



Oregon

John A. Kitzhaber, MD, Governor

Water Resources Department

North Mall Office Building
725 Summer St. NE, Suite A
Salem, OR 97301
Phone 503-986-0900
FAX 503-986-0904
www.wrd.state.or.us

March 13, 2013

Applicant

LEE SCHRIER
PO BOX 81
DAYVILLE, OR 97825

SUBJECT: Water Right Transfer Application T-10938

Please find enclosed the public notice of the recommendations of the Oregon Department of Fish and Wildlife (ODFW) and the Oregon Department of Environmental Quality (DEQ), to consent to injury of an instream water right.

Copies of ODFW's and DEQ's recommendation are available for viewing at the Salem office of the Water Resources Department. Any person may review the recommendations and submit written comments or may submit a written request for a public meeting to review the recommendations. The comments or request for a meeting must be received by WRD on or before April 11, 2013.

WRD will provide copies of any comments submitted in response to this notice to ODFW and DEQ. If a meeting is requested, WRD will schedule a joint public meeting with ODFW and DEQ to review the recommendations.

To review the recommendations, contact Dorothy Pedersen at 503-986-0890 or e-mail Dorothy.I.Pedersen@wrdd.state.or.us. Written comments and requests for a public meeting should be mailed to Attn: Dorothy Pedersen, Water Resources Department, 725 Summer St NE, Suite A, Salem, OR 97301-1271 or faxed to 503-986-0903.

If no comments or requests are received by the Department in response to the notice or if, after consideration of any written comments or the discussion during the meeting, the recommending agencies notify the Department that they will not withdraw their recommendations to consent to injury, the Department shall issue an order approving the transfer and consenting to the injury to the instream water right. The order shall include any conditions necessary to ensure that the change will be consistent with the findings and will result in a continued net benefit to the resource.

Please do not hesitate to contact me at the phone number or email address above if you have any questions.

Sincerely,

Dorothy Pedersen
Transfer Program Advisor

cc: T-10938
Eric W. Julsrud, District 4 Watermaster (*via e-mail*)
Kyle Sullivan, Agent for the applicant (*via e-mail: sullivan@ortelco.net*)
Gary Wilson, GCSWCD (*via e-mail: garywilson@ortelco.net*)
Danette Faucera, ODFW Water Policy Coordinator (*via e-mail: danette.l.faucera@state.or.us*)
Don Butcher, DEQ Basin Water Quality Coordinator (*via e-mail: Butcher.Don@deq.state.or.us*)

encs





Oregon

John A. Kitzhaber, MD, Governor

Department of Fish and Wildlife

Wildlife Division
3406 Cherry Ave NE
Salem, OR 97303-4924
(503) 947-6300
Fax (503) 947-6330
www.dfw.state.or.us



February 26, 2013

Dwight French
Oregon Water Resources Department
North Mall Office Building
725 Summer Street NE, Suite A
Salem, OR 97301

REFERENCE: Transfer T-10938

The Department has received notification of your finding that transfer application T-10938 cannot be made without injury to an existing instream water right. You also indicated that the applicant intends to seek approval under ORS 540.530(1)(b) – (e). Based on this, you have requested ODFW make a recommendation on whether OWRD should consent to injury of the instream water right. For the ODFW to consent to injury of the instream water right, ODFW must find that the transfer will provide a net benefit to the resource consistent with the purposes of the instream water right, which in this case, is aquatic life.

The ODFW has evaluated the proposed transfer and finds that the overall benefits of the transfer provide a net benefit, which offsets the injury to the instream water right caused by the transfer. The attached analysis provides ODFW's reasoning for recommending the consent to injury of the instream water right.

If you have any questions please contact Jeff Neal in our John Day office (541-575-1167 x 226) or Rick Kepler in our Salem office (503-947-6084).

Bruce McIntosh
Acting Fish Division Administrator
Fish Division

RECEIVED BY OWRD

FEB 28 2013

SALEM, OR

Cc: Jeff Neal, ODFW John Day (via e-mail)
Rick Kepler, ODFW Salem (via e-mail)
Eric Julsrud, WRD District 4 Watermaster (via e-mail)
Dorothy Pedersen, WRD Salem (via e-mail)
Kyle Sullivan, Grant County SWCD/applicant's agent (via e-mail)

Attachment: ODFW's Discussion and Analysis of Transfer T-10938 (February 25, 2013)





Oregon

John A. Kitzhaber, MD, Governor

December 10, 2012

Ed Bowles, Administrator
Fish Division
Department of Fish and Wildlife
3406 Cherry Ave. NE
Salem, Oregon 97303

Water Resources Department
North Mall Office Building
725 Summer St. NE, Suite A
Salem, OR 97301
Phone 503-986-0900
FAX 503-986-0904
www.wrd.state.or.us

SUBJECT: Water Right Transfer Application T-10938

Dear Mr. Bowles:

The Water Resources Department has determined that approval of water right transfer T-10938 would result in injury to instream water right certificate 59794 on the South Fork John Day River. The transfer proposes to change the point of diversion upstream approximately 2100 feet to the existing Miller Ditch diversion and approximately 3700 feet upstream to the Cummings Ditch diversion under Certificate 12096 on the South Fork John Day River. Based on the impacts on the instream water right, we are issuing a preliminary determination proposing denial of the transfer unless, on the recommendation of the Department of Fish and Wildlife, we consent to the injury.

The agent for the applicant, the Grant Soil and Water Conservation District, has submitted this transfer application along with two other transfers as described in the attached table on the same stretch of the South Fork John Day River. This transfer application (Schrier) is the only application proposing an upstream movement of the point of diversion. Transfer applications T-10939 (Stan & Karen Harlan) and T-10940 (Jim Gillespie) are being processed simultaneously with this transfer and propose moving their points of diversion downstream. The merits and impacts of the "package" as a whole may create an overall net benefit to the resource (fish) and wildlife habitat. The table represents the movement of a specific amount of cubic foot per second per each segment of the river described.

The applicant has reviewed our draft preliminary determination and has requested that we seek your recommendation on whether we should consent to the injury of the instream water right pursuant to ORS 540.530(c).

We hereby request a recommendation on whether we should consent to the injury to the instream water right that would result from approval of water right transfer T-10938. We have not previously approved a transfer injuring instream water right 59794. Thus, approval of the transfer would not result in a cumulative increase in the impacts from previously approved transfers.

We are enclosing a copy of the transfer application, our preliminary determination, and other supporting information to assist you in determining if the change would result in net benefits to the resource and in preparing a recommendation. Please do not hesitate to contact Dorothy Pedersen at 503-986-0890 or Dorothy.I.Pedersen@wrdd.state.or.us if you have questions or need additional information.

Sincerely,

Dwight French
Water Right Services Administrator

cc: Lee Schrier
Kyle Sullivan, Grant Soil & Water Conservation District (via e-mail)
Rick Kepler, Oregon Department of Fish and Wildlife
Jeff Neal, Oregon Department of Fish and Wildlife
Mike Ladd, North Central Region Manager (via e-mail)
Eric Julsrud, Watermaster District 4 (via e-mail)
Ken Dowden, Transfer Specialist (via e-mail)

enclosures

RECEIVED BY OWRD

FEB 28 2013

SALEM, OR



ODFW's Discussion and Analysis of Transfer T-10938
February 25, 2013

RECEIVED BY OWRD

FEB 28 2013

SALEM, OR

Action

This project involves moving one Point of Diversion (POD) for Certificate 12096 upstream on the South Fork John Day River to two locations: 1) approximately 2,100 feet (0.4 mi) upstream to the current, historical POD at the Miller Ditch and 2) approximately 3,700 feet (0.7 mi) to an existing, fish-friendly POD (Cummings Ditch). Moving the POD upstream will enable the land owner to remove a pushup dam with the intention of improving irrigation efficiency as well as fish habitat and passage. The Grant County Soil and Water Conservation District (GSWCD) is facilitating this transfer and has performed all related construction for the two pumping stations associated with the mitigation package. The quantity of water to be moved upstream in this transfer is 0.035 cfs (1/40th of one cfs for each acre irrigated) prior to June 1 and 0.017 cfs (1/80th of one cfs for each irrigated acre) thereafter. The Water Resources Department (WRD) has determined that transferring this water right upstream will injure at least one instream water right (ISWR). ORS 540.530 (1)(c) allows the WRD to consent to injury of an ISWR only if the agency who applied for the instream water right recommends that WRD consent to the injury. For the recommendation and consent to injury to occur, the agency that requested the instream water right must find that the transfer will result in a net benefit to the resource. This is the Oregon Department of Fish and Wildlife's (ODFW) analysis of the transfer and determination of whether a net benefit to the resource will occur.

Background

The John Day River basin encompasses approximately 8,100 square miles, is the second longest free-flowing river in the lower 48 states, and is one of the few rivers in the Columbia River basin that is managed exclusively for wild anadromous fish. The South Fork John Day River enters the John Day River at approximately river mile 212 near Dayville, Oregon. The South Fork supports populations of wild redband trout, Westslope cutthroat trout, spring Chinook salmon, ESA-listed summer steelhead, Pacific lamprey, and mountain whitefish, as well as many other species of non-game fish.

The accepted historic irrigation water diversion method in the basin has been almost exclusively to use gravel pushup dams. A pushup dam requires reconstruction prior to each irrigation season using a bulldozer, loader or backhoe to push stream gravels and cobble into a semi-porous berm that is angled across the stream. Depending on the timing of installation, eggs or alevins in the gravel can be injured or killed directly by this disturbance or by the resulting fine sediment. The disturbance also reduces habitat diversity by degrading rearing habitat, spawning gravel, and riparian vegetation. In addition, a dam typically spans all or most of the stream channel, effectively impairing fish passage, and often requires modifications throughout the summer to

ensure that the legal rate of irrigation water is diverted as stream flows recede. Sealing a pushup dam often includes placing plastic or canvas on the upstream face of the dam, which can further impede adult and juvenile fish passage upstream. In most years, spring or early summer high flow events wash out the pushup dam requiring it to be installed a second or even third time. Each dam may divert water for several water rights and several different water users. Some of these dams are significant barriers to upstream migration of adult and juvenile salmon and steelhead.

Over the last 20 years, hundreds of fish habitat improvement projects have been implemented throughout the John Day River basin by ODFW, Watershed Councils, and Soil and Water Conservation Districts. These riparian fencing, irrigation diversion, streambank stabilization and upland restoration projects were funded to address fish passage barriers, habitat, water quality, flows, and screening. Many of the projects also contribute to irrigation efficiency and effectiveness.

In 1998, the GSWCD began replacing pushup dams on the John Day River with permanent fish-friendly diversion structures containing fish ladders or converting them to pump stations that are screened from fish entry. Both eliminate the need for landowners to construct pushup dams. Since 1998, GSWCD has replaced over 100 diversions, majorly improving fish passage and riparian function at irrigation diversions.

The GSWCD has worked with several landowners to already discontinue use of their pushup dams associated with this transfer and to install and utilize fish-friendly pump stations. These changes are reflected in T-10939 and T-10940. In the proposed transfer, T-10938, the POD is being moved upstream to an existing, fish-friendly diversion at Cummings Ditch, as well as legally authorizing the current, historic POD at Miller Ditch. The POD at Miller Ditch has been utilized since as early as the mid-1960's due to flood damage at the authorized POD. Although the applicant for T-10938 currently utilizes a pushup dam at the Miller Ditch, a cooperative agreement with GSWCD has been signed to not construct a pushup dam at the Miller Ditch if the transfer is approved. The user's irrigation schedule, if the transfer is approved, would entail diverting at the Miller Ditch POD during high, early season flows when water naturally enters the ditch and then switching to the Cummings Ditch later in the season as flows recede. pushup dam or other diversion will not be needed at the Miller Ditch for this schedule.

Instream Water Right

T-10938 is proposing an upstream transfer within a stream reach that has an established instream water right, C59794, with a priority date of November 3, 1983. The instream right has recommended minimum flows for aquatic life and minimizing pollution that varies by month from 25 to 133 cfs. According to WRD, water rights in the South Fork through this reach are typically not regulated due to reported shortages by landowners, but the ISWR is deficient at times during summer months. Comparison of the ISWR flows to WRD's Expected Average

RECEIVED BY OWRD
FEB 28 2013
SALEM, OR

Natural Flow (EANF) shows there is likely to be injury to C59794 if the point of diversion is moved (transferred) upstream. Because WRD has determined that transferring this water right upstream 0.7 mile will injure the instream water right, ODFW may consent to the injury if we find that the transfer will result in a net benefit to the resource (aquatic life). It is ODFW's understanding that C59794 is a joint water right with the Oregon Department of Environmental Quality that also sets minimum flows for minimizing pollution, so both agencies need to provide a consent to the injury. The following is ODFW's analysis and evaluation of whether the transfer will result in a net benefit to aquatic life. Although collaboration occurred during this review, the Oregon Department of Environmental Quality recommendations are not included.

Injury

Potential injury of C59794 would most likely occur during the irrigation season from June until the end of September. The Water Availability Tables show a deficiency in net water available of between 18 and 44 cfs.

Habitat within the affected reach is utilized during the period of expected impact to the ISWR by adult and juvenile Chinook salmon, adult and juvenile steelhead, resident redband trout, Westslope cutthroat trout, and Pacific lamprey, along with other non-game fish species. The greatest potential for negative impact to the instream water right would be in late August when adult Chinook must migrate upstream and during late September when juvenile fish species are moving downstream in the affected reach. During downstream migration, juvenile fish will utilize this stream reach for foraging and escape cover. Potential impacts include reduced availability of water depth for adult spring Chinook passage, reduced availability of foraging habitat, reduced availability of edge habitat (hiding cover offered by stream bank sedges and slightly submerged vegetation), and any effects that less water in the channel would have on water quality, such as increased water temperature. Because of these habitats being impacted within this stream reach, ODFW has determined that under ODFW's Mitigation Policy (OAR 635-415), the habitat is classified as Category 3. Category 3 habitat is essential habitat for fish and wildlife or important habitat that is limited on a physiographic province or on a site-specific basis. If impacts are unavoidable, ODFW requires in-kind, in-proximity replacement of impacted habitat and no net loss of habitat quantity or quality. In addition, the transfer requires a net benefit to the resource.

Mitigating Measures

T-10938 is being submitted as part of a group of projects initiated by the SWCD. Three transfers (T-10938, T-10939, and T-10940), agreed upon by local landowners, aim to improve irrigation efficiency, fish passage, and habitat for Endangered Species Act-listed summer steelhead, as well as other native fish species. The submitted package proposes to eliminate the need of 3 gravel pushup dams at the Miller, Campbell-Martin, and Riley ditches by utilizing existing, fish-friendly diversions and pump stations, all of which are downstream of the current PODs, except

RECEIVED BY OWRD
FEB 28 2013
SALEM, OR

for the upstream transfer proposed in T-10938. Considered together, this package will provide an overall in-kind improvement in stream flow and fish habitat in proximity to the injured reach and convert 115 acres from flood irrigation to a more efficient sprinkler system along a 5.5 mile reach of the lower South Fork John Day River. The following table, submitted by the SWCD, outlines the movement of water rights and the expected benefits. The 1/40th category is listed for irrigation prior to June 1 (April – May) and the 1/80th category is listed for irrigation thereafter (June – September) per the water right conditions.

Summary Table of Proposed POD Changes for T-10938, T-10939 & T-10940

From:		Distances (moving downstream from Cummings River Ditch)											
		Cummings Ditch		Miller Ditch		Campbell Martin Ditch		Riley Ditch		Gillespie Pump Station		Dayville Ditch	
To:		Miller Ditch		Campbell Martin Ditch		Riley Ditch		Gillespie Pump Station		Dayville Ditch		Harlan Pump Station	
Distance:		0.7 mile		2.3 mile		0.37 mile		0.03 mile		0.67 mile		0.5 mile	
*Split Season Rate / Before & After June 1 st		1/40 th	1/80 th	1/40 th	1/80 th	1/40 th	1/80 th	1/40 th	1/80 th	1/40 th	1/80 th	1/40 th	1/80 th
Schrier Transfer (T-10938)	Move Water Right Cert#12096 upstream to fish friendly permanent lay-flat diversion structure to eliminate need for gravel push-up diversion	-0.035	-0.017							RECEIVED BY OWRD FEB 28 2013 SALEM, OR			
	Move part of Water Right 25488 & 25495 Downstream to Pump Station							1.27	0.64				
Gillespie Transfer (T-10940)	Move part of Water Right 9154 & 9155 Downstream to Pump Station	0.68	0.34	0.68	0.34	0.68	0.34	0.68	0.34				
	Move Water Right 25490 & 25497 Downstream to Pump Station					0.49	0.24	0.49	0.24				
Harlan Transfer (T-10939)	Move part of Water Right 25488 & 25495 Downstream to Pump Station							0.32	0.16	0.32	0.16	0.32	0.16
	Move Water Right 25496 Downstream to Pump Station											0.44	0.22
Net Instream Benefit (cfs)*		0.645	0.323	0.68	0.34	1.17	0.58	2.76	1.38	0.32	0.16	0.76	0.38

Fish Passage:

One benefit of transferring the PODs to established, fish-friendly diversions in lieu of installing pushup dams would be that all life stages of fish will have passage at all stream flows at these locations throughout the entire year. Salmon, trout, and steelhead have adapted life history patterns within the basin to take advantage of the most desirable habitats and water temperatures

needed for survival. One of these adaptations is for them to move either upstream or downstream seeking cool water refuge areas. Pushup dams have the potential to prevent these salmonids from reaching refuge areas. Removal of the historically-used pushup dams will greatly benefit fish passage in the lower South Fork John Day River and allow these salmonids access to the most desirable water temperatures and habitat as needed.

Fish Habitat:

Another benefit of removing the 3 pushup dams is that stream bed material will no longer be disturbed each year to construct the dams. This will result in more stable stream banks at the retired pushup dam construction sites and likely will result in a more stable stream channel downstream. By not disturbing streambed material each year, the stream channel will become more stable over time, which should result in improved riparian vegetation at the sites and a narrower and deeper stream channel. Other similar projects in the upper mainstem John Day watershed have resulted in increased sedge growth at the water's edge, increased willow growth on the stabilized gravel bars, and a gradual narrowing and deepening of the stream channel. The improvements in fish passage, riparian vegetation, and stream structure would provide additional higher quality habitat than the habitat found using a pushup dam.

Water Temperature:

The North Fork John Day Watershed Council has been monitoring water temperatures at similar types of projects. Preliminary results indicate that water temperatures can increase by as much as eight degrees Fahrenheit in the artificial side channels formed by pushup dams that divert a significant portion of the river, and that the majority of the warmed water passes by the pump location and returns to the main river, resulting in warming of downstream flows. By eliminating the need for the pushup dams at the Campbell-Martin and Riley ditches, there will no longer be annual disturbance of the gravel bar and artificial maintenance of the side channel entrance. Eventually, gravel, sand and silt will accumulate in the diversion to the point where the un-vegetated side channel will cease to exist. Therefore, eliminating the need to maintain the pushup dams could contribute to a reduction in water temperatures. It is anticipated that periodic, minor maintenance will occur at the entrance of the Miller Ditch, but the improvements made at the other two sites will still yield better habitat in this reach of the river.

Stream Flow:

As outlined in the above table submitted by the SWCD, the overall in-kind gains in stream flow are much greater than that being injured by the upstream transfer. The gains in stream flow also improve a much longer stretch of river in proximity to the injury. For example, the single, permanent downstream transfer of 0.68 (April – May)/0.34 (June – September) cfs from the Cummings Ditch to the Gillespie Pump Station proposed in T-10940 more than replaces the .035 (April – May)/0.17 (June – September) cfs of water lost by T-10938 within the same reach and for approximately an additional 2.7 miles downstream.

RECEIVED BY OWRD
FEB 28 2013
SALEM, OR

Conclusion

Transferring C12096 upstream approximately 0.7 miles has the potential to injure the instream water right C59794 by potentially reducing flows by 0.035 (April – May)/0.17 (June – September) cfs within the affected reach. This has the potential to limit fish migration and make escape cover and forage opportunities less accessible. In considering this water right transfer, ODFW concludes that the proposed package, and specifically the permanent downstream transfer of 0.68 (April – May)/0.34 (June – September) cfs in T-10940, will offset the injury and provide a net benefit to the resource. ODFW believes fish migration will not be prevented by the reduction in flow caused by the upstream transfer because sufficient water will remain instream to facilitate migration, and the new PODs will also allow volitional fish passage at the diversions. Any flow reductions will be offset by an increase in quantity and quality of fish habitat as a result of the removal of the pushup dams and the downstream transfers of water included in T-10939 and T-10940. The habitats that are increased or improved include escape cover, foraging habitat and reduction in water temperature. The channel is expected to narrow and stabilize both at each pushup dam site and for a substantial distance below the sites. This will then allow riparian vegetation to re-colonize the area, providing more escape and forage habitat for fish. Allowing stream banks to stabilize will additionally improve riparian vegetation, providing shade and a deeper channel. At a minimum, these actions should curtail warming of the stream and have the potential to allow the stream to maintain cooler water temperatures.

Because of these stated reasons, ODFW finds that the overall project benefits will more than offset any negative effects. With the following conditions, ODFW hereby recommends that WRD consent to the injury of C59794 from the transfer of C12096 upstream in the South Fork John Day River.

Conditions:

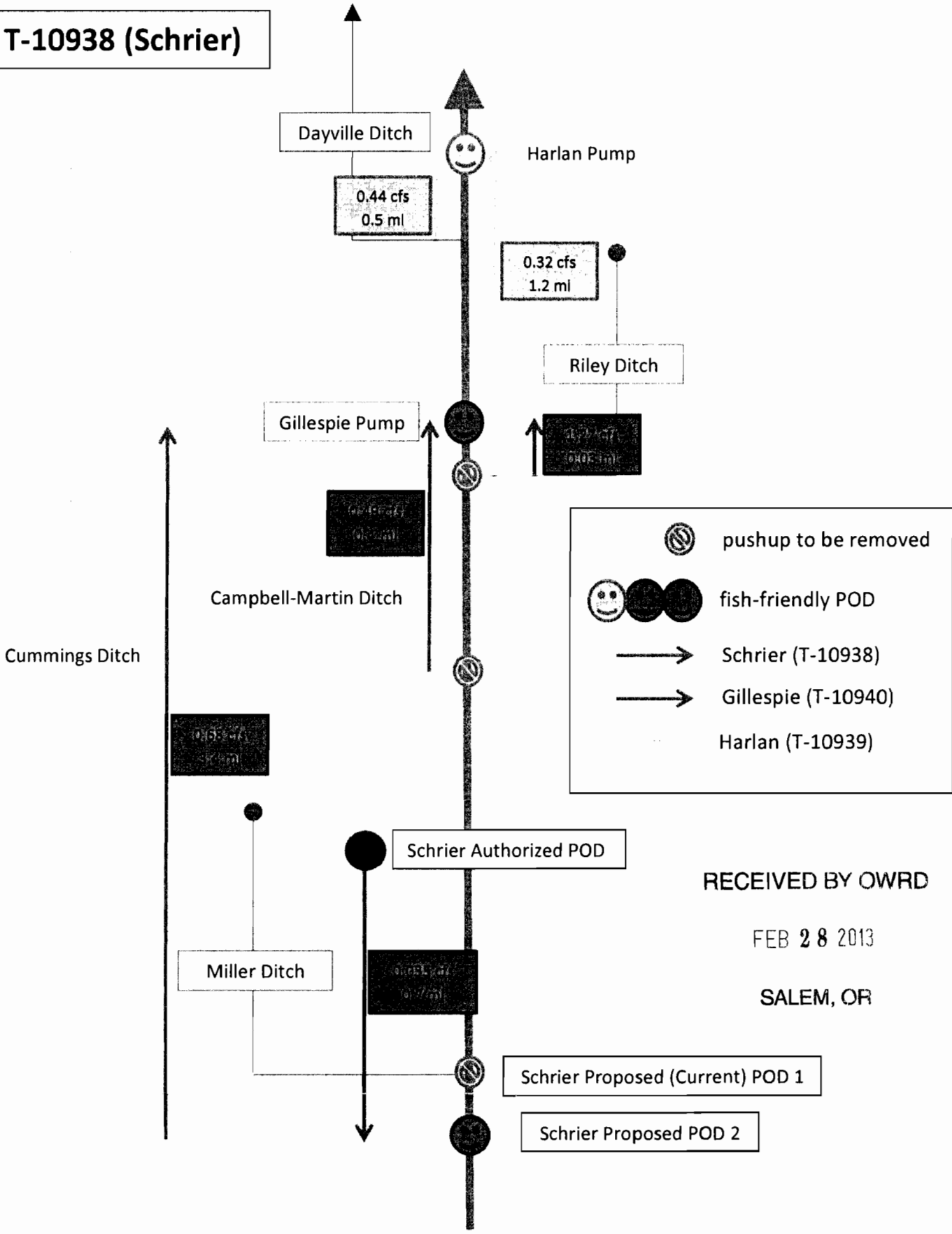
- 1) This consent to injury is contingent upon approval of T-10940.
- 2) ODFW-approved fish screens need to be maintained on the Miller Ditch and at the Gillespie and Harlan pump stations.

RECEIVED BY OWRD

FEB 28 2013

SALEM, OR

T-10938 (Schrier)



RECEIVED BY OWRD

FEB 28 2013

SALEM, OR



Oregon

John A. Kitzhaber, MD, Governor

Department of Environmental Quality

Eastern Region - Pendleton Office

700 SE Emigrant Ave, Suite 330

Pendleton, OR 97801

Phone: (541) 276-4063

Fax: (541) 278-0168

Relay Service: 711

February 27, 2013

Dwight French
Water Rights Services Administrator
Oregon Water Resources Department
North Mall Office Building
725 Summer Street NE, Suite A
Salem, OR 97301-1290

Subject: Consent to Injury review for T-10938. Ref. Feb 1, 2013 letter from Dwight French to Greg Aldrich

Dear Mr. French:

For the following reasons, DEQ concurs with ODFW in recommending consent to injury to the Certificate 59794 instream water right due to the T-10938 upstream transfer of a point of diversion:

- While the T-10938 (Schrier) transfer, by itself, would lead to less instream flow (-0.035 CFS maximum) for 0.7 stream miles, this is mitigated by the elimination of the need for the existing Schrier diversion push-up dam. Push-up dams can directly harm water quality as well as impede fish passage. Fish passage is a subcategory of beneficial uses that water quality standards protect. Additional beneficial use support is provided by the screening requirement for the new POD of the Schrier transfer. Given these factors and the net increase in flow in the same reach through related projects (next paragraph), it is clear that a net environmental benefit that will occur as a result of the proposed changes, as called for in consents to injury (OAR 690-380-5050).
- Decreased instream flow via the Schrier transfer (moving a POD upstream) is offset 10-fold by the 0.34-0.68 CFS Gillespie transfer (T-10940, moving a POD downstream), that is packaged with the Schrier and one other transfer. Only the Schrier transfer by itself would lead to decreased instream flow. The Gillespie transfer is from the upper POD of the Schrier transfer to well below the original Schrier POD, thus bracketing the reach of potential loss from the Schrier transfer. Viewed in aggregate, the net effect of the two transfers would be an increase in instream flow for approximately 3.4 miles and no decrease elsewhere.

Our consenting recommendation is based in part on the increase instream flow due to the Gillespie downstream POD transfer. If this transfer is not authorized we may request to re-evaluate our recommendation. Please contact me at 541/278-4603 or Greg Aldrich (503/229-6345) if you have any questions.

Sincerely,

Don Butcher
Basin Water Quality Coordinator

RECEIVED BY OWRD

MAR 04 2013

cc: Kyle Sullivan, Grant Soil and Water Conservation District (*via email*)
Mike Ladd, North Central Region Manager (*via email*)
Dorothy Pedersen, Water Resources Department (*via email*)

SALEM, OR



Eric Julsrud, Watermaster District 4 *(via email)*
Ken Dowden, Transfer Specialist *(via email)*
Greg Aldrich *(via email)*
Eric Nigg *(via email)*

RECEIVED BY OWRD

MAR 04 2013

SALEM, OR