	68		
03-Aug-05	Brian:	N	Applied	Grey	33621			0 Female	52.5		dorsal
03-Aug-05	Brian:	N	Applied	Grey	33622			0 Female	71		lower lobe,,dorsal
03-Aug-05	Brian:	N	Applied	Grey	33623			0 Female	66		
03-Aug-05	Brian:	N	Applied	Grey	33625			0 Female	50.5		dorsal
03-Aug-05	Brian:	N	Applied	Grey	33627			0 Female	68		snout,netmrks
03-Aug-05	Brian:	N	Applied	Grey	33628			0 Female	76		right plate
03-Aug-05	kevin	N	Applied	Grey	33630			0 Female	51		set net,leading edge dorsal
03-Aug-05	kevin	N	Applied	Grey	33631			0 Female	59		
03-Aug-05	kevin	N	Applied	Grey	33632			0 Male	58.5		
04-Aug-05	Brian:	N	Applied	Grey	33633			0 Female	58		net,,hickey
04-Aug-05	kevin	N	Applied	Grey	33634			0 Female	54		
04-Aug-05	kevin	N	Applied	Grey	33635			0 Female	52		
04-Aug-05	kevin	N	Applied	Grey	33646			0 Female	53		
04-Aug-05	kevin	N	Applied	Grey	33647			0 Female	70		upper lobe
04-Aug-05	kevin	N	Applied	Grey	33649			0 Male	55		
05-Aug-05	Brian:	N	Applied	Grey	33700			0 Female	51.5		mint
05-Aug-05	Brian:	N	Applied	Grey	33701			0 Female	56		mint
05-Aug-05	Brian:	N	Applied	Grey	33702			0 Male	66		mint
05-Aug-05	Brian:	N	Applied	Grey	33707			0 Female	53		mint
05-Aug-05	Brian:	N	Applied	Grey	33708			0 Male	76		mint

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
05-Aug-05	Brian:	N	Applied	Grey	33709			0 Female	52		mint,,scales
05-Aug-05	Brian:	N	Applied	Grey	33712			0 Male	91		left
05-Aug-05	Brian:	N	Applied	Grey	33713			0 Female	53		upper lobe
05-Aug-05	Brian:	N	Applied	Grey	33714			0 Female	66		upper lobe, dorsal
05-Aug-05	Brian:	N	Applied	Grey	33716			0 Female	62		mint dorsal 62?
05-Aug-05	Brian:	N	Applied	Grey	33718			0 Female	62		mint
05-Aug-05	Brian:	N	Applied	Grey	33723			0 Female	53		mint
05-Aug-05	Brian:	N	Applied	Grey	33725			0 Male	71		mint
05-Aug-05	kevin	N	Applied	Grey	33729			0 Female	50		
05-Aug-05	kevin	N	Applied	Grey	33730			0 Male	87.5		
05-Aug-05	kevin	N	Applied	Grey	33731			0 Male	74		
05-Aug-05	kevin	N	Applied	Grey	33732			0 Female	72		
08-Aug-05	kevin	N	Applied	Grey	33733			0 Female	63.5		
08-Aug-05	Brian:	N	Applied	Grey	33739			0 Female	51		single load,left pelvic split
08-Aug-05	Brian:	N	Applied	Grey	33742			0 Female	54		dorsal
08-Aug-05	Brian:	N	Applied	Grey	33745			0 Female	51.5		split pecs,+pelvics+dorsal
08-Aug-05	Brian:	N	Applied	Grey	33747			0 Female	51		
08-Aug-05	Brian:	N	Applied	Grey	33749			0 Male	68		left plate
08-Aug-05	Brian:	N	Applied	Grey	33800			0 Female	68		dorsal, net shoulder
08-Aug-05	Brian:	N	Applied	Grey	33801			0 Female	58		upper lobe
08-Aug-05	Brian:	N	Applied	Grey	33802			0 Female	60		upper lobe
08-Aug-05	Brian:	N	Recaptured			brown	23719	Female	68		no punch
08-Aug-05	Brian:	N	Recaptured			Grey	33739	Female	51	Bottom	left pelvic split
08-Aug-05	Brian:	N	Recaptured			green	38541	Female	62	Top	
08-Aug-05	Brian:	N	Recaptured			green	38562	Female	50	Top	dorsal,net
09-Aug-05	kevin	N	Applied	Grey	33803			0 Female	52.5		
09-Aug-05	kevin	N	Applied	Grey	33804			0 Male	54		
09-Aug-05	kevin	N	Applied	Grey	33805			0 Female	50		scales
09-Aug-05	kevin	N	Applied	Grey	33806			0 Male	59.5		
09-Aug-05	kevin	N	Applied	Grey	33807			0 Male	50		
09-Aug-05	kevin	N	Applied	Grey	33808			0 Female	69.5		
09-Aug-05	kevin	N	Applied	Grey	33809			0 Female	55.5		set net,dorsal
09-Aug-05	kevin	N	Applied	Grey	33810			0 Female	67		
09-Aug-05	Brian:	N	Applied	Grey	33812			0 Female	54		

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
09-Aug-05	Brian:	N	Applied	Grey	33814			0 Female	57		dorsal
09-Aug-05	Brian:	N	Applied	Grey	33816			0 Male	83		dorsal
09-Aug-05	Brian:	N	Applied	Grey	33817			0 Female	51		dorsal
09-Aug-05	Brian:	N	Applied	Grey	33818			0 Female	69		dorsal,all fins
09-Aug-05	Brian:	N	Applied	Grey	33819			0 Male	64		net upper lobe
09-Aug-05	Brian:	N	Applied	Grey	33820			0 Female	51		
09-Aug-05	Brian:	N	Applied	Grey	33822			0 Female	66.5		upper lobe
09-Aug-05	Brian:	N	Applied	Grey	33823			0 Female	62		dorsal, net
09-Aug-05	Brian:	N	Applied	Grey	33849			0 Female	51		dorsal
10-Aug-05	kevin	N	Applied	Grey	33824			0 Male	54.5		
10-Aug-05	kevin	N	Applied	Grey	33825			0 Female	67		
10-Aug-05	kevin	N	Applied	Grey	33826			0 Female	51		scales
10-Aug-05	Brian:	N	Applied	Grey	33828			0 Female	75		dorsal. Lower lobe
10-Aug-05	Brian:	N	Applied	Grey	33829			0 Female	55		
10-Aug-05	Brian:	N	Applied	Grey	33830			0 Female	64		awesome
10-Aug-05	Brian:	N	Applied	Grey	33831			0 Male	85.5		
10-Aug-05	Brian:	N	Applied	Grey	33833			0 Female	53.5		net ,dorsal
10-Aug-05	Brian:	N	Applied	Grey	33834			0 Female			all fins , no size d'oh
10-Aug-05	Brian:	N	Applied	Grey	33836			0 Female	53		
10-Aug-05	Brian:	N	Applied	Grey	33837			0 Female	56		
10-Aug-05	Brian:	N	Applied	Grey	33838			0 Male	75		net
10-Aug-05	Brian:	N	Recaptured			Grey	33625	Female	50	Bottom	dorsal
10-Aug-05	kevin	N	Recaptured			Grey	33701	Female	56	Bottom	
11-Aug-05	kevin	N	Applied	Grey	33641			0 Female	50		
11-Aug-05	kevin	N	Applied	Grey	33839			0 Male	63		
11-Aug-05	kevin	N	Applied	Grey	33840			0 Female	55		left plate
11-Aug-05	kevin	N	Applied	Grey	33841			0 Male	67.5		lower jaw
11-Aug-05	kevin	N	Applied	Grey	33842			0 Male	62.5		
11-Aug-05	Brian:	N	Applied	Grey	33843			0 Male	60		net
11-Aug-05	Brian:	N	Applied	Grey	33844			0 Male	75		
11-Aug-05	Brian:	N	Applied	Grey	33845			0 Female	64		
11-Aug-05	Brian:	N	Applied	Grey	33846			0 Female	67		net,,, dorsal
11-Aug-05	Brian:	N	Applied	Grey	33847			0 Female	82		
12-Aug-05	kevin	N	Applied	Grey	33650			0 Male	63		

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
12-Aug-05	kevin	N	Applied	Grey	33651			0 Female	71.5		cyst rt
12-Aug-05	kevin	N	Applied	Grey	33652			0 Male	50.5		
12-Aug-05	kevin	N	Applied	Grey	33653			0 Female	66.5		
12-Aug-05	Brian:	N	Applied	Grey	33654			0 Female	51.5		net
12-Aug-05	Brian:	N	Applied	Grey	33656			0 Male	85.5		tick on snout only
12-Aug-05	Brian:	N	Applied	Grey	33657			0 Unknown	54		
12-Aug-05	Brian:	N	Applied	Grey	33658			0 Male	85		
12-Aug-05	Brian:	N	Applied	Grey	33659			0 Female	65		claw
12-Aug-05	Brian:	N	Applied	Grey	33660			0 Female	52		
12-Aug-05	Brian:	N	Applied	Grey	33661			0 Male	55.5		
12-Aug-05	Brian:	N	Applied	Grey	33662			0 Male	66		
12-Aug-05	Brian:	N	Applied	Grey	33663			0 Female	55		net
12-Aug-05	kevin	N	Recaptured			Green	38673	Female	51.5	Top	
15-Aug-05	Brian:	N	Applied	Lime	21105			0 Female	55		original id as coho (changed)
15-Aug-05	Brian:	N	Applied	Grey	33655			0 Female	70.5		
15-Aug-05	kevin	N	Applied	Grey	33664			0 Female	55.5		
15-Aug-05	kevin	N	Applied	Grey	33665			0 Female	59		
15-Aug-05	kevin	N	Applied	Grey	33666			0 Female	51.5		
15-Aug-05	kevin	N	Applied	Grey	33667			0 Male	52		
15-Aug-05	kevin	N	Applied	Grey	33668			0 Female	53		
15-Aug-05	kevin	N	Applied	Grey	33669			0 Female	88		cyst rt,snout
15-Aug-05	kevin	N	Applied	Grey	33670			0 Female	49		
15-Aug-05	kevin	N	Applied	Grey	33672			0 Female	53.5		
15-Aug-05	Brian:	N	Applied	Grey	33674			0 Male	64		
15-Aug-05	Brian:	N	Applied	Grey	33675			0 Female	54		net
15-Aug-05	Brian:	N	Applied	Grey	33676			0 Female	71		scales
15-Aug-05	Brian:	N	Applied	Grey	33677			0 Female	54		
15-Aug-05	Brian:	N	Applied	Grey	33679			0 Female	53		
15-Aug-05	Brian:	N	Applied	Grey	33682			0 Female	57		
15-Aug-05	Brian:	N	Applied	Grey	33683			0 Male	79.5		
15-Aug-05	Brian:	N	Applied	Grey	33684			0 Female	53		
15-Aug-05	Brian:	N	Applied	Grey	33685			0 Female	53		
15-Aug-05	Brian:	N	Applied	Grey	33686			0 Female	56		dorsal
15-Aug-05	Brian:	N	Applied	Grey	33687			0 Male	67		



Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
15-Aug-05	Brian:	N	Recaptured			Grey	33646	Female	51	Bottom	upper lobe,scales
15-Aug-05	Brian:	N	Recaptured			green	38688	Male	67	Top	min environment tag,net
15-Aug-05	kevin	N	Recaptured			green	38714	Male	52.5		no tail punch, canyon tagged
15-Aug-05	Brian:	N	Recaptured			green	38804	Female	58	Top	min environment tag,,,lower
16-Aug-05	kevin	N	Applied	Grey	33689			0 Female	79		
16-Aug-05	kevin	N	Applied	Grey	33690			0 Male	57		
16-Aug-05	kevin	N	Applied	Grey	33691			0 Female	50.5		
16-Aug-05	kevin	N	Applied	Grey	33692			0 Female	53		
16-Aug-05	kevin	N	Applied	Grey	33693			0 Male	74		
16-Aug-05	Brian:	N	Applied	Grey	33694			0 Male	67		
16-Aug-05	Brian:	N	Applied	Grey	33695			0 Male	79.5		hunch back,dorsal
16-Aug-05	Brian:	N	Applied	Grey	33696			0 Female	77		dorsal
16-Aug-05	Brian:	N	Applied	Grey	33697			0 Female	68		scales
16-Aug-05	Brian:	N	Applied	Grey	33699			0 Female	55		
16-Aug-05	Brian:	N	Applied	Grey	33851			0 Female	62.5		
16-Aug-05	Brian:	N	Recaptured			Grey	33691	Female	51	Bottom	dorsal
16-Aug-05	kevin	N	Recaptured			Grey	33723	Female	53		
16-Aug-05	kevin	N	Recaptured			green	38819	Female	62	Top	
17-Aug-05	kevin	N	Applied	Grey	33852			0 Female	73		
17-Aug-05	kevin	N	Applied	Grey	33853			0 Female	65		under jaw damaged
17-Aug-05	kevin	N	Applied	Grey	33854			0 Female	55.5		
17-Aug-05	kevin	N	Applied	Grey	33856			0 Female	62		
17-Aug-05	kevin	N	Applied	Grey	33857			0 Male	53		set net
17-Aug-05	kevin	N	Applied	Grey	33858			0 Female	64.5		
17-Aug-05	kevin	N	Applied	Grey	33859			0 Male	72.5		
17-Aug-05	kevin	N	Applied	Grey	33860			0 Female	81.5		
17-Aug-05	Brian:	N	Applied	Grey	33862			0 Female	82		scales,electro burn rt
17-Aug-05	Brian:	N	Applied	Grey	33863			0 Female	72		dorsal,
17-Aug-05	Brian:	N	Applied	Grey	33864			0 Female	69		
17-Aug-05	Brian:	N	Applied	Grey	33865			0 Male	54.5		
17-Aug-05	Brian:	N	Applied	Grey	33866			0 Female	55		dorsal
17-Aug-05	Brian:	N	Applied	Grey	33867			0 Male	71		
17-Aug-05	Brian:	N	Applied	Grey	33869			0 Male	76		right eye, dorsal,left plate,
17-Aug-05	Brian:	N	Recaptured			Grey	31346	Male	75.5		no punch

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
17-Aug-05	Brian:	N	Recaptured			Grey	33795	Female	57		dorsal, no tail punch
18-Aug-05	kevin	N	Applied	Grey	33871			0 Female	70		
18-Aug-05	kevin	N	Applied	Grey	33872			0 Female	55		
18-Aug-05	kevin	N	Applied	Grey	33873			0 Female	61.5		gash above pelvic rt
18-Aug-05	kevin	N	Applied	Grey	33874			0 Female	53.5		
18-Aug-05	kevin	N	Applied	Grey	33876			0 Male	62.5		33875 dud
18-Aug-05	kevin	N	Applied	Grey	33877			0 Female	73		
18-Aug-05	kevin	N	Applied	Grey	33878			0 Male	68		
18-Aug-05	kevin	N	Applied	Grey	33879			0 Female	52		
18-Aug-05	kevin	N	Applied	Grey	33880			0 Female	53		
18-Aug-05	kevin	N	Applied	Grey	33881			0 Male	52		
18-Aug-05	kevin	N	Applied	Grey	33882			0 Female	52		
18-Aug-05	Brian:	N	Applied	Grey	33883			0 Female	64.5		dorsal
18-Aug-05	Brian:	N	Applied	Grey	33884			0 Female	53.5		electro burn both sides
18-Aug-05	Brian:	N	Applied	Grey	33885			0 Female	74		X
18-Aug-05	Brian:	N	Applied	Grey	33886			0 Female	80		
18-Aug-05	Brian:	N	Applied	Grey	33887			0 Female	52		
18-Aug-05	kevin	N	Recaptured			green	38812	Female	75	Top	
19-Aug-05	kevin	N	Applied	Grey	33900			0 Female	66.5		
19-Aug-05	kevin	N	Applied	Grey	33901			0 Female	58		set net,scales
19-Aug-05	kevin	N	Applied	Grey	33902			0 Female	64.5		set net,scales,dorsal
19-Aug-05	kevin	N	Applied	Grey	33903			0 Male	61.5		gash left side belly
19-Aug-05	kevin	N	Applied	Grey	33904			0 Female	58		
19-Aug-05	Brian:	N	Applied	Grey	33905			0 Female	77.5		mint
19-Aug-05	Brian:	N	Applied	Grey	33906			0 Female	70		SSL
19-Aug-05	Brian:	N	Applied	Grey	33907			0 Female	52.5		net,dorsal
19-Aug-05	Brian:	N	Applied	Grey	33908			0 Female	53		all fins,dorsal
19-Aug-05	Brian:	N	Applied	Grey	33909			0 Female	76		mint
19-Aug-05	Brian:	N	Applied	Grey	33910			0 Female	52		lower lobe
19-Aug-05	Brian:	N	Applied	Grey	33911			0 Female	68		
19-Aug-05	Brian:	N	Applied	Grey	33912			0 Female	80.5		
19-Aug-05	Brian:	N	Recaptured			brown	22113	Female	56		no tail punch
19-Aug-05	Brian:	N	Recaptured			Grey	33665	Female	59.5	Bottom	net,dorsal
22-Aug-05	Brian:	N	Applied	Grey	33913			0 Male	72		electro burn right

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
22-Aug-05	Brian:	N	Applied	Grey	33914			0 Female	70		lower lobe
22-Aug-05	Brian:	N	Applied	Grey	33915			0 Female	64		
22-Aug-05	Brian:	N	Applied	Grey	33918			0 Female	59		scar rt
22-Aug-05	Brian:	N	Applied	Grey	33919			0 Female	76.6		scar rt,dorsal
22-Aug-05	Brian:	N	Applied	Grey	33920			0 Female	56		dorsal
22-Aug-05	Brian:	N	Applied	Grey	33921			0 Female	55		net,scales,dorsal
22-Aug-05	Brian:	N	Applied	Grey	33922			0 Female			dorsal,caudal,scales
22-Aug-05	Brian:	N	Applied	Grey	33923			0 Male	55		
22-Aug-05	Brian:	N	Applied	Grey	33924			0 Female	54		lil scale loss, caudal
22-Aug-05	Brian:	N	Applied	Grey	33925			0 Female	53		net neck
22-Aug-05	Brian:	N	Applied	Grey	33926			0 Male	69		scale loss rt
22-Aug-05	Brian:	N	Applied	Grey	33927			0 Female	53.5		
22-Aug-05	Brian:	N	Applied	Grey	33928			0 Male	61		
22-Aug-05	Brian:	N	Applied	Grey	33929			0 Female	56		scales
22-Aug-05	Brian:	N	Applied	Grey	33930			0 Male	53		
22-Aug-05	Brian:	N	Applied	Grey	33931			0 Male	92.5		
22-Aug-05	Brian:	N	Applied	Grey	33933			0 Female	51		net,dorsal,scales
22-Aug-05	Brian:	N	Applied	Grey	33934			0 Female	71		
22-Aug-05	Brian:	N	Applied	Grey	33935			0 Female	66		lil scale loss,
22-Aug-05	Brian:	N	Applied	Grey	33936			0 Male	52.5		mint
22-Aug-05	kevin	N	Applied	Grey	33937			0 Female	71		scales
22-Aug-05	kevin	N	Applied	Grey	33938			0 Female	58		
22-Aug-05	kevin	N	Applied	Grey	33939			0 Female	62.5		
22-Aug-05	kevin	N	Applied	Grey	33940			0 Female	59		
22-Aug-05	kevin	N	Applied	Grey	33941			0 Female	65		
22-Aug-05	kevin	N	Applied	Grey	33942			0 Female	65		
22-Aug-05	kevin	N	Applied	Grey	33943			0 Female	52.5		
22-Aug-05	kevin	N	Applied	Grey	33945			0 Female	70		
22-Aug-05	kevin	N	Applied	Grey	33946			0 Female	70		
22-Aug-05	kevin	N	Applied	Grey	33947			0 Female	81.5		
22-Aug-05	kevin	N	Applied	Grey	33949			0 Female	71		
22-Aug-05	kevin	N	Applied	Grey	33950			0 Female	64		dorsal,,,,,
22-Aug-05	kevin	N	Applied	Grey	33952			0 Female	71.5		dorsal,,,,,
22-Aug-05	kevin	N	Applied	Grey	33953			0 Female	50		

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
22-Aug-05	kevin	N	Applied	Grey	33954			0 Female	66		
22-Aug-05	kevin	N	Applied	Grey	33955			0 Female	52.5		
22-Aug-05	kevin	N	Applied	Grey	33956			0 Female	54		scales
22-Aug-05	kevin	N	Recaptured			Grey	29747	Female	64	Bottom	
22-Aug-05	Brian:	N	Recaptured			Grey	33840	Female	55	Bottom	left plate torn
22-Aug-05	Brian:	N	Recaptured			Grey	33913	Male	71.5	Bottom	electro burn
22-Aug-05	Brian:	N	Recaptured			green	38569	Female	53	Top	also bottom punched,net, hed
22-Aug-05	Brian:	N	Recaptured			green	38656	Female	72	Top	head
23-Aug-05	Brian:	N	Applied	Grey	33957			0 Female	68		
23-Aug-05	Brian:	N	Applied	Grey	33958			0 Female	53		
23-Aug-05	Brian:	N	Applied	Grey	33959			0 Female	56		net
23-Aug-05	Brian:	N	Applied	Grey	33960			0 Male	71		
23-Aug-05	Brian:	N	Applied	Grey	33961			0 Female	55.5		
23-Aug-05	Brian:	N	Applied	Grey	33963			0 Female	80.5		
23-Aug-05	Brian:	N	Applied	Grey	33964			0 Female	55.5		
23-Aug-05	Brian:	N	Applied	Grey	33965			0 Female	59		
23-Aug-05	Brian:	N	Applied	Grey	33966			0 Female	57.5		
23-Aug-05	Brian:	N	Applied	Grey	33967			0 Female	66.5		upper lobe,dorsal
23-Aug-05	Brian:	N	Applied	Grey	33969			0 Female	64		
23-Aug-05	Brian:	N	Applied	Grey	33970			0 Female	60		net
23-Aug-05	Brian:	N	Applied	Grey	33971			0 Female	54		
23-Aug-05	kevin	N	Applied	Grey	33972			0 Female	61.5		
23-Aug-05	kevin	N	Applied	Grey	33973			0 Female	52		
23-Aug-05	kevin	N	Applied	Grey	33974			0 Female	71.5		
23-Aug-05	kevin	N	lost	Grey	33975			0 Female	64.5	Top	
23-Aug-05	kevin	N	Applied	Grey	33976			0 Female	51		
23-Aug-05	kevin	N	Applied	Grey	33977			0 Female	72.5		
23-Aug-05	kevin	N	Recaptured			brown	22324	Female	54	Bottom	no punch
24-Aug-05	Brian:	N	Applied	Grey	33979			0 Female	70.5		lower lobe
24-Aug-05	Brian:	N	Applied	Grey	33981			0 Female	81		exellente'
24-Aug-05	Brian:	N	Applied	Grey	33982			0 Female	56		
24-Aug-05	Brian:	N	Applied	Grey	33983			0 Female	52		net, caudal
24-Aug-05	Brian:	N	Applied	Grey	33984			0 Female	69		
24-Aug-05	kevin	N	Applied	Grey	33985			0 Female	56		lower lobe

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
24-Aug-05	kevin	N	Applied	Grey	33986			0 Female	67		
24-Aug-05	kevin	N	Applied	Grey	33987			0 Male	67.5		dorsal
24-Aug-05	kevin	N	Applied	Grey	33988			0 Male	53.5		scales
24-Aug-05	kevin	N	Applied	Grey	33989			0 Female	59		
24-Aug-05	kevin	N	Applied	Grey	33990			0 Female	71		gash on right,,,,dorsal
24-Aug-05	kevin	N	Applied	Grey	33991			0 Female	68		dorsal,,,set net
24-Aug-05	kevin	N	Applied	Grey	33992			0 Female	52.5		scales
24-Aug-05	kevin	N	Applied	Grey	33993			0 Female	66		dorsal
24-Aug-05	kevin	N	Applied	Grey	33994			0 Female	80		dorsal
24-Aug-05	kevin	N	Applied	Grey	33995			0 Female	62		dorsal
24-Aug-05	kevin	N	Applied	Grey	33996			0 Female	74		
24-Aug-05	kevin	N	Applied	Grey	33997			0 Female	64		
24-Aug-05	Brian:	N	Recaptured			brown	22399	Male	90.5		no tail punch
24-Aug-05	Brian:	N	Recaptured			green	38575	Female	55		caudal, net, no tail punch
25-Aug-05	Brian:	N	Applied	brown	24875			0 Male	87.5		net, lower lobe
25-Aug-05	Brian:	N	Applied	brown	24876			0 Female	57		
25-Aug-05	Brian:	N	Applied	brown	24877			0 Male	56		
25-Aug-05	Brian:	N	Applied	brown	24878			0 Female	69		dorsal, scales, rt pec
25-Aug-05	Brian:	N	Applied	brown	24879			0 Female	67.5		upper lobe
25-Aug-05	kevin	N	Applied	brown	24880			0 Female	58		
25-Aug-05	kevin	N	Applied	brown	24881			0 Female	59.5		scrapes
25-Aug-05	kevin	N	Applied	brown	24882			0 Female	77		
25-Aug-05	kevin	N	Applied	brown	24883			0 Female	59		
25-Aug-05	Brian:	N	Recaptured			brown	24551	Male	76.5	Top	
25-Aug-05	kevin	N	Recaptured			brown	24882	Female	77	Bottom	
26-Aug-05	Brian:	N	Applied	brown	24884			0 Female	54		dorsal,scales
26-Aug-05	Brian:	N	Applied	brown	24886			0 Female	80.5		scales,dorsal, electro brn
26-Aug-05	Brian:	N	Applied	brown	24888			0 Female	58		dorsal
26-Aug-05	Brian:	N	Applied	brown	24889			0 Female	55		upper lobe, net, dorsal
26-Aug-05	Brian:	N	Applied	brown	24890			0 Female	50		
26-Aug-05	Brian:	N	Applied	brown	24891			0 Female	73		
26-Aug-05	Brian:	N	Applied	brown	24892			0 Female	51		scvales
26-Aug-05	kevin	N	Applied	brown	24893			0 Female	67.5		
26-Aug-05	kevin	N	Applied	brown	24894			0 Male	68.5		lower lobe

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
26-Aug-05	kevin	N	Applied	brown	24895			0 Female	50.5		
26-Aug-05	kevin	N	Applied	brown	24896			0 Male	57		set net
26-Aug-05	Brian:	N	Recaptured			Blue	3475	Female	53	Bottom	electro shock rt
26-Aug-05	Brian:	N	Recaptured			brown	22269	Female	71.5	Bottom	net, head, no punch, all fins
26-Aug-05	Brian:	N	Recaptured			Grey	33699	Female	55	Bottom	net
26-Aug-05	Brian:	N	Recaptured			Grey	33930	Female	54	Bottom	
29-Aug-05	Brian:	N	Applied	brown	24800			0 Female	52		
29-Aug-05	Brian:	N	Applied	brown	24801			0 Female	68		scales
29-Aug-05	Brian:	N	Applied	brown	24803			0 Female	60		
29-Aug-05	Brian:	N	Applied	brown	24804			0 Female	68		
29-Aug-05	Brian:	N	Applied	brown	24805			0 Female	55.5		
29-Aug-05	kevin	N	Applied	brown	24806			0 Male	69		
29-Aug-05	kevin	N	Applied	brown	24807			0 Male	58		
29-Aug-05	kevin	N	Applied	brown	24808			0 Female	64		set net
29-Aug-05	Brian:	N	Applied	brown	24897			0 Female	68		scales,caudal
29-Aug-05	Brian:	N	Applied	brown	24898			0 Male	60		
29-Aug-05	kevin	N	Recaptured			brown	22335	Female	64	Top	
29-Aug-05	kevin	N	Recaptured			brown	22390	Male	68.5		all fins
29-Aug-05	Brian:	N	Recaptured			brown	24674	Female	57.5	Top	
29-Aug-05	kevin	N	Recaptured			Grey	33812	Female	54.5	Bottom	
29-Aug-05	Brian:	N	Recaptured			Grey	33966	Female	57.5	Bottom	
29-Aug-05	Brian:	N	Recaptured			green	38737	Female	49.5	Top	all fins
29-Aug-05	Brian:	N	Recaptured			green	38810	Female	71.5	Top	head, all fins
30-Aug-05	Brian:	N	Applied	brown	24809			0 Female	55.5		net , dorsal
30-Aug-05	Brian:	N	Applied	brown	24810			0 Male	79.5		claw mrks
30-Aug-05	Brian:	N	Applied	brown	24811			0 Female	79		lower lobe
30-Aug-05	Brian:	N	Applied	brown	24812			0 Female	72.5		electro brn left
30-Aug-05	Brian:	N	Applied	brown	24813			0 Female	68		scales, left plate
30-Aug-05	Brian:	N	Applied	brown	24814			0 Female	66		net, scales , dorsal
30-Aug-05	Brian:	N	Applied	brown	24815			0 Female	75		
30-Aug-05	Brian:	N	Applied	brown	24816			0 Female	55		
30-Aug-05	Brian:	N	Applied	brown	24817			0 Female	71.5		electro burn rt, scales
30-Aug-05	Brian:	N	Applied	brown	24818			0 Female	68		scales
30-Aug-05	kevin	N	Applied	brown	24819			0 Male	50		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
30-Aug-05	kevin	N	Applied	brown	24820			0 Female	56.5		
30-Aug-05	kevin	N	Applied	brown	24821			0 Female	65		scales
30-Aug-05	kevin	N	Applied	brown	24822			0 Male	74		
30-Aug-05	kevin	N	Applied	brown	24823			0 Female	72.5		
30-Aug-05	kevin	N	Applied	brown	24824			0 Female	56		scales
30-Aug-05	kevin	N	Applied	brown	24825			0 Male	71		
30-Aug-05	kevin	N	Applied	brown	24826			0 Male	57		
30-Aug-05	Brian:	N	Recaptured			Blue	5379	Female	68		net, no tail punch
30-Aug-05	Brian:	N	Recaptured			brown	22385	Female	67.5		snout, no tail punch
30-Aug-05	Brian:	N	Recaptured			Grey	31974	Male	66		no tail punch
31-Aug-05	Brian:	N	Applied	brown	24827			0 Female	78.5		
31-Aug-05	Brian:	N	Applied	brown	24828			0 Female	54.5		
31-Aug-05	Brian:	N	Applied	brown	24829			0 Female	83.5		
31-Aug-05	Brian:	N	Applied	brown	24830			0 Female	51		scales
31-Aug-05	Brian:	N	Recaptured			Grey	33954	Female	66	Bottom	scales
01-Sep-05	Brian:	N	Applied	brown	24831			0 Female	82.5		
01-Sep-05	Brian:	N	Applied	brown	24832			0 Female	54		net hed
01-Sep-05	Brian:	N	Applied	brown	24833			0 Female	54		net mrks neck lol
01-Sep-05	Brian:	N	Applied	brown	24834			0 Female	71		scales,
01-Sep-05	Brian:	N	Applied	brown	24835			0 Female	56		dorsal,
01-Sep-05	Brian:	N	Applied	brown	24836			0 Female	66		scales
01-Sep-05	Brian:	N	Applied	brown	24837			0 Male	69.5		electro burn pelvic area
01-Sep-05	Brian:	N	Applied	brown	24839			0 Male	70		scales
01-Sep-05	Brian:	N	Applied	brown	24840			0 Female	80.5		right eye white
01-Sep-05	Brian:	N	Applied	brown	24841			0 Female	79		scales
01-Sep-05	Brian:	N	Applied	brown	24842			0 Female	69.5		snout, dorsal
01-Sep-05	kevin	N	Applied	brown	24843			0 Female	81		
01-Sep-05	kevin	N	Applied	brown	24844			0 Female	66		
01-Sep-05	kevin	N	Applied	brown	24845			0 Female	73		dorsal
01-Sep-05	kevin	N	Applied	brown	24846			0 Female	55		dorsal,set net
01-Sep-05	kevin	N	Applied	brown	24847			0 Female	54		
01-Sep-05	Brian:	N	Recaptured			brown	24831	Female	82	Bottom	scales
02-Sep-05	Brian:	N	Applied	brown	24848			0 Female	49		
02-Sep-05	Brian:	N	Applied	brown	24849			0 Female	73		hook mrk left side peduncle

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
02-Sep-05	Brian:	N	Applied	brown	24850			0 Male	81.5		
02-Sep-05	Brian:	N	Applied	brown	24851			0 Male	67.5		scar rt pelvic
02-Sep-05	Brian:	N	Applied	brown	24852			0 Female	52.5		
02-Sep-05	Brian:	N	Applied	brown	24853			0 Male	91		
02-Sep-05	Brian:	N	Applied	brown	24854			0 Female	55		scales
02-Sep-05	kevin	N	Applied	brown	24855			0 Female	52		split dorsal
02-Sep-05	kevin	N	Applied	brown	24856			0 Female	52		upper lobe
02-Sep-05	kevin	N	Applied	brown	24857			0 Female	56		
02-Sep-05	kevin	N	Applied	brown	24858			0 Female	52		
02-Sep-05	kevin	N	Applied	brown	24859			0 Female	71		set net
02-Sep-05	kevin	N	Recaptured			brown	22123	Female	65		head,,,all fins
06-Sep-05	kevin	N	Applied	brown	24860			0 Female	52.5		
06-Sep-05	Brian:	N	Applied	brown	24861			0 Female	59		scales
06-Sep-05	Brian:	N	Applied	brown	24862			0 Female	80		cyst rt,dorsal fungussed up
06-Sep-05	Brian:	N	Applied	brown	24863			0 Female	83.5		lower lobe
06-Sep-05	Brian:	N	Recaptured			brown	22114	Female	57		no tail punch
06-Sep-05	Brian:	N	Recaptured			White	40283	Female	54 Top		also 40284
06-Sep-05	Brian:	N	Recaptured			White	40283	Female	54 Top		also 40284
07-Sep-05	kevin	N	Applied	brown	24864			0 Male	76		
07-Sep-05	kevin	N	Applied	brown	24865			0 Female	72		long and narrow
07-Sep-05	kevin	N	Applied	brown	24866			0 Female	79		
07-Sep-05	Brian:	N	Applied	brown	24867			0 Female	57		
07-Sep-05	Brian:	N	Applied	brown	24868			0 Female	55		scales
07-Sep-05	Brian:	N	Applied	brown	24869			0 Male	79		
07-Sep-05	Brian:	N	Applied	brown	24870			0 Female	68.5		scales, all fins
07-Sep-05	Brian:	N	Applied	brown	24871			0 Female	74		upper lobe,left plate,
07-Sep-05	Brian:	N	Applied	brown	24872			0 Female	73		
07-Sep-05	Brian:	N	Applied	brown	24873			0 Male	73		scales, dorsal
07-Sep-05	Brian:	N	Recaptured			brown	22495	Female	56		no punch
07-Sep-05	kevin	N	Recaptured			brown	24792	Female	57 Top		
07-Sep-05	kevin	N	Recaptured			brown	24792	Female	57 Top		
07-Sep-05	Brian:	N	Recaptured			White	40271	Female	72 Top		
07-Sep-05	Brian:	N	Recaptured			White	40382	Female	57 Top		
08-Sep-05	kevin	N	Applied	brown	22625			0 Female	55		set net



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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
08-Sep-05	kevin	N	Applied	brown	22626			0 Female	67.5		
08-Sep-05	kevin	N	Applied	brown	22627			0 Female	74		claw mrks
08-Sep-05	kevin	N	Applied	brown	22628			0 Female	64		
08-Sep-05	kevin	N	Applied	brown	22629			0 Female	75		
08-Sep-05	Brian:	N	Applied	brown	22630			0 Female	70.5		electro burn left
08-Sep-05	Brian:	N	Applied	brown	22631			0 Female	79		
08-Sep-05	Brian:	N	Applied	brown	22632			0 Male	80		
08-Sep-05	Brian:	N	Applied	brown	22633			0 Female	51		
08-Sep-05	Brian:	N	Applied	brown	22634			0 Female	74		scales, dorsal
08-Sep-05	Brian:	N	Applied	brown	22635			0 Female	68.5		scales
08-Sep-05	Brian:	N	Applied	brown	22636			0 Female	53		
08-Sep-05	Brian:	N	Applied	brown	22637			0 Male	58		scales
08-Sep-05	kevin	N	Applied	brown	24874			0 Female	71		scales
08-Sep-05	kevin	N	Recaptured			brown	22626	Female	67	Bottom	
08-Sep-05	kevin	N	Recaptured			brown	22626	Female	67.5	Bottom	
09-Sep-05	kevin	N	Applied	brown	22638			0 Female	50		
09-Sep-05	kevin	N	Applied	brown	22639			0 Female	74		scales
09-Sep-05	kevin	N	Applied	brown	22640			0 Female	56		
09-Sep-05	kevin	N	Applied	brown	22641			0 Female	56.5		
09-Sep-05	Brian:	N	Applied	brown	22642			0 Female	52		
09-Sep-05	Brian:	N	Applied	brown	22643			0 Female	76.5		dorsal
09-Sep-05	kevin	N	Recaptured			brown	22638	Female	50	Bottom	
09-Sep-05	kevin	N	Recaptured			brown	22638	Female	50	Bottom	
09-Sep-05	kevin	N	Recaptured			brown	24551	Female	75	Bottom	caudal
11-Sep-05	Brian	N	Applied	Brown	22621			0 Female	74		
11-Sep-05	Brian:	N	Applied	brown	22622			0 Male	87		lower lobe
11-Sep-05	Brian:	N	Applied	brown	22623			0 Male	75.5		
11-Sep-05	Brian:	N	Applied	brown	22624			0 Female	69		
11-Sep-05	Brian:	N	Applied	brown	22646			0 Male	87		
11-Sep-05	Brian:	N	Applied	brown	22647			0 Male	73		
11-Sep-05	Brian:	N	Applied	brown	22648			0 Female	77		nose,left plate,lower lobe
11-Sep-05	Brian:	N	Applied	brown	22649			0 Female	73		left eye,head
11-Sep-05	Brian:	N	Recaptured			brown	22621	Female	74	Bottom	
11-Sep-05	Brian:	N	Recaptured			Grey	33915	Female	64	Bottom	nose,

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
12-Sep-05	kevin	N	Applied	brown	22644			0 Female	85		set net,,
12-Sep-05	kevin	N	Applied	brown	22645			0 Male	72.5		
13-Sep-05	Brian:	N	Applied	brown	22612			0 Female	60		scales
13-Sep-05	Brian:	N	Applied	brown	22613			0 Female	66		
13-Sep-05	Brian:	N	Applied	brown	22614			0 Female	77.5		scales
13-Sep-05	Brian:	N	Applied	brown	22615			0 Female	58.5		
13-Sep-05	Brian:	N	Applied	brown	22616			0 Female	60		head, scales
13-Sep-05	Brian:	N	Applied	brown	22617			0 Female	69		lower lobe
13-Sep-05	Brian:	N	Applied	brown	22618			0 Male	83.5		lower lobe
13-Sep-05	kevin	N	Applied	brown	22619			0 Female	68.5		claw mrks
13-Sep-05	kevin	N	Applied	brown	22620			0 Female	56.5		dorsal
13-Sep-05	kevin	N	Recaptured			brown	22390	Male	68.5	Bottom	
13-Sep-05	Brian:	N	Recaptured			brown	22642	Female	51	Bottom	
13-Sep-05	kevin	N	Recaptured			White	40326	Female	64.5	Top	claw mrks
14-Sep-05	Brian:	N	Applied	brown	22550			0 Female	69		right plate, upper lobe
14-Sep-05	Brian:	N	Applied	brown	22552			0 Female	67		dorsal, cyst left x2
14-Sep-05	Brian:	N	Applied	brown	22554			0 Female	53		
14-Sep-05	Brian:	N	Applied	brown	22555			0 Female	67		dorsal, scales, single shot tag
14-Sep-05	Brian:	N	Applied	brown	22556			0 Male	72		upper lobe
14-Sep-05	Brian:	N	Applied	brown	22557			0 Male	88		caudal split
14-Sep-05	Brian:	N	Applied	brown	22558			0 Female	77		#3 pink blue fox
14-Sep-05	Brian:	N	Applied	brown	22559			0 Female	72		scales
14-Sep-05	Brian:	N	Applied	brown	22560			0 Female	73.5		claw mrks both sides
14-Sep-05	Brian:	N	Applied	brown	22561			0 Male	69.5		lower lobe
14-Sep-05	Brian:	N	Applied	brown	22601			0 Male	75		
14-Sep-05	Brian:	N	Applied	brown	22602			Female	55		scales
14-Sep-05	kevin	N	Applied	brown	22604			0 Female	78.5		
14-Sep-05	kevin	N	Applied	brown	22605			0 Male	55		
14-Sep-05	kevin	N	Applied	brown	22606			0 Female	77		
14-Sep-05	kevin	N	Applied	brown	22607			0 Female	71		
14-Sep-05	kevin	N	Applied	brown	22608			0 Female	67		scales
14-Sep-05	kevin	N	Applied	brown	22609			0 Female	67.5		
14-Sep-05	kevin	N	Applied	brown	22610			0 Female	66		
14-Sep-05	kevin	N	Applied	brown	22611			0 Female	61		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
14-Sep-05	kevin	N	Recaptured			green	38117	Female	64.5	Top	
14-Sep-05	Brian:	N	Recaptured			green	38951	Female	70	Top	adipose mrked
14-Sep-05	Brian:	N	Recaptured			green	39650	Female	68	Top	
15-Sep-05	kevin	N	Applied	brown	22562			Female	64		
15-Sep-05	kevin	N	Applied	brown	22564			Female	55.5		
15-Sep-05	kevin	N	Applied	brown	22565			Female	62		
15-Sep-05	kevin	N	Applied	brown	22566			Female	54.5		
15-Sep-05	Brian:	N	Applied	brown	22568			Male	59		
15-Sep-05	Brian:	N	Applied	brown	22569			Female	53		
15-Sep-05	Brian:	N	Applied	brown	22570			Female	63		cyst left, dorsal
15-Sep-05	Brian:	N	Applied	brown	22571			Female	75		
15-Sep-05	Brian:	N	Applied	brown	22572			Female	63		left bruise+back
15-Sep-05	Brian:	N	Applied	brown	22573			Male	61.5		scales
15-Sep-05	Brian:	N	Applied	brown	22574			Female	51.5		claw mrks
15-Sep-05	Brian:	N	Applied	brown	23900			Female	51		
15-Sep-05	Brian:	N	Applied	brown	23901			Female	65		
15-Sep-05	Brian:	N	Applied	brown	23902			Male	74		
15-Sep-05	Brian:	N	Applied	brown	23903			Female	65		upper lobe
15-Sep-05	Brian:	N	Applied	brown	23905			Female	72		cyst both sides
15-Sep-05	Brian:	N	Applied	brown	23906			Female	71		scales
15-Sep-05	Brian:	N	Applied	brown	23907			Female	56		scales
15-Sep-05	Brian:	Y	None Applied					Female	74		died in net
15-Sep-05	kevin	N	Recaptured			White	40447	Female	67	Top	
16-Sep-05	Brian:	N	Applied	brown	22875			Female	55		
16-Sep-05	kevin	N	Applied	brown	23908			Female	55.5		
16-Sep-05	kevin	N	Applied	brown	23909			Female	82.5		
16-Sep-05	kevin	N	Applied	brown	23910			Female	60.5		
16-Sep-05	Brian:	N	Applied	brown	23911			Male	70.5		scales
16-Sep-05	Brian:	N	Applied	brown	23912			Male	78.5		cyst both sides
16-Sep-05	Brian:	N	Applied	brown	23913			Female	69		cyst rt
16-Sep-05	Brian:	N	Applied	brown	23914			Female	51		scales
16-Sep-05	Brian:	N	Applied	brown	23915			Male	80		caudal
16-Sep-05	Brian:	N	Applied	brown	23916			Female	64		scales
16-Sep-05	Brian:	N	Applied	brown	23917			Female	72		

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
16-Sep-05	kevin	N	Recaptured			brown	24827	Female	78	Bottom	
16-Sep-05	kevin	N	Recaptured			White	40411	Female	52	Top	rt plate
19-Sep-05	kevin	N	Applied	brown	22869			0 Female	63		
19-Sep-05	kevin	N	Applied	brown	22870			0 Female	67		scales
19-Sep-05	Brian:	N	Applied	brown	22871			0 Male	77		rt plate, caudal
19-Sep-05	Brian:	N	Applied	brown	22872			0 Male	73.5		scales, lower lobe
19-Sep-05	Brian:	N	Applied	brown	22873			0 Female	73.5		jig mrk chin, cysts left
19-Sep-05	Brian:	N	Applied	brown	22874			0 Male	76		cyst rt, claw mrks pelvic,
19-Sep-05	Brian:	N	Applied	brown	23918			0 Male	78		snout, scales
19-Sep-05	Brian:	N	Applied	brown	23919			0 Female	62		claw mrk left pec
19-Sep-05	Brian:	N	Applied	brown	23920			0 Female	59.5		
19-Sep-05	Brian:	N	Applied	brown	23922			0 Female	66.5		scales
19-Sep-05	kevin	N	Applied	brown	23923			0 Female	83.5		
20-Sep-05	kevin	N	Applied	brown	22850			0 Male	78		
20-Sep-05	kevin	N	Applied	brown	22851			0 Female	61		scar rt
20-Sep-05	kevin	N	Applied	brown	22852			0 Female	75		
20-Sep-05	kevin	N	Applied	brown	22853			0 Female	74		
20-Sep-05	kevin	N	Applied	brown	22854			0 Female	50		
20-Sep-05	kevin	N	Applied	brown	22855			0 Female	59		claw mrks
20-Sep-05	Brian:	N	Applied	brown	22856			0 Male	82.5		
20-Sep-05	Brian:	N	Applied	brown	22857			0 Male	54		
20-Sep-05	Brian:	N	Applied	brown	22858			0 Female	68.5		
20-Sep-05	Brian:	N	Applied	brown	22859			0 Male	72		
20-Sep-05	Brian:	N	Applied	brown	22860			0 Female	71.5		
20-Sep-05	Brian:	N	Applied	brown	22861			0 Female	55		scartches rt
20-Sep-05	Brian:	N	Applied	brown	22862			0 Male	75.5		scales
20-Sep-05	Brian:	N	Applied	brown	22863			0 Female	70.5		scales
20-Sep-05	Brian:	N	Applied	brown	22864			0 Female	62		dorsal,scales
20-Sep-05	Brian:	N	Applied	brown	22865			0 Male	72		
20-Sep-05	Brian:	N	Applied	brown	22866			0 Female	65		dorsal, upper lobe
20-Sep-05	Brian:	N	Applied	brown	22867			0 Male	69.5		lower lobe
20-Sep-05	kevin	N	Applied	brown	24900			0 Female	64		
20-Sep-05	kevin	N	Applied	brown	24901			0 Female	67		
20-Sep-05	kevin	N	Applied	brown	24902			0 Female	67		

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
20-Sep-05	kevin	N	Applied	brown	24903			0 Male	65		
20-Sep-05	kevin	N	Applied	brown	24904			0 Female	66		
20-Sep-05	kevin	N	Applied	brown	24905			0 Female	53.5		
20-Sep-05	kevin	N	Applied	brown	24906			0 Male	80		
20-Sep-05	kevin	N	Applied	brown	24907			0 Female	68		
20-Sep-05	kevin	N	Applied	brown	24908			0 Male	56.5		
20-Sep-05	Brian:	N	Recaptured			White	40280	Female	55	Top	scales, caudal, lower lobe
20-Sep-05	Brian:	N	Recaptured			White	40324	Female	67	Top	net, caudal
20-Sep-05	Brian:	N	Recaptured			White	40440	Female	60	Bottom	hook mrk ,lower jaw
20-Sep-05	Brian:	N	Recaptured			White	40456	Female	70	Bottom	
20-Sep-05	kevin	N	Recaptured			White	40531	Female	65	Top	
21-Sep-05	Brian:	N	Applied	brown	24909			0 Female	76.5		scales
21-Sep-05	Brian:	N	Applied	brown	24910			0 Male	62		some scale loss
21-Sep-05	Brian:	N	Applied	brown	24911			0 Female	64		some scale loss
21-Sep-05	Brian:	N	Applied	brown	24912			0 Female	70		caudal
21-Sep-05	Brian:	N	Applied	brown	24913			0 Female	72.5		caudal
21-Sep-05	Brian:	N	Applied	brown	24914			0 Female	81		caudal, head
21-Sep-05	Brian:	N	Applied	brown	24915			0 Female	68		scales
21-Sep-05	Brian:	N	Applied	brown	24916			0 Male	88		
21-Sep-05	Brian:	N	Applied	brown	24917			0 Female	73		caudal, claw marks left
21-Sep-05	Brian:	N	Applied	brown	24918			0 Female	75		lower lobe, leading dorsal
21-Sep-05	Brian:	N	Applied	brown	24919			Male	84		electro burn left
21-Sep-05	kevin	N	Applied	brown	24920			0 Male	67.5		
21-Sep-05	kevin	N	Applied	brown	24921			0 Male	85		
21-Sep-05	kevin	N	Applied	brown	24922			0 Male	75.5		
21-Sep-05	kevin	N	Applied	brown	24923			0 Female	59.5		
21-Sep-05	kevin	N	Applied	brown	24924			0 Male	76.5		
21-Sep-05	kevin	N	Applied	brown	24925			0 Female	61		set net
21-Sep-05	kevin	N	Applied	brown	24926			0 Female	78.5		claw mrks
21-Sep-05	kevin	N	Applied	brown	24927			0 Female	74.5		
21-Sep-05	kevin	N	Applied	brown	24928			0 Female	71.5		
21-Sep-05	kevin	N	Applied	brown	24929			0 Female	70.5		
21-Sep-05	kevin	N	Applied	brown	24930			0 Female	75.5		
21-Sep-05	kevin	N	Applied	brown	24931			0 Female	71.5		head

Appendix 1. Steelhead data obtained by beach seining. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
21-Sep-05	kevin	N	Applied	brown	24932		0	Female	69		
21-Sep-05	Brian:	N	Recaptured			brown	24871	Female	74	Bottom	snout, caudal
22-Sep-05	Brian:	N	Applied	brown	23933		0	Female	73	Bottom	
22-Sep-05	Brian:	N	Applied	brown	23934		0	Male	76		
22-Sep-05	Brian:	N	Applied	brown	23935		0	Female	72.5		
22-Sep-05	Brian:	N	Applied	brown	23936			Male	75		
22-Sep-05	Brian:	N	Applied	brown	23937		0	Female	69		
22-Sep-05	Brian:	N	Applied	brown	23941		0	Female	68		
22-Sep-05	Brian:	N	Applied	brown	23942		0	Female	66		
22-Sep-05	Brian:	N	Applied	brown	23943		0	Female	62.5		
22-Sep-05	Brian:	N	Applied	brown	23944		0	Male	75		
22-Sep-05	Brian:	N	Applied	brown	23945		0	Female	63		stomache cyst left
22-Sep-05	Brian:	N	Applied	brown	23946		0	Female	67.5		
22-Sep-05	Brian:	N	Applied	brown	23947		0	Female	70.5		
22-Sep-05	Brian:	N	Applied	brown	23948		0	Female	67		dorsal fungus
22-Sep-05	Brian:	N	Applied	brown	23949		0	Female	51.5		electro burn
22-Sep-05	kevin	N	Recaptured			brown	22623	Female	75.5	Bottom	
23-Sep-05	Brian:	N	Applied	brown	23828		0	Female	67		
23-Sep-05	Brian:	N	Applied	brown	23829		0	Female	58.5		
23-Sep-05	Brian:	N	Applied	brown	23830		0	Female	75		dorsal
23-Sep-05	Brian:	N	Applied	brown	23831		0	Male	71		
23-Sep-05	Brian:	N	Recaptured			Grey	31656	Female	79	Bottom	net

**Appendix 2. Steelhead data obtained by dipnetting.**

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
25-Jul-05	george	N	Applied	green	38501			0 Female	63		net marks
26-Jul-05	george	N	Applied	green	38502			0 Female	75		torn fins claw marks, left side
27-Jul-05	george	N	Applied	Blue	3054			0 Male	63		net marks
27-Jul-05	Penny	N	Applied	Grey	38503			0 Male	21.5		
27-Jul-05	Penny	N	Applied	green	38526			0 Male	58		net marks
27-Jul-05	george	N	Applied	green	38527			0 Female	59		net marks torn tail
27-Jul-05	george	N	Applied	green	38528			0 Female	52		net marks, claw marks both sides
27-Jul-05	george	N	Applied	green	38529			0 Female	56		net marks
27-Jul-05	george	N	Applied	green	38530			0 Female	74		net marks
28-Jul-05	Penny	N	Applied	Lime	38505			0 Female	67.5		
28-Jul-05	george	N	Applied	Lime	38531			0 Female	63		net marks
28-Jul-05	george	N	Applied	Lime	38532			0 Female	74		
28-Jul-05	george	Y	None					0 Female	67		
29-Jul-05	Penny	N	Applied	Lime	38533			0 Female	52		dorsal, net marks
29-Jul-05	george	N	Applied	Lime	38534			0 Female	56		net marks
29-Jul-05	george	N	Applied	Lime	38535			0 Male	72		net marks, scales
29-Jul-05	george	N	Applied	Lime	38536			0 Female	58		netmarks
29-Jul-05	george	N	Applied	Lime	38537			0 Female	62		net marks, torn tail
29-Jul-05	Penny	Y	None					0 Female	79		
01-Aug-05	george	N	Applied	brown	38505			0 Female	71		netmarks
01-Aug-05	george	N	Applied	yellow	38506			0 Female	53		
01-Aug-05	george	Y	None					0 Female	66		bleeding gills
02-Aug-05	george	N	Applied	Lime	38508			0 Female	74		
02-Aug-05	george	N	Applied	Lime	38509			0 Female	76		
02-Aug-05	george	N	Applied	Lime	38551			0 Female	73.5		
02-Aug-05	george	N	Applied	Lime	38552			0 Female	64		
02-Aug-05	george	N	Applied	Lime	38553			0 Female	63		
02-Aug-05	george	Y	None					0 Female	78		
03-Aug-05	Penny	N	Applied	Grey	38554			0 Female	80.5		
03-Aug-05	george	N	Applied	green	38556			0 Female	77		fa
03-Aug-05	george	N	Applied	green	38557			0 Female	70		
03-Aug-05	george	N	Applied	green	38558			0 Female	72		net marks, eel scars
03-Aug-05	george	N	Applied	green	38559			0 Female	68		rm
03-Aug-05	Penny	N	None					0 Female	52		net marks



Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
03-Aug-05	george	Y	None					0 Female	78		
03-Aug-05	george	N	Recaptured			Grey	31228	Female	66		
04-Aug-05	Penny	N	Applied	green	38561			0 Female	48		
04-Aug-05	Penny	N	Applied	green	38562			0 Female	49		dorsal
04-Aug-05	Penny	N	Applied	green	38563			0 Female	69		net
05-Aug-05	Penny	N	Applied	green	38564			0 Male	55		
05-Aug-05	Penny	N	Applied	green	38576			0 Female	74		tail/dorsal
05-Aug-05	Penny	N	Applied	green	38577			0 Female	70		
05-Aug-05	george	N	Applied	green	38578			0 Female	51		
08-Aug-05	Penny	N	Applied	Lime	38539			0 Female	68		dorsal/scar left
08-Aug-05	Penny	N	Applied	Lime	38540			0 Female	59.5		
08-Aug-05	Penny	N	Applied	green	38541			0 Female	60		
08-Aug-05	Penny	N	Applied	Lime	38542			0 Female	55		
08-Aug-05	Penny	N	Applied	Lime	38543			0 Female	59		
08-Aug-05	Penny	N	Applied	Lime	38544			0 Female	57		
08-Aug-05	Penny	N	Applied	Lime	38545			0 Female	51		
08-Aug-05	george	N	Applied	Lime	38579			0 Female	88		
08-Aug-05	george	N	Applied	Lime	38580			0 Female	55		net marks/ torn tail
08-Aug-05	george	N	Applied	Lime	38581			0 Female	56		
08-Aug-05	george	N	Applied	Lime	38582			0 Female	52.5		damaged gill/ net marks
08-Aug-05	george	N	Applied	Lime	38583			0 Female	74		net marks
08-Aug-05	george	N	Applied	Lime	38584			0 Female	61		
08-Aug-05	george	N	Applied	Lime	38585			0 Female	51		
08-Aug-05	george	N	Applied	Lime	38586			0 Female	69		
08-Aug-05	george	N	Applied	Lime	38587			0 Female	67.5		
08-Aug-05	george	N	Applied	Lime	38588			0 Female	70		
08-Aug-05	george	N	Applied	Lime	38589			0 Female	53		
08-Aug-05	george	N	Applied	Lime	38590			0 Female	52		net marks
08-Aug-05	Penny	N	Applied	Lime	38591			0 Female	52		
08-Aug-05	Penny	N	Applied	Lime	38592			0 Female	55		net
08-Aug-05	Penny	N	Applied	Lime	38593			0 Female	88		
08-Aug-05	Penny	N	Applied	Lime	38594			0 Female	54.5		
08-Aug-05	Penny	N	Applied	Lime	38595			0 Female	75.5		
08-Aug-05	Penny	N	Applied	Lime	38596			0 Female	69		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
08-Aug-05	Penny	N	Applied	Lime	38597			0 Female	58		
08-Aug-05	Penny	N	Applied	Lime	38598			0 Male	63		
08-Aug-05	Penny	N	Applied	Lime	38599			0 Female	65		
08-Aug-05	Penny	N	Applied	Lime	38600			0 Female	75		dorsal
08-Aug-05	Penny	N	Applied	Grey	40397			0 Male	87		
08-Aug-05	Penny	N	Applied	Grey	40398			0 Female	68.5		
08-Aug-05	Penny	N	None					0 Female	51		
08-Aug-05	Penny	N	None					0 Female	49		
08-Aug-05	Penny	N	Recaptured			Grey	32313	Female	89		
09-Aug-05	george	N	Applied	Lime	38546			0 Female	51		
09-Aug-05	george	N	Applied	Lime	38547			0 Female	49		scale loss
09-Aug-05	george	N	Applied	Lime	38548			0 Female	55		damaged gill
09-Aug-05	george	N	Applied	Lime	38549			0 Female	46.5		net marks
09-Aug-05	george	N	Applied	Lime	38550			0 Female	58.5		
09-Aug-05	george	N	Applied	Lime	38601			0 Female	54		
09-Aug-05	george	N	Applied	Lime	38602			0 Female	49		
09-Aug-05	george	N	Applied	Lime	38603			0 Female	68.5		net marks
09-Aug-05	george	N	Applied	Lime	38604			0 Female	51		damaged gill/sclae loss/net marks
09-Aug-05	george	N	Applied	Lime	38605			0 Female	50		
09-Aug-05	george	N	Applied	Lime	38606			0 Female	56		
09-Aug-05	george	N	Applied	Lime	38607			0 Female	51		
09-Aug-05	george	N	Applied	Lime	38608			0 Female	69		net marks
09-Aug-05	george	N	Applied	Lime	38609			0 Female	65		
09-Aug-05	Penny	N	Applied	Lime	38610			0 Female	75		damaged head/tail/dorsal
09-Aug-05	Penny	N	Applied	Lime	38611			0 Female	53		
09-Aug-05	Penny	N	Applied	Lime	38612			0 Female	56		
09-Aug-05	Penny	N	Applied	Lime	38613			0 Female	56		
09-Aug-05	Penny	N	Applied	Lime	38614			0 Female	58		
09-Aug-05	Penny	N	Applied	Lime	38615			0 Male	49		
09-Aug-05	Penny	N	Applied	Lime	38616			0 Female	69		
09-Aug-05	Penny	N	Applied	Lime	38617			0 Female	69		
09-Aug-05	Penny	N	Applied	Lime	38618			0 Male	74		left gaff scar/dorsal/nose
09-Aug-05	Penny	N	Applied	White	40326			0 Male	63		
09-Aug-05	Penny	N	Applied	White	40327			0 Female	65		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
09-Aug-05	Penny	N	Applied	White	40328			0 Female	62		
09-Aug-05	Penny	N	Applied	White	40329			0 Female	61.5		
09-Aug-05	Penny	N	Applied	White	40330			0 Female	64	dorsal	
09-Aug-05	Penny	N	Applied	White	40331			0 Female	64		
09-Aug-05	Penny	N	Applied	White	40332			0 Female	53		
09-Aug-05	Penny	N	Applied	Grey	40333			0 Female	85	nose	
09-Aug-05	Penny	N	Applied	White	40334			0 Male	69		
09-Aug-05	Penny	N	Applied	White	40335			0 Female	67.5		
09-Aug-05	Penny	N	Applied	Grey	40336			0 Male	61	scar rt	
09-Aug-05	Penny	N	Applied	White	40337			0 Female	68.5		
09-Aug-05	Penny	N	Applied	White	40338			0 Female	72		
09-Aug-05	george	Y	None					0 Female	73		gills ripped in net
09-Aug-05	george	N	None					0 Female	46		jumped out before tagged
09-Aug-05	george	N	None					0 Female	66		fish jumped out before it could be
10-Aug-05	Penny	N	Applied	green	38619			0 Female	55		
10-Aug-05	Penny	N	Applied	green	38620			0 Female	54		
10-Aug-05	Penny	N	Applied	green	38622			0 Female	69		
10-Aug-05	Penny	N	Applied	green	38624			0 Female	51		
10-Aug-05	Penny	N	Applied	green	38626			0 Female	51	net mrks	
10-Aug-05	Penny	N	Applied	green	38627			0 Female	55		
10-Aug-05	Penny	N	Applied	green	38628			0 Female	58		
10-Aug-05	Penny	N	Applied	green	38629			0 Female	64		
10-Aug-05	Penny	N	Applied	Green	38630			0 Female	51.5		
10-Aug-05	Penny	N	Applied	Green	38631			0 Female	48		
10-Aug-05	Penny	N	Applied	Green	38632			0 Female	84		
10-Aug-05	Penny	N	Applied	Green	38633			0 Female	50		
10-Aug-05	Penny	N	Applied	Green	38634			0 Female	57		
10-Aug-05	Penny	N	Applied	Green	38635			0 Female	50		
10-Aug-05	Penny	N	Applied	Green	38636			0 Female	51		
10-Aug-05	Penny	N	Applied	Green	38637			0 Female	68		
10-Aug-05	Penny	N	Applied	Green	38638			0 Female	51		
10-Aug-05	Penny	N	Applied	Green	38639			0 Female	77	tail/dorsal	
10-Aug-05	Penny	N	Applied	Green	38640			0 Male	50		
10-Aug-05	Penny	N	Applied	Green	38641			0 Female	60		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
10-Aug-05	Penny	N	Applied	Green	38642			0 Female	58		
10-Aug-05	Penny	N	Applied	Green	38643			0 Female	65		
10-Aug-05	Penny	N	Applied	Green	38644			0 Female	54		dorsal/net mrks
10-Aug-05	Penny	N	Applied	Green	38645			0 Male	49		
10-Aug-05	Penny	N	Applied	Green	38646			0 Female	65		
10-Aug-05	Penny	N	None					0 Female	54		
10-Aug-05	Penny	N	Recaptured			Grey	31964	Female	63	Bottom	
10-Aug-05	Penny	N	Recaptured			Grey	33633	Female	57	Bottom	
11-Aug-05	george	N	Applied	green	38560			0 Female	51		tail
11-Aug-05	george	N	Applied	green	38565			0 Female	62		
11-Aug-05	george	N	Applied	green	38566			0 Female	51		double tagged 38567
11-Aug-05	george	N	Applied	green	38568			0 Female	62		
11-Aug-05	george	N	Applied	green	38569			0 Female	52.5		
11-Aug-05	george	N	Applied	green	38570			0 Female	79		
11-Aug-05	george	N	Applied	green	38571			0 Female	52		
11-Aug-05	george	N	Applied	green	38573			0 Female	56		net mrks
11-Aug-05	george	N	Applied	green	38574			0 Female	54		
11-Aug-05	george	N	Applied	green	38575			0 Female	55		
11-Aug-05	george	N	Applied	green	38647			0 Female	49		
11-Aug-05	george	N	Applied	green	38651			0 Female	55.5		
11-Aug-05	george	N	Applied	green	38653			0 Female	66		
11-Aug-05	george	N	Applied	green	38654			0 Female	56.5		
11-Aug-05	george	N	Applied	green	38655			0 Female	76		
11-Aug-05	Penny	N	Applied	green	38656			0 Female	70		2 gaff scars right
11-Aug-05	Penny	N	Applied	green	38657			0 Female	51		tail
11-Aug-05	Penny	N	Applied	green	38658			0 Male	51		scar left
11-Aug-05	Penny	N	Applied	green	38659			0 Female	48		
11-Aug-05	Penny	N	Applied	green	38660			0 Female	53		
11-Aug-05	Penny	N	Applied	green	38661			0 Female	67		
11-Aug-05	Penny	N	Applied	green	38662			0 Female	62		dorsal
11-Aug-05	Penny	N	Applied	green	38663			0 Female	50		
11-Aug-05	Penny	N	Applied	green	38664			0 Female	71		
11-Aug-05	Penny	N	Applied	green	38665			0 Female	74		
11-Aug-05	Penny	N	Applied	green	38666			0 Female	46		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
11-Aug-05	george	N	Recaptured			Grey	33288	Female	57	Bottom	tagged 2004/08/10 brian's crew
11-Aug-05	george	N	Recaptured			Grey	33608	Female	78	Bottom	
11-Aug-05	george	Y	Recaptured			green	38582	Female	52	Top	found dead in pool
11-Aug-05	Penny	N	Recaptured			Lime Green	38587	Female	65	Top	scar belly
12-Aug-05	Penny	N	Applied	Blue	3475			0 Female	52		originally id as coho, changed to ST
12-Aug-05	george	N	Applied	green	38667			0 Female	66.5		
12-Aug-05	george	N	Applied	green	38668			0 Female	52		
12-Aug-05	george	N	Applied	green	38669			0 Female	55		
12-Aug-05	george	N	Applied	green	38670			0 Female	83.5		
12-Aug-05	george	N	Applied	green	38671			0 Female	67		
12-Aug-05	george	N	Applied	green	38672			0 Female	51		
12-Aug-05	george	N	Applied	Green	38673			0 Female	52		
12-Aug-05	george	N	Applied	green	38674			0 Female	55.5		
12-Aug-05	george	N	Applied	green	38675			0 Female	75		
12-Aug-05	george	N	Applied	green	38676			0 Female	53		net mrks
12-Aug-05	george	N	Applied	green	38677			0 Female	52		double tagged 38682 green
12-Aug-05	george	N	Applied	green	38678			0 Female	55.5		
12-Aug-05	george	N	Applied	green	38679			0 Female	50		
12-Aug-05	george	N	Applied	green	38680			0 Female	73		
12-Aug-05	george	N	Applied	green	38681			0 Female	51		
12-Aug-05	george	N	Applied	green	38684			0 Female	71		
12-Aug-05	george	N	Applied	green	38685			0 Female	75		net mrks
12-Aug-05	george	N	Applied	green	38686			0 Female	59		
12-Aug-05	george	N	Applied	green	38687			0 Female	71		tail/bleeding gill
12-Aug-05	george	N	Applied	green	38688			0 Female	66		
12-Aug-05	george	N	Applied	green	38689			0 Male	48		net mrks, tail
12-Aug-05	george	N	Applied	green	38690			0 Male	71		
12-Aug-05	george	N	Applied	green	38691			0 Male	57		gills bleeding
12-Aug-05	george	N	Applied	green	38692			0 Female	53.5		
12-Aug-05	george	N	Applied	green	38693			0 Female	64		
12-Aug-05	Penny	N	Applied	Grey	38694			0 Female	61		dorsal/tail/net mrks
12-Aug-05	Penny	N	Applied	Grey	38695			0 Female	50		
12-Aug-05	Penny	N	Applied	Grey	38696			0 Female	76		
12-Aug-05	Penny	N	Applied	Grey	38697			0 Female	53		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
12-Aug-05	Penny	N	Applied	Grey	38698			0 Female	52		dorsal/net head
12-Aug-05	Penny	N	Applied	Grey	38699			0 Female	49		
12-Aug-05	Penny	N	Applied	Grey	38700			0 Female	58.5		dorsal
12-Aug-05	Penny	N	Applied	Grey	38701			0 Male	73.5		
12-Aug-05	Penny	N	Applied	Grey	38702			0 Female	82.5		
12-Aug-05	Penny	N	Applied	Grey	38703			0 Female	51.5		
12-Aug-05	Penny	N	Applied	Grey	38704			0 Female	84		
12-Aug-05	Penny	N	Applied	Grey	38705			0 Female	51		
12-Aug-05	Penny	N	Applied	Grey	38706			0 Female	54.5		
12-Aug-05	Penny	N	Applied	Grey	38707			0 Male	70		
12-Aug-05	Penny	N	Applied	Grey	38708			0 Male	55.5		
12-Aug-05	Penny	N	Applied	Grey	38709			0 Female	63		
12-Aug-05	george	N	Recaptured			green	38526	Female	57	Top	net mrks
15-Aug-05	Penny	N	Applied	Green	38582			0 Female	67		
15-Aug-05	Penny	N	Applied	Green	38648			0 Female	51		leftb plate
15-Aug-05	Penny	N	Applied	green	38649			0 Female	77		
15-Aug-05	Penny	N	Applied	Green	38652			0 Female	66		
15-Aug-05	Penny	N	Applied	Green	38653			0 Female	61		
15-Aug-05	george	N	Applied	green	38710			0 Female	67		dry scales, net mrks
15-Aug-05	george	N	Applied	green	38711			0 Female	52		scales
15-Aug-05	george	N	Applied	green	38712			0 Female	74		
15-Aug-05	george	N	Applied	green	38713			0 Female	54		net mrks
15-Aug-05	george	N	Applied	green	38714			0 Female	53		
15-Aug-05	george	N	Applied	green	38715			0 Female	65		
15-Aug-05	george	N	Applied	green	38716			0 Female	56.5		
15-Aug-05	george	N	Applied	green	38717			0 Female	72		net
15-Aug-05	george	N	Applied	green	38718			0 Female	76		
15-Aug-05	george	N	Applied	green	38719			0 Female	54		net
15-Aug-05	george	N	Applied	green	38720			0 Female	72		net
15-Aug-05	george	N	Applied	green	38721			0 Female	61		dorsal
15-Aug-05	george	N	Applied	green	38722			0 Female	54		
15-Aug-05	george	N	Applied	green	38723			0 Female	56		scales, net mrks
15-Aug-05	george	N	Applied	green	38724			0 Female	69		
15-Aug-05	george	N	Applied	green	38725			0 Female	55.5		net mrks

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
15-Aug-05	george	N	Applied	green	38726			0 Female	53		net mrks
15-Aug-05	george	N	Applied	green	38728			0 Female	89		
15-Aug-05	george	N	Applied	green	38729			0 Female	58		
15-Aug-05	george	N	Applied	green	38730			0 Female	52		
15-Aug-05	george	N	Applied	green	38731			0 Female	63		
15-Aug-05	george	N	Applied	green	38732			0 Female	71.5		
15-Aug-05	george	N	Applied	green	38733			0 Female	62.5		
15-Aug-05	george	N	Applied	green	38734			0 Female	57.5		
15-Aug-05	george	N	Applied	green	38735			0 Female	70		
15-Aug-05	george	N	Applied	green	38736			0 Female	58		
15-Aug-05	george	N	Applied	green	38737			0 Female	50		
15-Aug-05	george	N	Applied	Green	38738			0 Female	53		
15-Aug-05	george	N	Applied	green	38739			0 Female	73		
15-Aug-05	george	N	Applied	green	38740			0 Female	53		
15-Aug-05	george	N	Applied	green	38741			0 Female	75.5		
15-Aug-05	george	N	Applied	green	38742			0 Female	55		
15-Aug-05	george	N	Applied	green	38743			0 Female	49.5		
15-Aug-05	george	N	Applied	green	38744			0 Female	55		
15-Aug-05	george	N	Applied	green	38745			0 Female	77		torn fins
15-Aug-05	george	N	Applied	green	38746			0 Female	53.5		
15-Aug-05	george	N	Applied	green	38747			0 Female	49		
15-Aug-05	Penny	N	Applied	green	38748			0 Female	52		
15-Aug-05	Penny	N	Applied	green	38749			0 Male	52		
15-Aug-05	Penny	N	Applied	green	38750			0 Female	58		tail
15-Aug-05	Penny	N	Applied	green	38801			0 Female	53		net mrks
15-Aug-05	Penny	N	Applied	green	38802			0 Female	65		
15-Aug-05	Penny	N	Applied	green	38803			0 Female	51		
15-Aug-05	Penny	N	Applied	green	38804			0 Female	58		
15-Aug-05	Penny	N	Applied	green	38805			0 Female	58		
15-Aug-05	Penny	N	Applied	green	38806			0 Female	57		
15-Aug-05	Penny	N	Applied	green	38807			0 Female	71		
15-Aug-05	Penny	N	Applied	green	38808			0 Female	67		
15-Aug-05	Penny	N	Applied	green	38809			0 Male	70		
15-Aug-05	Penny	N	Applied	green	38810			0 Female	70		tail

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
15-Aug-05	Penny	N	Applied	green	38811			0 Female	53		
15-Aug-05	Penny	N	Applied	green	38812			0 Male	73		
15-Aug-05	Penny	N	Applied	green	38813			0 Female	54		
15-Aug-05	Penny	N	Applied	green	38814			0 Female	64		
15-Aug-05	Penny	N	Applied	green	38815			0 Female	66		
15-Aug-05	Penny	N	Applied	green	38816			0 Female	67		
15-Aug-05	Penny	N	Applied	green	38817			0 Male	71		scar left
15-Aug-05	Penny	N	Applied	green	38818			0 Female	71		scar both sides, undt left plate
15-Aug-05	Penny	N	Applied	Green	38819			0 Female	63		
15-Aug-05	Penny	N	Applied	Green	38820			0 Female	70		
15-Aug-05	Penny	N	Applied	Green	38821			0 Female	69		
15-Aug-05	Penny	N	Applied	Green	38822			0 Female	50		
15-Aug-05	Penny	N	Applied	Green	38823			0 Male	55		scar left
15-Aug-05	Penny	N	Applied	Green	38824			0 Female	52		
15-Aug-05	Penny	N	Applied	Green	38825			0 Female	64		left side head
15-Aug-05	Penny	N	Applied	Green	38826			0 Female	52		double tagged 38827
15-Aug-05	Penny	N	Applied	Green	38828			0 Male	53		
15-Aug-05	Penny	N	Applied	Green	38829			0 Male	54		
15-Aug-05	george	N	Recaptured			Grey	31432	Female	74	Bottom	tagged 2004/09/02 wilfred's team
15-Aug-05	george	N	Recaptured			Grey	32467	Female	72.5		net
15-Aug-05	Penny	N	Recaptured			Grey	32486	Female	71		should be bottom punch
15-Aug-05	george	N	Recaptured			Grey	33622	Female	71	Bottom	net mrks
15-Aug-05	Penny	N	Recaptured			Grey	33657	Female	55	Bottom	
15-Aug-05	Penny	N	Recaptured			Grey	33663	Male	55	Bottom	no tail punch KEVINNNNNN LOL
15-Aug-05	george	N	Recaptured			Grey	33733	Female	63.5	Bottom	
15-Aug-05	Penny	N	Recaptured			Grey	33822	Female	66	Bottom	
15-Aug-05	Penny	N	Recaptured			green	38569	Female	52		no punch?
16-Aug-05	george	N	Applied	Lime	38830			0 Female	68		net marks/broken left gill
16-Aug-05	george	N	Applied	Lime	38831			0 Male	77		
16-Aug-05	george	N	Applied	Lime	38832			0 Female	63		
16-Aug-05	george	N	Applied	Lime	38833			0 Female	55.5		net marks
16-Aug-05	george	N	Applied	Lime	38835			0 Female	93		
16-Aug-05	george	N	Applied	Lime	38836			0 Female	62		net marks
16-Aug-05	george	N	Applied	Lime	38837			0 Female	52		



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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
16-Aug-05	george	N	Applied	Lime	38838			0 Female	73.5		
16-Aug-05	george	N	Applied	Lime	38839			0 Female	48		
16-Aug-05	george	N	Applied	Lime	38840			0 Female	74		
16-Aug-05	george	N	Applied	Lime	38841			0 Female	86.5		
16-Aug-05	george	N	Applied	Lime	38842			0 Female	71		net marks
16-Aug-05	george	N	Applied	Lime	38843			0 Female	52.5		net marks
16-Aug-05	george	N	Applied	Lime	38844			0 Female	50		broken gill left side
16-Aug-05	george	N	Applied	Lime	38845			0 Female	80		ripped tail
16-Aug-05	george	N	Applied	Lime	38846			0 Female	80		ripped tail
16-Aug-05	george	N	Applied	Lime	38847			0 Female	77.5		net marks
16-Aug-05	george	N	Applied	Lime	38848			0 Male	56		
16-Aug-05	george	N	Applied	Lime	38849			0 Female	50		
16-Aug-05	george	N	Applied	Lime	38850			0 Male	68		
16-Aug-05	george	N	Applied	Lime	38851			0 Female	53		net marks
16-Aug-05	george	N	Applied	Lime	38852			0 Female	71		
16-Aug-05	george	N	Applied	Lime	38853			0 Female	78		
16-Aug-05	george	N	Applied	Lime	38854			0 Female	67.5		net marks
16-Aug-05	george	N	Applied	Lime	38855			0 Female	73		net marks
16-Aug-05	george	N	Applied	Lime	38856			0 Female	71		
16-Aug-05	george	N	Applied	Lime	38857			0 Female	58.5		net marks
16-Aug-05	george	N	Applied	Lime	38858			0 Female	58		torn tail/scale loss
16-Aug-05	george	N	Applied	Lime	38860			0 Female	76		
16-Aug-05	george	N	Applied	Lime	38861			0 Female	64		net marks
16-Aug-05	george	N	Applied	Lime	38862			0 Female	65		
16-Aug-05	george	N	Applied	Lime	38863			0 Female	67		
16-Aug-05	george	N	Applied	Lime	38864			0 Female	57		
16-Aug-05	george	N	Applied	Lime	38865			0 Female	70		net marks
16-Aug-05	george	N	Applied	Lime	38866			0 Male	73		net marks
16-Aug-05	Penny	N	Applied	Lime	38867			0 Male	54		
16-Aug-05	george	N	Applied	Lime	38868			0 Male	64		
16-Aug-05	Penny	N	Applied	Lime	38869			0 Female	55		
16-Aug-05	Penny	N	Applied	Lime	38870			0 Male	53		
16-Aug-05	Penny	N	Applied	Lime	38871			0 Female	51		
16-Aug-05	Penny	N	Applied	Lime	38872			0 Female	77		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
16-Aug-05	Penny	N	Applied	Lime	38873			0 Male	71		
16-Aug-05	Penny	N	Applied	Lime	38874			0 Male	56		
16-Aug-05	Penny	N	Applied	Lime	38875			0 Female	52		net marks
16-Aug-05	Penny	N	Applied	Lime	38876			0 Female	76		
16-Aug-05	Penny	N	Applied	Lime	38877			0 Female	80		
16-Aug-05	Penny	N	Applied	Lime	38878			0 Male	57		
16-Aug-05	Penny	N	Applied	Lime	38879			0 Male	51		
16-Aug-05	Penny	N	Applied	Lime	38880			0 Female	63		
16-Aug-05	Penny	N	Applied	Lime	38881			0 Male	48		
16-Aug-05	Penny	N	Applied	Lime	38882			0 Female	54		
16-Aug-05	Penny	N	Applied	Lime	38883			0 Female	70		
16-Aug-05	Penny	N	Applied	Lime	38884			0 Female	76		
16-Aug-05	Penny	N	Applied	Lime	38885			0 Female	64		gill plate torn
16-Aug-05	Penny	N	Applied	Lime	38886			0 Female	60		
16-Aug-05	Penny	N	Applied	Lime	38887			0 Male	56		
16-Aug-05	Penny	N	Applied	Lime	38888			0 Female	53		
16-Aug-05	Penny	N	Applied	Lime	38889			0 Female	76		tail
16-Aug-05	Penny	N	Applied	Lime	38890			0 Female	53		
16-Aug-05	Penny	N	Applied	Lime	38891			0 Female	53.5		
16-Aug-05	Penny	N	Applied	Lime	38892			0 Female	67		
16-Aug-05	Penny	N	Applied	Lime	38893			0 Male	57		
16-Aug-05	Penny	N	Applied	Lime	38894			0 Female	69		
16-Aug-05	george	N	Recaptured			Lime Green	20315	Female	65.5		damaged nose
16-Aug-05	Penny	N	Recaptured			Lime Green	29703	Male	62		
16-Aug-05	Penny	N	Recaptured			Grey	31525	Female	66		
16-Aug-05	george	N	Recaptured			Lime Green	38844	Female	50		'damaged left gill
17-Aug-05	george	N	Applied	lime	3789			0 Female	80		
17-Aug-05	george	N	Applied	Lime	34013			0 Male	62		single load tag
17-Aug-05	george	N	Applied	Lime	37760			0 Female	56		
17-Aug-05	george	N	Applied	Lime	38751			0 Male	74		
17-Aug-05	george	N	Applied	Lime	38752			0 Female	75		broken right gill
17-Aug-05	george	N	Applied	Lime	38753			0 Female	84		net marks
17-Aug-05	george	N	Applied	Lime	38754			0 Male	52		
17-Aug-05	george	N	Applied	Lime	38755			0 Male	76.5		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
17-Aug-05	george	N	Applied	Lime	38756			0 Female	63		
17-Aug-05	george	N	Applied	Lime	38757			0 Male	58		net marks
17-Aug-05	george	N	Applied	Lime	38758			0 Female	48		
17-Aug-05	george	N	Applied	Lime	38759			0 Male	64		
17-Aug-05	george	N	Applied	Lime	38761			0 Female	55		
17-Aug-05	george	N	Applied	Lime	38762			0 Male	63		
17-Aug-05	george	N	Applied	Lime	38763			0 Female	72		broken left gill
17-Aug-05	george	N	Applied	Lime	38764			0 Male	76		net marks
17-Aug-05	george	N	Applied	Lime	38765			0 Male	76.5		
17-Aug-05	george	N	Applied	Lime	38766			0 Female	67		
17-Aug-05	george	N	Applied	Lime	38767			0 Female	68		
17-Aug-05	george	N	Applied	Lime	38768			0 Male	78		
17-Aug-05	george	N	Applied	Lime	38769			0 Male	68		
17-Aug-05	george	N	Applied	Lime	38770			0 Male	51		net marks
17-Aug-05	george	N	Applied	Lime	38771			0 Male	73		
17-Aug-05	george	N	Applied	Lime	38772			0 Female	66		right side scarred tail
17-Aug-05	george	N	Applied	Lime	38773			0 Male	54		
17-Aug-05	george	N	Applied	Lime	38774			0 Female	73		gaff mark on tail
17-Aug-05	george	N	Applied	Lime	38775			0 Male	72.5		
17-Aug-05	george	N	Applied	lime	38776			0 Female	57		
17-Aug-05	george	N	Applied	lime	38777			0 Female	50.5		
17-Aug-05	george	N	Applied	lime	38778			0 Female	68.5		
17-Aug-05	george	N	Applied	lime	38779			0 Female	62		net marks
17-Aug-05	george	N	Applied	lime	38780			0 Female	65		
17-Aug-05	george	N	Applied	lime	38781			0 Female	76		
17-Aug-05	george	N	Applied	lime	38782			0 Male	71		net marks
17-Aug-05	george	N	Applied	lime	38783			0 Female	67		
17-Aug-05	george	N	Applied	lime	38784			0 Female	71		
17-Aug-05	george	N	Applied	lime	38785			0 Female	69		net marks
17-Aug-05	george	N	Applied	lime	38786			0 Female	71.5		
17-Aug-05	george	N	Applied	lime	38787			0 Male	51		
17-Aug-05	george	N	Applied	lime	38788			0 Female	52		
17-Aug-05	george	N	Applied	lime	38790			0 Female	56		
17-Aug-05	george	N	Applied	lime	38791			0 Male	53		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
17-Aug-05	george	N	Applied	lime	38792			0 Female	72		
17-Aug-05	george	N	Applied	lime	38793			0 Female	53.5		
17-Aug-05	george	N	Applied	lime	38794			0 Female	75		
17-Aug-05	george	N	Applied	Lime	38795			0 Female	54		net marks
17-Aug-05	george	N	Applied	lime	38796			0 Female	55.5		
17-Aug-05	george	N	Applied	Lime	38797			0 Female	58		net marks
17-Aug-05	george	N	Applied	Lime	38798			0 Female	48		
17-Aug-05	george	N	Applied	Lime	38799			0 Female	66		
17-Aug-05	george	N	Applied	Lime	38800			0 Male	68		
17-Aug-05	george	N	Applied	lime	38895			0 Male	51		net marks/open wound on head
17-Aug-05	george	N	Applied	lime	38896			0 Male	70.5		
17-Aug-05	george	N	Applied	lime	38897			0 Female	52		
17-Aug-05	george	N	Applied	lime	38898			0 Male	70		net marks
17-Aug-05	george	N	Applied	lime	38899			0 Female	68		
17-Aug-05	george	N	Applied	Lime	38900			0 Male	61.5		
17-Aug-05	george	N	Applied	lime	38900			0 Female	64		net marks
17-Aug-05	george	N	Applied	Lime	38900			0 Female	78		right gill plate
17-Aug-05	george	N	Applied	Lime	38901			0 Female	64.5		
17-Aug-05	george	N	Applied	Lime	38902			0 Male	52.5		
17-Aug-05	george	N	Applied	Lime	38903			0 Female	66		
17-Aug-05	george	N	Applied	Lime	38904			0 Male	72.5		
17-Aug-05	george	N	Applied	Lime	38905			0 Female	50.5		head damage
17-Aug-05	george	N	Applied	Lime	38906			0 Male	59.5		left gill plate damage
17-Aug-05	george	N	Applied	Lime	38907			0 Female	50		
17-Aug-05	george	N	Applied	Lime	38908			0 Male	71		
17-Aug-05	george	N	Applied	Lime	38910			0 Male	62		scar bottom
17-Aug-05	george	N	Applied	Lime	38911			0 Female	60		
17-Aug-05	george	N	Applied	Lime	38912			0 Male	63.5		
17-Aug-05	george	N	Applied	Lime	38913			0 Female	67		
17-Aug-05	george	N	Applied	Lime	38914			0 Female	81		
17-Aug-05	george	N	Applied	Lime	38915			0 Female	66		scar right, left & bottom
17-Aug-05	george	N	Applied	Lime	38916			0 Female	52.5		
17-Aug-05	george	N	Applied	Lime	38917			0 Female	68.5		
17-Aug-05	george	N	Applied	Lime	38918			0 Male	55		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
17-Aug-05	george	N	Applied	Lime	38919			0 Female	55.5		scar left
17-Aug-05	george	N	Applied	Lime	38920			0 Male	84		
17-Aug-05	george	N	Applied	Lime	38976			0 Female	56		net mark on head
17-Aug-05	george	N	Applied	Lime	38977			0 Male	69		net mark on head
17-Aug-05	george	N	Applied	Lime	38979			0 Male	54		net marks
17-Aug-05	george	N	Applied	Lime	38980			0 Male	54		
17-Aug-05	george	N	Applied	Lime	38981			0 Male	59		
17-Aug-05	george	N	Applied	Lime	38982			0 Female	52		
17-Aug-05	george	N	Applied	Lime	38983			0 Male	79		
17-Aug-05	george	N	Applied	Lime	38984			0 Female	68.5		
17-Aug-05	george	N	Applied	Lime	38985			0 Female	72		
17-Aug-05	george	N	Applied	Lime	38986			0 Female	52		
17-Aug-05	george	N	Applied	Lime	38987			0 Female	50		
17-Aug-05	george	N	Applied	Lime	38988			0 Female	66		
17-Aug-05	george	N	Applied	Lime	38989			0 Female	66.5		
17-Aug-05	george	N	Applied	Lime	38991			0 Female	55		
17-Aug-05	george	N	Applied	Lime	38992			0 Female	48.5		
17-Aug-05	george	N	Applied	Lime	38993			0 Female	57		
17-Aug-05	george	N	Applied	Lime	38994			0 Male	69		left mouth damage
17-Aug-05	george	N	Applied	Lime	38995			0 Female	51.5		
17-Aug-05	george	N	Applied	Lime	38996			0 Female	82		
17-Aug-05	george	N	Applied	Lime	38997			0 Male	53		
17-Aug-05	george	N	Applied	Lime	38998			0 Female	81.5		
17-Aug-05	george	N	Applied	Lime	38999			0 Male	58		
17-Aug-05	george	Y	None					0 Male	69		elders food fish
17-Aug-05	george	Y	None					0 Male	70		elders food fish
17-Aug-05	george	Y	None					0 Female	50.5		died
17-Aug-05	george	N	lost					0 Male	67		
17-Aug-05	george	N	Recaptured			Lime Green	29604	Male	69		
17-Aug-05	george	N	Recaptured			Lime Green	31849	Female	64		could be grey tag? (RS)
17-Aug-05	george	N	Recaptured			Grey	31964	Female	66		net marks
17-Aug-05	george	N	Recaptured			Lime Green	33201	Male	77		could be grey tag? (RS)
17-Aug-05	george	N	Recaptured			Grey	33656	Female	85		
18-Aug-05	george	N	Applied	light	38921			0 Male	58		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
18-Aug-05	george	N	Applied	light	38922			0 Male	74		netmrks
18-Aug-05	george	N	Applied	light	38923			0 Female	59		38924 double tagged
18-Aug-05	george	N	Applied	light	38925			0 Female	71		netmrks, scales
18-Aug-05	george	N	Applied	green	38951			0 Female	70		
18-Aug-05	george	N	Applied	light	38952			0 Female	67.5		
18-Aug-05	george	N	Applied	light	38953			0 Female	52		scales
18-Aug-05	george	N	Applied	light	38954			0 Male	91		
18-Aug-05	george	N	Applied	light	38955			0 Female	55		netmrks
18-Aug-05	george	N	Applied	Lime	38956			0 Female	62		
18-Aug-05	george	N	Applied	light	38957			0 Male	75		
18-Aug-05	george	N	Applied	light	38958			0 Female	69		
18-Aug-05	george	N	Applied	Lime	38960			0 Female	73		
18-Aug-05	george	N	Applied	light	38961			0 Female	53		netmrks, scar belly
18-Aug-05	george	N	Applied	light	38962			0 Female	66		netmrks
18-Aug-05	george	N	Applied	light	38963			0 Male	53		
18-Aug-05	george	N	Applied	light	38964			0 Male	55		
18-Aug-05	george	N	Applied	light	38965			0 Male	84		
18-Aug-05	george	N	Applied	light	38966			0 Male	69		netmrks
18-Aug-05	george	N	Applied	light	38967			0 Female	73.5		
18-Aug-05	george	N	Applied	light	38968			0 Male	54		
18-Aug-05	george	N	Applied	light	38969			0 Female	69		
18-Aug-05	george	N	Applied	light	38970			0 Female	67		
18-Aug-05	george	N	Applied	light	38971			0 Male	55		
18-Aug-05	george	N	Applied	light	38972			0 Male	54		
18-Aug-05	george	N	Applied	light	38973			0 Male	74		
18-Aug-05	george	N	Applied	light	38974			0 Male	75		
18-Aug-05	george	N	Applied	light	38975			0 Male	54		
18-Aug-05	george	N	Applied	Lime	38976			0 Female	55		
18-Aug-05	Penny	N	None					0 Female	59		
18-Aug-05	Penny	N	None					0 Female	56		
18-Aug-05	Penny	N	None					0 Female	55.5		
18-Aug-05	Penny	N	None					0 Female	52		
18-Aug-05	Penny	N	None					0 Female	66.5		
18-Aug-05	Penny	N	None					0 Female	75		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
18-Aug-05	Penny	N	None					0 Female	55		
18-Aug-05	Penny	N	None					0 Female	65		
18-Aug-05	Penny	N	None					0 Female	49		
18-Aug-05	george	N	None					0 Female	54		
18-Aug-05	george	N	None					0 Female	67		
18-Aug-05	george	N	None					0 Female	53		no more tags
18-Aug-05	george	N	None					0 Male	60		
18-Aug-05	Penny	N	None					0 Female	63		
18-Aug-05	Penny	N	None					0 Female	56		
18-Aug-05	Penny	N	None					0 Female	46		
18-Aug-05	Penny	N	None					0 Female	53.5		
18-Aug-05	george	N	None					0 Male	55		
18-Aug-05	Penny	N	None					0 Female	51		
18-Aug-05	Penny	N	None					0 Female	52		
18-Aug-05	Penny	N	None					0 Female	65		
18-Aug-05	Penny	N	None					0 Female	70		
18-Aug-05	george	N	None					0 Female	48		
18-Aug-05	Penny	N	None					0 Female	51.5		
18-Aug-05	Penny	N	None					0 Female	63		
18-Aug-05	Penny	N	None					0 Female	64		
18-Aug-05	Penny	N	None					0 Female	56		
18-Aug-05	Penny	N	None					0 Male	78		
18-Aug-05	Penny	N	None					0 Female	74		
18-Aug-05	Penny	N	None					0 Female	65		net mrks
18-Aug-05	Penny	N	None					0 Female	62		
18-Aug-05	Penny	N	None					0 Female	55		
18-Aug-05	Penny	N	None					0 Female	69		
18-Aug-05	Penny	N	None					0 Female	68		
18-Aug-05	Penny	N	None					0 Female	54		
18-Aug-05	Penny	N	None					0 Female	57		
18-Aug-05	Penny	Y	None					0 Male	49		
18-Aug-05	Penny	N	None					0 Female	66		
18-Aug-05	Penny	N	None					0 Female	72		
18-Aug-05	Penny	N	None					0 Female	67		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
18-Aug-05	george	N	Recaptured			Grey	31691	Male	63	Top	
18-Aug-05	george	N	Recaptured			Grey	33623	Female	66	Bottom	nose,scales
18-Aug-05	george	N	Recaptured			Grey	33693	Male	73	Bottom	
18-Aug-05	Penny	N	Recaptured			Grey	33739	Male	50.5	Bottom	
18-Aug-05	Penny	N	Recaptured			Grey	33801	Male	58	Bottom	
18-Aug-05	Penny	N	Recaptured			Grey	33807	Male	50	Bottom	
18-Aug-05	george	N	Recaptured			green	38562	Male	50	Top	
18-Aug-05	george	N	Recaptured			Lime Green	38920	Male	86	Top	nose, tail
18-Aug-05	george	N	Recaptured			light green	38958	Female	69	Top	
18-Aug-05	george	N	Recaptured			light green	38965	Male	83	Top	
19-Aug-05	george	N	Applied	Blue	4148			0 Female	50		wrong tag
19-Aug-05	george	N	Applied	brown	22100			0 Female	70		net
19-Aug-05	george	N	Applied	brown	22101			0 Female	51		left mouth hook
19-Aug-05	george	N	Applied	brown	22102			0 Female	57		chip nose
19-Aug-05	george	N	Applied	brown	22103			0 Male	75		
19-Aug-05	george	N	Applied	brown	22104			0 Female	74		
19-Aug-05	george	N	Applied	brown	22105			0 Female	56		
19-Aug-05	george	N	Applied	brown	22106			0 Female	53		
19-Aug-05	george	N	Applied	brown	22107			0 Male	53		
19-Aug-05	george	N	Applied	brown	22109			0 Male	78.5		
19-Aug-05	george	N	Applied	brown	22110			0 Male	68		
19-Aug-05	george	N	Applied	brown	22111			0 Female	52		net
19-Aug-05	george	N	Applied	brown	22112			0 Female	64		
19-Aug-05	george	N	Applied	brown	22113			0 Male	55.5		
19-Aug-05	george	N	Applied	brown	22114			0 Male	57.5		
19-Aug-05	george	N	Applied	brown	22115			0 Female	53		
19-Aug-05	george	N	Applied	brown	22116			0 Male	59		soft
19-Aug-05	george	N	Applied	brown	22117			0 Female	84		
19-Aug-05	george	N	Applied	brown	22118			0 Female	53		
19-Aug-05	george	N	Applied	brown	22119			0 Female	48		
19-Aug-05	george	N	Applied	brown	22120			0 Male	76		
19-Aug-05	george	N	Applied	brown	22121			0 Female	69		
19-Aug-05	george	N	Applied	brown	22122			0 Female	50		
19-Aug-05	george	N	Applied	brown	22123			0 Female	65.5		



**Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.**

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
19-Aug-05	george	N	Applied	brown	22124			0 Female	67.5		
19-Aug-05	george	N	Applied	brown	22200			0 Female	56		
19-Aug-05	george	N	Applied	brown	22201			0 Male	60		
19-Aug-05	george	N	Applied	brown	22202			0 Female	64	net	
19-Aug-05	george	N	Applied	brown	22203			0 Male	69.5		
19-Aug-05	george	N	Applied	brown	22204			0 Female	65	net	
19-Aug-05	george	N	Applied	brown	22205			0 Female	54		
19-Aug-05	george	N	Applied	brown	22206			0 Male	57		
19-Aug-05	george	N	Applied	brown	22207			0 Male	66	net	
19-Aug-05	george	N	Applied	brown	22208			0 Male	56	softy	
19-Aug-05	george	N	Applied	brown	22209			0 Female	62	net	
19-Aug-05	george	N	Applied	brown	22210			0 Female	73		
19-Aug-05	Penny	N	Applied	brown	22211			0 Male	59		
19-Aug-05	Penny	N	Applied	brown	22212			0 Male	65		
19-Aug-05	Penny	N	Applied	brown	22213			0 Female	74		
19-Aug-05	Penny	N	Applied	brown	22214			0 Female	70		
19-Aug-05	Penny	N	Applied	brown	22215			0 Female	54		
19-Aug-05	Penny	N	Applied	brown	22216			0 Male	78		
19-Aug-05	Penny	N	Applied	brown	22217			0 Male	51		
19-Aug-05	Penny	N	Applied	brown	22218			0 Female	68		
19-Aug-05	Penny	N	Applied	brown	22219			0 Male	60		
19-Aug-05	Penny	N	Applied	brown	22221			0 Female	59		
19-Aug-05	Penny	N	Applied	brown	22222			0 Female	68		
19-Aug-05	Penny	N	Applied	brown	22223			0 Female	56		
19-Aug-05	Penny	N	Applied	brown	22250			0 Female	56		
19-Aug-05	Penny	N	Applied	brown	22251			0 Female	57		
19-Aug-05	Penny	N	Applied	brown	22252			0 Female	67		
19-Aug-05	Penny	N	Applied	brown	22253			0 Female	68.5		
19-Aug-05	Penny	N	Applied	brown	22254			0 Female	63.5		
19-Aug-05	Penny	N	Applied	brown	22255			0 Female	67		
19-Aug-05	Penny	N	Applied	brown	22256			0 Female	55		
19-Aug-05	Penny	N	Applied	brown	22257			0 Female	66		
19-Aug-05	Penny	N	Applied	brown	22258			0 Male	50		
19-Aug-05	Penny	N	Applied	brown	22259			0 Female	53		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
19-Aug-05	Penny	N	Applied	brown	22260			0 Female	62		
19-Aug-05	Penny	N	Applied	brown	22261			0 Female	62		
19-Aug-05	Penny	N	Applied	brown	22262			0 Female	51		
19-Aug-05	Penny	N	Applied	brown	22263			0 Female	68		
19-Aug-05	Penny	N	Applied	brown	22264			0 Female	69	scar	rt
19-Aug-05	Penny	N	Applied	brown	22265			0 Female	53		
19-Aug-05	Penny	N	Applied	brown	22266			0 Female	57		
19-Aug-05	Penny	N	Applied	brown	22267			0 Female	53		
19-Aug-05	Penny	N	Applied	brown	22268			0 Female	63.5		
19-Aug-05	Penny	N	Applied	brown	22269			0 Female	70	dorsal	
19-Aug-05	Penny	N	Applied	brown	22270			0 Female	65		
19-Aug-05	Penny	N	Applied	brown	22271			0 Female	63		
19-Aug-05	Penny	N	Applied	brown	22272			0 Female	55		
19-Aug-05	Penny	N	Applied	brown	22273			0 Male	55		
19-Aug-05	Penny	N	Applied	brown	22300			0 Female	48		
19-Aug-05	Penny	N	Applied	brown	22301			0 Female	70		
19-Aug-05	Penny	N	Applied	brown	22302			0 Female	55		
19-Aug-05	Penny	N	Applied	brown	22303			0 Female	74		
19-Aug-05	Penny	N	Applied	brown	22304			0 Female	68		
19-Aug-05	Penny	N	Applied	brown	22305			0 Female	52		
19-Aug-05	Penny	N	Applied	brown	22306			0 Female	48		
19-Aug-05	Penny	N	Applied	brown	22307			0 Female	70		
19-Aug-05	Penny	N	Applied	brown	22308			0 Female	66		
19-Aug-05	george	N	Applied	light	38926			0 Female	53		
19-Aug-05	george	N	Applied	light	38927			0 Female	69		
19-Aug-05	george	N	Applied	light	38928			0 Male	75		
19-Aug-05	george	N	Applied	light	38929			0 Female	64		
19-Aug-05	george	N	Applied	light	38930			0 Female	64		
19-Aug-05	george	N	Applied	light	38931			0 Male	60		
19-Aug-05	george	N	Applied	light	38932			0 Male	58		
19-Aug-05	george	N	Applied	light	38933			0 Male	54		
19-Aug-05	george	N	Applied	light	38934			0 Male	69		
19-Aug-05	george	N	Applied	light	38935			0 Female	69		
19-Aug-05	george	N	Applied	light	38936			0 Female	56	net	

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
19-Aug-05	george	N	Applied	light	38937			0 Female	53		
19-Aug-05	george	N	Applied	light	38938			0 Female	63		
19-Aug-05	george	N	Applied	light	38939			0 Female	69		
19-Aug-05	george	N	Applied	light	38940			0 Female	53	net	
19-Aug-05	george	N	Applied	light	38941			0 Male	51		
19-Aug-05	george	N	Applied	light	38942			0 Female	55	net	
19-Aug-05	george	N	Applied	light	38943			0 Female	66	net	
19-Aug-05	george	N	Applied	light	38944			0 Male	74	net	
19-Aug-05	george	N	Applied	light	38945			0 Male	52		
19-Aug-05	george	N	Applied	light	38946			0 Male	68		hook mrk rt mouth
19-Aug-05	george	N	Applied	light	38947			0 Female	53		
19-Aug-05	george	N	Applied	light	38948			0 Male	57	net	
19-Aug-05	george	N	Applied	light	38949			0 Male	68	net	
19-Aug-05	george	N	Applied	light	38980			0 Female	48		
19-Aug-05	george	N	None					0 Male	53		
19-Aug-05	Penny	N	None					0 Female	65		
19-Aug-05	george	N	None					0 Female	56		
19-Aug-05	george	N	None					0 Female	57	no tags	
19-Aug-05	george	N	None					0 Female	50	net	
19-Aug-05	george	N	None					0 Male	71	no tags	
19-Aug-05	george	Y	None					0 Female	79	gilled	
19-Aug-05	george	N	None					0 Male	70		
19-Aug-05	george	N	None					0 Male	57		
19-Aug-05	george	Y	None					0 Male	75.5	gilled	
19-Aug-05	george	N	None					0 Male	57	no tags	
19-Aug-05	Penny	N	None					0 Female	69	lost	
19-Aug-05	george	N	None					0 Male	50		
19-Aug-05	george	N	None					0 Female	61		
19-Aug-05	george	N	None					0 Male	54		
19-Aug-05	george	N	None					0 Male	68		
19-Aug-05	george	N	Recaptured			Lime Green	21105	Female	54		
19-Aug-05	Penny	N	Recaptured			Grey	29763	Male	69		applied 2003/08/15 campground
19-Aug-05	Penny	N	Recaptured			Grey	33686	Female	55	Bottom	
19-Aug-05	Penny	N	Recaptured			Green	38738	Female	54	Bottom	

**Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.**

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
22-Aug-05	Penny	N	Applied	brown	22277			0 Male	79		
22-Aug-05	Penny	N	Applied	brown	22278			0 Male	55		
22-Aug-05	Penny	N	Applied	brown	22279			0 Female	66		
22-Aug-05	Penny	N	Applied	brown	22280			0 Female	54		
22-Aug-05	Penny	N	Applied	brown	22282			0 Female	55		
22-Aug-05	Penny	N	Applied	brown	22283			0 Male	67		
22-Aug-05	Penny	N	Applied	brown	22284			0 Female	54		
22-Aug-05	Penny	N	Applied	brown	22285			0 Female	52		
22-Aug-05	Penny	N	Applied	brown	22286			0 Female	66		
22-Aug-05	Penny	N	Applied	brown	22288			0 Female	65		
22-Aug-05	Penny	N	Applied	brown	22289			0 Female	53		
22-Aug-05	george	N	Applied	brown	22290			0 Male	69.5		
22-Aug-05	george	N	Applied	brown	22291			0 Female	58		
22-Aug-05	george	N	Applied	brown	22292			0 Male	57		
22-Aug-05	george	N	Applied	brown	22293			0 Female	54		
22-Aug-05	george	N	Applied	brown	22294			0 Female	54.5		
22-Aug-05	george	N	Applied	brown	22295			0 Male	60		
22-Aug-05	george	N	Applied	brown	22296			0 Female	54		
22-Aug-05	george	N	Applied	brown	22297			0 Female	49		
22-Aug-05	george	N	Applied	brown	22298			0 Female	54		
22-Aug-05	george	N	Applied	brown	22299			0 Female	52		
22-Aug-05	Penny	N	Applied	brown	22309			0 Female	72		
22-Aug-05	Penny	N	Applied	brown	22310			0 Female	56		
22-Aug-05	Penny	N	Applied	brown	22311			0 Female	49		
22-Aug-05	Penny	N	Applied	brown	22312			0 Female	61		
22-Aug-05	Penny	N	Applied	brown	22313			0 Female	52		
22-Aug-05	Penny	N	Applied	brown	22314			0 Female	65		
22-Aug-05	Penny	N	Applied	brown	22315			0 Female	59		
22-Aug-05	Penny	N	Applied	brown	22316			0 Female	61		
22-Aug-05	Penny	N	Applied	brown	22317			0 Female	55		
22-Aug-05	Penny	N	Applied	brown	22318			0 Female	78		
22-Aug-05	Penny	N	Applied	brown	22319			0 Female	83		
22-Aug-05	Penny	N	Applied	brown	22320			0 Female	56		
22-Aug-05	Penny	N	Applied	brown	22321			0 Female	70		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
22-Aug-05	Penny	N	Applied	brown	22322			0 Female	61		
22-Aug-05	Penny	N	Applied	brown	22323			0 Female	75		
22-Aug-05	george	N	Applied	brown	22324			0 Male	54		netmrks
22-Aug-05	george	N	Applied	brown	22325			0 Female	62		
22-Aug-05	george	N	Applied	brown	22350			0 Female	56		
22-Aug-05	george	N	Applied	brown	22351			0 Male	70		
22-Aug-05	george	N	Applied	brown	22352			0 Male	68		
22-Aug-05	george	N	Applied	brown	22353			0 Female	70		netmrks
22-Aug-05	george	N	Applied	brown	22354			0 Female	57.5		
22-Aug-05	george	N	Applied	brown	22355			0 Female	57		
22-Aug-05	george	N	Applied	brown	22357			0 Male	74		
22-Aug-05	george	N	Applied	brown	22358			0 Male	54		
22-Aug-05	george	N	Applied	brown	22359			0 Male	52		
22-Aug-05	george	N	Applied	brown	22360			0 Female	64		netmrks
22-Aug-05	george	N	Applied	brown	22361			0 Female	52		
22-Aug-05	george	N	Applied	brown	22362			0 Female	63		
22-Aug-05	george	N	Applied	brown	22363			0 Female	52.5		netmrks
22-Aug-05	george	N	Applied	brown	22364			0 Male	76		
22-Aug-05	george	N	Applied	brown	22365			0 Male	81		netmrks
22-Aug-05	george	N	Applied	brown	22366			0 Female	81		netmrks
22-Aug-05	george	N	Applied	brown	22367			0 Male	70		
22-Aug-05	george	N	Applied	brown	22368			0 Female	59		
22-Aug-05	george	N	Applied	brown	22369			0 Male	69		netmrks
22-Aug-05	george	N	Applied	brown	22370			0 Female	52		netmrks
22-Aug-05	george	N	Applied	brown	22371			0 Female	60		netmrks
22-Aug-05	george	N	Applied	brown	22372			0 Female	55		
22-Aug-05	george	N	Applied	brown	22373			0 Female	50		
22-Aug-05	george	N	Applied	brown	22374			0 Female	52		netmrks
22-Aug-05	george	Y	None					0 Female	67		food
22-Aug-05	george	Y	None					0 Male	58		food fish
22-Aug-05	george	Y	None					0 Female	59		gills caught in net
22-Aug-05	Penny	N	Recaptured			Grey	33682	Female	55	Bottom	
22-Aug-05	Penny	N	Recaptured			Grey	33865	Female	53	Bottom	
22-Aug-05	george	N	Recaptured			green	38652	Female	66	Bottom	netmrks

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
23-Aug-05	Penny	N	Applied	brown	22326			0 Female	67		
23-Aug-05	Penny	N	Applied	brown	22327			0 Female	56		
23-Aug-05	Penny	N	Applied	brown	22328			0 Female	50		
23-Aug-05	Penny	N	Applied	brown	22329			0 Female	67		
23-Aug-05	Penny	N	Applied	brown	22330			0 Male	72.5		
23-Aug-05	Penny	N	Applied	brown	22331			0 Male	58		
23-Aug-05	Penny	N	Applied	brown	22332			0 Female	66		
23-Aug-05	Penny	N	Applied	brown	22333			0 Female	63		
23-Aug-05	Penny	N	Applied	brown	22334			0 Female	84		
23-Aug-05	Penny	N	Applied	brown	22335			0 Female	61.5		scar left
23-Aug-05	Penny	N	Applied	brown	22336			0 Female	64		
23-Aug-05	Penny	N	Applied	brown	22337			0 Female	73		
23-Aug-05	Penny	N	Applied	brown	22338			0 Male	66		
23-Aug-05	Penny	N	Applied	brown	22339			0 Female	67		
23-Aug-05	Penny	N	Applied	brown	22340			0 Female	62.5		
23-Aug-05	george	N	Applied	brown	22341			0 Male	69		net marks/broken left gill
23-Aug-05	george	N	Applied	brown	22343			0 Male	59		net marks
23-Aug-05	george	N	Applied	brown	22344			0 Female	67		
23-Aug-05	george	N	Applied	brown	22345			0 Female	56		
23-Aug-05	george	N	Applied	brown	22346			0 Female	66		
23-Aug-05	george	N	Applied	brown	22347			0 Female	66.5		net marks
23-Aug-05	george	N	Applied	brown	22348			0 Female	51		
23-Aug-05	george	N	Applied	brown	22349			0 Female	56		
23-Aug-05	george	N	Applied	brown	22375			0 Male	77		
23-Aug-05	george	N	Applied	brown	22376			0 Female	52		
23-Aug-05	george	N	Applied	brown	22378			0 Male	62		net marks
23-Aug-05	george	N	Applied	brown	22379			0 Female	67		net marks
23-Aug-05	george	N	Applied	brown	22380			0 Female	57		
23-Aug-05	george	N	Applied	brown	22381			0 Female	54		
23-Aug-05	george	N	Applied	brown	22382			0 Female	57.5		net marks
23-Aug-05	george	N	Applied	brown	22383			0 Female	68		
23-Aug-05	george	N	Applied	brown	22384			0 Female	66.5		
23-Aug-05	george	N	Applied	brown	22385			0 Female	67		
23-Aug-05	george	N	Applied	brown	22386			0 Male	55		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
23-Aug-05	george	N	Applied	brown	22387			0 Female	51		
23-Aug-05	george	N	Applied	brown	22388			0 Male	55		damaged gill
23-Aug-05	george	N	Applied	brown	22389			0 Female	82.5		net marks/scars right side
23-Aug-05	george	N	Applied	brown	22390			0 Male	68		
23-Aug-05	george	N	Applied	brown	22391			0 Female	69		net marks
23-Aug-05	george	N	Applied	brown	22392			0 Female	75		net marks
23-Aug-05	george	N	Applied	brown	22393			0 Female	74		net marks
23-Aug-05	george	N	Applied	brown	22395			0 Male	76		net marks
23-Aug-05	george	N	Applied	brown	22396			0 Male	68		net marks
23-Aug-05	george	N	Applied	brown	22397			0 Female	57.5		
23-Aug-05	george	N	Applied	brown	22398			0 Male	71		
23-Aug-05	george	N	Applied	brown	22399			0 Male	91		damaged gill
23-Aug-05	Penny	Y	None					0 Female	73.5		
23-Aug-05	Penny	Y	None					0 Female	85		
23-Aug-05	Penny	Y	None					0 Female	77		
23-Aug-05	george	Y	Recaptured			brown	22278	Female	46		found dead in pool
23-Aug-05	Penny	N	Recaptured			Grey	33851	Female	62		
24-Aug-05	Penny	N	Applied	brown	22451			0 Female	64		
24-Aug-05	Penny	N	Applied	brown	22452			0 Female	57		
24-Aug-05	Penny	N	Applied	brown	22453			0 Female	47		
24-Aug-05	Penny	N	Applied	brown	22454			0 Male	53		
24-Aug-05	Penny	N	Applied	brown	22455			0 Female	67		
24-Aug-05	Penny	N	Applied	brown	22456			0 Female	56		
24-Aug-05	Penny	N	Applied	brown	22457			0 Female	81		
24-Aug-05	george	N	Applied	brown	22458			0 Female	56		
24-Aug-05	george	N	Applied	brown	22459			0 Female	59		
24-Aug-05	george	N	Applied	brown	22460			0 Female	55		netmrks
24-Aug-05	george	N	Applied	brown	22461			0 Female	75		
24-Aug-05	george	N	Applied	brown	22462			0 Female	59.5		
24-Aug-05	george	N	Applied	brown	22463			0 Female	65		
24-Aug-05	george	N	Applied	brown	22464			0 Female	55		netmrks
24-Aug-05	george	N	Applied	brown	22465			0 Male	77		
24-Aug-05	george	N	Applied	brown	22466			0 Female	80		
24-Aug-05	george	N	Applied	brown	22467			0 Male	53		netmrks, scar top

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
24-Aug-05	george	N	Applied	brown	22469			0 Female	60		
24-Aug-05	george	N	Applied	brown	24625			0 Female	47		
24-Aug-05	george	N	Applied	brown	24626			0 Female	52		
24-Aug-05	george	N	Applied	brown	24627			0 Female	53		
24-Aug-05	george	N	Applied	brown	24628			0 Male	78		netmrks
24-Aug-05	george	N	Applied	brown	24629			0 Female	51		
24-Aug-05	george	N	Applied	brown	24630			0 Female	72		
24-Aug-05	george	N	Applied	brown	24631			0 Male	68		netmrks
24-Aug-05	george	N	Applied	brown	24632			0 Male	53		
24-Aug-05	george	N	Applied	brown	24633			0 Female	58		net
24-Aug-05	george	N	Applied	brown	24635			0 Male	82		netmrks
24-Aug-05	george	N	Applied	brown	24636			0 Female	59		netmrks
24-Aug-05	george	N	Applied	brown	24637			0 Female	59		
24-Aug-05	george	N	Applied	brown	24638			0 Male	82		
24-Aug-05	george	N	Applied	brown	24639			0 Female	62		fleshed left side
24-Aug-05	Penny	N	Applied	brown	24725			0 Male	58		
24-Aug-05	Penny	N	Applied	brown	24726			0 Female	57		rt gill
24-Aug-05	Penny	N	Applied	brown	24727			0 Male	59		
24-Aug-05	Penny	N	Applied	brown	24728			0 Female	75		
24-Aug-05	Penny	N	Applied	brown	24729			0 Female	64		
24-Aug-05	Penny	N	Applied	brown	24730			0 Female	60		
24-Aug-05	Penny	N	Applied	brown	24731			0 Female	54		
24-Aug-05	Penny	N	Applied	brown	24732			0 Female	53		
24-Aug-05	Penny	N	Applied	brown	24733			0 Female	61		
24-Aug-05	Penny	N	Applied	brown	24734			0 Female	64		
24-Aug-05	Penny	N	Applied	brown	24735			0 Female	52		
24-Aug-05	Penny	N	Applied	brown	24736			0 Female	65		hole left
24-Aug-05	Penny	N	Applied	brown	24737			0 Female	67		
24-Aug-05	Penny	N	Applied	brown	24738			0 Female	73		
24-Aug-05	Penny	N	Applied	brown	24739			0 Male	56		
24-Aug-05	Penny	N	Applied	brown	24740			0 Female	48		
24-Aug-05	Penny	N	Applied	brown	24741			0 Female	64		
24-Aug-05	Penny	N	Applied	brown	24742			0 Female	58		
24-Aug-05	Penny	N	Applied	brown	24743			0 Female	53		



Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
24-Aug-05	Penny	N	Applied	brown	24744			0 Female	54		
24-Aug-05	Penny	N	Applied	brown	24745			0 Female	67		
24-Aug-05	Penny	N	Applied	brown	24746			0 Female	50		
24-Aug-05	Penny	N	Applied	brown	24747			0 Female	67		
24-Aug-05	Penny	N	Applied	brown	24748			0 Male	56		
24-Aug-05	Penny	N	Applied	brown	24749			0 Female	71		
24-Aug-05	george	Y	None					0 Female	66.5		gilled so it was killed
24-Aug-05	Penny	N	Recaptured			brown	22312	Male	51	Top	
24-Aug-05	george	N	Recaptured			brown	22457	Male	77	Top	rt gill
24-Aug-05	george	N	Recaptured			Grey	33742	Female	54	Bottom	
24-Aug-05	Penny	N	Recaptured			Grey	33824	Female	53	Bottom	
24-Aug-05	george	N	Recaptured			Grey	33857	Female	53	Bottom	netmrks
24-Aug-05	george	N	Recaptured			Grey	33872	Female	54	Bottom	
24-Aug-05	george	N	Recaptured			green	38746	Male	53	Bottom	
24-Aug-05	george	N	Recaptured			green	38747	Female	55	Bottom	
25-Aug-05	Penny	N	Applied	brown	22470			0 Female	83		
25-Aug-05	Penny	N	Applied	brown	22472			0 Female	68		
25-Aug-05	Penny	N	Applied	brown	22473			0 Female	57		
25-Aug-05	Penny	N	Applied	brown	22474			0 Female	76		
25-Aug-05	george	N	Applied	brown	22476			0 Female	54		netmrks
25-Aug-05	george	N	Applied	brown	22478			0 Male	78		netmrks
25-Aug-05	george	N	Applied	brown	22479			0 Female	57		
25-Aug-05	george	N	Applied	brown	22480			0 Female	57		
25-Aug-05	george	N	Applied	brown	22481			0 Male	61		
25-Aug-05	george	N	Applied	brown	22482			0 Female	55		open wound by netmrks
25-Aug-05	george	N	Applied	brown	22483			0 Male	70		
25-Aug-05	george	N	Applied	brown	22484			0 Female	54		netmrks
25-Aug-05	george	N	Applied	brown	22485			0 Female	58		
25-Aug-05	george	N	Applied	brown	22486			0 Female	66		
25-Aug-05	george	N	Applied	brown	22487			0 Female	62		
25-Aug-05	george	N	Applied	brown	22488			0 Male	72		
25-Aug-05	george	N	Applied	brown	22489			0 Female	73		
25-Aug-05	george	N	lost	brown	24491			0 Female	51.5	Bottom	
25-Aug-05	george	N	Applied	brown	24492			0 Female	60		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
25-Aug-05	george	N	Applied	brown	24493			0 Female	68		
25-Aug-05	george	N	Applied	brown	24494			0 Male	51		
25-Aug-05	george	N	Applied	brown	24495			0 Female	56		
25-Aug-05	george	N	Applied	brown	24496			0 Female	55		
25-Aug-05	george	N	Applied	brown	24497			0 Female	59		
25-Aug-05	george	N	Applied	brown	24498			0 Female	68		
25-Aug-05	george	N	Applied	brown	24499			0 Female	51		netmrks
25-Aug-05	Penny	N	Applied	brown	24550			0 Female	69		
25-Aug-05	Penny	N	Applied	brown	24551			0 Female	77		
25-Aug-05	Penny	N	Applied	brown	24552			0 Female	75		
25-Aug-05	Penny	N	Applied	brown	24553			0 Female	58		
25-Aug-05	Penny	N	Applied	brown	24555			0 Female	56		
25-Aug-05	Penny	N	Applied	brown	24556			0 Female	53		
25-Aug-05	Penny	N	Applied	brown	24558			0 Female	54		
25-Aug-05	Penny	N	Applied	brown	24560			0 Female	78		
25-Aug-05	Penny	N	Applied	brown	24561			0 Female	67		
25-Aug-05	Penny	N	Applied	brown	24562			0 Female	52		
25-Aug-05	Penny	N	Applied	brown	24563			0 Male	75		
25-Aug-05	Penny	N	Applied	brown	24564			0 Female	54		
25-Aug-05	Penny	N	Applied	brown	24565			0 Female	74		
25-Aug-05	Penny	N	Applied	brown	24566			0 Female	61		
25-Aug-05	Penny	N	Applied	brown	24568			0 Female	71		
25-Aug-05	Penny	N	Applied	brown	24569			0 Female	53		
25-Aug-05	Penny	N	Applied	brown	24572			0 Male	68		
25-Aug-05	Penny	N	Applied	brown	24573			0 Male	74		
25-Aug-05	Penny	N	Applied	brown	24574			0 Female	73		
25-Aug-05	george	N	Applied	brown	24600			0 Female	69.5		old scr rt, nose, net, dorsal
25-Aug-05	george	N	Applied	brown	24601			0 Female	64.5		netmrks
25-Aug-05	george	N	Applied	brown	24602			0 Male	87		netmrks
25-Aug-05	george	N	Applied	brown	24605			0 Female	67		
25-Aug-05	george	N	Applied	brown	24606			0 Female	71		netmrks
25-Aug-05	george	N	Applied	brown	24607			0 Female	72		netmrks
25-Aug-05	george	N	Applied	brown	24623			0 Female	57		
25-Aug-05	george	N	Applied	brown	24624			0 Female	56		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
25-Aug-05	Penny	N	Applied	brown	24700			0 Male	55		
25-Aug-05	Penny	N	Applied	brown	24701			0 Female	67		
25-Aug-05	Penny	N	Applied	brown	24702			0 Female	66		
25-Aug-05	Penny	N	Applied	brown	24704			0 Female	68		
25-Aug-05	Penny	N	Applied	brown	24705			0 Male	83		
25-Aug-05	Penny	N	Applied	brown	24706			0 Male	52		
25-Aug-05	Penny	N	Applied	brown	24707			0 Male	84.5		
25-Aug-05	Penny	N	Applied	brown	24708			0 Female	72		
25-Aug-05	Penny	N	Applied	brown	24709			0 Female	72		
25-Aug-05	Penny	N	Applied	brown	24711			0 Female	65		
25-Aug-05	Penny	N	Applied	brown	24712			0 Male	61		
25-Aug-05	Penny	N	Applied	brown	24713			0 Male	54		
25-Aug-05	Penny	N	Applied	brown	24714			0 Male	68		
25-Aug-05	Penny	N	Applied	brown	24715			0 Female	52		
25-Aug-05	Penny	N	Applied	brown	24717			0 Female	67		
25-Aug-05	george	N	Applied	brown	24718			0 Female	64		left gill
25-Aug-05	george	N	Applied	brown	24720			0 Female	50		
25-Aug-05	george	N	Applied	brown	24721			0 Female	55		
25-Aug-05	george	N	Applied	brown	24722			0 Female	64		netmrks
25-Aug-05	george	N	Applied	brown	24723			0 Female	58		
25-Aug-05	george	N	Applied	brown	24724			0 Female	66		netmrks
25-Aug-05	george	N	Applied	brown	24725			0 Female	68.5		
25-Aug-05	Penny	N	Applied	brown	24752			0 Female	65		
25-Aug-05	Penny	N	Applied	brown	24755			0 Female	68		
25-Aug-05	Penny	N	Applied	brown	24756			0 Female	53		
25-Aug-05	Penny	N	Applied	brown	24758			0 Female	64		
25-Aug-05	Penny	N	Applied	brown	24760			0 Male	54		
25-Aug-05	Penny	N	Applied	brown	24761			0 Female	73		
25-Aug-05	Penny	N	Applied	brown	24762			0 Female	64		
25-Aug-05	Penny	N	Applied	brown	24763			0 Male	52		
25-Aug-05	Penny	N	Applied	brown	24764			0 Male	54		
25-Aug-05	Penny	N	Applied	brown	24766			0 Female	55		
25-Aug-05	Penny	N	Applied	brown	24767			0 Male	86		
25-Aug-05	Penny	N	Applied	brown	24768			0 Female	51		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
25-Aug-05	Penny	N	Applied	brown	24769			0 Female	54		
25-Aug-05	Penny	N	Applied	brown	24770			0 Male	84.5		
25-Aug-05	Penny	N	Applied	brown	24771			0 Female	62		
25-Aug-05	Penny	N	Applied	brown	24772			0 Female	71		
25-Aug-05	Penny	N	Applied	brown	24774			0 Female	57		
25-Aug-05	george	N	None					0 Female	51		jumped out
25-Aug-05	george	N	Recaptured			brown	22378	Male	61.5	Top	netmrks
25-Aug-05	george	N	Recaptured			brown	22469	Female	61		no punch
25-Aug-05	george	N	Recaptured			Grey	33823	Female	62	Bottom	
25-Aug-05	george	N	Recaptured			Grey	33871	Male	69	Bottom	
25-Aug-05	Penny	N	Recaptured			Grey	33907	Male	51	Bottom	
25-Aug-05	george	N	Recaptured			Grey	33971	Male	53	Bottom	netmrks
25-Aug-05	george	N	Recaptured			Lime Green	38887	Female	57	Top	
25-Aug-05	Penny	N	Recaptured			lime green	38897	Female	62	Bottom	
26-Aug-05	Penny	N	Applied	Blue	5379			0 Female	70		original id as coho, changed to St
26-Aug-05	george	N	Applied	brown	24574			0 Female	57		netmrks
26-Aug-05	george	N	Applied	brown	24575			0 Male	60		
26-Aug-05	george	N	Applied	brown	24576			0 Male	76		
26-Aug-05	george	N	Applied	brown	24577			0 Female	50		netmrks
26-Aug-05	george	N	Applied	brown	24578			0 Female	73		deformed lower jaw
26-Aug-05	george	N	Applied	brown	24579			0 Male	64		netmrks
26-Aug-05	george	N	Applied	brown	24580			0 Female	78		hook mrk rt mouth
26-Aug-05	george	N	Applied	brown	24581			0 Female	71		netmrks
26-Aug-05	george	N	Applied	brown	24583			0 Male	70		
26-Aug-05	george	N	Applied	brown	24584			0 Female	66		netmrks
26-Aug-05	george	N	Applied	brown	24585			0 Male	60.5		netmrks
26-Aug-05	george	N	Applied	brown	24586			0 Female	60.5		netmrks
26-Aug-05	george	N	Applied	brown	24587			0 Male	57		netmrks
26-Aug-05	george	N	Applied	brown	24588			0 Male	53		scales, ole scar left
26-Aug-05	george	N	Applied	brown	24589			0 Female	51		
26-Aug-05	Penny	N	Applied	brown	24608			0 Female	80		
26-Aug-05	Penny	N	Applied	brown	24609			0 Male	71		
26-Aug-05	Penny	N	Applied	brown	24610			0 Female	48		
26-Aug-05	Penny	N	Applied	brown	24611			0 Female	73		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
26-Aug-05	Penny	N	Applied	brown	24612			0 Female	57		
26-Aug-05	Penny	N	Applied	brown	24613			0 Female	64.5		top dam
26-Aug-05	Penny	N	Applied	brown	24614			0 Male	51		top dam
26-Aug-05	Penny	N	Applied	brown	24615			0 Male	61		nada?
26-Aug-05	george	N	Applied	brown	24616			0 Male	89.5		fins, adipose damaged
26-Aug-05	george	N	Applied	brown	24618			0 Female	61		
26-Aug-05	george	N	Applied	brown	24619			0 Male	59		
26-Aug-05	george	N	Applied	brown	24620			0 Female	57		
26-Aug-05	george	N	Applied	brown	24621			0 Female	50		
26-Aug-05	george	N	Applied	brown	24622			0 Male	52		netmrks
26-Aug-05	george	N	Applied	brown	24650			0 Female	57		netmrks
26-Aug-05	george	N	Applied	brown	24651			0 Male	74		
26-Aug-05	george	N	Applied	brown	24652			0 Male	57		netmrks
26-Aug-05	george	N	Applied	brown	24653			0 Female	66		netmrks
26-Aug-05	george	N	Applied	brown	24654			0 Female	57		netmrks,,,,left plate
26-Aug-05	george	N	Applied	brown	24655			0 Female	55		netmrks,,
26-Aug-05	george	N	Applied	brown	24656			0 Female	71		top
26-Aug-05	george	N	Applied	brown	24657			0 Male	56		netmrks,,
26-Aug-05	george	N	Applied	brown	24658			0 Female	67.5		
26-Aug-05	george	N	Applied	brown	24659			0 Female	58		
26-Aug-05	george	N	Applied	brown	24660			0 Female	58		fins
26-Aug-05	george	N	Applied	brown	24661			0 Female	58.5		netmrks
26-Aug-05	george	N	Applied	brown	24662			0 Male	69		netmrks
26-Aug-05	george	N	Applied	brown	24663			0 Male	74		
26-Aug-05	george	N	Applied	brown	24664			0 Female	62		netmrks
26-Aug-05	george	N	Applied	brown	24665			0 Female	65		netmrks
26-Aug-05	george	N	Applied	brown	24666			0 Female	61.5		netmrks
26-Aug-05	george	N	Applied	brown	24667			0 Female	53		netmrks
26-Aug-05	george	N	Applied	brown	24668			0 Female	63		
26-Aug-05	george	N	Applied	brown	24669			0 Male	80		netmrks
26-Aug-05	george	N	Applied	brown	24670			0 Female	55		netmrks, left
26-Aug-05	george	N	Applied	brown	24671			0 Female	67.5		
26-Aug-05	george	N	Applied	brown	24672			0 Female	77		netmrks
26-Aug-05	george	N	Applied	brown	24673			0 Female	68		netmrks

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
26-Aug-05	Penny	Y	None					0 Female	64.5		
26-Aug-05	Penny	Y	None					0 Female	59.5		
26-Aug-05	Penny	Y	None					0 Female	66.5		
26-Aug-05	Penny	Y	None					0 Female	76.5		
26-Aug-05	Penny	Y	None					0 Male	68.5		
26-Aug-05	Penny	Y	None					0 Male	65.5		
26-Aug-05	Penny	Y	None					0 Female	69		
26-Aug-05	Penny	Y	None					0 Female	70		
26-Aug-05	Penny	Y	None					0 Female	73		
26-Aug-05	Penny	Y	None					0 Male	69.5		
26-Aug-05	Penny	Y	None					0 Male	54		
26-Aug-05	Penny	Y	None					0 Female	54		
26-Aug-05	Penny	Y	None					0 Female	61.5		
26-Aug-05	Penny	Y	Recaptured			brown	22362	Female	62	Top	
26-Aug-05	george	N	Recaptured			brown	22456	Female	54	Top	
26-Aug-05	Penny	Y	Recaptured			brown	24615	Male	61		should be deleted?
26-Aug-05	george	N	Recaptured			Grey	33651	Male	71	Bottom	netmrks
26-Aug-05	Penny	Y	Recaptured			Grey	33660	Male	51	Bottom	
26-Aug-05	Penny	Y	Recaptured			Grey	33909	Female	76	Bottom	
26-Aug-05	george	N	Recaptured			Grey	33922	Female	58		netmrks
26-Aug-05	george	N	Recaptured			Grey	33963	Female	82	Bottom	
29-Aug-05	Penny	N	Applied	brown	24590			0 Female	60		scar rt
29-Aug-05	Penny	N	Applied	brown	24591			0 Female	51		
29-Aug-05	Penny	N	Applied	brown	24592			0 Female	59		
29-Aug-05	Penny	N	Applied	brown	24593			0 Male	67		
29-Aug-05	Penny	N	Applied	brown	24594			0 Female	67		
29-Aug-05	Penny	N	Applied	brown	24596			0 Female	80		rt plate
29-Aug-05	Penny	N	Applied	brown	24597			0 Female	62		
29-Aug-05	Penny	N	Applied	brown	24598			0 Female	50		
29-Aug-05	Penny	N	Applied	brown	24599			0 Male	67		
29-Aug-05	Penny	N	Applied	brown	24675			0 Female	48		
29-Aug-05	Penny	N	Applied	brown	24676			0 Female	62		
29-Aug-05	Penny	N	Applied	brown	24677			0 Female	69		scar left\
29-Aug-05	Penny	N	Applied	brown	24678			0 Male	82		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
29-Aug-05	Penny	N	Applied	brown	24679			0 Female	72		
29-Aug-05	Penny	N	Applied	brown	24680			0 Female	64		
29-Aug-05	Penny	N	Applied	brown	24681			0 Female	67		
29-Aug-05	Penny	N	Applied	brown	24682			0 Female	73		
29-Aug-05	Penny	N	Applied	brown	24683			0 Female	68		
29-Aug-05	Penny	N	Applied	brown	24684			0 Female	63		
29-Aug-05	Penny	N	Applied	brown	24685			0 Female	78		rt plate
29-Aug-05	Penny	N	Applied	brown	24686			0 Male	82		
29-Aug-05	Penny	N	Applied	brown	24687			0 Female	74		
29-Aug-05	Penny	N	Applied	brown	24688			0 Male	72		
29-Aug-05	Penny	N	Applied	brown	24689			0 Female	69		
29-Aug-05	Penny	N	Applied	brown	24690			0 Female	57		
29-Aug-05	Penny	N	Applied	brown	24691			0 Female	71		
29-Aug-05	Penny	N	Applied	brown	24692			0 Male	53		
29-Aug-05	Penny	N	Applied	brown	24694			0 Female	65		
29-Aug-05	george	N	Applied	brown	24695			0 Male	55		dorsal almost gone,missing adiose
29-Aug-05	george	N	Applied	brown	24696			0 Female	56		net
29-Aug-05	george	N	Applied	brown	24697			0 Female	58.5		net
29-Aug-05	george	N	Applied	brown	24698			0 Female	69		net
29-Aug-05	george	N	Applied	brown	24699			0 Female	54		net
29-Aug-05	george	N	Applied	brown	24775			0 Female	66		net
29-Aug-05	george	N	Applied	brown	24776			0 Male	60		net
29-Aug-05	george	N	Applied	brown	24777			0 Female	51		net
29-Aug-05	george	N	Applied	brown	24778			0 Male	71		net
29-Aug-05	george	N	Applied	brown	24779			0 Female	74		
29-Aug-05	george	N	Applied	brown	24780			0 Female	82		net
29-Aug-05	george	N	Applied	brown	24781			0 Male	78		net
29-Aug-05	george	N	Applied	brown	24782			0 Female	78		net
29-Aug-05	george	N	Applied	brown	24783			0 Male	70.5		net
29-Aug-05	george	N	Applied	brown	24784			0 Female	78		scales
29-Aug-05	george	N	Applied	brown	24785			0 Female	54		net
29-Aug-05	george	N	Applied	brown	24786			0 Female	69		net
29-Aug-05	george	N	Applied	brown	24787			0 Male	75		
29-Aug-05	george	N	Applied	brown	24788			0 Male	73		netmrks

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
29-Aug-05	george	N	Applied	brown	24789			0 Female	83		netmrks
29-Aug-05	george	N	Applied	brown	24790			0 Female	75		net
29-Aug-05	george	N	Applied	brown	24791			0 Female	67		net
29-Aug-05	george	N	Applied	brown	24792			0 Female	58		net
29-Aug-05	george	N	Applied	brown	24793			0 Female	60		net
29-Aug-05	george	N	Recaptured			brown	24636	Female	59.5		
29-Aug-05	george	N	Recaptured			brown	24886	Female	80	Bottom	net
29-Aug-05	Penny	N	Recaptured			Grey	31106	Female	64	Bottom	applied 2003/08/01 canyon
29-Aug-05	Penny	N	Recaptured			Grey	32543	Female	75	Bottom	applied 2003/03/09 canyon
29-Aug-05	Penny	N	Recaptured			Grey	32585	Female		Bottom	applied 2003/04/09 canyon
29-Aug-05	Penny	N	Recaptured			Grey	33847	Female	82	Bottom	
29-Aug-05	george	N	Recaptured			light green	38940	Male	52.5	Bottom	net
30-Aug-05	george	N	Applied	Blue	5880			0 Female	65		wrong tag
30-Aug-05	george	N	Applied	brown	22491			0 Male	78		net mrks
30-Aug-05	george	N	Applied	brown	22492			0 Female	76		net mrks,,,tail
30-Aug-05	george	N	Applied	brown	22493			0 Male	61		netmrks
30-Aug-05	george	N	Applied	brown	22494			0 Male	66.5		netmrks
30-Aug-05	george	N	Applied	brown	22495			0 Female	71		
30-Aug-05	george	N	Applied	brown	22496			0 Female	61		netmrks
30-Aug-05	george	N	Applied	brown	22497			0 Female	67		
30-Aug-05	george	N	Applied	brown	22498			0 Male	72		netmrks
30-Aug-05	george	N	Applied	brown	24450			0 Female	70.5		netmrks
30-Aug-05	george	N	Applied	brown	24451			0 Male	83		netmrks
30-Aug-05	george	N	Applied	brown	24452			0 Male	72		netmrks
30-Aug-05	george	N	Applied	brown	24453			0 Female	75		netmrks
30-Aug-05	george	N	Applied	brown	24454			0 Female	47		
30-Aug-05	george	N	Applied	brown	24455			0 Female	66		netmrks
30-Aug-05	george	N	Applied	brown	24457			0 Female	56		netmrks
30-Aug-05	george	N	Applied	brown	24458			0 Male	70		netmrks
30-Aug-05	george	N	Applied	brown	24459			0 Female	56		netmrks
30-Aug-05	george	N	Applied	brown	24460			0 Female	70		netmrks
30-Aug-05	george	N	Applied	brown	24461			0 Male	59		netmrks
30-Aug-05	Penny	N	Applied	brown	24475			0 Female	65.5		net mrks
30-Aug-05	Penny	N	Applied	brown	24476			0 Male	70		



Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
30-Aug-05	Penny	N	Applied	brown	24477			0 Male	52		
30-Aug-05	Penny	N	Applied	brown	24478			0 Male	73		
30-Aug-05	Penny	N	Applied	brown	24480			0 Female	71		
30-Aug-05	Penny	N	Applied	brown	24481			0 Female	75		
30-Aug-05	Penny	N	Applied	brown	24482			0 Female	74		
30-Aug-05	Penny	N	Applied	brown	24483			0 Male	78		
30-Aug-05	Penny	N	Applied	brown	24484			0 Female	68		
30-Aug-05	Penny	N	Applied	brown	24485			0 Female	63		
30-Aug-05	Penny	N	Applied	brown	24486			0 Male	70		
30-Aug-05	Penny	N	Applied	brown	24487			0 Female	53		
30-Aug-05	Penny	N	Applied	brown	24488			0 Female	67		
30-Aug-05	Penny	N	Applied	brown	24489			0 Female	58		
30-Aug-05	Penny	N	Applied	brown	24490			0 Female	74		
30-Aug-05	Penny	N	Applied	brown	24794			0 Female	52		
30-Aug-05	Penny	N	Applied	brown	24795			0 Female	61.5		
30-Aug-05	Penny	N	Applied	brown	24796			0 Female	67.5		
30-Aug-05	Penny	N	Applied	brown	24797			0 Male	59		
30-Aug-05	Penny	N	Applied	brown	24798			0 Female	78		
30-Aug-05	george	N	Applied	light	39626			0 Female	63		netmrks
30-Aug-05	george	N	Applied	light	39627			0 Male	60		netmrks
30-Aug-05	george	N	Applied	light	39628			0 Male	78		netmrks
30-Aug-05	george	N	Applied	brown	39629			0 Female	53		
30-Aug-05	george	N	Applied	brown	39630			0 Female	51		
30-Aug-05	george	N	Applied	brown	39631			0 Male	68		netmrks
30-Aug-05	george	N	Applied	brown	39632			0 Male	72		netmrks
30-Aug-05	george	N	Applied	brown	39633			0 Male	59		
30-Aug-05	george	N	Applied	brown	39634			0 Female	57.5		
30-Aug-05	george	N	Applied	brown	39635			0 Female	74		
30-Aug-05	george	N	Applied	brown	39636			0 Female	68		
30-Aug-05	george	N	Applied	brown	39637			0 Female	67.5		
30-Aug-05	george	N	Applied	brown	39638			0 Female	69		
30-Aug-05	george	N	Applied	brown	39639			0 Female	57		
30-Aug-05	george	N	Applied	brown	39640			0 Female	71		
30-Aug-05	george	N	Applied	brown	39641			0 Female	60		netmrks

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
30-Aug-05	george	N	Applied	brown	39642			0 Female	60		
30-Aug-05	george	N	Applied	brown	39643			0 Female	54		netmrks
30-Aug-05	george	Y	None					0 Female	67		food fish
30-Aug-05	george	N	None					0 Female	61		oops didn't tag
30-Aug-05	george	N	Recaptured			White	14673	Male	58		no punch
30-Aug-05	george	N	Recaptured			brown	22118	Male	54	Bottom	lil netmrks
30-Aug-05	Penny	N	Recaptured			brown	22257	Female	52.5	Top	
30-Aug-05	george	N	Recaptured			brown	22452	Male	57	Bottom	netmrks
30-Aug-05	george	N	Recaptured			brown	24721	Female	54	Bottom	
30-Aug-05	george	N	Recaptured			brown	24876	Female	66	Bottom	
30-Aug-05	Penny	N	Recaptured			Grey	29729	Male	69	Bottom	applied 2003/08/14 camp
30-Aug-05	george	N	Recaptured			Grey	33927	Female	52	Bottom	
30-Aug-05	Penny	N	Recaptured			Grey	33986	Female	65	Bottom	
30-Aug-05	george	N	Recaptured			Lime Green	38907	Female	50	Top	
31-Aug-05	Penny	N	Applied	Grey	38101			0 Female	54		
31-Aug-05	Penny	N	Applied	Grey	38102			0 Female	81		
31-Aug-05	Penny	N	Applied	Grey	38103			0 Female	68		
31-Aug-05	Penny	N	Applied	Grey	38104			0 Female	70		
31-Aug-05	Penny	N	Applied	Grey	38105			0 Female	61		
31-Aug-05	Penny	N	Applied	Grey	38106			0 Female	71		
31-Aug-05	Penny	N	Applied	Green	38107			0 Female	67		
31-Aug-05	Penny	N	Applied	Green	38108			0 Male	53		
31-Aug-05	Penny	N	Applied	Green	38109			0 Male	53		
31-Aug-05	Penny	N	Applied	Green	38111			0 Female	58		
31-Aug-05	Penny	N	Applied	Green	38112			0 Female	66		]
31-Aug-05	Penny	N	Applied	Green	38113			0 Female	65		
31-Aug-05	Penny	N	Applied	Green	38114			0 Female	66		
31-Aug-05	Penny	N	Applied	Green	38115			0 Male	72		
31-Aug-05	Penny	N	Applied	Green	38116			0 Male	72		
31-Aug-05	Penny	N	Applied	Green	38117			0 Female	65		left plate
31-Aug-05	Penny	N	Applied	Green	38118			0 Female	57		
31-Aug-05	Penny	N	Applied	Green	38119			0 Female	73		
31-Aug-05	Penny	N	Applied	Green	38120			0 Male	73		
31-Aug-05	george	N	Applied	light	38121			0 Male	59		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
31-Aug-05	george	N	Applied	light	38122			0 Female	74		net mrks, nose
31-Aug-05	george	N	Applied	light	38123			0 Male	77		net mrks
31-Aug-05	george	N	Applied	light	38124			0 Male	65		net mrks
31-Aug-05	george	N	Applied	light	38125			0 Female	57		net mrks
31-Aug-05	george	N	Applied	light	38126			0 Male	74		net mrks
31-Aug-05	george	N	Applied	light	38127			0 Female	66		net mrks
31-Aug-05	george	N	Applied	light	38128			0 Female	71		net mrks
31-Aug-05	george	N	Applied	light	38129			0 Male	74		
31-Aug-05	george	N	Applied	light	38130			0 Female	63		net mrks
31-Aug-05	george	N	Applied	light	38131			0 Male	74		net mrks, head
31-Aug-05	george	N	Applied	light	38132			0 Female	56		net mrks
31-Aug-05	george	N	Applied	light	38133			0 Female	53		net mrks
31-Aug-05	george	N	Applied	light	38134			0 Female	53		net mrks
31-Aug-05	george	N	Applied	light	38137			0 Female	69		net mrks
31-Aug-05	george	N	Applied	light	38138			0 Female	68		net mrks
31-Aug-05	george	N	Applied	light	38139			0 Male	75		net mrks
31-Aug-05	george	N	Applied	light	38140			0 Female	80.5		net mrks
31-Aug-05	george	N	Applied	light	38141			0 Male	51		net mrks
31-Aug-05	george	N	Applied	light	38142			0 Male	52		net mrks
31-Aug-05	george	N	Applied	light	38143			0 Male	89		net mrks
31-Aug-05	george	N	Applied	light	38144			0 Female	66		net mrks
31-Aug-05	george	N	Applied	light	38145			0 Female	70		hook mrks
31-Aug-05	Penny	N	Applied	Green	39645			0 Female	62		
31-Aug-05	Penny	N	Applied	Green	39646			0 Female	62		
31-Aug-05	Penny	N	Applied	Green	39647			0 Female	66		
31-Aug-05	Penny	N	Applied	Green	39648			0 Female	57		
31-Aug-05	Penny	N	Applied	Green	39649			0 Female	74		mouth
31-Aug-05	Penny	N	Applied	Green	39650			0 Female	67		
31-Aug-05	george	Y	None					0 Female	71.5		food fish
31-Aug-05	Penny	N	Recaptured			brown	22372	Female	54	Top	no punch
31-Aug-05	Penny	N	Recaptured			brown	24500	Female	53	Bottom	from previous yrs tagging?I say no
31-Aug-05	george	N	Recaptured			brown	24898	Male	59	Bottom	
31-Aug-05	Penny	N	Recaptured			Grey	31137	Female	80		applied 2003/08/06 canyon
31-Aug-05	Penny	N	Recaptured			Grey	31890	Male	69	Bottom	applied 2003/08/22, canyon

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
31-Aug-05	george	N	Recaptured			Grey	33910	Male	52	Bottom	net mrks
31-Aug-05	Penny	N	Recaptured			Lime Green	38585	Male	49		top?
31-Aug-05	george	N	Recaptured			green	38681	Female	51	Top	motz
31-Aug-05	george	N	Recaptured			Lime Green	38856	Female	69	Top	nose
31-Aug-05	Penny	N	Recaptured			Lime Green	38878	Male	51	Top	
01-Sep-05	Penny	N	Applied	White	40251			0 Male	60		
01-Sep-05	Penny	N	Applied	White	40252			0 Female	60		
01-Sep-05	Penny	N	Applied	White	40253			0 Female	80		
01-Sep-05	Penny	N	Applied	White	40254			0 Male	80		
01-Sep-05	Penny	N	Applied	White	40255			0 Female	64		
01-Sep-05	Penny	N	Applied	White	40256			0 Female	71		
01-Sep-05	Penny	N	Applied	White	40257			0 Male	65		
01-Sep-05	Penny	N	Applied	White	40258			0 Male	93		
01-Sep-05	george	N	Applied	White	40259			0 Female	70		net mrks
01-Sep-05	george	N	Applied	White	40260			0 Male	60		net mrks
01-Sep-05	george	N	Applied	White	40261			0 Male	75		net mrks
01-Sep-05	george	N	Applied	White	40262			0 Male	88		net mrks
01-Sep-05	george	N	Applied	White	40263			0 Female	54		
01-Sep-05	george	N	Applied	White	40264			0 Male	71		net mrks
01-Sep-05	george	N	Applied	White	40265			0 Male	82		
01-Sep-05	george	N	Applied	White	40266			0 Female	81.5		
01-Sep-05	george	N	Applied	White	40267			0 Male	65		net mrks
01-Sep-05	george	N	Applied	White	40268			0 Female	54.5		net mrks
01-Sep-05	george	N	Applied	White	40269			0 Female	49.5		net mrks
01-Sep-05	george	N	Applied	White	40270			0 Male	72		net mrks
01-Sep-05	george	N	Applied	White	40271			0 Male	71		net mrks
01-Sep-05	george	N	Applied	White	40272			0 Female	70		dorsal
01-Sep-05	george	N	Applied	White	40273			0 Female	58.5		net mrks
01-Sep-05	george	N	Applied	White	40274			0 Female	74		net mrks
01-Sep-05	george	N	Applied	White	40275			0 Female	67		net mrks
01-Sep-05	george	N	Recaptured			Grey	33168	Female	77		old scar right
01-Sep-05	george	N	Recaptured			Grey	33856	Female	62	Bottom	head skinned
01-Sep-05	george	N	Recaptured			Grey	33926	Male	67	Bottom	net mrks
01-Sep-05	george	N	Recaptured			Grey	33926	Male	67	Bottom	net mrks

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
02-Sep-05	Penny	N	Applied	White	40276			0 Female	77		
02-Sep-05	Penny	N	Applied	White	40277			0 Female	69		dorsal
02-Sep-05	Penny	N	Applied	White	40278			0 Male	50		
02-Sep-05	Penny	N	Applied	White	40279			0 Female	63		
02-Sep-05	Penny	N	Applied	White	40280			0 Female	57		
02-Sep-05	Penny	N	Applied	White	40281			0 Female	79		
02-Sep-05	Penny	N	Applied	White	40282			0 Female	56		left plate
02-Sep-05	george	N	Applied	White	40283			0 Female	54		double tagged 40284,net
02-Sep-05	george	N	Applied	White	40285			0 Male	72		net
02-Sep-05	george	N	Applied	White	40286			0 Female	67		spots missing what tha
02-Sep-05	george	N	Applied	White	40287			0 Male	56		net
02-Sep-05	george	N	Applied	White	40288			0 Female	53		
02-Sep-05	george	N	Applied	White	40289			0 Female	70		net
02-Sep-05	george	N	Applied	White	40290			0 Female	57		net
02-Sep-05	george	N	Applied	White	40291			0 Male	79		
02-Sep-05	george	N	Applied	White	40292			0 Female	73		hook mrk
02-Sep-05	george	N	Applied	White	40293			0 Female	55		net
02-Sep-05	george	N	Applied	White	40294			0 Female	68		fins
02-Sep-05	george	N	Applied	White	40295			0 Male	78		net
02-Sep-05	george	N	Applied	White	40297			0 Female	70		net
02-Sep-05	george	N	Applied	White	40298			0 Male	54		net
02-Sep-05	george	N	Applied	White	40299			0 Male	87		net
02-Sep-05	george	N	Applied	White	40300			0 Female	53		net
02-Sep-05	george	N	Applied	White	40301			0 Male	62.5		net
02-Sep-05	george	N	Applied	White	40302			0 Male	62		net
02-Sep-05	george	N	Applied	White	40303			0 Male	55		scar rt
02-Sep-05	george	N	Applied	White	40304			0 Male	65		
02-Sep-05	george	N	Applied	White	40305			0 Male	71		net
02-Sep-05	george	N	Applied	White	40306			0 Female	57		
02-Sep-05	george	N	Applied	White	40307			0 Female	58		net
02-Sep-05	george	N	Applied	White	40308			0 Female	69		net
02-Sep-05	george	N	Applied	White	40309			0 Female	68.5		net
02-Sep-05	george	N	Applied	White	40310			0 Female	86		fins
02-Sep-05	george	N	Applied	White	40311			0 Male	78		net

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
02-Sep-05	george	N	Applied	White	40312			0 Female	49.5		
02-Sep-05	george	N	Applied	White	40313			0 Male	62		
02-Sep-05	george	N	Applied	White	40314			0 Female	55	net	
02-Sep-05	george	N	Applied	White	40315			0 Male	66		
02-Sep-05	george	N	Applied	White	40316			0 Female	55	net	
02-Sep-05	Penny	N	Recaptured			brown	24569	Female	53	Bottom	
02-Sep-05	george	N	Recaptured			brown	24836	Male	65	Bottom	
02-Sep-05	george	N	Recaptured			brown	24896	Male	56	Bottom	net
02-Sep-05	george	N	Recaptured			Grey	33823	Female	62	Bottom	fins
02-Sep-05	george	N	Recaptured			light green	38929	Female	68	Bottom	fins/net
06-Sep-05	Penny	N	Applied	White	40296			0 Female	50		
06-Sep-05	george	N	Applied	White	40317			0 Male	75	net	
06-Sep-05	george	N	Applied	White	40318			0 Female	72	scales, net	
06-Sep-05	george	N	Applied	White	40319			0 Male	74.5	net	
06-Sep-05	george	N	Applied	White	40320			0 Female	68.5	net	
06-Sep-05	george	N	Applied	White	40321			0 Male	75.5	tail/net	
06-Sep-05	george	N	Applied	White	40322			0 Female	51	scales, tail/dorsal	
06-Sep-05	george	N	Applied	White	40323			0 Female	76.5	net	
06-Sep-05	george	N	Applied	White	40324			0 Female	66	net mrks, old scars	
06-Sep-05	Penny	N	Applied	White	40325			0 Male	70		
06-Sep-05	Penny	N	Applied	White	40376			0 Female	68		
07-Sep-05	george	N	Applied	White	40377			0 Female	68	left eye red,net,dorsal	
07-Sep-05	george	N	Applied	White	40378			0 Female	77		
07-Sep-05	george	N	Applied	White	40379			0 Female	88		
07-Sep-05	george	N	Applied	White	40380			0 Male	58		
07-Sep-05	george	N	Applied	White	40381			0 Male	77		
07-Sep-05	george	N	Applied	White	40382			0 Male	57	net	
07-Sep-05	george	N	Applied	White	40383			0 Female	69.5		
07-Sep-05	george	N	Applied	White	40384			0 Female	79		
07-Sep-05	george	N	Applied	White	40385			0 Male	70	net	
07-Sep-05	george	N	Applied	White	40386			0 Male	74		
07-Sep-05	george	N	Applied	White	40387			0 Male	79.5		
07-Sep-05	george	N	Applied	White	40388			0 Male	79		
07-Sep-05	george	N	Applied	White	40389			0 Female	49		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
07-Sep-05	Penny	N	Applied	Grey	40390			0 Female	64		
07-Sep-05	Penny	N	Applied	Grey	40391			0 Female	58		net mrks
07-Sep-05	Penny	N	Applied	Grey	40392			0 Male	83.5		
07-Sep-05	Penny	N	Applied	Grey	40393			0 Female	76.5		
07-Sep-05	Penny	Y	None					0 Female	72		
07-Sep-05	Penny	Y	None					0 Female	80		
07-Sep-05	Penny	Y	None					0 Female	58		
07-Sep-05	Penny	Y	None					0 Female	80		
07-Sep-05	Penny	Y	None					0 Female	60		
07-Sep-05	george	N	Recaptured			brown	24823	Male	52.5	Bottom	net
07-Sep-05	george	N	Recaptured			Grey	33077	Female	59.5	Bottom	net,scales
07-Sep-05	george	N	Recaptured			Grey	33958	Male	52	Bottom	rt gill
08-Sep-05	george	N	Applied	White	40394			0 Female	55		net marks-scale loss
08-Sep-05	george	N	Applied	White	40395			0 Female	52		net marks
08-Sep-05	Penny	N	Applied	Grey	40396			0 Female	66.5		tail
08-Sep-05	Penny	N	Applied	Grey	40399			0 Female	61		
08-Sep-05	Penny	N	Applied	Grey	40400			0 Male	75		
08-Sep-05	Penny	Y	None					0 Male	57		
08-Sep-05	george	N	Recaptured			brown	22380	Female	57	Top	all fins torn-net marks
08-Sep-05	george	N	Recaptured			Grey	33823	Female	61	Bottom	all fins torn-nose dam.
08-Sep-05	Penny	Y	Recaptured			Green	38821	Male	68		
08-Sep-05	Penny	Y	Recaptured			Lime Green	38877	Female	54		
09-Sep-05	george	N	Applied	White	40339			0 Female	64		all fins dam-old scar- R side-net
09-Sep-05	george	N	Applied	White	40341			0 Female	84		scale loss
09-Sep-05	george	N	Applied	White	40342			0 Female	71.5		
09-Sep-05	george	N	Applied	White	40343			0 Female	72		all fins torn
09-Sep-05	george	N	Applied	White	40344			0 Female	66.5		torn dorsal-net marks
09-Sep-05	george	N	Applied	White	40345			0 Female	69		R-side dam-net marks
09-Sep-05	george	N	Applied	White	40346			0 Male	55.5		tail-dorsal torn-net marks
09-Sep-05	george	N	Applied	White	40347			0 Female	71.5		abrassions on tail
09-Sep-05	george	N	Applied	White	40348			0 Female	67.5		torn dorsal
09-Sep-05	george	N	Applied	White	40349			0 Female	73		net marks-torn gill plate- tail
09-Sep-05	george	N	Applied	White	40350			0 Female	54.5		all fins torn-net marks
09-Sep-05	Penny	N	Applied	White	40351			0 Male	55		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
09-Sep-05	Penny	N	Applied	White	40352			0 Male	52		
09-Sep-05	Penny	N	Applied	White	40353			0 Male	77		
09-Sep-05	Penny	N	Applied	White	40354			0 Male	69	Top	nose
09-Sep-05	Penny	N	Applied	White	40355			0 Female	79		
09-Sep-05	Penny	N	Applied	White	40356			0 Female	82		
09-Sep-05	Penny	N	Applied	White	40357			0 Female	74		
09-Sep-05	george	Y	None					0 Male	72		
09-Sep-05	george	N	None	White				0 Female	56		all fins torn
09-Sep-05	george	Y	None					0 Male	69		
09-Sep-05	george	Y	None					0 Male	57		
09-Sep-05	george	Y	None					0 Female	69.5		
09-Sep-05	george	Y	None					0 Unknow	54		
09-Sep-05	george	Y	None					0 Male	71		
09-Sep-05	george	Y	None					0 Female	67.5		
09-Sep-05	george	N	Recaptured			brown	24853	Female	90.5	Bottom	
09-Sep-05	Penny	N	Recaptured			Grey	32619	Male	71		
09-Sep-05	george	N	Recaptured			Lime Green	38876	Male	76	Top	dam nose-torn dorsal
12-Sep-05	george	N	Applied	White	40358			0 Female	66		torn dorsal
12-Sep-05	george	N	Applied	White	40359			0 Female	67		all fins torn
12-Sep-05	george	N	Applied	White	40360			0 Female	89.5		net marks-R-side scar
12-Sep-05	george	N	Applied	White	40361			0 Female	74		net marks-dorsal torn
12-Sep-05	george	N	Applied	White	40362			0 Female	62		
12-Sep-05	george	N	Applied	White	40363			0 Female	69		net marks
12-Sep-05	george	N	Applied	White	40364			0 Female	66		
12-Sep-05	george	N	Applied	White	40365			0 Female	64		
12-Sep-05	george	N	Applied	White	40366			0 Male	85		
12-Sep-05	george	N	Applied	White	40367			0 Female	57		
12-Sep-05	george	N	Applied	White	40368			0 Female	83.5		
12-Sep-05	george	N	Applied	White	40369			0 Male	72.5		
12-Sep-05	george	N	Applied	White	40370			0 Male	96		bleeding gill.
12-Sep-05	Penny	N	Applied	White	40371			0 Male	90		
12-Sep-05	Penny	N	Applied	White	40372			0 Female	67		
12-Sep-05	Penny	N	Applied	White	40373			0 Female	71		
12-Sep-05	george	N	Recaptured			brown	22495	Male	55	Bottom	tail-dorsal torn



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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
12-Sep-05	Penny	N	Recaptured			brown	22641	Female	54	Bottom	
13-Sep-05	george	N	Applied	White	40374			0 Female	70.5		
13-Sep-05	george	N	Applied	White	40375			0 Female	66		scale loss/dorsal torn
13-Sep-05	george	N	Applied	White	40401			0 Female	65		tail-dorsal torn/net marks
13-Sep-05	george	N	Applied	White	40402			0 Female	63		all fins torn
13-Sep-05	george	N	Applied	White	40403			0 Female	71.5		marks R-side
13-Sep-05	george	N	Applied	White	40404			0 Male	87		
13-Sep-05	george	N	Applied	White	40405			0 Female	66		net marks-scale loss
13-Sep-05	george	N	Applied	White	40406			0 Male	56.5		net markls
13-Sep-05	george	N	Applied	White	40407			0 Male	61.5		scale loss
13-Sep-05	george	N	Applied	White	40408			0 Female	67.5		
13-Sep-05	george	N	Applied	White	40409			0 Female	75		claw mark around
13-Sep-05	george	N	Applied	White	40410			0 Female	67.5		
13-Sep-05	Penny	N	Applied	White	40411			0 Female	52		
13-Sep-05	Penny	N	Applied	White	40412			0 Male	54		
13-Sep-05	Penny	N	Applied	White	40413			0 Male	48		
13-Sep-05	Penny	N	Applied	White	40414			0 Male	70		head
13-Sep-05	Penny	N	Applied	White	40415			0 Female	56		
13-Sep-05	Penny	N	Applied	White	40416			0 Male	87		
13-Sep-05	Penny	N	Applied	White	40417			0 Female	66		
13-Sep-05	Penny	N	Applied	White	40418			0 Female	71		
13-Sep-05	george	Y	None					0 Male	77.5		food fish
13-Sep-05	george	Y	None					0 Male	79		food fish
13-Sep-05	george	N	None					0 Female	75		R-gill plate torn-no tag applied
13-Sep-05	Penny	N	Recaptured			brown	22370	Female	51.5		no tail clip
13-Sep-05	george	N	Recaptured			brown	24740	Male	49.5	Top	scale loss/net marks
13-Sep-05	Penny	N	Recaptured			brown	24791	Female	66	Top	
13-Sep-05	Penny	N	Recaptured			White	40316	Male	57		
13-Sep-05	george	N	Recaptured			White	40321	Male	76.5	Top	net marks
14-Sep-05	george	N	Applied	White	40419			0 Female	73.5		scale loss/sores on L-side.
14-Sep-05	george	N	Applied	White	40420			0 Female	84		all fins torn
14-Sep-05	george	N	Applied	White	40421			0 Male	56		net marks
14-Sep-05	george	N	Applied	White	40422			0 Male	58		net marks
14-Sep-05	george	N	Applied	White	40423			0 Male	42		floresent red stripe/all fins on

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
14-Sep-05	george	N	Applied	White	40424			0 Male	59		net marks
14-Sep-05	george	N	Applied	White	40425			0 Female	73.5		net marks
14-Sep-05	george	N	Applied	White	40426			0 Female	62.5		tail dam at top
14-Sep-05	george	N	Applied	White	40427			0 Female	79		dorsal-tail torn
14-Sep-05	george	N	Applied	White	40428			0 Male	89		R-gill dam-dorsal torn-net marks
14-Sep-05	george	N	Applied	White	40429			0 Male	58		
14-Sep-05	george	N	Applied	White	40430			0 Female	70.5		retagged-scale loss-net marks-head
14-Sep-05	george	N	Applied	White	40432			0 Female	95		
14-Sep-05	george	N	Applied	White	40433			0 Male	54.5		tag fell off
14-Sep-05	george	N	Applied	White	40434			0 Male	77.5		mouth torn L-side
14-Sep-05	george	N	Applied	White	40435			0 Female	69		dorsal torn
14-Sep-05	george	N	Applied	White	40436			0 Male	68		
14-Sep-05	george	N	Applied	White	40437			0 Male	70		net marks
14-Sep-05	Penny	N	Applied	White	40438			0 Female	66		
14-Sep-05	Penny	N	Applied	White	40439			0 Female	72.5		
14-Sep-05	Penny	N	Applied	White	40440			0 Female	59		mouth
14-Sep-05	Penny	N	Applied	White	40441			0 Female	64		
14-Sep-05	Penny	N	Applied	White	40442			0 Female	66.5		net
14-Sep-05	Penny	N	Applied	White	40443			0 Male	80		
14-Sep-05	Penny	N	Applied	White	40444			0 Female	70.5		
14-Sep-05	Penny	N	Applied	White	40445			0 Male	56.5		
14-Sep-05	Penny	N	Applied	White	40446			0 Female	65.5		
14-Sep-05	Penny	N	Applied	White	40447			0 Female	66		net
14-Sep-05	Penny	N	Applied	White	40448			0 Female	73		dorsal, both sides
14-Sep-05	george	N	None					0 Male	70		no tag applied
14-Sep-05	george	N	Recaptured			brown	22216	Male	77.5	Top	all fins torn
14-Sep-05	george	N	Recaptured			Lime Green	38982	Male	51		all fins torn
14-Sep-05	george	N	Recaptured			green	38982	Male	51		
15-Sep-05	george	N	Applied	White	40449			0 Male	82		net marks
15-Sep-05	george	N	Applied	White	40450			0 Female	65.5		dorsal dam
15-Sep-05	george	N	Applied	White	40451			0 Male	74		net marks
15-Sep-05	Penny	N	Applied	White	40452			0 Female	73		
15-Sep-05	Penny	N	Applied	White	40453			0 Male	68		
15-Sep-05	Penny	N	Applied	White	40454			0 Female	78		dorsal

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
15-Sep-05	Penny	N	Applied	White	40455			0 Female	76		
15-Sep-05	george	N	Applied	White	40497			0 Female	70		good
15-Sep-05	Penny	N	None					0 Female	67		scar5 left
15-Sep-05	george	N	Recaptured			brown	22352	Male	67		net marks/tail dam.
15-Sep-05	Penny	N	Recaptured			brown	22613	Female	65	Bottom	
16-Sep-05	george	N	Applied	White	40456			0 Female	69		
16-Sep-05	george	N	Applied	White	40457			0 Female	74.5		dorsal dam
16-Sep-05	george	N	Applied	White	40458			0 Male	71		
16-Sep-05	george	N	Applied	White	40459			0 Female	66		net marks
16-Sep-05	george	N	Applied	White	40460			0 Female	71		
16-Sep-05	Penny	N	Applied	White	40461			0 Female	68		
16-Sep-05	Penny	N	Applied	White	40462			0 Male	66		dorsal
16-Sep-05	Penny	N	Applied	White	40463			0 Male	53		
16-Sep-05	Penny	N	Applied	White	40464			0 Male	65		
16-Sep-05	Penny	N	Applied	White	40465			0 Male	65		
16-Sep-05	Penny	N	Applied	White	40466			0 Male	72		tail/dorsal
16-Sep-05	Penny	N	Applied	White	40467			0 Male	64		
16-Sep-05	Penny	N	Applied	White	40468			0 Male	77		
16-Sep-05	Penny	N	Applied	White	40469			0 Male	58		
16-Sep-05	Penny	N	Applied	White	40470			0 Female	62		
16-Sep-05	Penny	N	Applied	White	40471			0 Male	69		
16-Sep-05	Penny	Y	None					0 Male	72		
16-Sep-05	Penny	N	Recaptured			brown	22606	Male	77	Bottom	
16-Sep-05	Penny	N	Recaptured			Grey	33028	Male	62	Bottom	
16-Sep-05	george	N	Recaptured			Grey	33844	Male	74		R-eye rd/all fins dam
16-Sep-05	Penny	N	Recaptured			yellow	37470	Male	75	Bottom	
16-Sep-05	george	N	Recaptured			White	40458	Female	71	Top	
19-Sep-05	Penny	N	Applied	White	40472			0 Male	76		
19-Sep-05	Penny	N	Applied	White	40473			0 Male	68.5		
19-Sep-05	Penny	N	Applied	White	40474			0 Male	64		
19-Sep-05	Penny	N	Applied	White	40475			0 Male	67		
19-Sep-05	Penny	N	Applied	White	40476			0 Female	62		
19-Sep-05	Penny	N	Applied	White	40477			0 Male	66		
19-Sep-05	Penny	N	Applied	White	40478			0 Female	67		

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
19-Sep-05	Penny	N	Applied	White	40479			0 Male	91		saw adi rt
19-Sep-05	Penny	N	Applied	White	40480			0 Female	77		
19-Sep-05	Penny	N	Applied	White	40481			0 Male	53		
19-Sep-05	Penny	N	Applied	White	40482			0 Female	56		
19-Sep-05	Penny	N	Applied	White	40483			0 Female	67		
19-Sep-05	Penny	N	Applied	White	40484			0 Male	69		
19-Sep-05	Penny	N	Applied	White	40485			0 Male	20		really small anyways
19-Sep-05	Penny	N	Applied	White	40486			0 Female	72.5		
19-Sep-05	Penny	N	Applied	White	40487			0 Male	55.5		
19-Sep-05	Penny	N	Applied	White	40488			0 Male	58		
19-Sep-05	Penny	N	Applied	White	40489			0 Female	63.5		
19-Sep-05	george	N	Applied	White	40490			0 Male	76		head dam
19-Sep-05	george	N	Applied	White	40491			0 Female	73		
19-Sep-05	george	N	Applied	White	40492			0 Male	78		
19-Sep-05	george	N	Applied	White	40493			0 Female	73		
19-Sep-05	george	N	Applied	White	40494			0 Female	74		
19-Sep-05	george	N	Applied	White	40495			0 Male	79		
19-Sep-05	george	N	Applied	White	40496			0 Female	67		
19-Sep-05	george	N	Applied	White	40498			0 Male	84		
19-Sep-05	george	N	Applied	White	40499			0 Male	69		
19-Sep-05	george	N	Applied	White	40500			0 Male	97.5		
19-Sep-05	george	N	Applied	White	40501			0 Male	90		
19-Sep-05	george	N	Applied	White	40502			0 Female	70		
19-Sep-05	george	N	Applied	White	40504			0 Female	71		
19-Sep-05	george	N	Applied	White	40505			0 Male	59		
19-Sep-05	george	N	Applied	White	40507			0 Female	72		
19-Sep-05	george	N	Applied	White	40508			0 Male	87		
19-Sep-05	george	N	Applied	White	40509			0 Female	65		
19-Sep-05	george	N	Applied	White	40510			0 Female	71		net marks
19-Sep-05	george	N	Applied	White	40511			0 Female	77		
19-Sep-05	george	N	Applied	White	40512			0 Female	73		
19-Sep-05	george	N	Applied	White	40513			0 Female	85		
19-Sep-05	george	N	Applied	White	40514			0 Female	73		net marks
19-Sep-05	george	N	Applied	White	40515			0 Male	77		net marks

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Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
19-Sep-05	george	N	Applied	White	40516			0 Male	69		
19-Sep-05	george	N	Applied	White	40517			0 Male	56		
19-Sep-05	george	N	Applied	White	40518			0 Female	70		l-side open wound.
19-Sep-05	george	N	Applied	White	40519			0 Male	68		
19-Sep-05	george	N	Applied	White	40520			0 Female	61		net marks
19-Sep-05	george	N	Applied	White	40521			0 Male	73		
19-Sep-05	george	N	Recaptured			Brown	22569	Female	66		
19-Sep-05	Penny	N	Recaptured			brown	23910	Male	65	Bottom	
19-Sep-05	Penny	N	Recaptured			Grey	32702	Female	80.5	Bottom	
19-Sep-05	george	N	Recaptured			White	40236	Male	69	Top	
20-Sep-05	Penny	N	Applied	White	40522			0 Male	71.5		
20-Sep-05	Penny	N	Applied	White	40523			0 Female	67		
20-Sep-05	Penny	N	Applied	White	40524			0 Female	67		
20-Sep-05	Penny	N	Applied	White	40525			0 Male	56.5		scar back near dorsal
20-Sep-05	Penny	N	Applied	White	40526			0 Female	63		
20-Sep-05	Penny	N	Applied	White	40527			0 Female	70.5		
20-Sep-05	Penny	N	Applied	White	40529			0 Male	60		
20-Sep-05	Penny	N	Applied	White	40530			0 Male	57		
20-Sep-05	Penny	N	Applied	White	40531			0 Female	72.5		tail
20-Sep-05	Penny	N	Applied	White	40532			0 Male	56		
20-Sep-05	Penny	N	Applied	White	40533			0 Male	87		
20-Sep-05	Penny	N	Applied	White	40534			0 Male	66		
20-Sep-05	Penny	N	Applied	White	40535			0 Male	57		
20-Sep-05	Penny	N	Applied	White	40536			0 Male	87		
20-Sep-05	george	N	Applied	White	40537			0 Female	63		
20-Sep-05	george	N	Applied	White	40538			0 Female	70		
20-Sep-05	george	N	Applied	White	40539			0 Male	84		net marks
20-Sep-05	george	N	Applied	White	40540			0 Female	78		net marks
20-Sep-05	george	N	Applied	White	40541			0 Female	83		net marks
20-Sep-05	george	N	Applied	White	40542			0 Male	83		net marks/L-side claw marks
20-Sep-05	george	N	Applied	White	40543			0 Male	75		
20-Sep-05	george	N	Applied	White	40544			0 Female	66		net marks
20-Sep-05	george	N	Applied	White	40545			0 Female	63		
20-Sep-05	george	N	Applied	White	40546			0 Female	75		net marks

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
20-Sep-05	george	N	Applied	White	40547			0 Female	73		net marks
20-Sep-05	george	N	Applied	White	40548			0 Female	64		
20-Sep-05	george	N	Applied	White	40549			0 Female	71		
20-Sep-05	george	N	Applied	White	40550			0 Female	59		
20-Sep-05	george	N	Applied	White	40551			0 Female	62		broken gill plate r-side
20-Sep-05	george	N	Applied	White	40552			0 Female	72		
20-Sep-05	george	N	None					0			
20-Sep-05	Penny	N	None					0 Male	57.5		
20-Sep-05	george	N	None					0 Female	65		juumped out before tag.
20-Sep-05	Penny	N	Recaptured			White	40375	Female	70	Top	
20-Sep-05	Penny	N	Recaptured			White	40465	Female	69.5	Top	tail/dorsal
21-Sep-05	Penny	N	Applied	White	40503			0 Male	59.5		
21-Sep-05	Penny	N	Applied	White	40548			0 Female	62		
21-Sep-05	Penny	N	Applied	White	40553			0 Male	78.5		
21-Sep-05	Penny	N	Applied	White	40554			0 Male	84.5		
21-Sep-05	Penny	N	Applied	White	40555			0 Male	59		gash mid belly
21-Sep-05	Penny	N	Applied	White	40556			0 Female	69.5		
21-Sep-05	Penny	N	Applied	White	40557			0 Female	61		
21-Sep-05	Penny	N	Applied	White	40558			0 Male	56		
21-Sep-05	Penny	N	Applied	White	40559			0 Female	76		
21-Sep-05	Penny	N	Applied	White	40560			0 Male	75		
21-Sep-05	Penny	N	Applied	White	40561			0 Female	81		double tagged 40562
21-Sep-05	george	N	Applied	White	40563			0 Male	77		torn gills both sides/dorsal dam.
21-Sep-05	george	N	Applied	White	40564			0 Male	73.5		torn dorsal /tail
21-Sep-05	george	N	Applied	White	40565			0 Female	73		
21-Sep-05	george	N	Applied	White	40566			0 Female	67.5		scale loss
21-Sep-05	george	N	Applied	White	40567			0 Male	76		all fins dam.
21-Sep-05	george	N	Applied	White	40568			0 Female	62		net marks/scale loss
21-Sep-05	george	N	Applied	White	40569			0 Female	76		torn tail/scale loss
21-Sep-05	george	N	Applied	White	40570			0 Female	82.5		dorsal cyst
21-Sep-05	george	N	Applied	White	40571			0 Female	79		
21-Sep-05	george	N	Applied	White	40572			0 Female	63		
21-Sep-05	george	N	Applied	White	40573			0 Female	70		double tagged-40574/claw mark L-
21-Sep-05	george	N	Applied	White	40575			0 Female	61		

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
21-Sep-05	george	N	Applied	White	40576			0 Female	73.5		scale loss/tail-gill plate torn.
21-Sep-05	george	N	Applied	White	40577			0 Female	74		L-side cyst/torn fins
21-Sep-05	george	N	Applied	White	40578			0 Female	63		all fucked up.
21-Sep-05	george	N	Applied	White	40579			0 Female	59		scale loss
21-Sep-05	george	N	Applied	White	40580			0 Female	64		tail-dorsal torn
21-Sep-05	george	N	Applied	White	40581			0 Female	87.5		
21-Sep-05	george	N	Applied	White	40582			0 Female	69		net marks/scale loss/torn tail
21-Sep-05	george	N	Applied	White	40583			0 Female	72		tail dam
21-Sep-05	george	N	Applied	White	40584			0 Female	58.5		R-side scar
21-Sep-05	george	N	Applied	White	40585			0 Female	88		scale loss/tail dam
21-Sep-05	george	N	Applied	White	40586			0 Female	73		net marks
21-Sep-05	george	N	Applied	White	40587			0 Male	69		
21-Sep-05	george	N	Applied	White	40588			0 Female	73		scale loss
21-Sep-05	george	N	Applied	White	40589			0 Female	92		
21-Sep-05	george	N	Applied	White	40590			0 Female	97		torn tail
21-Sep-05	george	N	Applied	White	40591			0 Female	69		
21-Sep-05	george	N	Applied	White	40592			0 Female	66		scale loss
21-Sep-05	george	N	None					0 Female	68		jumped out
21-Sep-05	Penny	N	None					0 Female	85.5		
21-Sep-05	george	N	Recaptured			brown	22390	Female	72	Bottom	
21-Sep-05	george	N	Recaptured			green	22560	Female	74.5	Bottom	claw marks
21-Sep-05	Penny	N	Recaptured			brown	23916	Female	63.5	Bottom	
21-Sep-05	george	N	Recaptured			brown	24697	Male	60.5	Top	torn tail
21-Sep-05	Penny	N	Recaptured			Grey	32647	Male	77.5	Bottom	
22-Sep-05	Penny	N	Applied	White	40593			0 Male	72		
22-Sep-05	Penny	N	Applied	White	40594			0 Female	68.5		
22-Sep-05	Penny	N	Applied	White	40595			0 Male	68.5		
22-Sep-05	Penny	N	Applied	White	40596			0 Male	60.5		
22-Sep-05	Penny	N	Applied	White	40597			0 Male	61.5		
22-Sep-05	Penny	N	Applied	White	40598			0 Female	69		
22-Sep-05	Penny	N	Applied	White	40599			0 Male	60.5		
22-Sep-05	Penny	N	Applied	White	40600			0 Female	60.5		
22-Sep-05	Penny	N	Applied	White	40601			0 Male	83		
22-Sep-05	Penny	N	Applied	White	40602			0 Female	70.5		both plates, scars top

Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
22-Sep-05	Penny	N	Applied	White	40603			0 Male	64.5		adipose
22-Sep-05	Penny	N	Applied	White	40604			0 Male	67		
22-Sep-05	Penny	N	Applied	White	40605			0 Female	62.5		scar left, tail
22-Sep-05	Penny	N	Applied	White	40606			0 Female	73.5		
22-Sep-05	george	N	Applied	White	40607			0 Female	81		scales/mouth and all fins dam.
22-Sep-05	george	N	Applied	White	40608			0 Female	78		net marks/tail torn/white spots on
22-Sep-05	george	N	Applied	White	40609			0 Female	60		net marks/scales
22-Sep-05	george	N	Applied	White	40610			0 Female	63.5		scales/torn tail.
22-Sep-05	george	N	Applied	White	40611			0 Female	73		R-L sides
22-Sep-05	george	N	Applied	White	40612			0 Female	71		scale loss/ALL FINS TORN.
22-Sep-05	george	N	Recaptured			White	40477	Female	66	Top	net marks
23-Sep-05	Penny	N	Applied	White	40613			0 Male	84.5		
23-Sep-05	george	N	Applied	White	40614			0 Female	64		cyst on both sides scale loss/tail
23-Sep-05	george	N	Applied	White	40615			0 Male	57		parasites
23-Sep-05	george	N	Applied	White	40616			0 Female	65		
23-Sep-05	george	N	Applied	White	40617			0 Female	77		L-lump on side.
23-Sep-05	george	N	Applied	White	40618			0 Male	83		net marks.
23-Sep-05	george	N	Applied	White	40619			0 Male	91		dorsal scars/bottom scars
23-Sep-05	george	N	Applied	White	40620			0 Female	69		net marks
23-Sep-05	george	N	Recaptured			Grey	29896	Female	75		punch hole in tail
26-Sep-05	Penny	N	Applied	White	40621			0 Female	66		
26-Sep-05	Penny	N	Applied	White	40622			0 Female	61		
26-Sep-05	Penny	N	Applied	White	40623			0 Female	85.5		
26-Sep-05	Penny	N	Applied	White	40624			0 Male	72.5		scar rt
26-Sep-05	Penny	N	Applied	White	40625			0 Male	77.5		tail
26-Sep-05	Penny	N	Applied	White	40626			0 Male	80		
26-Sep-05	Penny	N	Applied	White	40627			0 Male	58.5		tail
26-Sep-05	Penny	N	Applied	White	40628			0 Male	60.5		
26-Sep-05	Penny	N	Applied	White	40629			0 Male	64.5		tail
26-Sep-05	Penny	N	Applied	White	40630			0 Male	59		
26-Sep-05	Penny	N	Applied	White	40631			0 Male	76.5		gash top head
26-Sep-05	Penny	N	Applied	White	40632			0 Male	84.5		
26-Sep-05	Penny	N	Applied	White	40633			0 Male	66.5		
26-Sep-05	Penny	N	Applied	White	40634			0 Male	89.5		mouth,nose,scars rt



Appendix 2. Steelhead data obtained by by dipnetting. Data are sorted by date and applied tag number.

Date1	Crew	Harvest	Tag Status	Applied Color	Applied Tag #	Recaptured Color	Recaptured Tag #	Sex	Fork Length	Caudal Punch	Comments
26-Sep-05	Penny	N	Applied	White	40635			0 Male	81		
26-Sep-05	Penny	N	Applied	White	40636			0 Male	82		
26-Sep-05	Penny	N	Applied	White	40637			0 Male	56.5		
26-Sep-05	Penny	N	Applied	White	40638			0 Male	73.5		left side mouth
26-Sep-05	Penny	N	Applied	White	40639			0 Female	70		
26-Sep-05	george	N	Applied	Grey	40640			0 Male	88		
26-Sep-05	george	N	Applied	Grey	40641			0 Male	69		
26-Sep-05	george	N	Applied	Grey	40642			0 Male	68		
26-Sep-05	george	N	Applied	Grey	40643			0 Female	78		
26-Sep-05	george	N	Applied	Grey	40644			0 Female	70		
26-Sep-05	george	N	Applied	Grey	40644			0 Male	77		
26-Sep-05	george	N	Applied	Grey	40645			0 Male	69		
26-Sep-05	george	N	Applied	Grey	40646			0 Female	66		
26-Sep-05	george	N	Applied	Grey	40647			0 Female	76		
26-Sep-05	george	N	Applied	Grey	40648			0 Male	87		
26-Sep-05	Penny	N	Recaptured			Grey	33479	Male	61.5		no clip
26-Sep-05	Penny	N	Recaptured			White	40424	Male	67	Top	tail
26-Sep-05	george	N	Recaptured			White	40442	Female	69		
27-Sep-05	Penny	N	Applied	White	40649			0 Male	63.5		
27-Sep-05	Penny	N	Applied	White	40650			0 Female	61.5		
27-Sep-05	Penny	N	Applied	White	40651			0 Male	82.5		
27-Sep-05	Penny	N	Applied	White	40652			0 Male	60		
27-Sep-05	George	N	Applied	White	40653			0 Female	78		lumps on both sides,tail damage.
27-Sep-05	george	N	Applied	White	40654			0 Female	72		torn fins
27-Sep-05	george	N	Applied	White	40655			0 Female	80		
27-Sep-05	george	N	Applied	White	40656			0 Male	84		net marks
27-Sep-05	george	N	Applied	White	40657			0 Female	82		scale loss,net marks
27-Sep-05	george	N	Applied	White	40658			0 Female	53		net marks/torn tail
27-Sep-05	george	N	Applied	White	40659			0 Female	70		full body dam.
27-Sep-05	george	N	Applied	White	40660			0 Female	67		lL side scar
27-Sep-05	george	N	Applied	White	40661			0 Male	75		net marks/cut R side

**Appendix 3. Steelhead Recaptures obtained during the 2005 Moricetown tagging program.**

Appendix 3. Steelhead recapture data obtained during the 2005 Moricetown tagging program. Data are sorted by tag colour and tag number.

Tag colour	Tag Number	Tag Origin	Tag Date	Recapture Location	Recapture Date	Original Species ID	Recapture Species ID	Original sex ID	Original FL	Recapture sex ID	Recapture FL
Blue	3475	Canyon	12-Aug-05	Campground	26-Aug-05	Coho	Steelhead	Female	52	Female	53
Blue	5379	Canyon	26-Aug-05	Campground	30-Aug-05	Coho	Steelhead	Female	70	Female	68
brown	22113	Canyon	19-Aug-05	Campground	19-Aug-05	Steelhead	Steelhead	Male	55.5	Female	56
brown	22114	Canyon	19-Aug-05	Campground	06-Sep-05	Steelhead	Steelhead	Male	57.5	Female	57
brown	22118	Canyon	19-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	53	Male	54
brown	22123	Canyon	19-Aug-05	Campground	02-Sep-05	Steelhead	Steelhead	Female	65.5	Female	65
brown	22216	Canyon	19-Aug-05	Canyon	14-Sep-05	Steelhead	Steelhead	Male	78	Male	77.5
brown	22257	Canyon	19-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	66	Female	52.5
brown	22269	Canyon	19-Aug-05	Campground	26-Aug-05	Steelhead	Steelhead	Female	70	Female	71.5
brown	22278	Canyon	22-Aug-05	Canyon	23-Aug-05	Steelhead	Steelhead	Male	55	Female	46
brown	22312	Canyon	22-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Female	61	Male	51
brown	22324	Canyon	22-Aug-05	Campground	23-Aug-05	Steelhead	Steelhead	Male	54	Female	54
brown	22335	Canyon	23-Aug-05	Campground	29-Aug-05	Steelhead	Steelhead	Female	61.5	Female	64
brown	22352	Canyon	22-Aug-05	Canyon	15-Sep-05	Steelhead	Steelhead	Male	68	Male	67
brown	22362	Canyon	22-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Female	63	Female	62
brown	22370	Canyon	22-Aug-05	Canyon	13-Sep-05	Steelhead	Steelhead	Female	52	Female	51.5
brown	22372	Canyon	22-Aug-05	Canyon	31-Aug-05	Steelhead	Steelhead	Female	55	Female	54
brown	22378	Canyon	23-Aug-05	Canyon	25-Aug-05	Steelhead	Steelhead	Male	62	Male	61.5
brown	22380	Canyon	23-Aug-05	Canyon	08-Sep-05	Steelhead	Steelhead	Female	57	Female	57
brown	22385	Canyon	23-Aug-05	Campground	30-Aug-05	Steelhead	Steelhead	Female	67	Female	67.5
brown	22390	Canyon	23-Aug-05	Campground	13-Sep-05	Steelhead	Steelhead	Male	68	Male	68.5
brown	22390	Canyon	23-Aug-05	Campground	29-Aug-05	Steelhead	Steelhead	Male	68	Male	68.5
brown	22390	Canyon	23-Aug-05	Canyon	21-Sep-05	Steelhead	Steelhead	Male	68	Female	72
brown	22399	Canyon	23-Aug-05	Campground	24-Aug-05	Steelhead	Steelhead	Male	91	Male	90.5
brown	22452	Canyon	24-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	57	Male	57
brown	22456	Canyon	24-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Female	56	Female	54
brown	22457	Canyon	24-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Female	81	Male	77
brown	22469	Canyon	24-Aug-05	Canyon	25-Aug-05	Steelhead	Steelhead	Female	60	Female	61
brown	22495	Canyon	30-Aug-05	Canyon	12-Sep-05	Steelhead	Steelhead	Female	71	Male	55
brown	22495	Canyon	30-Aug-05	Campground	07-Sep-05	Steelhead	Steelhead	Female	71	Female	56
brown	22560	Campground	14-Sep-05	Canyon	21-Sep-05	Steelhead	Steelhead	Female	73.5	Female	75
brown	22569	Campground	15-Sep-05	Canyon	19-Sep-05	Steelhead	Steelhead	Female	53	Female	66
brown	22606	Campground	14-Sep-05	Canyon	16-Sep-05	Steelhead	Steelhead	Female	77	Male	77
brown	22613	Campground	13-Sep-05	Canyon	15-Sep-05	Steelhead	Steelhead	Female	66	Female	65
Brown	22621	Campground	11-Sep-05	Campground	11-Sep-05	Steelhead	Steelhead	Female	74	Female	74
brown	22623	Campground	11-Sep-05	Campground	22-Sep-05	Steelhead	Steelhead	Male	75.5	Female	75.5

Appendix 3. Steelhead recapture data obtained during the 2005 Moricetown tagging program. Data are sorted by tag colour and tag number.

Tag colour	Tag Number	Tag Origin	Tag Date	Recapture Location	Recapture Date	Original Species ID	Recapture Species ID	Original sex ID	Original FL	Recapture sex ID	Recapture FL
brown	22626	Campground	08-Sep-05	Campground	08-Sep-05	Steelhead	Steelhead	Female	67.5	Female	67.5
brown	22626	Campground	08-Sep-05	Campground	08-Sep-05	Steelhead	Steelhead	Female	67.5	Female	67
brown	22638	Campground	09-Sep-05	Campground	09-Sep-05	Steelhead	Steelhead	Female	50	Female	50
brown	22638	Campground	09-Sep-05	Campground	09-Sep-05	Steelhead	Steelhead	Female	50	Female	50
brown	22641	Campground	09-Sep-05	Canyon	12-Sep-05	Steelhead	Steelhead	Female	56.5	Female	54
brown	22642	Campground	09-Sep-05	Campground	13-Sep-05	Steelhead	Steelhead	Female	52	Female	51
brown	23719			Campground	08-Aug-05		Steelhead			Female	68
brown	23910	Campground	16-Sep-05	Canyon	19-Sep-05	Steelhead	Steelhead	Female	60.5	Male	65
brown	23916	Campground	16-Sep-05	Canyon	21-Sep-05	Steelhead	Steelhead	Female	64	Female	63.5
brown	24500			Canyon	31-Aug-05		Steelhead			Female	53
brown	24551	Canyon	25-Aug-05	Campground	09-Sep-05	Steelhead	Steelhead	Female	77	Female	75
brown	24551	Canyon	25-Aug-05	Campground	25-Aug-05	Steelhead	Steelhead	Female	77	Male	76.5
brown	24569	Canyon	25-Aug-05	Canyon	02-Sep-05	Steelhead	Steelhead	Female	53	Female	53
brown	24615	Canyon	26-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Male	61	Male	61
brown	24636	Canyon	24-Aug-05	Canyon	29-Aug-05	Steelhead	Steelhead	Female	59	Female	59.5
brown	24674			Campground	29-Aug-05		Steelhead			Female	58
brown	24697	Canyon	29-Aug-05	Canyon	21-Sep-05	Steelhead	Steelhead	Female	58.5	Male	60.5
brown	24721	Canyon	25-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	55	Female	54
brown	24740	Canyon	24-Aug-05	Canyon	13-Sep-05	Steelhead	Steelhead	Female	48	Male	49.5
brown	24791	Canyon	29-Aug-05	Canyon	13-Sep-05	Steelhead	Steelhead	Female	67	Female	66
brown	24792	Canyon	29-Aug-05	Campground	07-Sep-05	Steelhead	Steelhead	Female	58	Female	57
brown	24792	Canyon	29-Aug-05	Campground	07-Sep-05	Steelhead	Steelhead	Female	58	Female	57
brown	24823	Campground	30-Aug-05	Canyon	07-Sep-05	Steelhead	Steelhead	Female	72.5	Male	52.5
brown	24827	Campground	31-Aug-05	Campground	16-Sep-05	Steelhead	Steelhead	Female	78.5	Female	78
brown	24831	Campground	01-Sep-05	Campground	01-Sep-05	Steelhead	Steelhead	Female	82.5	Female	82
brown	24836	Campground	01-Sep-05	Canyon	02-Sep-05	Steelhead	Steelhead	Female	66	Male	65
brown	24853	Campground	02-Sep-05	Canyon	09-Sep-05	Steelhead	Steelhead	Male	91	Female	90.5
brown	24871	Campground	07-Sep-05	Campground	21-Sep-05	Steelhead	Steelhead	Female	74	Female	74
brown	24876	Campground	25-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	57	Female	66
brown	24882	Campground	25-Aug-05	Campground	25-Aug-05	Steelhead	Steelhead	Female	77	Female	77
brown	24886	Campground	26-Aug-05	Canyon	29-Aug-05	Steelhead	Steelhead	Female	80.5	Female	80
brown	24896	Campground	26-Aug-05	Canyon	02-Sep-05	Steelhead	Steelhead	Male	57	Male	56
brown	24898	Campground	29-Aug-05	Canyon	31-Aug-05	Steelhead	Steelhead	Male	60	Male	59
Green	38117	Canyon	31-Aug-05	Campground	14-Sep-05	Steelhead	Steelhead	Female	65	Female	64.5
green	38526	Canyon	27-Jul-05	Canyon	12-Aug-05	Steelhead	Steelhead	Male	58	Female	57
green	38541	Canyon	08-Aug-05	Campground	08-Aug-05	Steelhead	Steelhead	Female	60	Female	62

Appendix 3. Steelhead recapture data obtained during the 2005 Moricetown tagging program. Data are sorted by tag colour and tag number.

Tag colour	Tag Number	Tag Origin	Tag Date	Recapture Location	Recapture Date	Original Species ID	Recapture Species ID	Original sex ID	Original FL	Recapture sex ID	Recapture FL
green	38562	Canyon	04-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Female	49	Male	50
green	38562	Canyon	04-Aug-05	Campground	08-Aug-05	Steelhead	Steelhead	Female	49	Female	50
green	38569	Canyon	11-Aug-05	Campground	22-Aug-05	Steelhead	Steelhead	Female	52.5	Female	53
green	38569	Canyon	11-Aug-05	Canyon	15-Aug-05	Steelhead	Steelhead	Female	52.5	Female	52
green	38575	Canyon	11-Aug-05	Campground	24-Aug-05	Steelhead	Steelhead	Female	55	Female	55
Green	38582	Canyon	15-Aug-05	Canyon	11-Aug-05	Steelhead	Steelhead	Female	67	Female	52
Green	38652	Canyon	15-Aug-05	Canyon	22-Aug-05	Steelhead	Steelhead	Female	66	Female	66
green	38656	Canyon	11-Aug-05	Campground	22-Aug-05	Steelhead	Steelhead	Female	70	Female	72
Green	38673	Canyon	12-Aug-05	Campground	12-Aug-05	Steelhead	Steelhead	Female	52	Female	51.5
green	38681	Canyon	12-Aug-05	Canyon	31-Aug-05	Steelhead	Steelhead	Female	51	Female	51
green	38688	Canyon	12-Aug-05	Campground	15-Aug-05	Steelhead	Steelhead	Female	66	Male	67
green	38714	Canyon	15-Aug-05	Campground	15-Aug-05	Steelhead	Steelhead	Female	53	Male	52.5
green	38737	Canyon	15-Aug-05	Campground	29-Aug-05	Steelhead	Steelhead	Female	50	Female	49.5
Green	38738	Canyon	15-Aug-05	Canyon	19-Aug-05	Steelhead	Steelhead	Female	53	Female	54
green	38746	Canyon	15-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Female	53.5	Male	53
green	38747	Canyon	15-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Female	49	Female	55
green	38804	Canyon	15-Aug-05	Campground	15-Aug-05	Steelhead	Steelhead	Female	58	Female	58
green	38810	Canyon	15-Aug-05	Campground	29-Aug-05	Steelhead	Steelhead	Female	70	Female	71.5
green	38812	Canyon	15-Aug-05	Campground	18-Aug-05	Steelhead	Steelhead	Male	73	Female	75
Green	38819	Canyon	15-Aug-05	Campground	16-Aug-05	Steelhead	Steelhead	Female	63	Female	62
Green	38821	Canyon	15-Aug-05	Canyon	08-Sep-05	Steelhead	Steelhead	Female	69	Male	68
green	38951	Canyon	18-Aug-05	Campground	14-Sep-05	Steelhead	Steelhead	Female	70	Female	70
Green	39650	Canyon	31-Aug-05	Campground	14-Sep-05	Steelhead	Steelhead	Female	67	Female	68
Grey	29604	Campground	12-Aug-03	Canyon	Ayg 17, 2005	Steelhead	Steelhead	Male	52.5	Male	69
Grey	29703	Campground	14-Aug-03	Canyon	16-Aug-05	Steelhead	Steelhead	Male	62	Male	62
Grey	29729	Campground	14-Aug-03	Canyon	30-Aug-05	Steelhead	Steelhead	Male	54	Male	69
Grey	29747	Campground	15-Aug-03	Campground	22-Aug-05	Steelhead	Steelhead	Female	62	Female	64
Grey	29763	Campground	15-Aug-03	Canyon	19-Aug-05	Steelhead	Steelhead	Male	55	Male	69
Grey	29896	Campground	21-Aug-03	Canyon	23-Sep-05	Steelhead	Steelhead	Female	57	Female	75
Grey	31106	Canyon	01-Aug-03	Canyon	29-Aug-05	Steelhead	Steelhead	Male	52	Female	64
Grey	31137	Canyon	06-Aug-03	Canyon	31-Aug-05	Steelhead	Steelhead	Female	72	Female	80
Grey	31228	Canyon	07-Aug-03	Canyon	03-Aug-05	Steelhead	Steelhead	Female	56.5	Female	66
Grey	31346	Canyon	12-Aug-03	Campground	17-Aug-05	Steelhead	Steelhead	Male	68	Male	75.5
Grey	31432	Canyon	13-Aug-03	Canyon	15-Aug-05	Steelhead	Steelhead	Male	70	Female	74
Grey	31525	Canyon	14-Aug-03	Canyon	16-Aug-05	Steelhead	Steelhead	Female	58	Female	66
Grey	31656	Canyon	18-Aug-03	Campground	23-Sep-05	Steelhead	Steelhead	Female	69	Female	79

Appendix 3. Steelhead recapture data obtained during the 2005 Moricetown tagging program. Data are sorted by tag colour and tag number.

Tag colour	Tag Number	Tag Origin	Tag Date	Recapture Location	Recapture Date	Original Species ID	Recapture Species ID	Original sex ID	Original FL	Recapture sex ID	Recapture FL
Grey	31691	Canyon	18-Aug-03	Canyon	18-Aug-05	Steelhead	Steelhead	Female	52	Male	63
Grey	31849	Canyon	21-Aug-03	Canyon	17-Aug-05	Steelhead	Steelhead	Female	55	Female	64
Grey	31890	Canyon	22-Aug-03	Canyon	31-Aug-05	Steelhead	Steelhead	Female	58	Male	69
Grey	31964	Canyon	22-Aug-03	Canyon	17-Aug-05	Steelhead	steelhead	Female	54	Female	66
Grey	31964	Canyon	22-Aug-03	Canyon	10-Aug-05	Steelhead	Steelhead	Female	54	Female	63
Grey	31974	Canyon	22-Aug-03	Campground	30-Aug-05	Steelhead	Steelhead	Male	63.5	Male	66
Grey	31974	Canyon	22-Aug-03	Campground	30-Aug-05	Steelhead	Steelhead	Female	51	Male	66
Grey	32313	Canyon	27-Aug-03	Canyon	08-Aug-05	Steelhead	Steelhead	Female	65.5	Female	89
Grey	32467	Canyon	29-Aug-03	Canyon	15-Aug-05	Steelhead	Steelhead	Male	61	Female	72.5
Grey	32486	Canyon	29-Aug-03	Canyon	15-Aug-05	Steelhead	Steelhead	Female	65	Female	71
Grey	32543	Canyon	09-Mar-03	Canyon	29-Aug-05	Steelhead	Steelhead	Female	69	Female	75
Grey	32585	Canyon	09-Apr-03	Canyon	29-Aug-05	Steelhead	Steelhead	Female	66	Female	
Grey	32619	Canyon	09-Mar-03	Canyon	09-Sep-05	Steelhead	Steelhead	Female	56	Male	71
Grey	32647	Canyon	09-Mar-03	Canyon	21-Sep-05	Steelhead	Steelhead	Female	62.5	Male	77.5
Grey	32702	Canyon	09-May-03	Canyon	19-Sep-05	Steelhead	Steelhead	Female	65	Female	80.5
Grey	33028	Campground	26-Aug-03	Canyon	16-Sep-05	Steelhead	Steelhead	Male	51	Male	62
Grey	33077	Campground	28-Aug-03	Canyon	07-Sep-05	Steelhead	Steelhead	Female	51	Female	59.5
Grey	33168	Campground	04-Sep-03	Canyon	01-Sep-05	Steelhead	Steelhead	Female	74	Female	77
Grey	33201	Campground	12-Sep-03	Canyon	17-Aug-05	Steelhead	Steelhead	Female	72	Male	77
Grey	33288	Campground	10-Aug-04	Canyon	11-Aug-05	Steelhead	Steelhead	Female	53.5	Female	57
Grey	33479	Campground	02-Sep-04	Canyon	26-Sep-05	Steelhead	Steelhead	Female	67	Male	61.5
Grey	33608	Campground	28-Jul-05	Canyon	11-Aug-05	Steelhead	Steelhead	Female	80.5	Female	78
Grey	33622	Campground	03-Aug-05	Canyon	15-Aug-05	Steelhead	Steelhead	Female	71	Female	71
Grey	33623	Campground	03-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Female	66	Female	66
Grey	33625	Campground	03-Aug-05	Campground	10-Aug-05	Steelhead	Steelhead	Female	50.5	Female	50
Grey	33633	Campground	04-Aug-05	Canyon	10-Aug-05	Steelhead	Steelhead	Female	58	Female	57
Grey	33646	Campground	04-Aug-05	Campground	15-Aug-05	Steelhead	Steelhead	Female	53	Female	51
Grey	33651	Campground	12-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Female	71.5	Male	71
Grey	33656	Campground	12-Aug-05	Canyon	17-Aug-05	Steelhead	Steelhead	Male	85.5	Female	85
Grey	33657	Campground	12-Aug-05	Canyon	15-Aug-05	Steelhead	Steelhead	Unknown	54	Female	55
Grey	33660	Campground	12-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Female	52	Male	51
Grey	33663	Campground	12-Aug-05	Canyon	15-Aug-05	Steelhead	Steelhead	Female	55	Male	55
Grey	33665	Campground	15-Aug-05	Campground	19-Aug-05	Steelhead	Steelhead	Female	59	Female	59.5
Grey	33682	Campground	15-Aug-05	Canyon	22-Aug-05	Steelhead	Steelhead	Female	57	Female	55
Grey	33686	Campground	15-Aug-05	Canyon	19-Aug-05	Steelhead	Steelhead	Female	56	Female	55
Grey	33691	Campground	16-Aug-05	Campground	16-Aug-05	Steelhead	Steelhead	Female	50.5	Female	51

Appendix 3. Steelhead recapture data obtained during the 2005 Moricetown tagging program. Data are sorted by tag colour and tag number.

Tag colour	Tag Number	Tag Origin	Tag Date	Recapture Location	Recapture Date	Original Species ID	Recapture Species ID	Original sex ID	Original FL	Recapture sex ID	Recapture FL
Grey	33693	Campground	16-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Male	74	Male	73
Grey	33699	Campground	16-Aug-05	Campground	26-Aug-05	Steelhead	Steelhead	Female	55	Female	55
Grey	33701	Campground	05-Aug-05	Campground	10-Aug-05	Steelhead	Steelhead	Female	56	Female	56
Grey	33723	Campground	05-Aug-05	Campground	16-Aug-05	Steelhead	Steelhead	Female	53	Female	53
Grey	33733	Campground	08-Aug-05	Canyon	15-Aug-05	Steelhead	Steelhead	Female	63.5	Female	63.5
Grey	33739	Campground	08-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Female	51	Male	50.5
Grey	33739	Campground	08-Aug-05	Campground	08-Aug-05	Steelhead	Steelhead	Female	51	Female	51
Grey	33742	Campground	08-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Female	54	Female	54
Grey	33795	Campground	20-Aug-04	Campground	17-Aug-05	Steelhead	Steelhead	Female	50	Female	57
Grey	33801	Campground	08-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Female	58	Male	58
Grey	33807	Campground	09-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Male	50	Male	50
Grey	33812	Campground	09-Aug-05	Campground	29-Aug-05	Steelhead	Steelhead	Female	54	Female	54.5
Grey	33822	Campground	09-Aug-05	Canyon	15-Aug-05	Steelhead	Steelhead	Female	66.5	Female	66
Grey	33823	Campground	09-Aug-05	Canyon	08-Sep-05	Steelhead	Steelhead	Female	62	Female	61
Grey	33823	Campground	09-Aug-05	Canyon	02-Sep-05	Steelhead	Steelhead	Female	62	Female	62
Grey	33823	Campground	09-Aug-05	Canyon	25-Aug-05	Steelhead	Steelhead	Female	62	Female	62
Grey	33824	Campground	10-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Male	54.5	Female	53
Grey	33840	Campground	11-Aug-05	Campground	22-Aug-05	Steelhead	Steelhead	Female	55	Female	55
Grey	33844	Campground	11-Aug-05	Canyon	16-Sep-05	Steelhead	Steelhead	Male	75	Male	74
Grey	33847	Campground	11-Aug-05	Canyon	29-Aug-05	Steelhead	Steelhead	Female	82	Female	82
Grey	33851	Campground	16-Aug-05	Canyon	23-Aug-05	Steelhead	Steelhead	Female	62.5	Female	62
Grey	33856	Campground	17-Aug-05	Canyon	01-Sep-05	Steelhead	Steelhead	Female	62	Female	62
Grey	33857	Campground	17-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Male	53	Female	53
Grey	33865	Campground	17-Aug-05	Canyon	22-Aug-05	Steelhead	Steelhead	Male	54.5	Female	53
Grey	33871	Campground	18-Aug-05	Canyon	25-Aug-05	Steelhead	Steelhead	Female	70	Male	69
Grey	33872	Campground	18-Aug-05	Canyon	24-Aug-05	Steelhead	Steelhead	Female	55	Female	54
Grey	33907	Campground	19-Aug-05	Canyon	25-Aug-05	Steelhead	Steelhead	Female	52.5	Male	51
Grey	33909	Campground	19-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Female	76	Female	76
Grey	33910	Campground	19-Aug-05	Canyon	31-Aug-05	Steelhead	Steelhead	Female	52	Male	52
Grey	33913	Campground	22-Aug-05	Campground	22-Aug-05	Steelhead	Steelhead	Male	72	Male	71.5
Grey	33915	Campground	22-Aug-05	Campground	11-Sep-05	Steelhead	Steelhead	Female	64	Female	64
Grey	33922	Campground	22-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Female		Female	58
Grey	33926	Campground	22-Aug-05	Canyon	01-Sep-05	Steelhead	Steelhead	Male	69	Male	67
Grey	33926	Campground	22-Aug-05	Canyon	01-Sep-05	Steelhead	Steelhead	Male	69	Male	67
Grey	33927	Campground	22-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	53.5	Female	52
Grey	33930	Campground	22-Aug-05	Campground	26-Aug-05	Steelhead	Steelhead	Male	53	Female	54

Appendix 3. Steelhead recapture data obtained during the 2005 Moricetown tagging program. Data are sorted by tag colour and tag number.

Tag colour	Tag Number	Tag Origin	Tag Date	Recapture Location	Recapture Date	Original Species ID	Recapture Species ID	Original sex ID	Original FL	Recapture sex ID	Recapture FL
Grey	33954	Campground	22-Aug-05	Campground	31-Aug-05	Steelhead	Steelhead	Female	66	Female	66
Grey	33958	Campground	23-Aug-05	Canyon	07-Sep-05	Steelhead	Steelhead	Female	53	Male	52
Grey	33963	Campground	23-Aug-05	Canyon	26-Aug-05	Steelhead	Steelhead	Female	80.5	Female	82
Grey	33966	Campground	23-Aug-05	Campground	29-Aug-05	Steelhead	Steelhead	Female	57.5	Female	57.5
Grey	33971	Campground	23-Aug-05	Canyon	25-Aug-05	Steelhead	Steelhead	Female	54	Male	53
Grey	33986	Campground	24-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	67	Female	65
light green	38929	Canyon	19-Aug-05	Canyon	02-Sep-05	Steelhead	Steelhead	Female	64	Female	68
light green	38940	Canyon	19-Aug-05	Canyon	29-Aug-05	Steelhead	Steelhead	Female	53	Male	52.5
light green	38958	Canyon	18-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Female	69	Female	69
light green	38965	Canyon	18-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Male	84	Male	83
Lime Green	20315	Campground	14-Aug-05	Canyon	16-Aug-05	Coho	Steelhead	Male	65.5	Female	66
Lime Green	21105	Campground	15-Aug-05	Canyon	19-Aug-05	Coho	Steelhead	Female	55	Female	54
Lime Green	38585	Canyon	08-Aug-05	Canyon	31-Aug-05	Steelhead	Steelhead	Female	51	Male	49
Lime Green	38587	Canyon	08-Aug-05	Canyon	11-Aug-05	Steelhead	Steelhead	Female	67.5	Female	65
Lime Green	38844	Canyon	16-Aug-05	Canyon	16-Aug-05	Steelhead	Steelhead	Female	50	Female	50
Lime Green	38856	Canyon	16-Aug-05	Canyon	31-Aug-05	Steelhead	Steelhead	Female	71	Female	69
Lime Green	38876	Canyon	16-Aug-05	Canyon	09-Sep-05	Steelhead	Steelhead	Female	76	Male	76
Lime Green	38877	Canyon	16-Aug-05	Canyon	08-Sep-05	Steelhead	Steelhead	Female	80	Female	54
Lime Green	38878	Canyon	16-Aug-05	Canyon	31-Aug-05	Steelhead	Steelhead	Male	57	Male	51
Lime Green	38887	Canyon	16-Aug-05	Canyon	25-Aug-05	Steelhead	Steelhead	Male	56	Female	57
lime green	38897	Canyon	17-Aug-05	Canyon	25-Aug-05	steelhead	Steelhead	Female	52	Female	62
Lime Green	38907	Canyon	17-Aug-05	Canyon	30-Aug-05	Steelhead	Steelhead	Female	50	Female	50
Lime Green	38920	Canyon	17-Aug-05	Canyon	18-Aug-05	Steelhead	Steelhead	Male	84	Male	86
lime green	38982			Canyon	14-Sep-05		Steelhead			Male	51
Lime Green	38982	Canyon	17-Aug-05	Canyon	14-Sep-05	Steelhead	Steelhead	Female	52	Male	51
White	14673	Canyon	05-Aug-04	Canyon	30-Aug-05	Steelhead	Steelhead	Male	51.5	Male	58
White	40236	Canyon	27-Aug-04	Canyon	19-Sep-05	Steelhead	Steelhead	Female	71	Male	69
White	40271	Canyon	01-Sep-05	Campground	07-Sep-05	Steelhead	Steelhead	Male	71	Female	72
White	40280	Canyon	02-Sep-05	Campground	20-Sep-05	Steelhead	Steelhead	Female	57	Female	55
White	40283	Canyon	02-Sep-05	Campground	06-Sep-05	Steelhead	Steelhead	Female	54	Female	54
White	40283	Canyon	02-Sep-05	Campground	06-Sep-05	Steelhead	Steelhead	Female	54	Female	54
White	40316	Canyon	02-Sep-05	Canyon	13-Sep-05	Steelhead	Steelhead	Female	55	Male	57
White	40321	Canyon	06-Sep-05	Canyon	13-Sep-05	Steelhead	Steelhead	Male	75.5	Male	76.5
White	40324	Canyon	06-Sep-05	Campground	20-Sep-05	Steelhead	Steelhead	Female	66	Female	67
White	40326	Canyon	09-Aug-05	Campground	13-Sep-05	Steelhead	Steelhead	Male	63	Female	64.5
White	40375	Canyon	13-Sep-05	Canyon	20-Sep-05	Steelhead	Steelhead	Female	66	Female	70



Appendix 3. Steelhead recapture data obtained during the 2005 Moricetown tagging program. Data are sorted by tag colour and tag number.

Tag colour	Tag Number	Tag Origin	Tag Date	Recapture Location	Recapture Date	Original Species ID	Recapture Species ID	Original sex ID	Original FL	Recapture sex ID	Recapture FL
White	40382	Canyon	07-Sep-05	Campground	07-Sep-05	Steelhead	Steelhead	Male	57	Female	57
White	40411	Canyon	13-Sep-05	Campground	16-Sep-05	Steelhead	Steelhead	Female	52	Female	52
White	40424	Canyon	14-Sep-05	Canyon	26-Sep-05	Steelhead	Steelhead	Male	59	Male	67
White	40440	Canyon	14-Sep-05	Campground	20-Sep-05	Steelhead	Steelhead	Female	59	Female	60
White	40442	Canyon	14-Sep-05	Canyon	26-Sep-05	Steelhead	Steelhead	Female	66.5	Female	69
White	40447	Canyon	14-Sep-05	Campground	15-Sep-05	Steelhead	Steelhead	Female	66	Female	67
White	40456	Canyon	16-Sep-05	Campground	20-Sep-05	Steelhead	Steelhead	Female	69	Female	70
White	40458	Canyon	16-Sep-05	Canyon	16-Sep-05	Steelhead	Steelhead	Male	71	Female	71
White	40465	Canyon	16-Sep-05	Canyon	20-Sep-05	Steelhead	Steelhead	Male	65	Female	69.5
White	40477	Canyon	19-Sep-05	Canyon	22-Sep-05	Steelhead	Steelhead	Male	66	Female	66
White	40531	Canyon	20-Sep-05	Campground	20-Sep-05	Steelhead	Steelhead	Female	72.5	Female	65
Yellow	37470			Canyon	16-Sep-05		Steelhead			Male	75

**Appendix 4. Breakdown of mark-recapture data for calculation of the Schaeffer estimate**

"2005 steelhead 0% tag loss"

	8	8	"Col 1"	"Col 2"	"Col 3"	"Col 4"	"Col 5"	"Col 6"	"Col 7"	"Col 8"
"row 1"	47									
"row 2"	63	2								
"row 3"	77	3	7	2						
"row 4"	95		5	8	3					
"row 5"	62		2	2	7	2				
"row 6"	34					1	2			
"row 7"	68		1					1	2	
"row 8"	81								4	
			43	171	453	348	247	70	102	200

>>>2005 data 5% tag loss - Chi-square Test Statistics

Complete Mixing : 30.80 (6 df)

Significance... 0.00

Equal Proportions: 9.62 (6 df)

Significance... 0.14

> End of Pooling Tests

>> ML Darroch Estimate

Total Number of iterations is 1 (Max iterations is 25)

Estimate (std. err) : 18126.25 ( 6202.87)

Log likelihood : 7199.27

95 % normal C I :( 5968.63, 30283.87)

G-square : 0.00 (0 df)

Significance : 2.00

Chi-square : 0.00 (0 df)

Significance... 2.00

> Table of Stratum Estimates & Predicted counts N(cap), m(cap,rec), u(rec)

Stratum	Si	S.E.(Size)	P(Capture)	S.E.(P(Cap	1	2	3	4	5	6&8	7
1	4777.55	3362.41	0.0093	0.0066	2.00	3.00	0.00	0.00	0.00	0.00	0.00
2	204.90	2971.94	0.2921	4.2367	0.00	8.00	5.00	2.00	1.00	1.00	0.00
3	2550.78	2758.61	0.0287	0.0310	0.00	3.00	8.00	2.00	0.00	0.00	0.00
4	1561.86	1536.41	0.0578	0.0568	0.00	0.00	3.00	7.00	1.00	0.00	0.00
5	1451.02	2138.03	0.0406	0.0598	0.00	0.00	0.00	2.00	2.00	0.00	0.00
6	1988.92	3351.49	0.0162	0.0274	0.00	0.00	0.00	0.00	0.00	1.00	0.00
7&8	5591.22	2760.00	0.0253	0.0125	0.00	0.00	0.00	0.00	0.00	2.00	4.00

Unmarked 212.00 439.00 332.00 234.00 66.00 140.00 154.00

> End of Table