Phil Rockefeller Chair Washington

> Tom Karier Washington

Henry Lorenzen Oregon

Bill Bradbury Oregon



W. Bill Booth Vice Chair Idaho

James Yost Idaho

Pat Smith Montana

Jennifer Anders Montana

June 10, 2015

### **DECISION MEMORANDUM**

**TO:** Council members

FROM: John Harrison

Information Officer

SUBJECT: Draft annual report to the Governors on Bonneville's fish and wildlife

costs in Fiscal Year 2014

### PROPOSED ACTIONS:

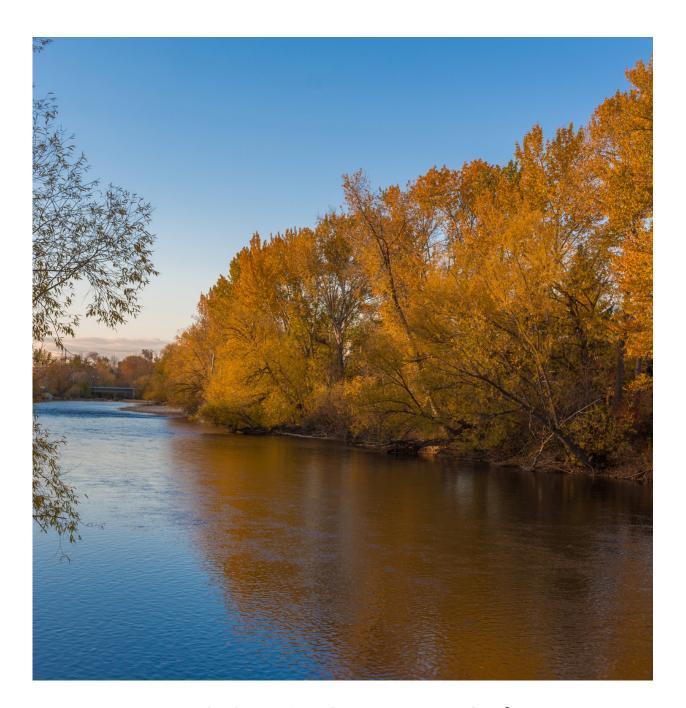
- 1) Release the draft report for 30 days of public comment
- 2) Work on any revisions and approve the final report at the July14-15 Council meeting

Calendar year 2015 is the 14th year the Council has reported to the Northwest governors on Bonneville's fish and wildlife costs in the previous fiscal year. The purpose of the report is to provide information, not to assess or comment on the costs. Information in the report is provided by Bonneville and is not independently verified by the Council.

The draft report was distributed to you on May 29. By June 2, the only comment received was to consider changing the word "costs" in the report to "investments."

At this meeting, staff requests that you approve releasing the draft report for 30 days of public comment, through Friday July 10, 2015.

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### DRAFT 2014 Columbia River Basin Fish and Wildlife Program Costs Report



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### Overview

Since 2001, in response to a request from the governors of the four Northwest states, the Council has reported annually on all costs related to fish and wildlife incurred by the Bonneville Power Administration (BPA) as reported by BPA, including costs to implement the Council's Columbia River Basin Fish and Wildlife Program. In this 14th annual report, the Council provides an update of Bonneville's reported fish and wildlife costs in Fiscal Year 2014. This cost information was provided by Bonneville in response to requests from the Council staff and was not independently verified by the Council or its staff. The Council prepares this report solely for informational purposes, not as a requirement of the Northwest Power Act, and has neither the expertise nor the resources to analyze the accuracy of BPA's reported costs.

### Summary of 2014 costs

In Fiscal Year 2014, Bonneville reported total fish and wildlife costs of approximately \$782.6 million, as follows:

- \$231.8 million in direct (expense) costs.<sup>i</sup>
- \$90.3 million in direct costs and reimbursements to the federal Treasury for expenditures by the Corps of Engineers, Bureau of Reclamation, and U.S. Fish and Wildlife Service for investments in fish passage and fish production, including direct funding of operations and maintenance expenses of federal fish hatcheries; this category also includes one-half of the Council's \$10.2 million budget in Fiscal Year 2014 (the other half is assigned to the Power Business Line budget).
- \$141.3 million in fixed costs (interest, amortization, and depreciation) of capital investments for facilities such as hatcheries, fish-passage facilities at dams, and some land purchases for fish and wildlife habitat.

- \$122.7 million in forgone hydropower sales revenue that results from dam operations that benefit fish but reduce hydropower generation.
- \$196.2 million in power purchases during periods when dam operations to protect migrating fish reduce hydropower generation, such as by spilling water over dams in the spring or storing it behind dams in winter months in anticipation of required spring spill.

The \$782.3 million total does not include the amount Bonneville borrowed from the U.S. Treasury in 2014 totaling \$37.4 million for program-related projects, and \$101.7 million for associated federal projects, which include capital investments at dams operated by the Corps of Engineers and Bureau of Reclamation ii. These investments are funded by congressional appropriations and repaid by Bonneville. Including them in the same total as fixed costs would double-count some of the capital investment. The total also does not reflect a credit of \$84 million from the federal Treasury related to fish and wildlife costs in 2014 that Bonneville is required to take under Section 4(h)(10)(C) of the Power Act. The annual credit comprises the obligations of other federal agencies for dam purposes other than hydropower, and which Bonneville pays in full. The credit is applied to Bonneville's federal Treasury debt. Subtracting the credit reduces the total fish and wildlife costs to \$678.7 million in fiscal year 2014 (the credit is explained in more detail in the "Power System Costs" section of this report).

The total of all fish and wildlife costs reported by Bonneville in Fiscal Year 2014 (\$782.3 million) includes forgone revenue and power purchases. How large is this relative to Bonneville's other costs? Bonneville reports the relationship in this way: in the same year, Bonneville's entire Power Business Line costs totaled approximately \$2.337 billion. Adding the forgone revenue (\$122.7 million) to these costs brings the total to \$2.459 billion. Bonneville's fish and wildlife costs of \$782.3 million comprised 31.8 percent of that total iii.



Fish and wildlife costs account for a significant portion of the rate Bonneville charges its wholesale power customers. Approximately one-third of Bonneville's wholesale rate of approximately \$31.50 per megawatt hour is estimated to be associated with its fish and wildlife program.

### Power system costs

The Council's program and the biological opinions on Federal Columbia River Power System operations issued by NOAA Fisheries and the U.S. Fish and Wildlife Service specify hydropower dam operations for fish that also affect power generation. These measures include river and dam operations to protect spawning and rearing areas for both anadromous and resident fish and to improve passage conditions at dams for juvenile salmon and steelhead. Sometimes these operations require Bonneville to purchase power to meet loads while at other times Bonneville simply forgoes a revenue-making opportunity. Regardless of how Bonneville handles the reduced generation, fish

operations to comply with these federal requirements affect Bonneville rates for utility customers. Bonneville customers pay the cost of power Bonneville purchases to meet regional loads.

Compliance with these legal requirements, and others, limits the amount of revenue that would be possible from an unrestricted operation of the hydropower system. For reporting purposes, on an annual basis Bonneville calculates the value of both power purchases and forgone revenues attributable to fish operations and reports them as part of its costs to mitigate the impacts to fish and wildlife from operation of the hydropower system. The Council recognizes there is debate over how Bonneville reports these power-system costs. A provision of the Act requires the Council, as it develops or amends the fish and wildlife program, to consider the "monetary costs and electric power issues resulting from implementation of the program," costs which are to be allocated by the Administrator, not the Counciliv. Thus, this report includes forgone revenues and power purchases as reported by Bonneville. The Council does not have the capability to audit Bonneville's financial records.

The amounts of forgone revenue and power purchases vary from year to year because the demand for power and the amount of water in the Columbia River system also vary. During some months of the year (most notably spring), the hydropower system generates sufficient power, even with fish operations, to both meet firm load and generate surplus power. During these months, the fish operations often reduce so-called "secondary" revenues from sales of surplus power. Bonneville calls these revenue reductions "forgone revenues." Among the many factors Bonneville considers in setting rates, one is the assumption of a lower amount of secondary revenue because of how the river and dams are operated for fish.

During other months of the year, and under low-water conditions, the hydropower system does not generate enough power to meet firm loads and Bonneville must supplement through purchasing electricity from other suppliers. Bonneville identifies some of these power purchases as necessary due to reduced generation resulting from operations to benefit fish. Bonneville labels these as "power purchases for fish enhancement" in its fish and wildlife costs. To calculate the annual power-generation share of forgone revenue and power purchases attributable to fish operations at the



dams, Bonneville conducts two studies of hydropower generation for the relevant fiscal year. One study includes all dam-operating requirements, including those for fish, and the other has no fish-protection requirements. The differences for each month are calculated and applied to the corresponding monthly actual Mid-Columbia Dow Jones wholesale electricity market prices. Bonneville combines these values with assumptions about the monthly power-demand load, and then calculates the monthly estimates of the forgone revenue and power purchases resulting from the fishenhancement operations.

In Fiscal Year 2014, the overall annual average difference between the two studies was 948 average-megawatts. Of this, about 465 average-megawatts contributed to the estimated \$122.7 million in forgone revenue. About 483 average megawatts contributed to the estimated \$196.2 million in replacement power purchases.

As noted, above, Bonneville receives a credit under Section 4(h)(10)(C) of the Northwest Power Act as reimbursement for the non-power share of fish and wildlife costs that Bonneville pays annually, including a portion of the power purchases. Other costs are not factored into that 4(h)(10)(C) credit, such as forgone revenue, interest on Treasury borrowing, amortization and depreciation of capital projects, reimbursable expenditures, and the Council budget. Non-power purposes such as irrigation, navigation, and flood control comprise a weighted, system-wide average of 22.3 percent of the authorized purposes of the federal dams. The annual credit to Bonneville is based on this percentage. The 2014 credit was \$103.9 million.

In effect, the credit reduces the fish and wildlife costs paid by electricity ratepayers. As noted earlier in this report, the grand total of all fish and wildlife costs incurred by Bonneville in 2014 was approximately \$782.3 million. Applying the 4(h)(10)(C) credit reduces Bonneville's total fish and wildlife-related costs, meaning that ratepayers were responsible for \$678.7 million and the federal government was responsible for the nonpower-purposes share of \$103.9 million.

### Background

The Pacific Northwest Electric Power Planning and Conservation Act of 1980 (16 USC 839; PL 96-501), the federal law that authorized the states of Idaho, Montana, Oregon, and Washington to form the Northwest Power and Conservation Council, directs the Council to prepare a program to protect, mitigate and enhance fish and wildlife, and related spawning grounds and habitat,

of the Columbia River Basin that have been affected by hydroelectric development. The Bonneville Power Administration satisfies its Power Act responsibilities for fish and wildlife mitigation through funding of the Council's Columbia River Basin Fish and Wildlife Program. Bonneville is a federal power marketing authority within the U.S. Department of Energy that sells wholesale electricity from 31 federal hydropower dams and one non-federal nuclear power plant in the Pacific Northwest (the Federal Columbia River Power System or FCRPS).

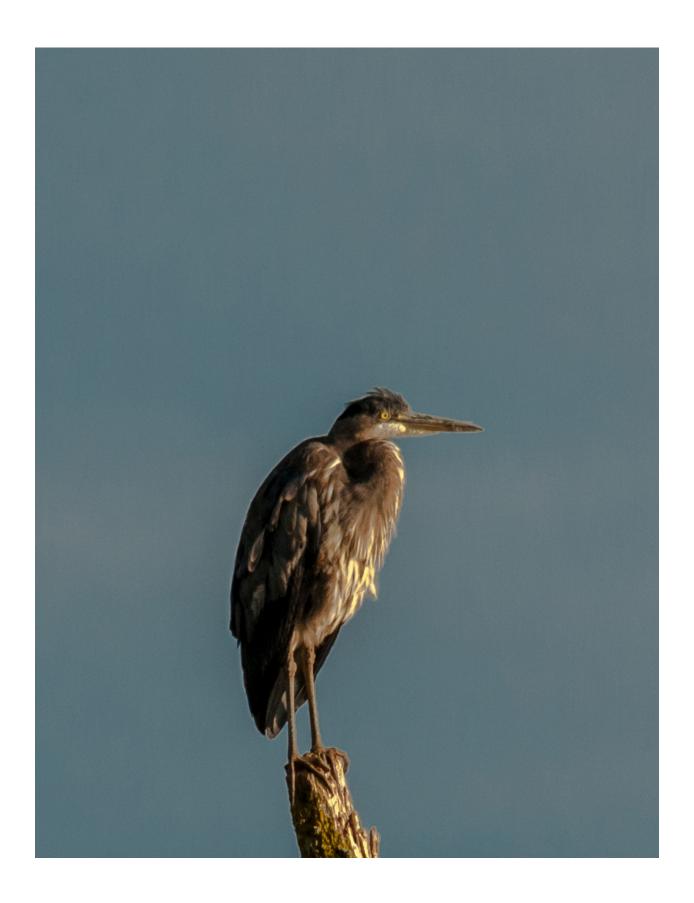
In addition to this annual report on Bonneville's fish and wildlife costs, the Council also tracks progress of fish and wildlife efforts in the Columbia River Basin using three high-level indicators. Posed as questions, they are:

- Are Columbia River Basin fish species abundant, diverse, productive, spatially distributed, and sustainable?
- 2. Are operations of the mainstem Columbia and Snake River hydropower dams meeting the fishpassage survival objectives of the program?
- 3. What is being accomplished by projects that implement the Council's Fish and Wildlife Program?

Over time, the Council expects to augment and refine these initial indicators to provide a more comprehensive picture of fish and wildlife in the Columbia River Basin. For example, at this point all of the indicators



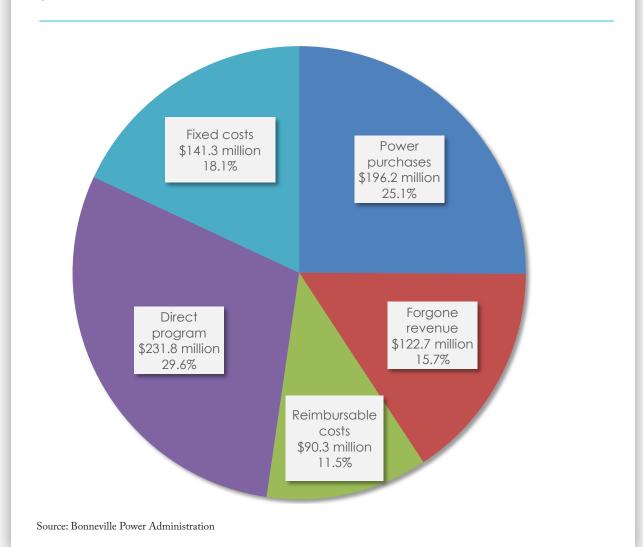
for Council actions are related to habitat work. As more information becomes available, this indicator should be expanded to better reflect the breadth of actions that implement the Council's program. While this information stops short of providing evidence of the effectiveness of the Council's program or individual projects, the Council is separately pursuing additional approaches to shed light on that matter, as well.



### Figures

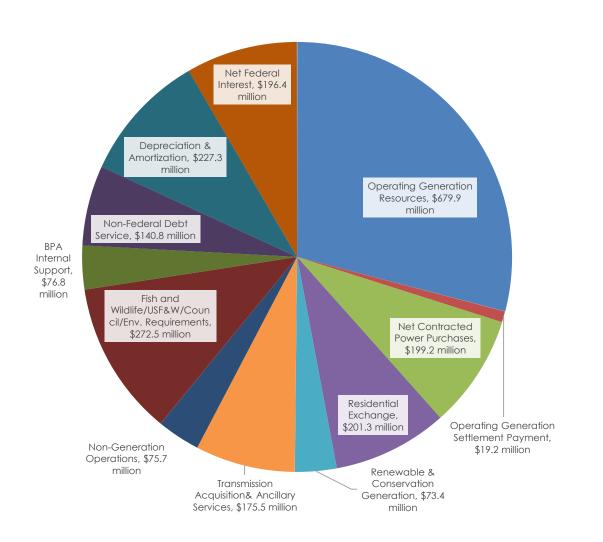
### Figure 1A: Total Costs, FY2014 By Major Spending Area

Total: \$782.3 million does not reflect \$139.2 million in obligations to capital projects or \$103.9 million in credits



### Figure 1B: BPA Power Business Line Costs, FY2014

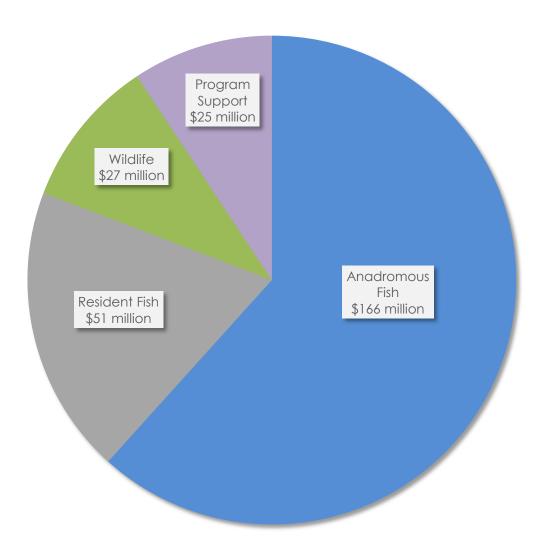
Total: \$2.34 billion



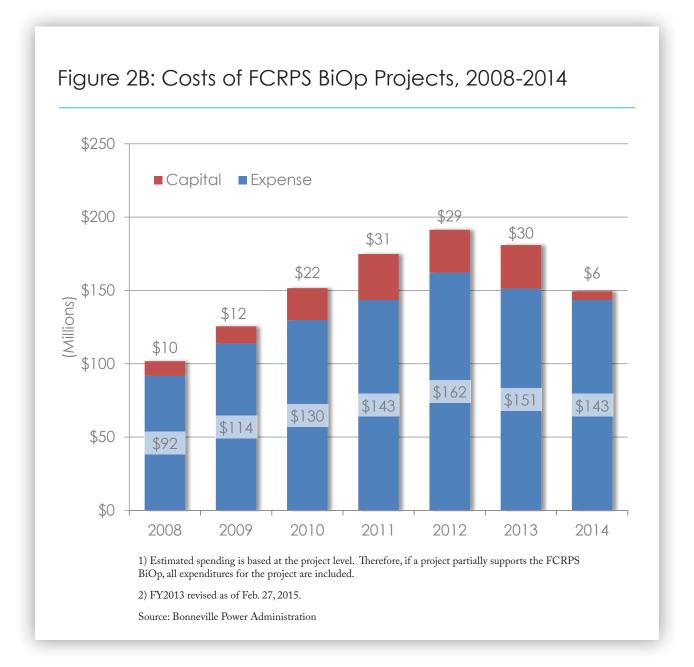
This information was made publicly available by BPA on 4/27/2015 and is consistent with audited actuals that contain agency approved financial information.

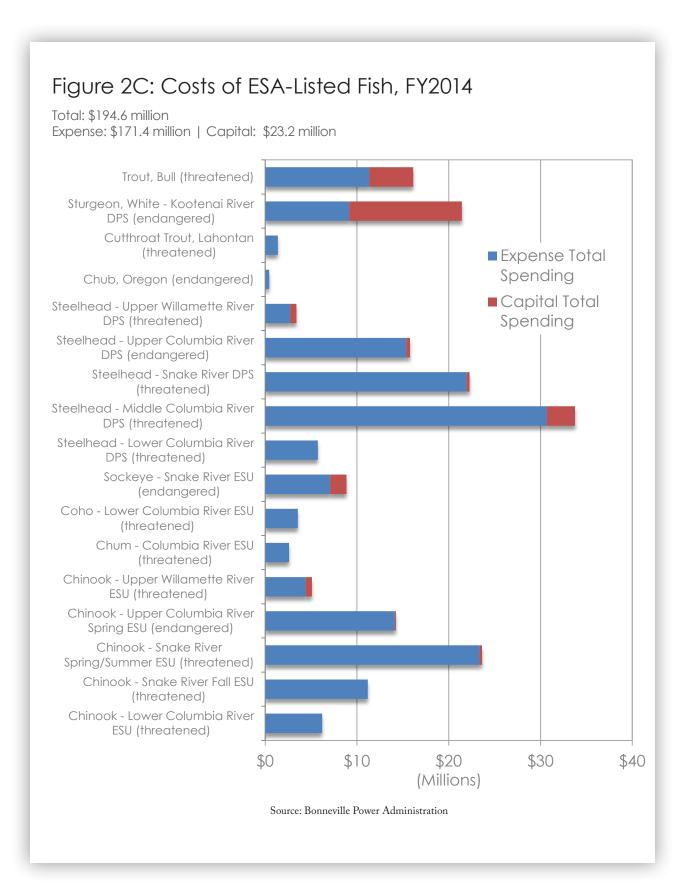
### Figure 2A: Costs by Types of Species, FY2014

Total: \$269.1 million includes \$37.4 million in obligations to capital projects



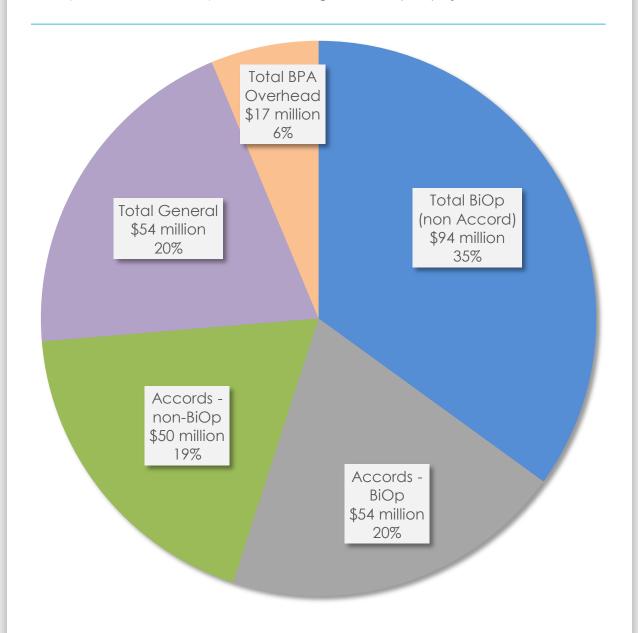
- 1) Starting in 2008, Spending can be tracked back to a work element where the contractor explicitly identified the "Primary Focal Species" benefiting from the work.
- 2) Program Support includes contracts that contain only administrative work elements or program-level spending that could not be mapped to a specific project, as well as BPA internal overhead such as personnel costs.
- 3) FY2013 revised as of March 2, 2015.





### Figure 2D: Direct Program Costs by Fund, FY2014

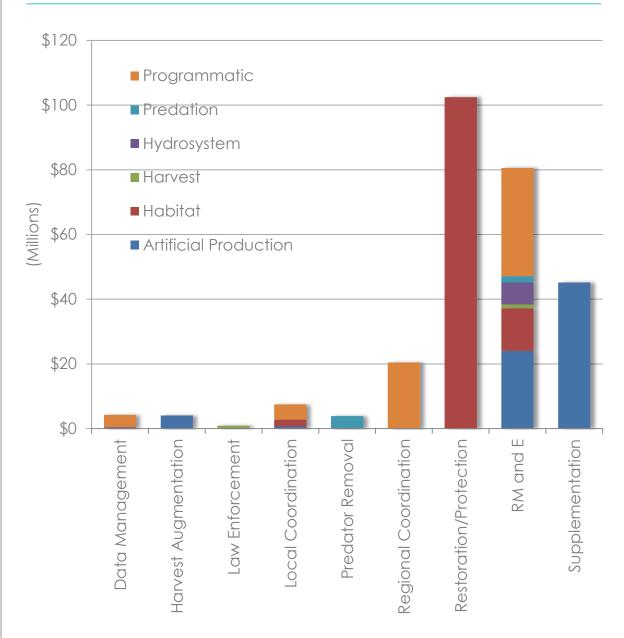
Total: \$269.1 million includes \$37.4 million in obligations to capital projects



- 1) BiOp tracking at fund level began in 2009, Accords began in 2008.
- 2) Spending is estimated based on the % of funding toward a project. For example, if a project budget is 70% BiOp and 30% General, the project expenditures will be prorated 70% toward BiOp and 30% General.
- 3) FY2013 revised as of March 2, 2015.

### Figure 3A: Costs by Purpose and Emphasis, FY2014

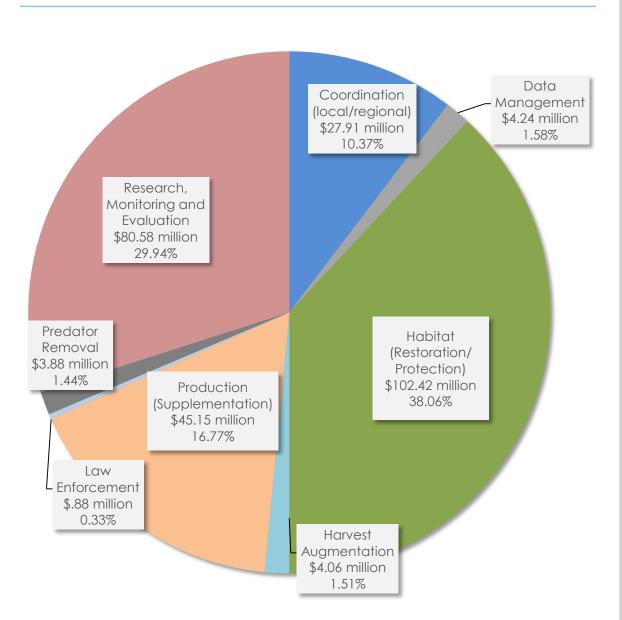
Total: \$269.1 million includes \$37.4 million in obligations to capital projects



Estimated spending is based at the project level. Therefore if a project is labeled AP, but also supports Habitat, the expenditures are counted as AP.

### Figure 3B: Costs by Category, FY2014

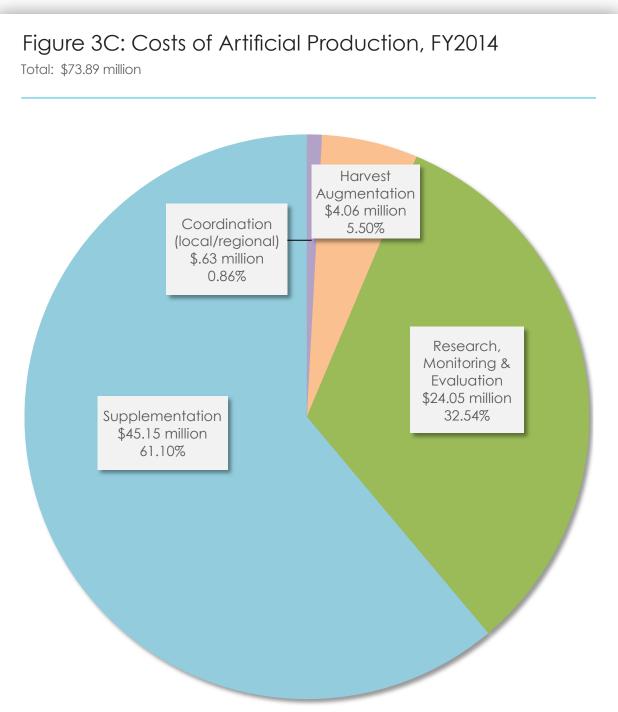
Total: \$269.1 million includes \$37.4 million in obligations to capital projects



Starting in 2008, as part an effort to improve how BPA manages our program's data and reporting, we have updated some of our old project categories. The new project categories are called "Purpose" and "Emphasis" where purpose describes the general goal or purpose of the project and emphasis describes the primary types of work being employed by the project. BPA program support is included within Coordination, Data Management and RM&E emphasis types.

Estimated spending is based at the project level. Therefore if a project is assigned an emphasis of Habitat, but also does RME, all expenditures for the project are included under Habitat.

FY2013 - No changes as of February 27, 2015

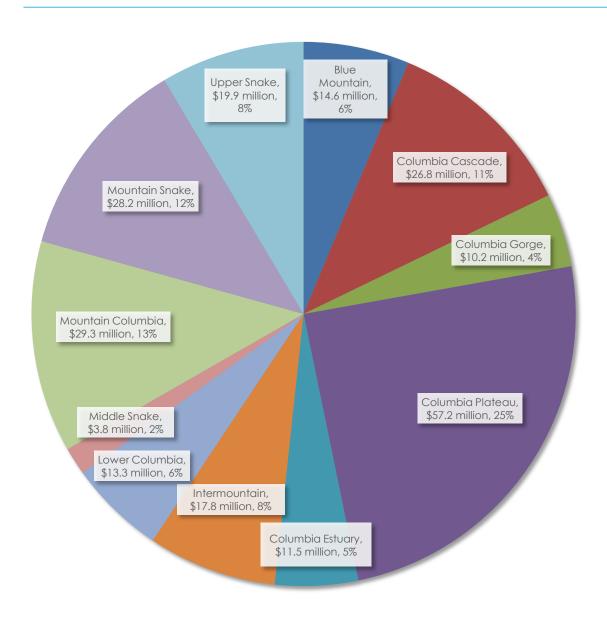


Estimated spending is based at the project level. Therefore if a project is assigned an emphasis of Habitat, but also does RME, all expenditures for the project are included under Habitat.

FY2013 - no changes as of February 27, 2015.

### Figure 4: Costs by Province, FY2014

Total: \$269.1 million includes \$37.4 million in obligations to capital projects



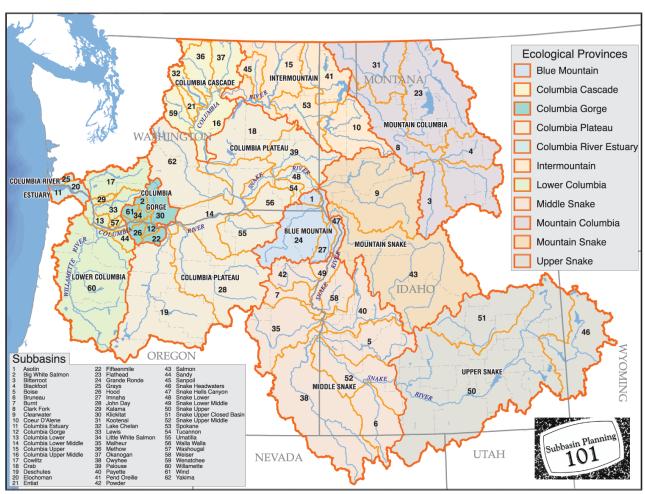
Starting in 2008, spending by province is tracked in Pisces (www.cbfish.org) based on where the contractor explicitly identified the work location.

Other includes "Undetermined" locations such as Ocean, Canada, and provinces not recognized by NPCC.

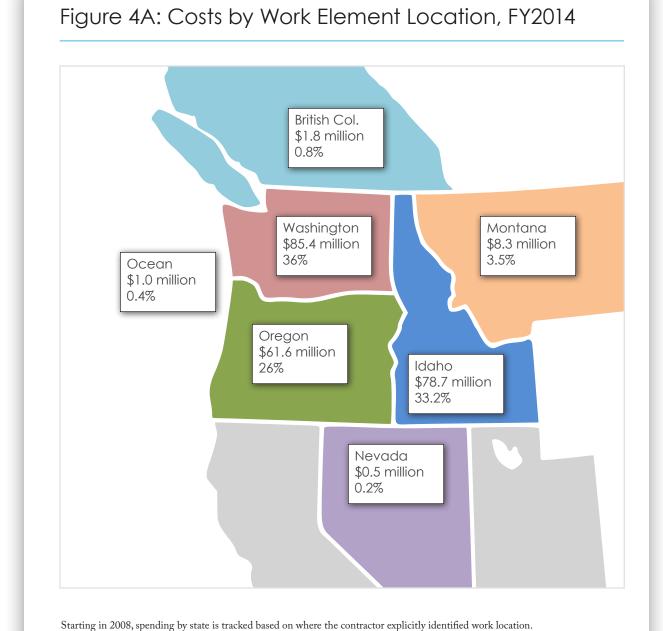
Program Support/Admin/Other includes spending that cannot be traced back to a contract that has at least one work element requiring location; contracts without any work elements at all; program level spending not mapped to a specific project; and BPA Overhead.

FYs revised as of March 2015.

### Province Map

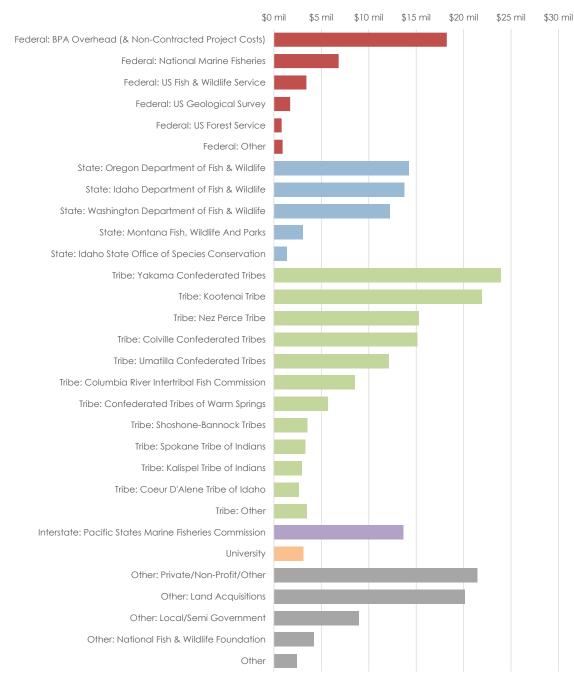


Map by Bonneville Power Administration Geographical Information System



### Figure 5: Costs by Contractor Types, FY2014

Total: \$269.1 million includes \$37.4 million in obligations to capital projects



Values above include accruals.

Starting in FY13, land acquisition values may include stewardship costs for long-term operations and maintenance (O&M).

FY2013 - No changes as of February 27, 2015.

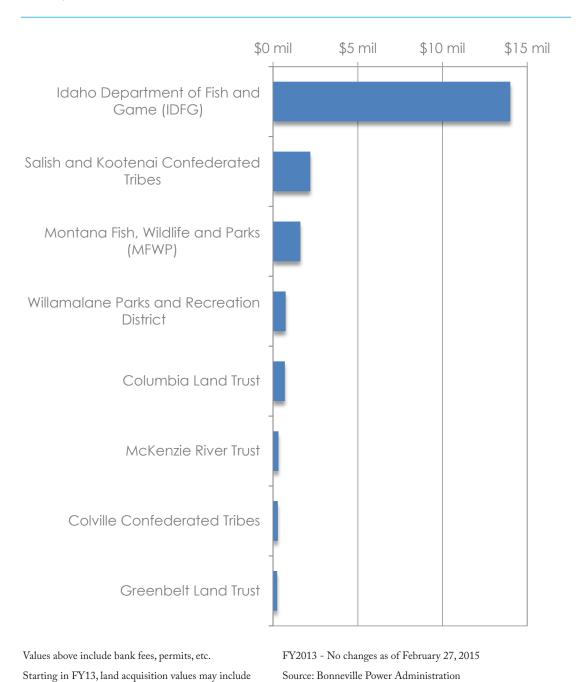
Smaller and "other" categories detailed in Tables 5A and 5B.



Total: \$20.1 million

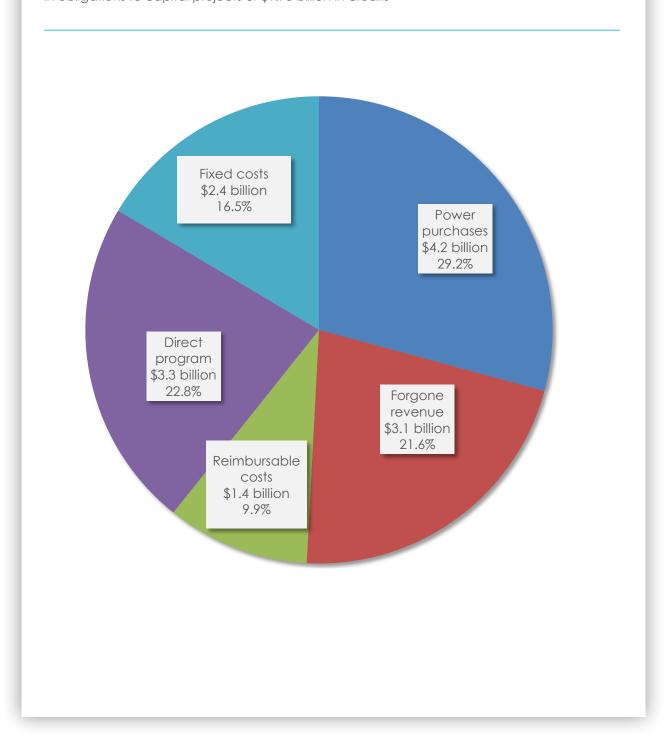
stewardship costs for long-term operations and

maintenance (O&M).



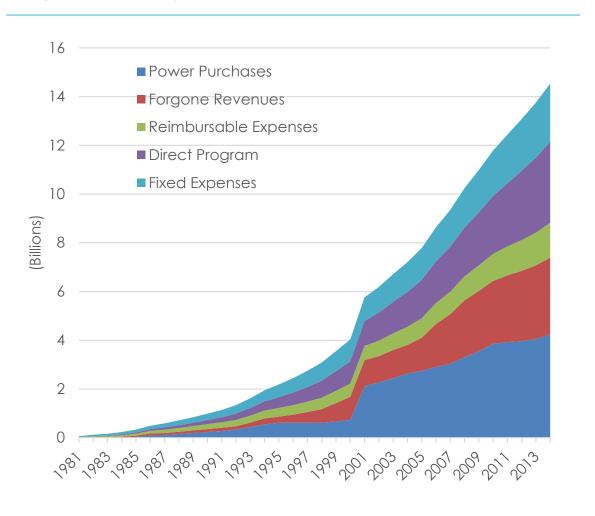
### Figure 7A: Total Costs 1978-2014, By Major Spending Area

Total of \$14.5 billion does not reflect \$2.56 billion in obligations to capital projects or \$1.98 billion in credits



### Figure 7B: Cumulative Costs 1978-2014, By Major Spending Area

Total of \$13.7 billion does not reflect \$2.42 billion in obligations to capital projects or \$1.88 billion in credits





### **Endnotes**

- <sup>i</sup> Direct program costs also can include supplemental mitigation expenses, which in the past included so-called "action-plan," "high-priority," and "fast-track" projects. For the period 2001-2004, direct program costs included a total of \$16 million in one-time expenditures for "high priority" and "action plan" projects. The "action-plan" projects were intended to bring immediate benefits to ESA-listed salmon and steelhead that were affected by altered hydropower dam operations in the spring and early summer of 2001, when the flow of the Columbia River was at a near-record low. The "high-priority" projects were intended to bring immediate benefits to all species listed for protection under the Endangered Species Act in advance of subbasin planning (the initial subbasin plans were submitted to the Council in 2004 and adopted into the Fish and Wildlife Program in 2004 and 2005). The action-plan and high-priority expenditures were included in the calculation of 1978-2009 total spending. "Fast Track" projects were identified under the Columbia Basin Research, Monitoring, and Evaluation Collaboration process and workshops in 2009. The projects were intended to meet high-priority gaps in the Reasonable and Prudent Alternative of the 2008 Federal Columbia River Power System Biological Opinion for salmon and steelhead by being implemented as quickly as possible. The projects can be found in the AA/ NOAA/NPCC BiOp RM&E Workgroup Recommendations Report, http://bit.ly/aWn7PR.
- ii Capital projects are financed over time with appropriated debt. In Bonneville's fish and wildlife budget, the amounts are called "obligations" as opposed to project expenditures through the direct-funded part of the program. Capital projects include construction of fish hatcheries, fish and wildlife habitat improvements, and land purchases for wildlife. Capital investments in Bonneville's budget also include those for "associated federal projects," which include Bonneville's share of the cost of the projects in the U.S. Army Corps of Engineers' Columbia River Fish Mitigation Program. These projects include, among others, fish-passage improvements at the federal dams, barge transportation of juvenile salmon and steelhead, research in the Columbia River estuary, and the effort to relocate Caspian tern and doublecrested cormorant nesting areas from the estuary to other locations in the Northwest.
- The 2014 costs bring the grand total of all fish and wildlife costs incurred by Bonneville from 1978 when the costs began, through 2014, to \$14.53 billion. The total does not include \$2.56 billion in annual obligations to capital investments (the actual annual costs are captured in the "fixed costs" category), or \$1.98 billion in credits applied to Bonneville's Treasury debt (discussed above).

Here, in descending order, is a breakdown of the major cost categories:

- \$4.24 billion for power purchases to meet electricitydemand requirements in response to river and dam operations that benefit fish but reduce hydropower generation.
- \$3.14 billion in forgone hydropower sales revenue. Bonneville calculates the value of hydropower that could not be generated (revenue that is forgone) because of river operations to assist fish passage and improve fish survival, such as water spills at the dams when juvenile salmon and steelhead are migrating to the ocean.
- \$3.31 billion for the Council's direct program. This amount does not include annual commitments to capital investments in the direct program.
- \$2.39 billion in fixed expenses for interest, amortization, and depreciation on the capital investments.
- \$1.43 billion to: 1) directly fund fish and wildlife projects undertaken by the U.S. Army Corps of Engineers or the Bureau of Reclamation for which Bonneville pays the hydropower share, consistent with the Power Act (these expenditures include, for example, operations and maintenance costs of certain fish-production facilities, fish passage facilities at dams, and research activities); and 2) reimburse the U.S. Treasury for the hydropower share of major dam modifications by the Corps of Engineers, such as installing spillway weirs, bypass systems, fish-deflection screens in front of turbine entrances, and spillway modifications to reduce dissolved gas.
- iv 839b(h)(8). The Council shall consider, in developing and adopting a program pursuant to this subsection, the following principles: ... 839b(h)(8)(D). Monetary costs and electric power losses resulting from the implementation of the program shall be allocated by the Administrator consistent with individual project impacts and system wide objectives of this subsection.



### Table 1A: Total Costs FY 2014, By Major Spending Area

Category	Total in Millions
POWER PURCHASES	196.2
FORGONE REVENUES	122.7
REIMBURSIBLE EXPENSES	90.3
DIRECT PROGRAM	231.8
FIXED EXPENSES	141.3
	782.3

Table 1B: BPA Power Business Line Costs, FY 2014

Category	Total in Millions
OPERATING GENERATION RESOURCES	889
OPERATING GENERATION SETTLEMENT PAYMENT	22
NON-OPERATING GENERATION	-26
NET CONTRACTED POWER PURCHASES	154
RESIDENTIAL EXCHANGE/IOU SETTLEMENT BENEFITS	202
renewable & conservation generation	29
transmission acquisition & ancillary services	162
non-generation operations	79
FISH AND WILDLIFE/USF&W/COUNCIL/ENV. REQUIREMENTS	278
BPA INTERNAL SUPPORT	70
OTHER INCOME, EXPENSES, & ADJUSTMENTS/BAD DEBT	0
NON-FEDERAL DEBT SERVICE	519
DEPRECIATION & AMORTIZATION	223
NET FEDERAL INTEREST	209
TOTAL	2,647

Costs in millions; total: \$2.64 billion. This information has been made publicly available by BPA on 3/20/2013 and is

consistent with audited actuals that contain Agency approved financial information.

### Table 2A: Direct Program Costs by Types of Species, FY2008-2014

\$160,624,889 \$ \$36,656,859 \$21,670,658 \$20,635,546 \$5239,587,953 \$	species type	2008	2009	2010	2011	2012	2013 3	2014
\$31,010,039 \$41,225,300 \$36,656,859 \$16,679,586 \$13,752,725 \$21,670,658 \$23,968,329 \$23,722,453 \$20,635,546 \$0 \$0 \$0 \$174,413,008 \$205,271,805 \$239,587,953 \$\$	₩	2,755,054	\$126,571,326	\$160,624,889	\$209,046,031	\$205,632,269	\$195,087,363	\$165,999,977
\$16,679,586 \$13,752,725 \$21,670,658 \$23,968,329 \$23,722,453 \$20,635,546 \$0 \$0 \$174,413,008 \$205,271,805 \$239,587,953 \$		1,010,039	\$41,225,300	\$36,656,859	\$58,941,817	\$53,678,573	\$48,188,111	\$51,454,630
\$23,968,329 \$23,722,453 \$20,635,546 \$0 \$0 \$0 \$174,413,008 \$205,271,805 \$239,587,953 \$	\$1	985'629'9	\$13,752,725	\$21,670,658	\$30,708,663	\$29,067,757	\$22,215,304	\$26,649,007
OST SHARE \$0 \$0 \$0 \$0 \$174,413,008 \$205,271,805 \$239,587,953		3,968,329	\$23,722,453	\$20,635,546	\$18,177,206	\$21,172,811	\$25,611,114	\$25,030,496
\$174,413,008 \$205,271,805 \$239,587,953	T SHARE	\$0	\$0	\$0	-\$5,658,821	-\$3,141,637	\$0	\$0
	\$17	4,413,008	\$205,271,805	\$239,587,953	\$311,214,895	\$306,409,772	\$291,101,892	\$269,134,110

Total: \$269.1 million includes \$37.3 million in obligations to capital projects.

1) Starting in 2008, Spending can be tracked back to a work element where the contractor explicitly identified the "Primary Focal Species" benefiting from the work.

2) Program Support includes includes contracts that contain only administrative work elements or program level spending that could not be mapped to a specific project, as well as BPA internal overhead such as personnel costs.

3) FY2013 revised as of March 2, 2015.

## Table 2B: Direct Program Costs of FCRPS BiOp Projects, FY2008-2014

Category	2008	2009	2010	2011	2012	2013 2	2014
EXPENSE	\$91,806,508	\$113,900,603	\$129,758,323	\$143,477,289	\$162,060,445	\$151,177,409	\$143,469,098
CAPITAL	260'698'6\$	\$11,668,863	\$21,761,323	\$31,297,548	\$29,240,867	\$29,683,425	\$5,925,196
TOTAL	\$101,675,605	\$125,569,466	\$151,519,646	\$174,774,837	\$191,301,312	\$180,860,834	\$149,394,294

1) Estimated spending is based at the project level. Therefore, if a project partially supports the Federal Columbia River Power System Biological Opinion, all expenditures for the project are included.

2) FY2013 revised as of Feb. 27, 2015.

Table 2C: Direct Program Costs on ESA-Listed Species, FY2014

ESA Listed Focal Species Name	Expense "Direct" Spending	Expense "Contract Administration" Spending	Expense Total Spending	Capital "Direct" Spending	Capital "Contract Administration" Spending	Capital Total Spending	Total Spending
CHINOOK - LOWER COLUMBIA RIVER ESU (THREATENED)	\$4,785,157	\$1,429,357	\$6,214,514	(\$496,010)	(\$16,209)	(\$512,218)	\$5,702,295
CHINOOK - SNAKE RIVER FALL ESU (THREATENED)	\$7,677,815	\$3,496,732	\$11,174,547	\$	0\$	0\$	\$11,174,547
CHINOOK - SNAKE RIVER SPRING/SUMMER ESU (THREATENED)	\$18,408,373	\$4,956,795	\$23,365,168	\$252,477	\$16,449	\$268,926	\$23,634,094
CHINOOK - UPPER COLUMBIA RIVER SPRING ESU (ENDANGERED)	\$9,079,253	\$5,044,268	\$14,123,521	\$96,679	\$21,562	\$118,241	\$14,241,762
CHINOOK - UPPER WILLAMETTE RIVER ESU (THREATENED)	\$3,137,256	\$1,292,815	\$4,430,071	\$104,041	\$554,187	\$658,228	\$5,088,299
CHUM - COLUMBIA RIVER ESU (THREATENED)	\$2,175,610	\$424,945	\$2,600,555	\$0	\$0	\$0	\$2,600,555
COHO - LOWER COLUMBIA RIVER ESU (THREATENED)	\$2,769,567	\$795,022	\$3,564,589	\$0	0\$	0\$	\$3,564,589
SOCKEYE - SNAKE RIVER ESU (ENDANGERED)	\$6,006,178	\$1,074,548	\$7,080,726	\$1,780,911	\$3,704	\$1,784,615	\$8,865,341
STEELHEAD - LOWER COLUMBIA RIVER DPS (THREATENED)	\$4,549,466	\$1,192,089	\$5,741,555	(\$529,090)	(\$16,968)	(\$546,058)	\$5,195,497
STEELHEAD - MIDDLE COLUMBIA RIVER DPS (THREATENED)	\$22,366,759	\$8,333,689	\$30,700,448	\$2,444,305	\$613,878	\$3,058,183	\$33,758,631
STEELHEAD - SNAKE RIVER DPS (THREATENED)	\$17,646,100	\$4,304,127	\$21,950,227	\$294,226	\$16,449	\$310,675	\$22,260,902
Steelhead - Upper Columbia river dps (endangered)	\$11,439,720	\$3,946,077	\$15,385,797	\$356,608.26	\$34,664.42	\$391,272.68	\$15,777,070
STEELHEAD - UPPER WILLAMETTE RIVER DPS (THREATENED)	\$1,798,855	\$949,006	\$2,747,860	\$104,038	\$554,186	\$658,224	\$3,406,084
CHUB, OREGON (ENDANGERED)	\$195,069	\$236,063	\$431,131	\$0	\$0	\$0	\$431,131
CUTTHROAT TROUT, LAHONTAN (THREATENED)	\$813,398	\$567,556	\$1,380,954	\$0	0\$	0\$	\$1,380,954
STURGEON, WHITE - KOOTENAI RIVER DPS (ENDANGERED)	\$7,256,614	\$1,920,447	\$9,177,061	\$12,252,838	\$3,726	\$12,256,564	\$21,433,625
TROUT, BULL (THREATENED)	\$6,613,932	\$4,745,633	\$11,359,565	\$4,699,026	\$65,154	\$4,764,180	\$16,123,745
TOTAL	\$126,719,122	\$44,709,169	\$171,428,291	\$21,360,050	\$1,850,782	\$23,210,832	\$194,639,123

<sup>1)</sup> Direct spending can be tracked back to a work element where the contractor explicitly identified the "Primary Focal Species" benefiting from the work.

<sup>2)</sup> Contract Administration spending can be tracked back to a work

element that did not require the contractor to identify the "Primary Focal Species" benefiting from the work.

<sup>3)</sup> Negative values for Capital Spending are a result of overaccruing costs in the previous year.

### Table 2D: Direct Program Costs by Fund, FY2008-2014

FUND	FY2008	FY2009	FY2010	FY2011	FY2012	FY2013 3	FY2014
TOTAL BIOP (NON ACCORD)		\$75,084,433	\$88,120,408	\$105,257,648	\$109,818,406	\$102,742,463	\$94,155,554
TOTAL ACCORDS <sup>1</sup>	\$31,917,878						
TOTAL ACCORDS - BIOP		\$35,655,361	\$64,187,623	\$79,829,739	\$76,351,240	\$75,238,565	\$53,834,339
TOTAL ACCORDS - NON-BIOP		\$18,896,601	\$20,983,783	\$37,606,835	\$45,782,424	\$48,583,014	\$50,324,963
TOTAL GENERAL	\$130,932,844	\$62,498,937	\$51,765,457	\$73,608,793	\$58,956,587	\$48,813,941	\$53,903,085
TOTAL BPA OVERHEAD	\$11,562,285	\$13,137,473	\$14,530,682	\$14,911,880	\$15,501,115	\$15,723,909	\$16,916,169
TOTAL PROGRAM	\$174,413,007	\$205,272,805	\$239,587,953	\$311,214,895	\$306,409,772	\$291,101,892	\$269,134,110

1) BiOp tracking at fund level began in 2009, Accords began in 2008.

3) FY2013 revised as of March 2, 2015.

2) Spending is estimated based on the % of funding towards a project. For example, if a project budget is 70% BiOp and 30% General, the project expenditures will be prorated 70% towards BiOp and 30% General.

### Table 3A: Direct Program Costs by Purpose & Emphasis, FY2014

	Artificial Production	Habitat	Harvest	Hydrosystem	Predation	Programmatic
DATA MANAGEMENT		\$161,645		\$293,851		\$3,789,311
HARVEST AUGMENTATION	\$4,062,872					
LAW ENFORCEMENT			\$883,679			
LOCAL COORDINATION	\$633,509	\$2,140,932				\$4,713,947
PREDATOR REMOVAL					\$3,879,435	
REGIONAL COORDINATION		\$97,475				\$20,324,584
RESTORATION/PROTECTION		\$102,422,790				
RM AND E	\$24,046,106	\$13,133,028	\$1,228,057	\$6,753,430	\$1,991,053	\$33,432,127
SUPPLEMENTATION	\$45,146,279					
TOTAL	\$73,888,765	\$117,955,870	\$2,111,737	\$7,047,281	\$5,870,488	\$62,259,969

Estimated spending is based at the project level. Therefore if a project is labeled AP, but also supports Habitat, the expenditures are counted as AP.

### Table 3B: Direct Program Costs by Category, FY2008-2014

Category	2008	2009	2010	2011	2012	2013 ³	2014
COORDINATION (LOCAL/REGIONAL)	\$15,227,116	\$18,618,170	\$22,462,594	\$25,185,796	\$28,135,259	\$30,074,160	\$27,910,447
DATA MANAGEMENT	\$2,803,385	\$3,964,851	\$4,199,379	\$4,319,007	\$4,130,748	\$3,980,351	\$4,244,807
habitat (restoration/protection)	\$60,793,513	\$76,781,454	\$80,386,909	\$123,373,947	\$122,609,228	\$118,831,309	\$102,422,790
HARVEST AUGMENTATION	\$3,674,945	\$3,417,255	\$3,241,566	\$3,599,302	\$4,429,624	\$4,077,995	\$4,062,872
Production (supplementation)	\$25,638,528	\$28,175,648	\$45,271,831	\$61,846,889	\$53,165,835	\$50,024,766	\$45,146,279
LAW ENFORCEMENT	\$1,119,159	\$705,064	\$656,356	\$805,250	\$853,122	\$750,780	\$883,679
PREDATOR REMOVAL	\$3,208,172	\$3,284,130	\$3,549,112	\$2,983,190	\$3,558,732	\$3,309,064	\$3,879,435
research, monitoring and evaluation	\$61,948,189	\$70,325,233	\$79,820,206	\$89,101,514	\$89,527,224	\$80,053,469	\$80,583,801
TOTAL	\$174,413,007	\$205,271,805	\$239,587,953	\$311,214,895	\$306,409,772	\$291,101,892	\$269,134,110
LAW ENFORCEMENT	1	1,119,159	705,064	656,356	805,250	853,122	750,780
PREDATOR REMOVAL	1	3,208,172	3,284,130	3,549,112	2,983,190	3,558,732	3,309,064
research, monitoring and evaluation	1	61,948,189	70,325,233	79,820,206	89,101,514	89,527,224	80,053,469
TOTAL	174,656,855	174,413,007	205,271,805	239,587,953	311,214,895	306,409,772	291,101,892
Total: \$269 1 million inclindes \$37.4 million in obligations to capital projects	ans to capital proje	4	Coordination,	Data Manageme	Coordination, Data Management and RM&E emphasis types.	ohasis types.	

Total: \$269.1 million includes \$37.4 million in obligations to capital projects

1) Starting in 2008, as part an effort to improve how BPA manages our program's data and reporting, we have updated some of our old project categories. The new project categories are called "Purpose" and "Emphasis" where purpose describes the general goal or purpose of the project and emphasis describes the primary types of work being employed by the project. BPA program support is included within

Coordination, Data Management and KM&E emphasis types.

2) Estimated spending is based at the project level. Therefore if a project is assigned an emphasis of Habitat, but also does RME, all expenditures for the project are included under Habitat.

3) FY2013 - No changes as of February 27, 2015.

### Table 3C: Direct Program Costs of Artificial Production, FY2008-2014

Category	2008	2009	2010	2011	2012	2013 2	2014
COORDINATION (LOCAL/REGIONAL)	\$764,148	-\$3,902	\$640,554	\$684,891	\$664,088	\$785,309	\$633,509
HARVEST AUGMENTATION	\$3,256,692	\$3,417,255	\$3,241,566	\$3,599,302	\$4,429,624	\$4,077,995	\$4,062,872
research, monitoring & evaluation	\$17,739,370	\$17,335,478	\$22,318,040	\$22,583,163	\$25,176,585	\$23,588,530	\$24,046,106
Supplementation	\$26,177,769	\$28,175,648	\$45,271,831	\$61,846,889	\$53,165,835	\$50,024,766	\$45,146,279
TOTAL	\$47,937,980	\$48,924,480	\$71,471,991	\$88,714,245	\$83,436,132	\$78,476,600	\$73,888,765

1) Estimated spending is based at the project level. Therefore if a project is assigned an emphasis of Habitat, but also does RME, all expenditures for the project are included under Habitat.

2) FY2013 - no changes as of February 27, 2015

### Table 3D: Direct Program Support, FY2014

		BPA	Non-BPA	Grand Total
Ared	Emphasis Type	Program Support	Program Support	(Capital & Expense)
BASINWIDE	DATA MANAGEMENT	\$512,923	\$3,080,757	\$3,593,680
	LAW ENFORCEMENT		\$212,231	\$212,231
	LOCAL COORDINATION		\$557,722	\$557,722
	REGIONAL COORDINATION	\$15,590,384	\$3,743,118	\$19,333,502
	RESTORATION/PROTECTION		\$3,169,660	\$3,169,660
	RM AND E	\$2,272,192	\$23,473,388	\$25,745,580
	SUPPLEMENTATION		\$842,438	\$842,438
BASINWIDE TOTAL		\$18,375,499	\$35,079,313	\$53,454,812
BASINWIDE/MAINSTEM	RM AND E		\$568,933	\$568,933
BASINWIDE/MAINSTEM TOTAL		\$0	\$568,933	\$568,933
MAINSTEM	DATA MANAGEMENT		\$489,482	\$489,482
	HARVEST AUGMENTATION		\$134,850	\$134,850
	LAW ENFORCEMENT		\$506,656	\$506,656
	PREDATOR REMOVAL		\$3,879,435	\$3,879,435
	RM AND E		\$3,239,039	\$3,239,039
MAINSTEM TOTAL		\$0	\$8,249,463	\$8,249,463
MAINSTEM/PROVINCIAL	LOCAL COORDINATION		\$1,394,927	\$1,394,927
	RM AND E		\$427,740	\$427,740
MAINSTEM/PROVINCIAL TOTAL		\$0	\$1,822,666	\$1,822,666
OCEAN	RM AND E		\$1,069,341	\$1,069,341
OCEAN TOTAL		\$0	\$1,069,341	\$1,069,341
PROVINCIAL	DATA MANAGEMENT		\$161,645	\$161,645
	HARVEST AUGMENTATION		\$3,928,022	\$3,928,022
	LAW ENFORCEMENT		\$164,792	\$164,792
	LOCAL COORDINATION		\$5,535,739	\$5,535,739
	REGIONAL COORDINATION		\$1,088,558	\$1,088,558
	RESTORATION/PROTECTION		\$99,155,669	\$99,155,669
	RM AND E		\$49,518,183	\$49,518,183
	SUPPLEMENTATION		\$44,303,841	\$44,303,841
PROVINCIAL TOTAL		\$0	\$203,856,449	\$203,856,449
REGIONAL	RESTORATION/PROTECTION		\$97,462	\$97,462
	RM AND E		\$14,984	\$14,984
REGIONAL TOTAL		\$0	\$112,446	\$112,446
GRAND TOTAL		\$18,375,499	\$250,758,611	\$269,134,110

Estimated spending is based at the project level. Therefore if a project is assigned an emphasis of Habitat, but also does RME, all expenditures for the project are included under Habitat.

## Table 4A: Direct Program Costs by Work Element Location, FY2011-FY2014

STATE	FY2011 3	FY2012 3	FY2013 3	FY2014
WASHINGTON	\$121,317,884	\$115,404,913	\$95,365,193	\$85,433,677
ІДАНО	\$50,870,890	\$73,383,217	\$61,857,476	\$78,709,188
OREGON	\$86,884,304	\$85,320,690	\$101,607,686	\$61,616,055
OCEAN	\$3,598,371	\$2,367,853	\$589,410	\$989,724
MONTANA	\$17,984,028	\$11,143,660	\$7,215,356	\$8,286,850
BRITISH COLUMBIA	\$1,610,361	\$1,983,288	\$2,042,752	\$1,838,018
NEVADA	\$622,594	\$883,615	\$524,606	\$493,777
PROGRAM SUPPORT/ADMIN/OVERHEAD/ OTHER <sup>2</sup>	\$28,326,464	\$15,922,536	\$21,899,413	\$31,766,819
TOTAL	\$311,214,895	\$306,409,772	\$291,101,892	\$269,134,110

Total: \$269.1 million includes \$37.4 million in obligations to capital projects

1) Starting in 2008, spending by state is tracked in Pisces (www.cbfish.org) based on where the contractor explicitly identified the work location.

2) Program Support/Admin/Other includes spending that cannot be traced back to a contract that has at least one work element requiring location; contracts without any work elements at all; program level spending not mapped to a specific project or NPCC province; and BPA Overhead.

3) FYs revised as of March 2015.

Table 4B: Direct Program Costs by Province, FY2008-FY2014

Province	2008	2009	2010	2011 4	2012 4	2013 4	2014
BLUE MOUNTAIN	\$9,336,015	\$10,063,271	\$12,243,309	\$13,045,831	\$13,498,753	\$13,359,734	\$14,631,881
COLUMBIA CASCADE	\$9,192,920	\$18,334,391	\$26,543,346	\$52,343,560	\$51,216,105	\$36,245,776	\$26,817,725
COLUMBIA GORGE	\$8,354,049	\$13,046,970	\$16,165,914	\$19,962,308	\$13,560,427	\$14,326,142	\$10,157,535
COLUMBIA PLATEAU	\$37,188,905	\$42,706,871	\$50,405,309	\$59,165,613	\$61,637,074	\$61,223,676	\$57,171,401
COLUMBIA ESTUARY	\$6,075,054	\$8,056,193	\$6,848,834	\$9,469,437	\$11,109,892	\$15,336,657	\$11,466,957
INTERMOUNTAIN	\$14,497,055	\$12,350,282	\$15,702,284	\$17,198,718	\$19,784,368	\$16,144,888	\$17,784,050
LOWER COLUMBIA	\$14,744,699	\$11,181,219	\$15,259,843	\$41,609,286	\$33,899,854	\$44,562,896	\$13,319,360
MIDDLE SNAKE	\$6,659,039	\$3,299,192	\$5,224,071	\$4,433,754	\$13,235,463	\$3,315,759	\$3,830,556
MOUNTAIN COLUMBIA	\$11,347,198	\$21,341,820	\$11,427,897	\$24,894,377	\$22,160,067	\$20,849,803	\$29,292,583
MOUNTAIN SNAKE	\$19,398,012	\$21,934,884	\$22,917,641	\$28,149,960	\$30,311,321	\$28,453,559	\$28,222,791
UPPER SNAKE	\$1,184,634	\$1,466,476	\$7,248,075	\$4,904,675	\$13,213,441	\$10,805,582	\$19,883,622
SYSTEMWIDE							
OTHER <sup>2</sup>	\$6,167,509	\$7,274,724	\$6,826,368	\$7,722,192	\$6,872,463	\$4,578,007	\$4,788,832
PROGRAM SUPPORT/ADMIN/ OVERHEAD/OTHER <sup>3</sup>	\$30,267,918	\$34,215,512	\$42,775,062	\$28,315,184	\$15,910,542	\$21,899,413	\$31,766,819
TOTAL	\$174,413,007	\$205,271,805	\$239,587,953	\$311,214,895	\$306,409,772	\$291,101,892	\$269,134,110

Total: \$269.1 million includes \$37.4 million in obligations to capital projects

1) Starting in 2008, spending by province is tracked in Pisces (www.cbfish.org) based on where the contractor explicitly identified the work location.

2) Other includes "Undetermined" locations such as Ocean, Canada, and provinces not recognized by NPCC.

3) Program Support/Admin/Other includes spending that cannot be traced back to a contract that has at least one work element requiring location; contracts without any work elements at all; program level spending not mapped to a specific project; and BPA Overhead.

4) FYs revised as of March 2015.

Table 5A: Direct Program Costs by Contractor Type, FY 2008-2014

Contractor Type	Prime Contractor	2008	2009	2010	2011	2012	2013 ³	2014
FEDERAL	national marine fisheries (noaa)	\$7,980,293	\$8,959,831	\$8,214,596	\$10,011,126	\$10,226,672	\$7,294,105	\$6,823,148
	BPA OVERHEAD (& NON-CONTRACTED PROJECT COSTS)	\$7,762,161	\$15,428,883	\$18,886,192	\$16,437,276	\$15,281,324	\$16,789,765	\$18,227,811
	us fish & wildlife service (usfws)	\$3,150,827	\$3,079,231	\$2,640,768	\$2,842,702	\$2,472,046	\$2,845,424	\$3,425,748
	us bureau of reclamation (bor)	\$152,309	\$202,092	\$180,104	\$160,153	\$237,486	\$181,862	\$312,773
	us army corp of engineers (coe)	\$20,924	\$235,612	\$205,064	\$358,523	\$358,214	\$604,602	\$171,313
	PACIFIC NW NATIONAL LABORATORY (PNNL/DEPT. OF ENERGY)	\$1,605,398	\$1,769,676	\$1,476,028	\$750,143	\$573,645	\$381,427	\$379,055
	US FOREST SERVICE (USFS)	\$1,410,740	\$3,668,543	\$1,649,120	\$1,124,508	\$851,567	\$819,258	\$813,992
	OTHER	\$454,711	\$434,000	\$444,850	\$904,925		\$178,002	\$50,000
	US GEOLOGICAL SURVEY (USGS)	\$1,722,389	\$1,835,708	\$1,760,653	\$2,385,971	\$3,135,564	\$2,209,567	\$1,704,163
FEDERAL TOTAL		\$24,259,752	\$35,613,576	\$35,457,375	\$34,975,327	\$33,136,516	\$31,304,010	\$31,908,003
STATE	OREGON DEPARTMENT OF FISH & WILDLIFE	\$10,237,010	\$10,170,389	\$13,269,950	\$10,238,326	\$15,805,509	\$13,248,075	\$14,244,566
	OREGON WATERSHED ENHANCEMENT BOARD					\$59,516	\$76,367	\$112,611
	OREGON SUBTOTAL	\$10,237,010	\$10,170,389	\$13,269,950	\$10,238,326	\$15,865,025	\$13,324,441	\$14,357,177
	IDAHO DEPARTMENT OF FISH & WILDLIFE	\$11,072,547	\$8,429,207	\$9,174,578	\$10,847,630	\$17,836,561	\$18,281,036	\$13,726,829
	idaho soil & water conservation commission	\$84,952	\$91,275	\$66,967				
	IDAHO STATE OFFICE OF SPECIES CONSERVATION	\$199,247	\$923,272	\$1,397,773	\$2,551,533	\$2,487,433	\$2,905,500	\$1,368,456
	IDAHO SUBTOTAL	\$11,356,746	\$9,443,754	\$10,639,318	\$13,399,163	\$20,323,994	\$21,186,535	\$15,095,286
	WASHINGTON DEPARTMENT OF FISH & WILDLIFE	\$5,912,604	\$6,134,350	\$7,712,743	\$9,148,722	\$11,855,753	\$10,691,474	\$12,239,873
	WASHINGTON DEPARTMENT OF ECOLOGY	\$211,309	\$150,324	\$181,562	\$43,689			
	WASHINGTON SUBTOTAL	\$6,123,913	\$6,284,673	\$7,894,305	\$9,192,411	\$11,855,753	\$10,691,474	\$12,239,873
	montana fish, wildlife and parks (mfwp)	\$2,762,721	\$2,829,533	\$2,913,118	\$2,414,914	\$2,382,531	\$2,777,167	\$3,063,650
	Montana subtotal	\$2,762,721	\$2,829,533	\$2,913,118	\$2,414,914	\$2,382,531	\$2,777,167	\$3,063,650
STATE TOTAL		\$30,480,390	\$28,728,349	\$34,716,691	\$35,244,814	\$50,427,303	\$47,979,618	\$44,755,986
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Table 5A: Direct Program Costs by Contractor Type, FY 2008-2014 (Continued)

Type	Prime Contractor	2008	2009	2010	2011	2012	2013 ³	2014
TRIBE	BURNS PAIUTE TRIBE	\$687,603	\$636,144	\$716,460	\$658,775	\$831,697	\$610,972	\$761,026
	COEUR D'ALENE TRIBE OF IDAHO	\$2,537,247	\$2,552,550	\$2,444,908	\$2,340,704	\$2,668,551	\$2,714,055	\$2,606,886
	COLUMBIA RIVER INTERTRIBAL FISH COMMISSION	\$1,776,526	\$4,329,842	\$6,034,143	\$7,660,904	\$8,747,388	\$7,939,587	\$8,553,076
	COLVILLE CONFEDERATED TRIBES	\$4,519,814	\$10,594,008	\$10,278,445	\$16,189,398	\$21,993,516	\$16,872,698	\$15,116,467
	CONFEDERATED TRIBES OF GRAND RONDE			\$93,475	\$124,703	\$158,296	\$110,571	\$140,398
	Confederated tribes of Siletz indians						\$68,134	\$52,780
	CONFEDERATED TRIBES OF WARM SPRINGS	\$3,373,196	\$6,142,650	\$6,078,270	\$6,859,314	\$7,223,659	\$11,203,330	\$5,691,055
	COWLITZ INDIAN TRIBE				\$34,325	\$118,229	\$364,937	\$453,801
	Kalispel tribe of indians	\$1,633,522	\$1,790,852	\$1,928,048	\$2,066,331	\$2,575,344	\$2,709,448	\$2,962,457
	KOOTENAI TRIBE	\$7,402,457	\$6,541,035	\$6,938,439	\$8,537,716	\$12,321,474	\$15,094,788	\$21,941,731
	NEZ PERCE TRIBE	\$11,552,934	\$12,037,027	\$12,664,313	\$15,349,520	\$16,073,605	\$15,800,876	\$15,294,865
	Salish and Kootenai tribes confederated tribes	\$1,176,490	\$483,878	\$560,467	\$430,107	\$453,175	\$755,839	\$664,292
	SHOSHONE-BANNOCK TRIBES	\$1,749,602	\$1,579,829	\$2,438,482	\$2,830,660	\$2,837,601	\$4,009,231	\$3,551,518
	SHOSHONE-PAUITE TRIBES	\$684,324	\$790,837	\$749,767	\$841,382	\$1,147,875	\$694,692	\$626,509
	SPOKANE TRIBE OF INDIANS	\$2,726,944	\$2,744,981	\$2,761,856	\$2,803,647	\$2,932,796	\$2,709,870	\$3,314,939
	UMATILLA CONFEDERATED TRIBES	\$6,158,492	\$6,593,550	\$8,881,642	\$11,365,123	\$9,951,477	\$12,122,357	\$12,088,602
	UPPER COLUMBIA UNITED TRIBES (UCUT)	\$162,707	\$251,327	\$516,803	\$427,731	\$403,540	\$389,914	\$448,433
	UPPER SNAKE RIVER TRIBES FOUNDATION	\$20,776	\$145,822	\$131,067	\$148,610	\$162,735	\$206,529	\$340,150
	YAKAMA CONFEDERATED TRIBES	\$10,793,537	\$17,438,231	\$24,319,364	\$32,944,242	\$25,813,516	\$25,447,029	\$23,930,424
TRIBE TOTAL		\$56,956,171	\$74,652,563	\$87,535,949	\$111,613,192	\$116,414,475	\$119,824,856	\$118,539,409
INTERSTATE	Pacific states marine fisheries commission (Psmec)	\$13,283,337	\$14,452,104	\$13,812,821	\$13,908,430	\$14,053,990	\$12,711,728	\$13,671,165

(Continued on next page.)

Table 5A: Direct Program Costs by Contractor Type, FY 2008-2014 (Continued)

Contractor Type	Prime Contractor	2008	2009	2010	2011	2012	2013 ³	2014
UNIVERSITY	UNIVERSITY	\$3,461,552	\$4,355,304	\$3,939,562	\$3,662,199	\$3,384,748	\$2,800,350	\$3,123,240
OTHER	PRIVATE/NON-PROFIT/OTHER	\$15,999,893	\$16,476,097	\$24,562,878	\$51,870,632	\$37,603,355	\$36,314,947	\$21,464,271
	LOCAL/SEMI GOVERNMENT	\$5,628,187	\$8,355,797	\$7,141,882	\$5,933,917	\$8,235,814	\$7,854,727	\$8,969,539
	COLUMBIA BASIN FISH & WILDLIFE AUTHORITY	\$2,875,372	\$2,102,582	\$2,162,548	\$1,748,321	\$1,611,166	\$1,231,260	\$544,684
	Land acquisitions	\$16,605,994	\$16,937,766	\$26,741,905	\$52,203,712	\$38,048,400	\$23,741,722	\$20,104,220
	UTILITY	\$897,497	\$36,104	\$44,731	\$935,038	\$1,802,447	\$1,810,123	\$1,862,133
	NATIONAL FISH & WILDLIFE FOUNDATION	\$3,964,862	\$3,561,562	\$3,471,611	\$4,778,134	\$4,833,194	\$5,528,550	\$4,191,459
	CHIEF JOSEPH HATCHERY COST SHARE (GRANT PUD)				-\$5,658,821	-\$3,141,637		
OTHER TOTAL		\$45,971,805	\$47,469,909	\$64,125,555	\$111,810,933	\$88,992,739	\$76,481,330	\$57,136,307
GRAND TOTAL		\$174,413,007	\$205,271,805	\$239,587,953	\$311,214,895	\$306,409,772	\$291,101,892	\$269,134,110

# Table 5B: Direct Program Expenditures by Contractor Type (Non-Profit and Private)

Prime Contractor	2014 Expenditures
NON-PROFIT	
COLUMBIA RIVER ESTUARY STUDY TASKFORCE (CREST)	\$2,434,358
LOWER COLUMBIA ESTUARY PARTNERSHIP	\$2,074,493
COLUMBIA LAND TRUST	\$1,252,789
METHOW SALMON RECOVERY FOUNDATION	\$1,161,612
S CENTRAL WASHINGTON RESOURCE CONSERVATION AND DEVELOPMENT	\$828,989
NORTHWEST POWER AND CONSERVATION COUNCIL	\$794,881
GRANDE RONDE MODEL WATERSHED FOUNDATION	\$732,476
MCKENZIE RIVER TRUST	\$561,595
MONTANA TROUT UNLIMITED	\$400,000
UPPER COLUMBIA SALMON RECOVERY BOARD	\$302,464
TROUT UNLIMITED (TU)	\$202,535
LAKE ROOSEVELT DEVELOPMENT ASSOCIATION	\$182,644
NATURE CONSERVANCY	\$53,525
LAKE ROOSEVELT FORUM	\$29,711
DESCHUTES RIVER CONSERVANCY (DRC)	\$19,075
TRI-STATE STEELHEADERS	\$12,502
CASCADE PACIFIC RESOURCE CONSERVATION AND DEVELOPMENT	\$11,582
CHELAN-DOUGLAS LAND TRUST	\$5,814
HISTORY INK	\$5,250
GREENBELT LAND TRUST	\$2,111
TOTAL	\$11,068,406

Prime Contractor	2014 Expenditures
PRIVATE	
QUANTITATIVE CONSULTANTS INC	\$1,808,705
ECO LOGICAL RESEARCH	\$1,688,114
TERRAQUA, INC.	\$1,492,454
SITKA TECHNOLOGY GROUP	\$1,246,261
BIOANALYSTS, INC.	\$1,053,038
SOUTH FORK RESEARCH, INC.	\$858,875
GOODFELLOW BROTHERS, INC.	\$848,189
TETRA TECH, INC.	\$321,199
PC TRASK AND ASSOCIATES	\$293,933
Jones and Stokes Associates	\$235,000
BIOMARK, INC.	\$157,436
Intermountain communications	\$148,412
PCL CONSTRUCTION SERVICES INC.	\$57,293
CH2M-HILL, INC.	\$46,566
SWCA ENVIRONMENTAL CONSULTANTS	\$42,840
d J warren and associates, inc.	\$36,544
SYNERGY CONSULTING INC.	\$31,556
historical research associates, inc.	\$22,507
SAPERE CONSULTING INC	\$14,984
MCMILLEN ENGINEERING, LLC	\$14,296
HDR ENGINEERING, INC.	\$2,078
normandeau associates, inc	-\$24,417
TOTAL	\$10,395,863
NON-PROFIT + PRIVATE GRAND TOTAL	\$21,464,271

Table 6: Direct Program Costs of Land Purchases for Fish and Wildlife Habitat, FY2008-FY2014

Project Proponent(s)	2008	9006	2010	2011	2012	2013 3	2014
CITY OF EUGENE					\$1,075,000		
CITY OF SALEM						\$1,212,330	
COEUR D'ALENE TRIBE, IDAHO DEPARTMENT OF FISH AND GAME (IDFG), KALISPEL TRIBE, KOOTENAI TRIBE	\$4,072,206	\$3,326,183	\$2,286,471	\$1,750,665	\$1,675,162	\$348,570	
COLUMBIA LAND TRUST					\$5,306,043	\$1,711,235	\$693,096
COLVILLE CONFEDERATED TRIBES	\$220,318	\$1,144,839	\$3,441,315	\$720,811	\$1,743,906	\$1,611,630	\$283,048
CONFEDERATED TRIBES OF THE GRANDE RONDE					\$54,305	\$3,596,391	\$12,500
DUCKS UNLIMITED						\$520,081	
GREENBELT LAND TRUST					\$772,500	\$1,500,000	\$244,082
IDAHO DEPARTMENT OF FISH AND GAME (IDFG)	\$2,279,851		\$4,750,821		\$5,059,268		\$14,000,000
IDAHO OFFICE OF SPECIES CONSERVATION			\$3,426,523				
KITITIAS CONSERVATION TRUST	\$130,000						
LOWER COLUMBIA RIVER ESTUARY PARTNERSHIP (LCREP)	\$67,130	\$608,223			\$946,739		
MCKENZIE RIVER TRUST					\$52,986		\$318,372
METHOW SALMON RECOVERY FOUNDATION		\$182,000					
MONTANA FISH, WILDLIFE AND PARKS (MFWP)				\$9,750,112	\$1,349,403	\$642,763	\$1,610,425
national fish and wildlife foundation	\$415,000	\$389,000					
nature conservancy	\$1,001,875	\$0	\$2,245,363	\$20,851,010		\$3,412,000	
NEZ PERCE TRIBE	\$7,297	\$7,751	\$540,992	\$5,788	\$820	\$5,000	\$5,000
OREGON DEPARTMENT OF FISH AND WILDLIFE (ODFW)	\$3,904,011	\$1,075,108	\$1,330,361	\$9,716,071		\$4,595,329	
OREGON WATERSHED ENHANCEMENT BOARD			\$779,252			\$600,000	
S CENTRAL WASHINGTON RESOURCE CONSERVATION AND DEVELOPMENT		\$14,500	\$33,800				
SALISH AND KOOTENAI CONFEDERATED TRIBES	\$4,217,842	\$9,385,802	\$1,394,127	\$4,068,146	\$6,370,226	\$1,596,594	\$2,196,197
SHOSHONE-BANNOCK TRIBES		\$546,610		\$1,996,948	\$3,666,163		
SHOSHONE-PAIUTE TRIBES			\$2,259,937		\$3,156,008		
SPOKANE TRIBE							
UMATILLA CONFEDERATED TRIBES (CTUIR)			\$2,114,907		\$15,382		
us fish and wildlife service (usfws)			\$1,005,967				
WASHINGTON DEPARTMENT OF FISH AND WILDLIFE (WDFW)	\$801,221	\$752	\$51		\$2,365,285	\$572,469	
WILLAMALANE PARKS AND RECREATION DISTRICT						\$500,509	\$741,501
YAKAMA CONFEDERATED TRIBES	\$372,234	\$262,257	\$1,132,019	\$3,344,161	\$4,437,146	\$333,123	
Yamhill Soil and water conservation district						\$983,699	
GRAND TOTAL	\$17,488,983	\$16,943,025	\$26,741,905	\$52,203,712	\$38,046,341	\$23,741,722	\$20,104,220

<sup>3)</sup> FY2013 - No changes as of February 27, 2015

1) Values above include bank fees, permits, etc.

<sup>2)</sup> Starting in FY13, land acquisition values may include stewardship costs for long-term operations and maintenance (O&M).

Table 7A: Total Costs of Fish and Wildlife Actions 1978-2014 (Five-Year Increments)

Cost Element	1978-1980	1985	1990	1995	2000	2005	2010	2014
CAPITAL INVESTMENTS <sup>1</sup>								
BPA FISH AND WILDLIFE		10.2	16.2	32.5	13.9	12.2	40.0	37.4
BPA SOFTWARE DEVELOPMENT COSTS	.1	•	,	,	1	•	1.2	0.1
ASSOCIATED PROJECTS (FEDERAL HYDRO)	30.0	46.4	4.5	39.3	47.0	53.8	56.4	101.7
TOTAL CAPITAL INVESTMENTS	30.0	56.6	20.7	71.8	6.09	0.99	97.6	139.2
PROGRAM EXPENSES	ı	1	1					
BPA DIRECT FISH AND WILDLIFE PROGRAM	2.3	15.9	32.8	71.4	108.2	135.8	199.6	231.8
fish & wildlife Software expense costs								0.3
SUPPLEMENTAL MITIGATION PROGRAM EXPENSES	1	1	1			0.0	1	
REIMBURS ABLE/DIRECT-FUNDED PROJECTS <sup>3</sup>	1	•	1					
O & M LOWER SNAKE RIVER HATCHERIES	1	5.4	8.3	12.7	12.4	17.2	23.3	31.0
O & M CORPS OF ENGINEERS	15.0	11.4	11.5	17.8	19.7	32.5	36.5	47.8
O & M BUREAU OF RECLAMATION	1	1	1	1.3	1.8	3.9	5.2	9.9
OTHER (NW POWER AND CONSERVATION COUNCIL)	1	3.1	3.6	4.3	3.7	4.3	4.7	4.9
SUBTOTAL (REIMB/DIRECT-FUNDED)	15.0	19.9	23.4	36.1	37.6	57.9	2.69	90.3
TOTAL OPERATING EXPENSES	17.3	35.8	56.2	107.5	145.8	193.7	269.3	322.4
PROGRAM RELATED FIXED EXPENSES⁴	ı	1	1					
INTEREST EXPENSE	15.0	15.3	26.0	44.9	48.4	56.4	80.5	83.4
AMORTIZATION EXPENSE	ı	0.1	2.4	8.5	16.1	17.4	25.0	38.7
DEPRECIATION EXPENSE	6.0	4.3	5.9	10.2	11.8	15.9	18.0	19.2
TOTAL FIXED EXPENSES	24.0	19.7	34.3	63.6	76.3	89.7	123.5	141.3
GRAND TOTAL PROGRAM EXPENSES	41.3	55.5	90.5	171.1	222.1	283.4	392.8	463.7
FORGONE REVENUES AND POWER PURCHASES	1	1	1					
FOREGONE REVENUES	1	27.0	15.0	7.1	193.1	182.1	99.4	122.7
BPA POWER PURCH. FOR FISH ENHANCEMENT	1	17.0	40.0	63.5	64.8	110.8	310.1	196.2
TOTAL FOREGONE REVENUES AND POWER PURCHASES	1	44.0	55.0	70.6	257.9	292.9	409.5	318.9
TOTAL PROGRAM EXPENSES, FOREGONE REVENUES, & POWER PURCHASES	41.3	99.5	145.5	241.7	480.0	576.3	802.3	782.6
CREDITS	1	1	1					
4(H)(10)(C)	ı	,		(45.2)	(50.4)	(57.7)	(122.8)	(103.9)
FISH COST CONTINGENCY FUND	ı	1	1	1	1	1	1	1
TOTAL CREDITS		•		(45.2)	(50.4)	(57.7)	(122.8)	(103.9)

This information has been made publicly available by BPA. The figures shown are consistent with audited actuals that contain Agency approved financial information, except for forgone revenues and power purchases which are estimates and do not contain agency-approved financial information.

- 1) Capital Investments include both BPA's direct fish and wildlife program capital investments, funded by BPA's Treasury borrowing, and "Associated Projects", which include capital investments at Corps of Engineers' and Bureau of Reclamation projects, funded by appropriations and repaid by BPA. The negative amount in FY 1997 reflects a decision to reverse "plant-in-service" investment that was never actually placed into service. The annual expenses associated with these investments are included in "Program-Related Fixed Expenses".
- Includes High Priority and Action Plan Expenses and other supplemental programs.
- 3) "Reimbursable/Direct-Funded Projects" includes the portion of costs BPA pays to or on behalf of other entities that is determined to be for fish and wildlife purposes.
- 4) "Fixed Expenses" include depreciation, amortization and interest on investments on the Corps of Engineers' projects, and amortization and interest on the investments associated with BPA's direct fish and wildlife program.

### Table 7B: Cumulative Costs, 1978-2014 (in Five-Year Increments)

Cost Element	1978-80	1985	1990	1995	2000	2005	2010	2014
POWER PURCHASES	0	29	234	612	730	2,740	3,855	4,246
FORGONE REVENUES	0	53	119	251	948	1,360	2,577	3,144
REIMBURSABLE EXPENSES	15	83	202	356	540	802	1,114	1,435
DIRECT PROGRAM	7	54	170	447	919	1,572	2,376	3,316
FIXED EXPENSES	24	114	261	520	968	1,308	1,864	2,395
TOTAL	41	449	1,108	2,337	3,992	7,739	11,730	14,536



