FY 2001 Ongoing Proposal 200003100

Section 1. General Administrative Information

Title of Project Proposal	Enhance North Fork John Day River Subbasin Anadromous Fish Habitat
BPA Project Proposal Number	200003100
Business name of agency, institution, or organization requesting funding	Confederated Tribes of the Umatilla Indian Reservation
Business acronym (if appropriate)	CTUIR

Proposal contact person or principal investigator

Name	R. Todd Shaw
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Manager of program authorizing this project	Gary James
Review Cycle	FY 2001 Ongoing
Province	Columbia Plateau
Subbasin	John Day
Short Description	Increase production of indigenous wild stocks of spring chinook salmon and summer steelhead within the North Fork of the John Day River Subbasin.
Target Species	

Project Location [No information]

Reasonable and Prudent Alternatives (RPAs)
Sponsor-Reported Relevant RPAs - Sponsor listed no RPAs for this project proposal
Relevant RPAs based upon NMFS & BPA Review - NMFS and BPA did not associate any reasonable and prudent alternatives with this project proposa**l**

Biological Outcomes of this project:	The project focuses on areas of the basin that are expected to provide the greatest benefit for salmonids. Pre-project surveys and monitoring will identify factors most limiting salmonid production. Restoration efforts will be designed to meet these needs with a long-term goal of restoring proper floodplain and channel function. Expected biological outcomes include: 1. Improved survival of incubating eggs through reduction of sediment input and water temperatures. 2. Elevated juvenile densities and survival as a result of improved channel diversity, pool habitat, riparian cover and increased populations of invertebrate species. 3. Improved adult return and usage as a result of elevated pool holding habitat and spawning gravels. 4. Increased riparian and upland vegetation by excluding livestock, supplementing native plants, encouraging floodplain function and stabilizing

channel form to reduce erosion. Enhancements including, livestock exclusion and supplemental planting of native plant species will be utilized to meet biological outcomes. Over time, and the return of a healthy riparian plant community, we expect improvements in bank stability, shade, insect drop, macroinvertebrate populations, large wood recruitment, pool formation, bank storage, and ultimately elevated juvenile outmigration and adult returns. Ecological benefits, associated with habitat restoration, often require years to achieve. Biological outcomes, particularly those that are quantifiable, may be difficult to directly credit to habitat restoration efforts. Recovery rates of project sites vary considerably with climate, elevation and past land use. Restoration approaches also play a significant role in the response of biological indicators. For example, salmonid populations will typically respond quickly to large wood and pool reintroductions. However, this may not represent the best long-term management proposal for the site. Habitat restoration is a slow business at best and although some sites will achieve immediate benefits, others may take decades to produce similar results.

Biological Data:

The overall project goal is to protect and enhance habitat for improved natural production of indigenous, wild spring chinook salmon and summer steelhead. The project focuses on correcting habitat factors most limiting to salmonid production. Project monitoring measures biological outcomes to determine effects of habitat enhancement efforts. The following pre and post-project monitoring methods are utilized under this project to evaluate biological outcomes and allow for adaptive management: 1. Summer stream temperatures (maximum, minimum and mean) are monitored from June through September of each year. Stream temperature data monitors the effectiveness of habitat enhancements on water temperature cooling. 2. Cross-section data is collected pre-project and continues to be taken once every three to five years thereafter. This information is useful in determining stream channel morphological responses from habitat enhancements. 3. Photos are taken in spring and autumn of each year to provide a visual record of changes in channel morphology and vegetative responses to habitat enhancements. This information provides managers with a visual tool of change over time and aids in the promotion of restoration activities. 4. Fish population estimates are sampled pre and post-project to determine anadromous fish presence and utilization as a result of habitat improvements. This information is useful in determining habitat use, species composition, and densities. 5. Habitat surveys are conducted pre-project to obtain baseline physical data. Post-project surveys will be conducted periodically to determine changes in stream hydrology, channel characteristics and riparian plant communities.

CBFWA-Generated Information

Database Administrator notes on the history of this proposal form: None

Type of Project (assigned by CBFWA Analysts): anadromous

Section 2. Past Accomplishments

Year	Accomplishment
"New Project in 2000 - FY 2000 Funds have not yet been provided"	

Section 3. Relationships to Other Projects

n/a or no information

Section 4. Budget for Planning and Design Phase
Task-based Budget

Objective	Task	Duration in FYs	Estimated 2001 cost	Subcontractor
1. Identify habitat impacts, attain solutions to detrimental land use practices and promote support of habitat enhancement measures in the North Fork of the John Day River Subbasin.	a. Utilize existing information, including historical documents, research and management plans and any available GIS Data, to determine locations of site-specific habitat impacts.	indefinite	$ 7,905	
	b. Coordinate with landowners and local, tribal, state and federal entities to identify habitat impacts, determine remedial measures and obtain support of project efforts.	indefinite	$ 11,945	
	c. Conduct local outreach efforts (public meetings, tours and presentations) to obtain input, address landowner concerns, provide educational opportunities, and promote stream habitat restoration and protection.	indefinite	$ 14,268	
	d. Assist the North Fork John Day Watershed Council in development of a North Fork John Day Watershed Assessment.	three years	$ 10,268	x
2. Plan and design habitat enhancement projects.	a. Coordinate with local, state and federal resource entities and prepare grant proposals to develop cost-share projects.	indefinite	$ 6,065	
	b. Develop and secure riparian easements with private landowners for proposed habitat enhancements.	indefinite	$ 9,323	
	c. Obtain necessary environmental clearances, including Section 106 National Historic Preservation Act cultural and archeological compliance, Sections 401 and 404 Federal Clean Water Act Permits and Section 7 U.S. Endangered Species Act consultations.	indefinite	$ 10,631	
	d. Complete project design and layout.	indefinite	$ 4,484	
	e. Solicit bids and award subcontracts for fence construction, operated equipment, native tree and shrub plantings and noxious weed control.	indefinite	$ 9,871	

Outyear Objective-Based Budget
n/a or no information

Outyear Budgets for Planning and Design Phase

FY 2005	FY 2003	FY 2004	FY 2002
$112,000	$ 93,000	$102,000	$ 93,000

Section 5. Budget for Construction and Implementation Phase
Task-based Budget

Objective	Task	Duration in FYs	Estimated 2001 cost	Subcontractor
3. Implement passive enhancements in combination with intensive, native revegetation efforts.	a. Construct livestock exclusion fencing around project areas	indefinite	$ 59,460	x
	b. Install native willow cuttings and various bareroot tree and shrub species with an excavator along stream channel margins.	indefinite	$ 23,667	x
	c. Seed native grasses and hand plant indigenous trees and shrubs in project areas to stabilize streambanks, reduce sediment input, provide insect drop, shade stream channels, cool stream temperatures and increase in-stream wood recruitment.	indefinite	$ 28,368	
	d. Treat noxious weeds in project areas.	duration of riparian easements	$ 3,500	x

Outyear Objective-Based Budget
n/a or no information

Outyear Budgets for Construction and Implementation Phase

FY 2005	FY 2003	FY 2004	FY 2002
$151,000	$134,500	$142,500	$126,500

Section 6. Budget for Operations and Maintenance Phase
Task-based Budget

Objective	Task	Duration in FYs	Estimated 2001 cost	Subcontractor
4. Maintain habitat enhancements within project areas.	a. Maintain livestock exclusion fencing.	duration of riparian easement	$ 8,092	
.	b. Care of trees and shrubs, including watering, tree mat placement and tree shelter installation.	approximately five years per individual project	$ 8,480	
	c. Treat noxious weeds in existing project areas.	duration of riparian easement	$ 3,000	x

Outyear Objective-Based Budget
n/a or no information

Outyear Budgets for Operations and Maintenance Phase

FY 2005	FY 2003	FY 2004	FY 2002
$ 25,500	$ 22,500	$ 24,000	$ 21,000

Section 7. Budget for Monitoring and Evaluation Phase

Task-based Budget

Objective	Task	Duration in FYs	Estimated 2001 cost	Subcontractor
5. Collect baseline data and conduct post-project monitoring to identify habitat limiting factors and to quantify effects of habitat enhancement measures.	a. Conduct habitat surveys in proposed habitat enhancement project areas to obtain baseline physical data.	life of project	$ 7,018	
	b. Conduct biological inventories to determine pre and post-project anadromous fish presence.	life of project	$ 4,578	
	c. Measure changes in channel morphology and vegetative responses to habitat enhancements at new and established photo point and stream channel transect sites.	life of project	$ 4,578	
	d. Collect stream temperatures during summer months to monitor the effectiveness of habitat enhancements on water temperature cooling.	life of project	$ 699	

Outyear Objective-Based Budget

n/a or no information

Outyear Budgets for Monitoring and Evaluation Phase

FY 2005	FY 2003	FY 2004	FY 2002
$ 22,500	$ 20,000	$ 21,000	$ 19,000

Section 8. Estimated Budget Summary

Itemized Budget

Item	Note	FY 2001 Cost
Personnel	FTE: 9.75 months (Biologist, Technician, GIS Analyst, Cultural Technician, Office Manager and Secretary	$ 37,323
Fringe	30%	$ 11,197
Supplies	phone services, office supplies, duplication/printing, educational materials	$ 4,000
Travel	GSA vehicle lease, vehicle mileage, vehicle insurance	$ 3,271
Indirect	34% of personnel & fringe, supplies and travel	$ 18,969
NEPA	included in Personnel above	$ 0
Subcontractor	Watershed Assessment	$ 10,000
Personnel	FTE: fish habitat technician, 2 months	$ 4,630
Fringe	30%	$ 1,389
Supplies	fence materials, native trees/shrubs, native grass seed, and field materials	$ 38,000
Travel	GSA vehicle lease, vehicle mileage, vehicle insurance, training and per diem	$ 4,485
Indirect	34% of personnel, fringe benefits, construction materials and field materials	$ 16,491
Subcontractor	fence construction, operated heavy equipment and noxious weed control	$ 50,000
Personnel	FTE: 1.5 months fisheries technician; 0.5 fish biologist	$ 3,964
Fringe	30%	$ 1,189

Supplies	tools, fence materials, tree mats and tree shelters		$ 6,000
Travel	GSA vehicle lease, vehicle mileage and vehicle insurance		$ 1,214
Indirect	34% of personnel, fringe benefits, supplies & materials and travel		$ 4,205
Subcontractor	noxious weed control		$ 3,000
Personnel	FTE: fish technician (2 months) and fish biologist (1.75 months)		$ 8,752
Fringe	30%		$ 2,626
Travel	GSA vehicle lease, vehicle mileage and vehicle insurance		$ 1,214
Indirect	34% of personnel, fringe benefits and travel		$ 4,281
		Total Itemized Budget	**$236,200**

Total estimated budget

Total FY 2001 project cost	$236,200
Amount anticipated from previously committed BPA Funds	$ 0
Total FY 2001 budget request	**$236,200**
FY 2001 forecast from 2000	$210,000
% change from forecast	12.5%

Reason for change in estimated budget

Budget is slightly higher than anticipated because of additional funds required for: (1) biologist to develop biological assessments for proposed noxious weed treatments and installation of live plant materials with 404 fill and removal permits (compliance with ESA Section 7 Consultation and NMFS 4d rules), (2) additional O&M (includes increased technician hours for fence and plant maintenance due to project biologist having less field time than anticipated because of time required to develop biological assessments), and (3) trenching in willows with a subcontracted operated excavator.

Reason for change in scope

Scope has changed slightly to include modified O&M costs. This was a new project in FY 2000 and no O&M was required. Enhancements implemented during FY 2000 will require O&M during FY 2001. Enhancements involving operated heavy equipment and 404 fill and removals permits were not initially proposed. However, project personnel have determined that trenching in live plant materials with an excavator is the most cost-effective and most successful means of establishing riparian vegetation in project areas. CTUIR has had considerable success establishing native willow communities utilizing this planting technique in neighboring, Umatilla and Walla Walla River Basins.

Cost Sharing

Not applicable

Outyear Budget Totals

	2002	**2003**	**2004**	**2005**
Planning and design	$ 93,000	$ 93,000	$102,000	$112,000
Construction/implementation	$126,500	$134,500	$142,500	$151,000
Operations and maintenance	$ 21,000	$ 22,500	$ 24,000	$ 25,500
Monitoring and evaluation	$ 19,000	$ 20,000	$ 21,000	$ 22,500
Total Outyear Budgets	**$259,500**	**$270,000**	**$289,500**	**$311,000**

Other Budget Explanation

Not applicable

Reviews and Recommendations

This information was not provided on the original proposals, but was generated during the review process.

CBFWA Funding Recommendation	**Recommendation:** Ongoing Funding: yes; New Funding: no	**Date:** Jul 14, 2000

2001

$236,200

Comment:

The budget is slightly higher than anticipated because of additional funds required for:

1. the biologist to develop biological assessments for proposed noxious weed treatments and installation of live plant materials with 404 fill and removal permits (compliance with ESA Section 7 Consultation and NMFS 4d rules),
2. additional O&M (includes increased technician hours for fence and plant maintenance due to project biologist having less field time than anticipated because of time required to develop biological assessments), and
3. trenching in willows with a subcontracted operated excavator.

The scope has changed slightly to include modified O&M costs. This was a new project in FY 2000 and no O&M was required. Enhancements implemented during FY 2000 will require O&M during FY 2001. Enhancements involving operated heavy equipment and 404 fill and removals permits were not initially proposed; however, project personnel have determined that trenching in live plant materials with an excavator is the most cost-effective and most successful means of establishing riparian vegetation in project areas. CTUIR has had considerable success establishing native willow communities utilizing this planting technique in neighboring Umatilla and Walla Walla River Basins.

NWPPC Funding Recommendation	**Recommendation:** Fund	**Date:** Sep 13, 2000

2001

$221,205

Comment: Rationale: Budget increase inappropriate in this review.

NW Power and Conservation Council's FY 2006 Project Funding Review	**Funding category:** expense	**Date:** May 2005

FY05 NPCC Start of Year:	**FY06 NPCC Staff Preliminary:**	**FY06 NPCC July Draft Start of Year:**
$244,544	$244,544	$244,544

Response for project 200003100: Enhance North Fork John Day Rim
Comment received on 5/20/2005 12:03:51 PM

Comment on proposed FY 2006 budget
The proposed budget is identical to the budgets for FY2004 and FY2005. Freezing the budgets in FY2003, FY2005 and FY2006 has and does not allow for increases in the cost of living and other wage increases, rising utility and fuel and other materials costs, and associated administrative costs let alone project costs that were unforseen when proposals were last submitted in 2002. We have absorbed these cost increases for the last 4 years. It will become more difficult if not impossible to implement the project properly without concurrent funding increases. To cover these additional costs, CTUIR requests that the project budget be increased by 10% from $244,544 to $268,998. This project represents a long-term core component of the F&W Program and proposed '06 increases represent a ramp up towards increased '07 costs that the NPCC must recognize as necessary to maintain past investments in this "base program".

Accomplishments since the last review

Metrics	
Produce Environmental Compliance Documentation	WE 165 - Completed & submitted BPA Watershed NEPA Checklists to BPA; conducted cultural & archeological surveys; completed & submitted BPA Herbicide Applications forms to BPA.
# of people reached in each of 3 classes (T/S/G): Teachers, Students, General public	WE 99 - Conducted outreach efforts (public meetings, tours, mailings & presentations) to obtain input, identify landowner & resource agency concerns, provide educational opportunities, & promote stream habitat restoration & protection (350 people reached)
Identify and Select Projects	WE 114 - Identified, prioritized & selected projects through subbasin planning, watershed assessment review, public outreach, landowner coordination, watershed council coordination & interagency communication.
Coordination	WE 118 - Developed & submitted grant proposals through the North Fork John Day Watershed Council & to various local, state & federal entities & the Columbia River Inter-Tribal Fish Commission.
Manage and Administer Projects	WE 119 - Prepared & submitted BiOp metrics reports, draft SOW package, Inventory, Spending Plan, budget and accrual estimates, property inventory and accomplishment narratives to BPA.
Provide Technical Review	WE 122 - Coordinated with NRCS on combined BPA/CREP projects & reviewed NRCS planting, fencing & water development plans; inspected subcontract services to determine whether they conformed to specifications; reviewed Camas Creek Watershed Assessment.
Produce Plan	WE 174 - Coordinated with the U.S. Army Corps of Engineers & subcontracted Ecovista to prepare and complete the Camas Creek Watershed Assessment.
Produce Annual Report	WE 132 - Developed annual reports of progress as per contract specifications between the CTUIR and BPA, which included details of accomplishments for work elements included within the Statement of Work, and submitted to BPA.
Produce Status Report	WE 141 - Produced quarterly reports to summarize status of project milestones. Quarterly reports documented project accomplishments, problems encountered, planned activities for the following quarter & purchases of non-expendable & sensitive items.

Narrative
(n/a)

Develop Alternative Water Source	WE 34 - Developed springs for off-stream livestock water sources to better disburse livestock & better utilize available forage in uplands & relieve erosion problems in riparian & floodplain areas.
# of miles of fence (0.01 mi.)	WE 40 - 7.6 miles of new riparian corridor fences have been constructed and 1.8 miles of existing on-site fencing was repaired as new projects were initiated.
# of acres of vegetation planted (0.1 ac.)	WE 47 - 130 acres of native willows, black cottonwood, wild rose, red alder, snowberry, red & black elderberry, choke cherry, redosier dogwood, black hawthorn, ponderosa pine and native grasses.
# of riparian miles treated (0.01 mi.; count each bank separately)	WE 47 - 15 stream miles of native willows, black cottonwood, wild rose, red alder, snowberry, red & black elderberry, choke cherry, redosier dogwood, black hawthorn, ponderosa pine and native grasses.
Maintain Terrestrial Structure	WE 18 - Riparian corridor fences and off-stream water developments (spring sites and wells)were maintained at project sites as needed.
Maintain Vegetation	WE 22 - Treated noxious weeds with herbicides in existing project areas; installed nexar tubing and tree shelters around trees to prevent animal browse; installed woven wire around cottonwoods to prevent beaver damage.
# of riparian miles protected (0.01 mi.)	WE 92 - 2.4 stream miles; initial implementation efforts were carried out on an additional 5.1 stream miles for easements that were obtained in 2001
# of acres of new lease. (0.1 ac.)	WE 92 -77 acres; initial implementation efforts were carried out on an additional 114 acres for easements that were obtained in 2001
Start and end dates of lease (mm/dd/yyyy)	WE 92 - 09/01/2003 - 08/31/2018
Conduct Pre-Acquisition Activities	WE 172 - Negotiated terms/developed easements with landowners, which permitted CTUIR restoration efforts & restricted certain land uses, such as grazing, vegetation removal, construction of buildings, etc. in exchange for improvement/maintenance costs.
Collect/Generate/Validate Field and Lab Data	WE 157 - Collected pre & post project data to monitor enhancement effects of existing habitat projects. Data collected included longitudinal & cross-section surveys, percent shade, stream temperature, photo point monitoring, land-use & percent substrate.
Submit/Acquire Data	WE 159 - Stream temperature data was provided to the Monument SWCD, who reformatted the data & uploaded the information to NOAA's access database; this database provides one point of storage and retrieval for stream temerature data.
Estimated # of miles of primary stream reach improvement	WE 82 - 0.5 miles (developed two wells for off-stream watering in lieu of water gaps)
Estimated # of miles of total stream reach improvement	WE 82 - 1 mile (developed two wells for off-stream watering in lieu of water gaps)
Amount of unprotected water flow returned to the stream by conservation (cfs)	WE 82 - Primarily reduces maintenance costs associated with water gaps & protects water quality.
Amount of unprotected water flow returned to the stream by conservation (acre-feet)	WE 82 - Primarily reduces maintenance costs associated with water gaps & protects water quality.

Estimated # of miles of total stream reach improvement	WE 149 - 0.5 stream miles (2,950 feet of pvc installed for off-site water developments and wells)
Amount of unprotected water flow returned to the stream by conservation (cfs)	WE 149 - Primarily reduces maintenance costs associated with water gaps and protects water quality.
Amount of unprotected water flow returned to the stream by conservation (acre-feet)	WE 149 - Primarily reduces maintenance costs associated with water gaps and protects water quality.
Estimated # of miles of primary stream reach improvement	WE 149 - 1 stream mile

FY 2006 goals and anticipated accomplishments

Metrics

Produce Environmental Compliance Documentation	WE 165 - Complete & submit BPA Watershed NEPA Checklists to BPA; conduct cultural & archeological surveys; complete & submit BPA Herbicide Applications forms to BPA.
# of people reached in each of 3 classes (T/S/G): Teachers, Students, General public	WE 99 - Conduct outreach efforts (public meetings, tours, mailings & presentations) to obtain input, identify landowner & resource agency concerns, provide educational opportunities, & promote stream habitat restoration & protection (reach 100 people)
Identify and Select Projects	WE 114 - Identify, prioritize & select projects through subbasin plan prioritization, watershed assessment review, public outreach, landowner coordination, watershed council coordination & interagency communication.
Coordination	WE 118 - Develop & submit grant proposals through the North Fork John Day Watershed Council & to various local, state & federal entities & the Columbia River Inter-Tribal Fish Commission.
Manage and Administer Projects	WE 119 - Prepare & submitt BiOp metrics reports, draft SOW package, Inventory, Spending Plan, budget and accrual estimates, property inventory and accomplishment narratives to BPA.
Provide Technical Review	WE 122 - Coordinate with NRCS on combined BPA/CREP projects & review NRCS planting, fencing & water development plans; inspect subcontract services to determine whether they conform to specifications; review Camas Creek Watershed Assessment.
Produce Annual Report	WE 132 - Develop annual report of progress as per contract specifications between the CTUIR and BPA, which shall include details of accomplishments for work elements included within the Statement of Work, and submit to BPA.
Produce Status Report	WE 141 - Produce quarterly reports to summarize status of project milestones. Quarterly reports document project accomplishments, problems encountered, planned activities for the following quarter & purchases of non-expendable & sensitive items.
Develop Alternative Water Source	WE 34 - Develop springs for off-stream livestock water sources to better disburse livestock & better utilize available forage in uplands & relieve erosion problems in riparian & floodplain areas.
# of miles of fence (0.01 mi.)	WE 40 - Approximately 10 miles of new riparian corridor fences will be constructed.

Narrative

(n/a)

# of acres of vegetation planted (0.1 ac.)	WE 47 - Approximately 90 acres of native willows, black cottonwood, wild rose, red alder, snowberry, red & black elderberry, choke cherry, redosier dogwood, black hawthorn, ponderosa pine and native grasses will be planted.
# of riparian miles treated (0.01 mi.; count each bank separately)	WE 47 - Approximately 8 stream miles of native willows, black cottonwood, wild rose, red alder, snowberry, red & black elderberry, choke cherry, redosier dogwood, black hawthorn, ponderosa pine and native grasses will be planted.
Maintain Terrestrial Structure	WE 18 - Maintain riparian corridor fences and off-stream water developments (spring sites and wells) at project sites as needed.
Maintain Vegetation	WE 22 - Treat noxious weeds with herbicides in existing project areas; install nexar tubing and tree shelters around trees to prevent animal browse; install woven wire around cottonwoods to prevent beaver damage.
# of riparian miles protected (0.01 mi.)	WE 92 - approximately 5 stream miles
# of acres of new lease. (0.1 ac.)	We 92 - approximately 150 acres
Start and end dates of lease (mm/dd/yyyy)	WE 92 - 2006 easements not yet negotiated.
Conduct Pre-Acquisition Activities	WE 172 - Negotiate terms/develop easements with landowners, which permit CTUIR restoration efforts & restrict certain land uses, such as grazing, vegetation removal, construction of buildings, etc. in exchange for improvement/maintenance costs.
Collect/Generate/Validate Field and Lab Data	WE 157 - Collect pre & post project data to monitor enhancement effects of existing habitat projects. Data collected shall include longitudinal & cross-section surveys, percent shade,stream temperature, photo point monitoring, land-use & percent substrate
Submit/Acquire Data	WE 159 - Stream temperature data shall continue to be provided to the Monument SWCD and uploaded to NOAA's access database; this database provides one point of storage and retrieval for stream temerature data.
Estimated # of miles of primary stream reach improvement	WE 82 - O.5 miles (for off-stream watering in lieu of water gaps)
Estimated # of miles of total stream reach improvement	WE 82 - 1 mile (for off-stream watering in lieu of water gaps)
Amount of unprotected water flow returned to the stream by conservation (cfs)	We 82 - Primarily reduces maintenance costs associated with water gaps.
Amount of unprotected water flow returned to the stream by conservation (acre-feet)	We 82 - Primarily reduces maintenance costs associated with water gaps.
Estimated # of miles of total stream reach improvement	WE 149 - 0.5 stream miles (pvc installed for off-site water developments and wells)
Amount of unprotected water flow returned to the stream by conservation (cfs)	WE 149 - Primarily reduces maintenance costs associated with water gaps and protects water quality.

Amount of unprotected water flow returned to the stream by conservation (acre-feet)	WE 149 - Primarily reduces maintenance costs associated with water gaps and protects water quality.
Estimated # of miles of primary stream reach improvement	WE 149 - 1 stream mile

Subbasin planning

How is this project consistent with subbasin plans?

It is consistent with & implements Strategy D, Activity D3 (p. 260); Strategy E, Activities E1 & E2 (p. 263), E3 (pp. 263-4) & E4 (p. 264); Strategy G, Activity G2 (p. 270); Strategy H, Activities H1 & H3 (p. 273); Strategy I, Activities I1, I2, I3, I4 & I5 (p. 278); Strategy J, Activity J1 (p. 281); & Terrestrial Species under Herbaceous Wetlands, Objective 2, Strategies 2-5 (pp. 303-4); Upland Aspen Forest, Objective 3, Strategies 1-3 (pp. 307-8). These strategies relate to the following objectives listed in Table 69. (pp. 245- 7): improve channel stability, increase role & abundance of LWD; increase pool habitat, maintain & improve quality & quantity of spawning areas; decrease gradient; restore sinuosity; restore channel/floodplain connectivity; restore off-channel areas; trap sediment on the floodplain; moderate stream temperatures through improvement of width-to-depth ratios, increased shade & floodplain reconnectivity; manage subbasin fisheries for wild fish production; enhance base flows; moderate peak flows; restore natural hydrographic conditions; minimize direct mortality & stress to fish; minimize factors that lead to fluctuations in dissolved oxygen; minimize rates of erosion from uplands; maintain riparian management objectives; provide adequate habitat components for focal species; create physical & educational conditions that provide for growth of fish & wildlife and enjoyment of natural resources; bring the stream channel in balance with water & sediment supplied by the watershed; & the following objectives listed under Terrestrial Species: restore, enhance &/or create wetland habitat where feasible (pp. 303-4); & target the enhancement, restoration & protection of upland aspen forest (pp. 307-8). Project implementations consistent with the strategies and objectives above include constructing riparian/floodplain livestock exclusion fencing & off-stream water sites, planting native vegetation, treating noxious weeds & conducting public outreach.

How do goals match subbasin plan priorities?

The project accomplishes priority work because it improves habitat for focal species, summer steelhead, spring Chinook, redband trout (p63), great blue heron & American beaver (Table 22, p64; Set 1.5), p286). The project implements enhancements in the North Fork Subbasin & Upper Camas Creek, Lower Camas Creek, Cottonwood Creek & Lower NF JDR Geographic Areas, 3 of these 4 areas are restoration priority areas in the Management Plan (pp 231-2; Set 1.2) p285); the Lower NF JDR Geographic Area provides habitat for focal species, but is not identified as priority & landowner interest is high (Set 1.3), p285); the project utilizes CTUIR□s Walla Walla Basin Fish Habitat Enhancement Project□s Monitoring Protocol, a practical, & cost-effective monitoring & evaluation strategy (Set 2.2), p286); the project has established partnerships with local organizations, such as NRCS, Grant County, Monument & Umatilla County SWCD's, & Grant & Umatilla County FSA's to partner & cost share on habitat projects. The CTUIR holds a seat on the watershed council & works closely with the watershed council coordinator to identify projects & funding opportunities (Set 3.1), p286); the project conducts outreach efforts to obtain input, identify landowner & agency concerns, provide educational opportunities, & promote habitat restoration & protection (Set 3.2), pp 286-7); the project frequently hires local subcontractors from within Umatilla & Grant Counties. Materials & fuel are purchased locally. Storage & tree refrigeration units are rented from locals (Set 3.3), p287); the watershed council promotes CTUIR's habitat improvement efforts, resulting in landowners providing feedback & contacting CTUIR for assistance, schools & interest groups requesting outreach, & contractors contacting CTUIR to bid on jobs (Set 3.4), p287); the project implements passive, natural recovery processes & integrates restoration efforts with other entities to achieve large scale, self-sustaining benefits (3.5), p287).

Other comments

The project has only $22,162 in actual BPA dollars available for 2005 on-the-ground implementation efforts. While the project continues to develop partnerships and seek and secure cost share funds, obtaining these other dollars is not guaranteed, and it is difficult to leverage other funds with minimal BPA monies. The project has absorbed inflation increases,

additional O&M costs (as more projects are secured) and desires to increase project monitoring. Willing landowners also become frustrated and relationships with these individuals can be damaged when projects are negotiated, and we are than unable to follow through due to lack of funds. Additional dollars are very much warranted to continue day to day project operations in this very important watershed.