

WATER TRANSFER WORKING GROUP PROJECT DESCRIPTION

APPLICATION NO./COURT CLAIM NO. American River Recreational Cabin Communities – See Table 1		
APPLICANT NAME Cabin Owners within the following tracts: Timber Creek (13) Union Creek (6) Pleasant Valley (7) Idlehour (7) Sleepy Hollow (15) American River (11)	CONTACT NAME Kelsey Collins	TELEPHONE NO. 509-575-2640
WATER RIGHT HOLDER'S NAME (if different) Multiple – See Table 1		EMAIL KESI461@ECY.WA.GOV

DATE OF APPLICATION Pending	PRIORITY DATE Multiple; mitigated by trust water right with June 30, 1873 priority date
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WATER SOURCE: Water from and tributary to the American River	CROP: N/A - Indoor Use Only
INSTANTANEOUS QUANTITY: N/A	ANNUAL QUANTITY: 1.22 acre-feet (consumptive use)
PERIOD OF USE: Continuous – year round	
PLACE OF USE: See attached map and description below.	PURPOSE OF USE: Community or single domestic – indoor use only
IRRIGATION METHOD: N/A	

<p>CONSUMPTIVE USE CALCULATION:</p> <p><u>Court Claims and Temporary Surface Water Permits</u> – For consistency, Ecology has assumed the same consumptive use defined by rule (WAC 173-539(A)-050(3)) in upper Kittitas County as 30 percent of total use. Therefore, for existing claims and temporary surface water permits, the consumptive use was estimated to be 30 percent of the authorized Qa. It is recognized that for many claims, the total Qa is conservatively high when compared to actual use, and the number may be adjusted downward following the investigation.</p> <p><u>Unauthorized Water Users</u> - In 2006, Ecology completed a survey to identify the number of water users that rely on surface water, how they use water (in-house and/or outside irrigation), and how much water they use. Ecology received 285 completed surveys from water users with and without water rights. Ecology estimated the group's annual water use by multiplying the gallon per day (gpd) identified on the survey by the number of days the cabin was occupied. In cases where a water duty was not</p>

provided, Ecology used criteria developed for mitigation during the 2005 drought and/or procedures outlined in the Washington State Department of Health (2009) Water System Design Manual.

Based on the available data, Ecology determined that the average seasonal recreational cabin uses no more than 100 gpd or about 0.03 ac-ft/yr for occupancy up to 105 days per year. This equates to approximately 0.01 ac-ft/yr (consumptive use) per seasonal cabin. Ecology's 2006 report also determined that full time/permanent residence with no irrigation uses up to 200 gpd (total use). This is approximately equal to 0.06 ac-ft/y (consumptive use).

Specific to the American River drainage, the survey resulted in 33 responses. At least one survey response was received from each American River cabin community except for one (Pleasant Valley). Examination of the survey results indicate that for the American River drainage an average of 35 gpd is used per cabin for an average of 63 days per year.

The three lower basin communities (American Forks, American River, Sleepy Hollow) have electrical service and tend to be more frequently occupied than the four upper basin communities (Idlehour, Pleasant Valley, Union Creek, and Timber Creek) which lack utilities. Many of the lower communities have wells, where the upper communities rely on surface water. In addition, the many upper basin communities are not readily accessible and use a very limited amount of water during the winter.

Most cabins in the American River drainage are primitive and all are leased from the USFS. The lease with the USFS prohibits year round occupancy and limits improvements. Therefore, based on the survey results, site observations, and interviews with individual cabin owners, the water use estimates reported above are considered to be conservatively high.

Total use from each individual cabin and cabin community will be confirmed with metering data, when available.

NARRATIVE DESCRIPTION OF PROJECT:

As directed by Senate Bill 6861, Ecology is providing water banking opportunities for Yakima Basin Cabin Owners with junior claims (post-1905) to purchase senior mitigation credits to offset the consumptive use of water during years of rationing by the United States Bureau of Reclamation.

Ecology proposes to offset the consumptive use with mitigation credits from Trust Water Right Nos. CS4-00195CTCL(A)sb6, CS4-00195CTCL(B)sb6, and CS4-00195CTCL(C)sb6 – collectively known as Bruton Ditch. The Bruton Ditch project was last presented to the WTWG on September 14, 2009.

Of the 60 ac-ft/yr currently assigned to the USBR-Ecology Exchange Contract (Contract No. 09XX101700) under the Bruton Ditch project, 1.22 ac-ft will be allocated to the subject application to address impacts to TWSA.

Diversion of surface water during rationing years will impact flows in the Yakima River when the TWSA irrigation supply period is in effect.

IMPACT ANALYSIS

The following section provides community-specific details and a cumulative impact analysis, starting from high in the basin, down to the American and Bumping River confluence. Photographs of representative individual community diversions are attached.

Timber Creek – Lots 1-3, 5-13, 15 of Timber Creek Summer Homes within unsurveyed Section 34 and 35, T. 17 N., R. 11 E.W.M., Wenatchee National Forest.

A site visit was conducted by Tyson Carlson (Aspect) and Jonathon Kohr (WDFW) on October 4, 2013. During the site visit, several of the points of diversion were observed on lower Timber Creek. Additional site visit(s) were completed by Tyson to observe other points of diversion and spring discharge.

Several (6) points of diversion are located on Timber Creek above a large water fall, about 2,800 feet from the confluence with the American River. Other diversions (2) are located along Timber Creek directly above the confluence. In addition, several (2-4) diversions are either located directly on the American River, or a (1) small spring located about 1,300 feet from the American River. Water is diverted from the creek, river, or spring, via gravity or a small submersible pump, then conveyed to individual cabins. Water which is not consumptively used is discharged to an individual on-site septic or drainfield which discharge to the lower reach of Timber Creek or the American River.

Union Creek – Lots 2-7 of Union Creek Recreation Residence Group within the SW $\frac{1}{4}$ of unsurveyed Section 25, T. 17 N., R. 11 E.W.M., Wenatchee National Forest.

A site visit was last conducted by Tyson Carlson (Aspect) and Jonathon Kohr (WDFW) on October 4, 2013. During the site visit, the point of diversion was observed, along with spring discharge, seepage, and continuity with Union Creek and the American River.

The point of diversion is located on an unnamed spring, approximately 1,500 feet upslope from the American River and about 150 feet from Union Creek. Union Creek is located in an incised channel, at the base of a steep embankment. Water is diverted from the improved spring, filtered, and stored prior to distribution to the 6 cabins. Water which is not consumptively used is discharged to an individual on-site septic or drainfield.

Discharge from the spring infiltrates into a small meadow about 100 feet down from the point of diversion. The meadow is located on a topographic divide, separating Union Creek from the American River drainage. Although difficult to quantify, it was estimated that about 1/3 of the discharge may ultimately drain toward Union Creek, but no seepage was observed on the embankment above Union Creek.

Recent metering readings indicate that between July 15 and October 4, the community diverted 13,470 gallons, or about 33 gpd per cabin. Therefore, the estimated

cumulative consumptive impact calculated above is reasonable and will not exceed 0.05 ac-ft/yr.

Union Creek previously received a hold from the WTWG on August 5, 2013.

Pleasant Valley - Lots 1-7 of the Pleasant Valley Summer Home within the SW $\frac{1}{4}$ of unsurveyed Section 13, T. 17 N., R. 12 E.W.M., Wenatchee National Forest.

A site visit was conducted by Tyson Carlson (Aspect) and Jacque Metcalf (Ecology) on October 17, 2014. During the site visit, several points of diversion were observed directly on the American River. Water is diverted via a small submersible pump at a point directly adjacent to the cabin, then conveyed a short distance for use. Water which is not consumptively used is discharged to an individual on-site septic or drainfield which discharge to the American River.

Idlehour - Lots 1-7 of the Idlehour Summer Home within the NW $\frac{1}{4}$ NW $\frac{1}{4}$ of unsurveyed Section 15, T. 17 N., R. 13 E.W.M., Wenatchee National Forest.

A site visit was conducted by Tyson Carlson (Aspect) on August 15, 2014. During the site visit, the merits of the mitigation program was presented to several cabin owners. To date, the community has declined participation in the program, but the community is included for completeness in the impacts analysis should individual cabin owners elect to participate in the future.

Water is diverted from a series of three unnamed springs located approximately 700 feet from the American River. During much of the year, spring discharge reinfilters into the alluvium before reaching the river. Water is diverted from the spring and distributed to the cabins. Water which is not consumptively used is discharged to an individual on-site septic or drainfield which discharge to the American River.

Sleepy Hollow – Lots 6-17, 27-29 of the Sleepy Hollow Summer Homes within the SW $\frac{1}{4}$ of unsurveyed Section 11, T. 17 N., R. 13 E.W.M., Wenatchee National Forest.

A site visit was conducted by Tyson Carlson (Aspect) on August 15, 2014. The site visit included a meeting with community cabin owners, including inspection of all diversions from the American River and shallow and drilled wells. Water is diverted via a small submersible pump or withdrawn from a well a point directly adjacent to the cabin, then conveyed a short distance for use. Water which is not consumptively used is discharged to an individual on-site septic or drainfield which discharge to the American River.

American River – Lots 1-5, 20-25, of the American River Summer Homes within Section 11 and 12, T. 17 N., R. 13 E.W.M., Wenatchee National Forest.

A site visit was conducted by Tyson Carlson (Aspect) on September 4, 2013. The site visit included a meeting with community cabin owners, including inspection of all diversions from the American River, shallow and drilled wells, and the spring. Water is diverted via a small submersible pump or withdrawn from a well at a point directly adjacent to the cabin, then conveyed a short distance for use. Water which is not consumptively used is discharged to an individual on-site septic or drainfield which

discharge to the American River. An additional site visit was completed by Tyson Carlson (Aspect) and Jonathon Kohr (WDFW) on October 4, 2013 to observe the points of diversion/withdrawal and their relation to the river.

American Forks – This proposal received a thumbs up from the WTWG on August 5, 2013, but is included in the American River impacts analysis for completeness. Mitigation included 0.6 ac-ft for 21 cabins, plus WDFW office and Outfitters from a spring tributary to the American River above the confluence with the Bumping River.

Cumulative Impact Analysis – The points of diversion are located on or tributary to the American River. WDFW fish distribution data indicate Bull Trout and other ESA-listed fish are present in the American River and the lower reach of Timber and Union Creeks. However, the cumulative diversion volume – defined as the total Qa normalized over a 6-month period – is below 1 percent of seasonal low flow of both creeks, with no other claims are located in the tributary drainages. In addition, the cumulative diversion volume of all claims, temporary permits, and unauthorized use (see Table 1) in the American River drainage is below the 1 percent threshold. Therefore, no formal ESA consultation has been conducted.

Location	Qi in cfs	Qa (Total) in ac-ft/yr	Qa (CU) in ac-ft/yr	2015 Measured Low-Flow in cfs
Total American River Drainage Diversion (excluding American Forks)	0.585	3.71	1.039	-
Total American River Drainage Diversion (including American Forks)	0.605	5.71	1.639	-
Cumulative American River Impact (cfs)	-	0.016	0.005	33.77 cfs (at USBR gage)
Cumulative Timber Creek Impact (cfs)	-	0.001	0.0003	1.33 cfs (Timber Creek); 10.30 cfs (American above Timber Creek)
Cumulative Union Creek Impact (cfs)	-	0.001	0.0002	3.87 cfs (at Hwy 410 Bridge)

CONCLUSION

During rationing years, the availability of water to satisfy TWSA in the Yakima River will not be impacted if 1.22 ac-ft were held and released from Bumping Lake. Assignment of 1.22 ac-ft would be in compliance with the consultation threshold in paragraph 18(b) of the USBR-Ecology contract.

REFERENCES

Ecology 2011. Columbia River Instream Atlas Project, Publication Number: 11-12-015. Prepared by the Washington Department of Fish and Wildlife. September 2011.

Reclamation, 2005. Phase I Assessment Report, Storage Dam Fish Passage Study, Yakima Project, Washington. Revised April 2005

WDFW. SalmonScape. <http://wdfw.wa.gov/mapping/salmonscape/index.html>.

CLAIMANT NAME: **Robert K. Horton**

COURT CLAIM NO. 00401

Certificate Number: S4-83420-J

Subbasin: 16 Upper Naches

Source: Timber Creek

Use: Single domestic supply

Period of Use: Continuously

Quantity: 0.01 cubic foot per second; 1 acre-foot per year

Priority Date: **July 24, 1950**

Point of Diversion: 1,300 feet south and 1,200 feet east from the west quarter corner of Section 35, within the NW $\frac{1}{4}$ SW $\frac{1}{4}$ of Section 35, T. 17 N., R. 11 E.W.M., Snoqualmie National Forest.

Place of Use: Lot 7 of Timber Creek Summer Homes, lying within the NW $\frac{1}{4}$ SW $\frac{1}{4}$ of unsurveyed Section 35 T. 17 N., R. 11 E.W.M., Snoqualmie National Forest.

CLAIMANT NAME: **Mrs. Lenard Vander Houwen** COURT CLAIM NO. 00531
Union Creek Recreation Residence

Certificate Number: S4-83435-J

Subbasin: 16 Upper Naches

Source: An unnamed spring

Use: Group domestic supply for seven residences

Period of Use: Continuously

Quantity: 0.045 cubic foot per second, 3.5 acre-feet per year

Priority Date: **May 15, 1974**

Point of Diversion: 400 feet south and 700 feet west from the north quarter corner of unsurveyed Section 25, within the NE¹/₄NW¹/₄ of unsurveyed Section 25, T. 17 N., R. 11 E.W.M., Snoqualmie National Forest.

Place of Use: Lots 2, 3, 4, 5, and 6 of Union Creek Recreation Residence Group within the SW¹/₄ of unsurveyed Section 25, T. 17 N., R. 11 E.W.M., Snoqualmie National Forest.

CLAIMANT NAME: **Gerald W. Davis
& Lyndal Davis**

COURT CLAIM NO. 02384

Certificate Number: S4-83439-J

Subbasin: 16 Upper Naches

Source: American River

Use: Single domestic supply

Period of Use: Continuously

Quantity: 0.01 cubic foot per second, 0.5 acre-foot per year

Priority Date: **March 18, 1976**

Point of Diversion: 600 feet south and 300 feet east from the west quarter corner of unsurveyed Section 35, within the NW $\frac{1}{4}$ SW $\frac{1}{4}$ of unsurveyed Section 35, T. 17 N., R. 11 E.W.M., Snoqualmie National Forest.

Place of Use: Lot 11 of Timber Creek Recreation Residences within the NW $\frac{1}{4}$ SW $\frac{1}{4}$ of unsurveyed Section 35, T. 17 N., R. 11 E.W.M., Snoqualmie National Forest.

CLAIMANT NAME: **United States of America**
U.S. Forest Service

COURT CLAIM NO. 02276
(A) 03074
(A) 05548
(A) 07253

Certificate Number: S4-84358-J

Subbasin: MC Major Claimants

Source: Timber Creek, tributary of American River

Use: Single domestic supply

Period of Use: May 1 to October 31

Quantity: 0.01 cubic foot per second, 1 acre-foot per year

Priority Date: **August 26, 1940**

Point of Diversion: 390 feet south and 100 feet west of the northeast corner of Section 2, being within the NE¹/₄NE¹/₄ of Section 2, T. 16 N., R. 11 E.W.M.

Place of Use: Lot 3 of Timber Creek Summer Home Tracts in Section 2, T. 16 N., R. 11 E.W.M.

CLAIMANT NAME: **United States of America** COURT CLAIM NO. 02276
U.S. Forest Service (A) 03074
(A) 05548
(A) 07253

Certificate Number: S4-84386-J

Subbasin: MC Major Claimants

Source: American River, tributary to Naches River

Use: Domestic supply

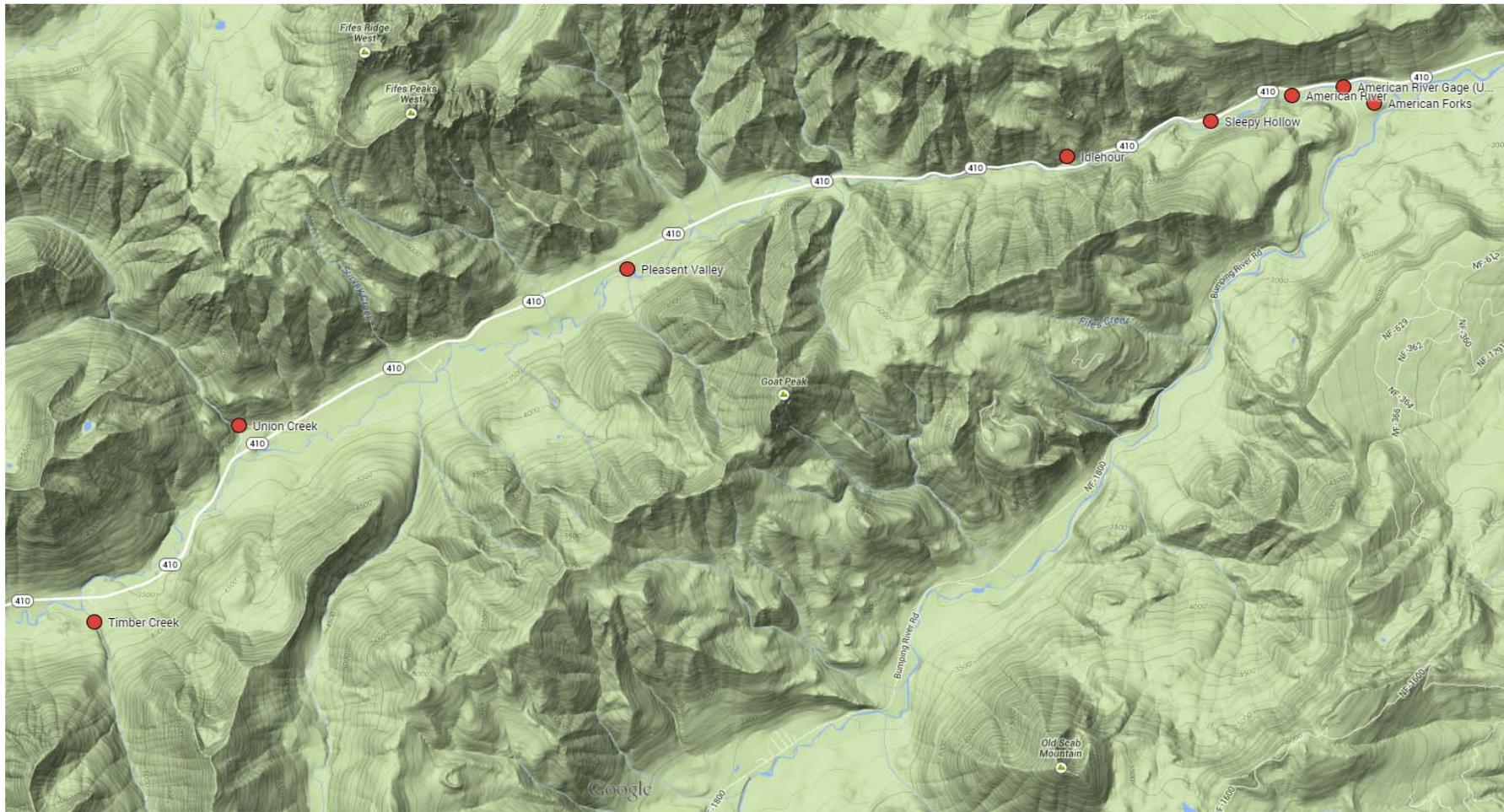
Period of Use: May 1 to October 31

Quantity: 0.01 cubic foot per second, 1 acre-foot per year

Priority Date: **May 12, 1975**

Point of Diversion: 500 feet north and 300 feet east of the west quarter corner of Section 12, being in the SW¹/₄NW¹/₄ of Section 12, T. 17 N., R. 13 E.W.M.

Place of Use: Lot 1, American River Summer Homes, within the SW¹/₄NW¹/₄ of Section 12, T. 17 N., R. 13 E.W.M.



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Figure 1

American River Cabin Communities

Ecology's Cabin Owner Mitigation Program

American River, WA



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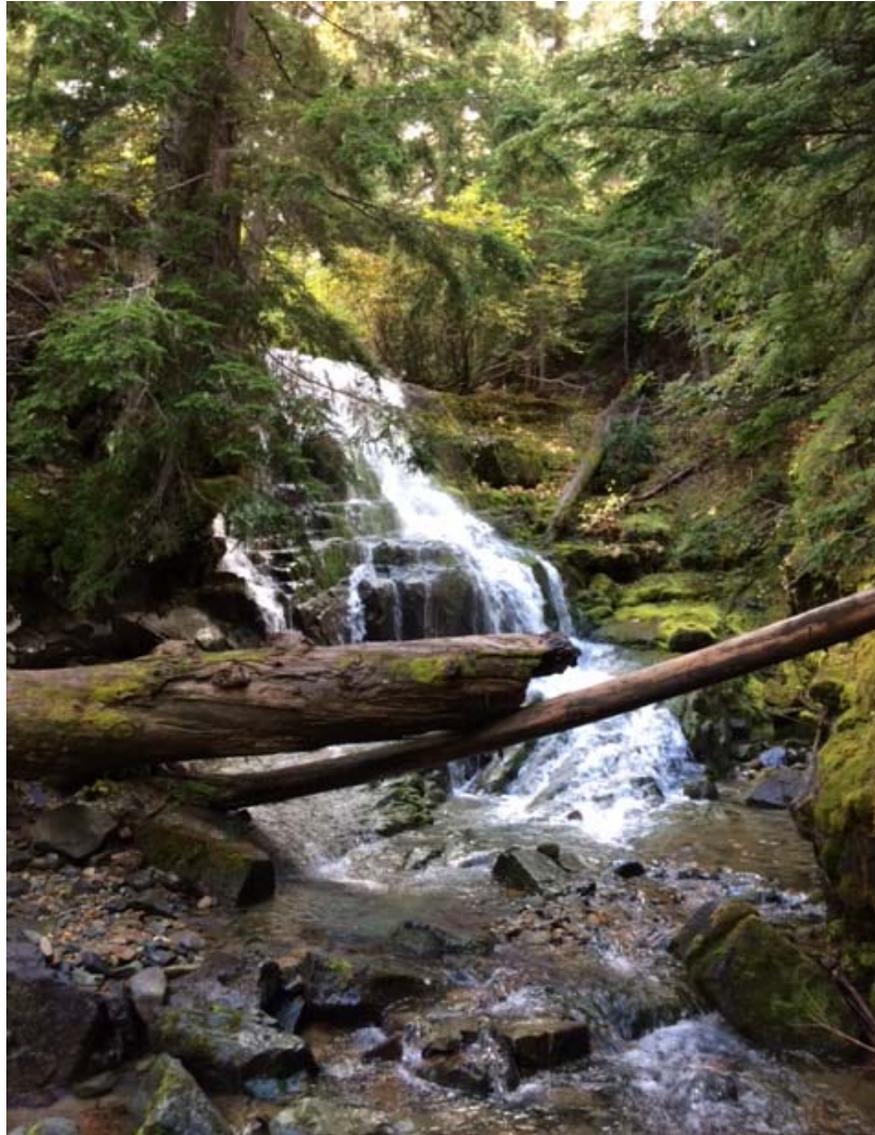
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Figure 2

Timber Creek

Ecology's Cabin Owner Mitigation Program

American River, WA



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Figure 3

Timber Creek

Ecology's Cabin Owner Mitigation Program

American River, WA



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Figure 4

Timber Creek

Ecology's Cabin Owner Mitigation Program

American River, WA



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Figure 5

Timber Creek

Ecology's Cabin Owner Mitigation Program

American River, WA



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Figure 6

Union Creek

Ecology's Cabin Owner Mitigation Program

American River, WA



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Figure 7

Union Creek

Ecology's Cabin Owner Mitigation Program

American River, WA



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Figure 8

Union Creek

Ecology's Cabin Owner Mitigation Program

American River, WA



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Figure 13
American River

Ecology's Cabin Owner Mitigation Program
American River, WA



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Figure 16
American River

Ecology's Cabin Owner Mitigation Program
American River, WA