

# EXHIBIT B

SUAGEE DEC.

S. HRG. 102-739

# **ELWHA RIVER ECOSYSTEM AND FISHERIES RESTORATION ACT**

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## **HEARING BEFORE THE COMMITTEE ON ENERGY AND NATURAL RESOURCES UNITED STATES SENATE ONE HUNDRED SECOND CONGRESS**

**SECOND SESSION**

**ON**

**S. 2527**

**TO RESTORE OLYMPIC NATIONAL PARK AND THE ELWHA RIVER  
ECOSYSTEM AND FISHERIES IN THE STATE OF WASHINGTON**

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**JUNE 4, 1992**



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## **ELWHA RIVER ECOSYSTEM AND FISHERIES RESTORATION ACT**

**THURSDAY, JUNE 4, 1992**

**U.S. SENATE,  
COMMITTEE ON ENERGY AND NATURAL RESOURCES,  
*Washington, DC.***

The committee met, pursuant to notice, at 9:31 a.m., in room SD-366, Dirksen Senate Office Building, Hon. Bill Bradley, presiding.

### **OPENING STATEMENT OF HON. BILL BRADLEY, U.S. SENATOR FROM NEW JERSEY**

Senator BRADLEY. The committee will come to order.

The bill we are considering today is an unusual measure and one that offers this committee an unusual privilege. The bill itself is unusual because, frankly, this is not an inside-the-beltway production. This has been worked out at the grassroots level in the State of Washington. The negotiators included timber companies and environmentalists, fishermen and paper mills, Native Americans and city officials, park administrators and economic development specialists.

In my experience, S. 2527 marks a singular achievement for these diverse groups who so often have had different priorities that overwhelmed their shared needs and opportunities.

The bill is unusual as well because it offers hope for a better future to all of these diverse groups, each of which might easily have chosen to pursue its own interest at the expense of all the others.

S. 2527 presents this committee with the negotiated deal that protects 300 jobs in a paper mill and thousands of other jobs in the region, allows salmon back into a pristine river, supports economic development for an impoverished Indian tribe, restores a national park ecosystem, moots complex and costly litigation, and raises real doubts about the need for pending legislation seen as a threat by the Nation's hydropower industry. In other words, this bill does quite a lot.

I want to commend all the groups and individuals who participated in the negotiation of this bill, and that includes Senator Adams who has talked to me about this, shall I say, every other week, if not every other day, Senator Gorton who has been and is a supporter, Congressman Swift, Congressman Dicks and their staffs, and all of the other groups involved in the negotiation. I have a long list here, but since we are going to hear from most of you anyway, I want to simply commend all of you for your hard work.

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SUAGEE DEC.

It has paid off in a bill that has won strong bipartisan support of the entire Washington State delegation and Governor Gardner as well. I think everyone deserves to be proud of what you have achieved for each other and for the Pacific Northwest and for the country, and that is getting it to this point.

Having previewed some of your testimony, I am aware that not everyone is fully satisfied with all of the provisions of the bill. I am certainly open to good ideas and assume that the bill's cosponsors, Senators Adams and Gorton, will remain willing to accept constructive amendments.

I am hopeful that the committee can move promptly to mark up this bill. The longer we take, the more likely it is that events in the Federal court and the conference on the energy bill or elsewhere will undermine or complicate our ability to resolve the problems on the Elwha. This wouldn't be good for anybody, in my opinion.

All too often in the natural resource arena we in Washington, D.C. are presented with legislation more concerned with advancing a particular ideology or serving a special interest than with solving or heading off real problems in the real world. This bill is a rare and welcome exception. How this committee, Congress, and the administration deal with this bill will be a pretty good test of whether we are up to solving real problems in a constructive way.

[The prepared statement of Senator Burns and the text of S. 2527 follow:]

PREPARED STATEMENT OF HON. CONRAD BURNS, U.S. SENATOR FROM MONTANA

Mr. Chairman, this is an interesting measure, but I think it is more complicated than it needs to be. I will have a series of questions to be submitted to the witnesses after the hearing, but for the moment, let me suggest some different approaches.

Rather than setting up this elaborate system with a task force composed mostly of groups who have already reached the conclusion that the dams should be removed at taxpayer expense, why don't we direct the Secretary to undertake both a feasibility and definite plan study of dam removal and report back on the costs? At the same time, the Secretary could also study the costs and alternatives for restoration and have that report submitted at the same time. Then we would know what we are dealing with. While we are awaiting those studies, we could direct FERC to issue only annual licenses while proceeding with its EIS and other studies.

Another alternative would be to acquire the projects and turn them over to the National Park Service, since the powerhouses are on the National Register. The National Park Service would be in the best position to maintain and interpret them, especially if the net result is that the dams are not removed. I understand that the primary thrust of this legislation is to enhance the resources of the Park, so it would seem to make sense that the lower Elwha be added to the Park. Any lands not needed for park purposes could either be sold or given to Port Angeles.

The majority memo indicates that there are significant economic advantages to the local community from dam removal, and I wonder whether there shouldn't be some form of cost sharing? That should markedly enhance the possibility of the National Park Service obtaining the appropriations to pay for the removal of the dams and restoration of the new park lands.

Senator BRADLEY. Let me welcome all of you to the committee today, and I think that we want to try to run this as expeditiously and yet as fairly and thoroughly as possible. So, let's begin with Senator Brock Adams, followed by Representative Al Swift and Representative Norm Dicks. I understand Paul Isaki is testifying on behalf of Governor Gardner.

Senator Adams, welcome to the committee. I can only say that you have been nothing less than tenacious when it comes to this bill.

**STATEMENT OF HON. BROCK ADAMS, U.S. SENATOR FROM  
WASHINGTON**

Senator ADAMS. Thank you very much, Mr. Chairman. I want to particularly thank you for listening to my comments and my requests and hopefully arguments, and we are very grateful for this hearing. I have just left Representative Dicks, and Representatives Swift and Dicks and I were in a morning breakfast. He will be here also. I have talked with Senator Gorton, and as you indicate, he is in full support of the bill.

I just want to thank you for this hearing. I think this is an extraordinarily important morning. It may be a small niche in what is a very important matter before this total committee, and I am grateful to you for seeing to it that we have moved this far.

Today, Mr. Chairman, you will hear from many witnesses of why this bill is extremely important to our people at home. Representatives Swift and Dicks, Senator Gorton and myself, because of the people on the Olympic Peninsula of the State of Washington, who have taken many hard blows in recent months and years, hope this bill will be very important to the jobs in their economy, to the regional economy, and most important, to the environment, which I will touch on in a moment.

The controversy comes down to surrounding the proposed relicensing of two hydropower projects on the Elwha River. These threaten both economic stability of the peninsula's largest employer and the opportunity to restore an important salmon run for the Pacific Northwest.

Senator Bradley and I, along with Senator Gorton and Congressman Swift and their staffs, have all spent hours over the last year with many different parties trying to develop a legislative solution. I want to commend all of those who have been involved, as the Chairman has just done, for participating in a cooperative mood and with an innovative manner in these negotiations.

But I particularly want to thank you, Mr. Chairman, because without your leadership and invaluable assistance, we can't make this bill move, and there will be several points that I think are important to help put this bill in perspective of both the national energy policy, the national environmental policy, and where we are going.

First and foremost, we need this bill this year. Now that we have an agreement by the affected parties, we should move forward. The people of the peninsula, the local economy, and the environment cannot afford another year of uncertainty and economic instability.



The proposed relicensing of the two Elwha projects presents several major national policy conflicts that threaten the Olympic Peninsula. These include the jurisdiction of the Federal Energy Regulatory Commission to relicense dams within national parks, the longstanding claims of affected Indian tribes, and perhaps most important of all, the restoration of Pacific Northwest salmon runs. This river is capable of supporting in a pristine state a chinook salmon run, and these are almost gone throughout the whole Pacific Northwest, in fact, through the whole portion of the United States where they all used to run wild.

I believe we have crafted a fair and a comprehensive settlement, and it provides economic and environmental stability for the region without undermining any national policies. We have done so by providing for an exchange where each side gives up and receives something of equal value.

Mr. Chairman, to a degree I, in starting work on this bill, patterned some of it after legislation that we had used years in the past in many other different fields, like when we were trying to solve the Conrail proposition where we couldn't condemn all the railroads, and we got into trades and we got into a number of innovative situations which produced a saving of the railroads so that they were not nationalized.

Now, Mr. Chairman, there has been more than a little misunderstanding as to the nature of this exchange ever since the concept was first discussed, and I would like to take just a moment to clarify this matter of the exchange.

The bill proposes to save 300 plus jobs at the local paper mill. That is where it starts and it is terribly important that we do this. This is the largest single industry in Port Angeles. I know that Representative Swift will have more to say about this when he testifies. It does this by providing replacement electrical power at a cost comparable to what the mill would have paid if it had received a FERC license for 40 years.

Now, this is not a buyout, and it is not a subsidy. If it were, then the companies involved would not have to pay the same costs for power as they would have paid under a FERC license, as this bill requires. This bill requires that they pay that same amount and also have to transfer to the Federal Government all rights and interest in the dams, hundreds of acres of valuable land, and other assets. This is a good deal for both sides and particularly for the National Government and for the private parties to it.

In exchange for the transfer of all private property and virtual control of the Elwha River. The companies will receive electrical power at the same cost they would have paid to try to restore fish, wildlife, and the Olympic Park ecosystem. In exchange for providing the electrical power, the Federal Government is receiving complete control over the Elwha River fish, wildlife, and park restoration without any of the limitations and uncertainties that would be present if the projects had been relicensed.

In essence—and that is the beauty of this proposed legislation—each party is giving up something of uncertain value in exchange for certainty and stability. This is a fair exchange and provides the most reasonable solution of conflicts affecting the region.

Mr. Chairman, in addition to preserving employment at the local mill and furthering the national goals of restoring salmon and national park ecosystems, this bill also takes the important step toward redressing decades of neglect by the Federal Government toward the Elwha Klallam Tribe. It will not resolve all of the long-standing claims of this remarkable people, but it will begin to provide an economic base upon which the tribe and the Government can continue to build.

As the Chairman knows and as all of us who have visited this site again and again, this is typical of the tribes of the Pacific Northwest. Its village is on the flood plain or borders the flood plain of the Elwha River. As part of this bill, we will be able to begin to work on those problems, as well as the restoration of the salmon run, which would be incredible. Imagine putting 250,000 to 400,000 wild salmon back into a pristine river. It is beyond conception for most of us in the Pacific Northwest who are fighting for every fish and are down on the Columbia River trying to carry them in tank cars and plastic tubes and so on.

I can just tell you that this is an exciting part that goes with the stability of providing jobs because if we do not do this, what occurs is we get into an enormous amount of litigation, and we have had litigation on the Yakima. We've got litigation on the Columbia. We've got litigation on the forests. We can avoid that, and that is what I think legislation for and what legislative bodies are for. We have more flexibility to provide solutions than courts do. The salmon that were returned to the Elwha are not the only economic value and not the only important economic value, but they are at the heart and the core of the culture of that tribe also.

Although the Bonneville Power Administration will be used as a source of the replacement power, absolutely none of the costs to BPA of providing this power will be passed on to BPA ratepayers. This will be a Federal investment in salmon restoration similar to the substantial investments already made through Federal agencies such as the Forest Service, U.S. Fish and Wildlife Service, and the Bureau of Reclamation.

The estimated cost of the bill, depending upon the eventual restoration alternatives selected, is from \$30 million to \$100 million. As you will hear in testimony today, the actual cost will likely fall in the middle range, and this is over a number of years. However, it is important to note that even the highest cost estimate compares very favorably with the Federal investments in salmon restoration in the other Pacific Northwest river basins because we don't know how to do it in a lot of the others.

For example, the Bureau of Reclamation has spent approximately \$50 million to \$60 million on just fish screens and ladders in the Yakima River basin. Additional costs from other agencies for planning, hatcheries, and habitat and improvements raise that figure to approximately \$100 million, and we are not saving the salmon in that area. We are just scratching the surface.

Comparable or higher amounts have been authorized for expenditure in the Umatilla River basin in Oregon and the Upper Snake in Idaho. We have one fish left up in the Upper Idaho.

The return on investment on the Elwha is expected and will meet and exceed all these other basins. Imagine 150,000 to 400,000



salmon because of the high productivity of the virtually pristine Elwha River watershed and the fact it rises and flows through the park. It will be protected. We are not involved with private interests there. And historic diversity and quality of the salmon produced from that basin.

I fished for salmon, Mr. Chairman, both commercially and otherwise, and this will produce all the way from coho to chinook. If we can bring the big salmon back out of that river, it will be a gift to this country that we should all be pleased about.

But most of all, I urge the members of this committee to pass the bill as expeditiously as possible because if we can start this, as you will see from the bill, it is going to take 5 or 6 years, and I can assure you from looking at it—and I know that you have looked at it also—the only way is to approach these dams and this river as a whole and the jobs in Port Angeles as a whole. I, therefore, hope that the committee will act expeditiously.

It is my understanding, Mr. Chairman, that I have been granted permission by the committee to join you up there at the dais after the questioning. Is that correct?

[The prepared statement of Senator Adams follows:]

PREPARED STATEMENT OF HON. BROCK ADAMS, U.S. SENATOR FROM WASHINGTON

Mr. Chairman, thank you for scheduling a hearing on this important legislation and for providing the opportunity to testify before your committee today.

As you will hear from many of the witnesses, this is an extremely important bill to the people on the Olympic Peninsula in the State of Washington. It is important to their jobs, to the regional economy, and to the environment. The controversy surrounding the proposed relicensing of the two hydropower projects on the Elwha River threatens both the economic stability of the peninsula's largest employer and the opportunity to restore important salmon runs for the Pacific Northwest.

Senator Bradley and I, along with Senator Gorton and Congressman Swift and their staffs, spent many hours over the last year with many different parties developing this legislative solution. All of the parties are to be commended for participating in such a cooperative and innovative manner in the negotiations.

I especially wish to thank Senator Bradley, Chairman of the Water and Power Subcommittee, for his leadership and invaluable assistance on this legislation.

Mr. Chairman, there are several points that will help to put this bill in perspective. First and foremost, we need this bill this year. Now that we have agreement by the affected parties, we should move forward. The people of the peninsula, the local economy and environment cannot afford another year of uncertainty and economic instability.

The proposed relicensing of the two Elwha projects presents several major national policy conflicts that threaten the Olympic Peninsula. These include: the jurisdiction of the Federal Energy Regulatory Commission to relicense dams within National Parks; the long-standing claims of the affected Indian Tribes; and the restoration of Pacific Northwest salmon runs.

I believe we have crafted a fair and comprehensive settlement that provides economic and environmental stability for the region without undermining these important national policies. We have done so by providing for an exchange where each side gives up and receives something of equal value.

Mr. Chairman, there has been more than a little misunderstanding as to the nature of this exchange ever since the concept was first discussed. I would like to take a moment to clarify this matter.

The bill proposes to preserve the 300 plus jobs at the local paper mill by providing replacement electrical power at a cost comparable to what the mill would have paid if it had received a FERC license for 40 years.

This is not a buyout or a subsidy. If it were, then the companies involved would not have to pay the same cost for power as they would have paid under a FERC license, as this bill requires, and also have to transfer to the Federal government all rights and interests in the dams, hundreds of acres of valuable land, and other assets.



In exchange for the transfer of all private property and virtual control of the Elwha River, the companies will receive electrical power at the same cost they would have paid to try restore fish, wildlife, and the Olympic Park ecosystem. In exchange for providing the electrical power, the Federal government is receiving complete control over Elwha River fish, wildlife, and Park restoration without any of the limitations and uncertainty that would have been present if the projects had been relicensed.

In essence—and this is the beauty of the proposed legislation—each party is giving up something of uncertain value in exchange for certainty and stability. This is a fair exchange and provides the most reasonable resolution of the conflicts affecting the region.

Mr. Chairman, in addition to preserving employment at the local mill and furthering the national goals of restoring salmon and National Park ecosystems, this bill also takes an important step toward redressing decades of neglect by the Federal government toward the Elwha Klallam Tribe. It will not resolve all of the long-standing claims of this remarkable people, but it will begin to provide an economic base upon which the Tribe and the government can continue to build. The salmon that will return to the Elwha River are not only important for the economic value they provide, they are at the very heart of the tribal culture and history.

Although the Bonneville Power Administration will be used as the source of the replacement power, absolutely none of the costs to BPA of providing this power will be passed on to BPA ratepayers. This will be a Federal investment in salmon restoration similar to the substantial investments already being made through other Federal agencies such as the Forest Service, the U.S. Fish and Wildlife Service, and the Bureau of Reclamation.

The estimated cost of the bill, depending on the eventual restoration alternative selected, is from \$30-\$100 million. As you will hear in testimony today, the actual cost will likely fall within the middle of that range. However, it is important to note that even the highest cost estimate compares very favorably with Federal investments in salmon restoration in other Pacific Northwest river basins.

For example, the Bureau of Reclamation has spent approximately \$50-\$60 million on just fish screens and ladders in the Yakima River basin. Additional costs from other agencies for planning, hatcheries, and habitat improvements raise the figure to approximately \$100 million. Comparable or higher amounts have been or are authorized for expenditure in the Umatilla River basin in Oregon and the Upper Snake in Idaho.

The return on investment in the Elwha is expected to meet or exceed that in other basins. Salmon returns are expected to be in the 150,000 to 400,000 range because of the high productivity of the virtually pristine Elwha watershed and the historic diversity and quantity of salmon produced from that basin.

Given these numbers, the investment in Elwha River salmon restoration, combined with the value of preserving the local economy and assisting the Elwha Klallam Tribe, is a very positive Federal investment. I urge members of the Committee to pass this bill as expeditiously as possible.

Thank you again, Mr. Chairman and members of the Committee, for your patience and careful consideration of this important legislation.

Senator BRADLEY. The Senator is always welcome to sit on the dais here.

Senator ADAMS. Thank you.

Senator BRADLEY. Representative Swift.

#### STATEMENT OF HON. AL SWIFT, U.S. REPRESENTATIVE FROM WASHINGTON

Mr. SWIFT. Senator, thank you very much. First of all, let me thank you for the sensitivity you have shown to a local issue. I must tell you that I will treat unique problems of New Jersey with much greater sensitivity as a result of how you have treated this issue which is terribly important to our portion of Washington State.

I don't want to repeat what Senator Adams has said, but I think that it's only reasonable to expect a lot of people are going to just become aware of this issue, and it might be useful to put on the

record how we got to where we are today, how this bill was developed.

When I first got involved, we had the beginning of a holy war. The issue was really one that I call kind of aesthetic environmental issues in that there were people in Seattle who couldn't sleep at night knowing there was a dam in a national park, that kind of issue.

[Laughter.]

Mr. SWIFT. And on the other hand, you had people who said you're going to take those dams down over my dead body. There was no basis on which to try to bring reason to bear on how to resolve the problem.

So, I suggested to everybody—and by everybody, I mean the environmentalists and the community and the National Park Service, the Indians and all the others—why don't we try and figure out what is best for the fish. That at least gives us something that is quantifiable, measurable, something about which reasonable people can argue, but it gives you a factual basis on which to make decisions. This was at a time when expert fisheries' opinion on this was extremely divided as to whether the fish would be more helped by some mitigation and leave the dams in place or whether dam removal was, in fact, the option.

Everybody agreed to follow that, and everybody has continued to follow that. What happened over time was the preponderance of evidence, virtually unanimous as a matter of fact, was that the best thing for the fish was to remove the dams. Even FERC, not generally known for its sensitivity to fish, has concluded the best thing for the fish is to remove the dams.

Having arrived at that point, with that apparently the policy decision that should be made, we then began to try to figure out how do you deal with a whole variety of local important issues that have to be addressed. I must say, Senator, that Senator Adams and your committee, that is where the major contribution was made. We are pretty glib around here in passing out compliments to colleagues, and I do not mean this cheaply. The work done by your staff and the work done by Senator Adams' staff to work out the specifics of how you address the problem of the power to Daishowa, how you address the problems of keeping the water supply at Port Angeles, both industrial and residential, pure, how you address the problems of the Indian tribes and so forth and so on were the key to making this work. It was done by your staff and it was done by Senator Adams' staff, and I think that is a compliment that I want to offer most sincerely.

To those who now may come and look at the work that has been done and say, well, why didn't you do this, and why didn't you do that, all absolutely legitimate questions, there are a couple of things that I think they should keep in mind, and that is if they analyze this very carefully, what drove these various and disparate groups to agree to this compromise was the reality that either we do it or the courts will do it. We are not in a situation where by not passing this bill nothing happens. That is not the alternative. If we don't pass this bill or something very similar to it, the courts will move in.



Now, I don't know whether your States have been the recipient of the tender care of the Federal courts on a variety of issues or not, but I will tell you Washington State has had about as much of that attention as we can stand in terms of the boat decision, in terms of a variety of decisions dealing with old growth and so forth and so on.

The fact is the courts do not have the pallet, the broad pallet, to deal with these kinds of issues the way we in a legislative body do. The fact is that the Park Service wanted to sue somebody. I'm not quite sure. But we had the Federal Government suing each other. There are already lawsuits filed by the environmentalists. The Indians have grounds have grounds for a lawsuit, and what we will have, if we do not move legislatively is a great huge, wonderful battle that will be many-fronted within the courts and there isn't a soul who knows how that is going to come out with the possible exception of the very likely certainty that at the end, the fish will be the losers because by the time we get through the courts, there is serious question of whether there are going to be any fish left to worry about.

Therefore, I think it's very careful with those who would second guess this little provision of the bill or that little provision of the bill to go back to the basics and say if we don't do this or something very close to this, what will happen. The fact is the Federal Government could be subject to costs infinitely greater than assumed in this bill if courts decided one way. It could be that the fish will be all gone by the time anything is decided. It will probably be that the concerns of the city and of Daishowa will be ignored because the courts won't have the flexibility to get to those issues.

So, I am hoping that the people who will ask legitimate questions of why didn't you do this and why didn't you do that will do so in the context that we are legislators with the broad pallet. We have used that pallet I suggest very well in the drafting of this legislation, and in passing this legislation, we will benefit I think all of the parties involved rather than leaving it up to a coin toss in the Federal Courts.

[The prepared statement of Mr. Swift follows:]

PREPARED STATEMENT OF HON. AL SWIFT, U.S. REPRESENTATIVE FROM WASHINGTON

I am here today as the chief sponsor of the House version of the "Elwha River Ecosystem and Fisheries Restoration Act". I have worked closely with Senators Adams, Gorton, and Bradley to see that this compromise bill was completed. I would like to thank them and all the parties who have actively participated in creating this much-needed solution. In the end, we have created legislation that best protects the long-term interests of all parties involved.

The eight historic fish runs on the Elwha River have often been described as legendary. Those who can remember a time before the Lower Elwha and Glines Canyon Dams were built remind us that massive salmon, some as big as 100 pounds, once moved freely up the river. Tens of thousands of salmon returned one year to find a wall of concrete where more river had once been. Sadly yet predictably, those legendary runs soon ceased to exist.

These salmon were more than an ecological wonder; they were an economic resource for the people of Port Angeles. Our goal with this legislation is to see those runs flourish again. It is unquestionably a worthwhile goal, but getting there means far more than simply contemplating removal of two dams. A thorough reading of this legislation reveals the complexity of the situation.



A situation, you can see, that requires providing Daishowa of America with replacement power so it can continue to run a mill that employs 318 people in Port Angeles. A mill that produces large quantities of telephone directory paper using 30% recycled paper. It requires protecting the pure water supply for the people of Port Angeles as well as the industrial users who depend on that pure water for their livelihood. It requires giving the Elwha Klallam Tribe and the City of Port Angeles an opportunity to rebuild an economy that the loss of salmon has damaged so greatly. It requires providing a process to restore and protect the fish runs should the dams be removed.

Bringing all the parties and all the divergent interests together to reach this compromise was no easy task. It was accomplished, I think, because each of the parties came to understand that failure to reach a consensus would likely lead to the courts deciding vital issues without the opportunity for rational compromise.

As you may know, the federal courts already have before them some of the central issues surrounding this controversy. It is not long before they will decide these questions. These verdicts, however, will be narrowly defined by the lawsuit put before them. The courts will practice a piecemeal approach where a complete package is required, and in the end, none of these verdicts can hope to unravel all the complexities of this situation. None of them can do what we are attempting with this legislation.

It follows that none of the parties to this litigation can hope to have all their concerns answered even with a successful verdict. We have talked in the Washington delegation of parties fighting for "half a loaf"; that is, even a winning party in the lawsuits cannot hope to walk away from the federal courts with all they need to restore the fish runs, let alone protect the workers and water supply in Port Angeles. For instance, the courts have been asked whether it would be illegal for FERC to relicense Glines Canyon, the dam in the national park. If they decide it would be illegal, then the Departments of Commerce and Interior will have "won"—but what will this victory get them? Perhaps they will have won the right to halt operations of the Glines Canyon Dam but no government agency would be left with control of this Project and no government agency could touch the Lower Elwha Dam which will remain downriver on private land. In the end, Daishowa's operations would be severely hampered by the loss of power from the Glines Project with a resultant loss of jobs, yet not one more fish would make its way up the Elwha River. Everyone loses in this scenario. That is why we have worked so hard to negotiate this solution.

It has been expressed to me that some view the situation on the Elwha as simply a local issue that should be resolved locally. I must beg to differ. The fact is that it is not within the authority of local agencies to make the decisions required. These are federally licensed dams—one in a national park and their operation directly impacts an Indian tribe. This issue has national interest written all over it.

People have also talked about a national precedent we may be setting by contemplating dam removal. I assure you that those involved with this bill are not knee-jerk about removing hydroelectric projects. We all realize their importance to our long-term energy needs. That is why I want to emphasize that the unique circumstances on the Elwha River set it apart from other rivers where we may be experiencing similar problems. Here we have two projects that provide power to only one customer, and we have a means to replace that power source. The dams are not connected at all to the electricity "grid" in the surrounding community, and thus we are taking no power from the people of Port Angeles. Finally, the two dams block fish passage to over 30 miles of pristine river within a national park. This provides an opportunity for fish restoration not present elsewhere in the country. These points, combined with the national interests I mentioned before, set the Elwha apart.

Finally, I come to cost. Recent estimates say that the entire package, including dam removal and fish restoration, could cost between \$60 and \$80 million. This is substantial, I admit, but this figure may be extremely modest when compared to the costs that would be incurred by the federal government and the people of Port Angeles if the courts decide this issue piece by piece. This figure is also put into proper perspective when we look at far-larger sums being spent for fish restoration on other rivers in the Northwest. Rivers, that is, that don't have miles of untainted ecosystem to support recovery.

In short, the Elwha River is an excellent investment in ecosystem recovery. If we decide that salmon recovery is an ecological priority, then the Elwha River should top the list of rivers to restore.

Thank you for the opportunity to testify today.

Despite my skepticism of the cost-effectiveness of this legislation, I stand ready to work with the authors to have the Department of the Interior undertake the Federal studies necessary to determine the technical feasibility of dam removal and river restoration, and the actual cost of the proposal. Simply put, I am a firm believer in looking carefully before leaping.

If the Committee decides to proceed with this legislation—which I do not now believe to be a wise course of action—it would appear to make good policy sense to put the entire ecosystem under the control of a single Federal agency. The logical agency would be the Park Service. This could easily be accomplished by making the two dams and related project lands part of the Olympic National Park. A corollary benefit of this approach is that it would enable the Park Service to preserve the powerhouses which are on the National Register. Until the dams and hydroelectric facilities are removed, the Park Service could contract with the present operator to operate the dams and hydroelectric facilities. The Park Service could also contract with the Bureau of Reclamation and other Federal agencies to undertake the feasibility and definite plan studies for the removal of the dams and the restoration of the river ecosystem. This would appear to make more sense than the approach proposed to be taken by this bill whereby part of the Elwha River ecosystem is under the control of the Park Service, while other portions end up under the control of other Federal agencies.

I look forward to hearing the testimony of today's witnesses.

Senator BRADLEY. Representative Dicks.

**STATEMENT OF HON. NORMAN D. DICKS, U.S. REPRESENTATIVE  
FROM WASHINGTON**

Mr. Dicks. Mr. Chairman, I too want to come here today. I would like to put my statement in the record.

I am confident that, as Senator Adams and I have heard, most of what Congressman Swift said clearly I think lay out the reasons for this bill.

I have been up and visited this site, and I think it would be a tremendous benefit if we could remove these dams, as Senator Wallop has suggested, if there is a way to finance this, the way to do it reasonably, practically. One of the things I think the bill calls for is kind of a study of that aspect, dam removal, after we work this out. It is kind of a two-step process, Senator, which I think is a good one because our problem is we have to resolve this problem. I completely concur with my colleague, Congressman Swift. The last place we want to resolve this is in the Federal courts.

We also have a jurisdictional problem between the Park Service and FERC here which is very fundamental. As I understand it, if FERC would not relicense these dams, it would be incumbent on the Federal Government to remove the dams. So, the responsibility is there either way we go. So, there is no way to remove this obligation.

I think it would be very, very unfortunate if the administration did not support us on this particular endeavor. We really need to do this in a bipartisan way.

I have studied this. I have met with our city officials up in the Port Angeles area. They have legitimate concerns. I am pleased that in this legislation many of those concerns have been dealt with. I understand that there are still some remaining issues that they have problems with. I would hope that the committee would continue. I know our delegation will continue to listen to those concerns.

But the bottom line is we have a very major problem for the major industries in this area, an area that has been hardest hit in



the entire State of Washington by the spotted owl problems, and we have endangered salmon problems coming down the road. One thing about this project, it would, in fact, create significant job opportunities over the next several years on the Olympic Peninsula where jobs are very, very important today because of the Endangered Species Act and the implications on that entire area.

So, I want to just say we appreciate your leadership on this. We appreciate the fact that you are working with Senator Adams and trying to get this bill through. It's a very important issue in our State from both an environmental perspective and a jobs perspective. Congressman Swift deserves enormous credit for the study that does show that fish will be mightily benefited by this.

So, I appreciate being here today and in support of this. I hope that we will all try to overcome our skepticism and try to find a way to make this work because this legislation is truly critical to the State of Washington.

[The prepared statement of Mr. Dick3 follows:]

PREPARED STATEMENT OF HON. NORMAN D. DICKS, U.S. REPRESENTATIVE FROM  
WASHINGTON

Good morning Mr. Chairman and members of the committee: I want to thank you for this opportunity to appear today before this committee, and to share my perspective on the Elwha Dams bill, which has been introduced in both the Senate and the House.

As I am sure this committee has become aware, the issue of how to address the removal of the Elwha Dams is one that is very high profile in Washington State, and is a matter that a number of citizens have a great deal of interest in resolving. The Elwha Dams issue is an issue that the entire Washington State delegation has been working together to address, and there has been active input from local governmental leaders, tribal leaders, environmental groups, and citizens of the community in an effort to find common ground towards a solution.

I would like to especially commend my able colleagues, Senator Brock Adams and Congressman Al Swift, for the leadership they have shown on a very complex issue, in bringing key players together, in tackling the tough specifics, and in crafting a bill that will serve as a basis for resolving the critical issues. They are to be commended for their hard work in bringing us this far, and I ask that this committee take action to build on the positive work that they have begun.

At the center of matters is what to do about two dams on the Olympic Peninsula, the Elwha Dam and the Glines Canyon Dam. The Elwha Dam was completed in 1913, and of course predates the Federal Power Act and the creation of the Federal Energy Regulatory Commission (FERC). The Elwha project was never licensed. However, FERC asserted its jurisdiction in 1979 on the basis of navigability. The Glines Canyon Dam was completed in 1927, and has been operating on annual licenses since 1976, when its original license expired.

The boundary of the Olympic National Park was expanded in 1940, resulting in the enclosure of the Glines Canyon Dam into the park. As this committee is aware, the presence of the Glines Canyon Dam inside the park has served as the basis for a dispute between the National Park Service and FERC over relicensing jurisdiction. Regardless of other debates about the two hydroelectric projects and their purposes, these two dams have been a vital supplier of power in the area, producing a combined total of 19 megawatts, and supplying the Daishowa papermill in Port Angeles, the city's largest employer, with approximately 35 percent of its current energy requirement.

There are a number of interests involved in resolving questions related to the removal of the Elwha dams, and I ask that the committee consider carefully the concerns of all those involved. Conservation interests are very critical in this legislation, as we look at how the removal of the dams could serve to enhance the ecology, both for species and the landscape. This is particularly a matter of importance at a time when the Northwest region is examining options for protecting and enhancing wild salmon runs. With regard to conservation interests, I want to thank the environmental community for its participation and active role in this process.

SUAGEE DEC.



The city of Port Angeles has important concerns that are vital to consider and address, particularly with regard to impacts affecting the city's drinking water. Both the James River Company and the Daishowa America Corporation have much at stake in the outcome of this legislative process, and are seeking to be supportive players as we move forward. The Lower Elwha tribe has its cultural heritage tied closely to the Elwha River, and continues to play an active role on matters surrounding dam removal. All of these parties will be presenting testimony today on their specific concerns as they relate to the Elwha bill. I ask that the committee give careful consideration to the arguments being made.

I believe that all parties involved are working to get conflicts resolved related to specific aspects of the legislation, and we need this committee's support to make compromises possible. The path to cooperation in the best interest of all concerned can only be achieved by going one step at a time and making sure that all reasonable concerns are dealt with and addressed.

Even when all remaining concerns are resolved, there are other matters that must be dealt with related to the cost of dam removal, the engineering feasibility, and how to best achieve the restoration of natural resources.

However, even within the context of these complexities, I pledge, as I know my Washington State colleagues do, to work towards a sensible and fiscally responsible resolution in regard to the removal of the Elwha dams. We look forward to achieving these goals with your support.

Thank you.

Senator BRADLEY. Thank you very much, Mr. Dicks.  
Mr. Isaki.

**STATEMENT OF HON. BOOTH GARDNER, GOVERNOR, STATE OF WASHINGTON, AS PRESENTED BY PAUL ISAKI, DIRECTOR, DEPARTMENT OF TRADE AND ECONOMIC DEVELOPMENT, STATE OF WASHINGTON**

Mr. ISAKI. Thank you, Mr. Chairman. I am pleased to be here today to remark from the testimony provided I believe earlier from Governor Gardner, his statement. I will draw extracts from that if that's all right.

For years, as it has been pointed out by our esteemed congressional delegation representatives here, Elwha issues have been debated. Fishery interests have called for fish, national park interests have argued for parks, and the businesses have pressed for jobs. Many real concerns got lost and resources continued to degrade. During the debate decades, diverse interests battled one another in regulatory, legal, and political arenas.

The time has arrived to stop the battles and to set aside the acrimony. Fortunately, through the cooperative efforts of all parties, Washington's congressional delegation, you, Mr. Chairman, the staff of this committee, Federal agencies, the Elwha Tribe, environmental groups, Clallam County, and the City of Port Angeles, Daishowa America, and the James River Corporation, as well as the State of Washington, we now have the appropriate vehicle to successfully conclude the Elwha dam debate. That vehicle is the Elwha Restoration Act.

Much of the Olympic Peninsula, including Clallam County, faces severe economic problems because of changes in the basic historic industry, that is, timber, and the degradation of valuable fish and wildlife resources. Despite current difficulties, however, the area's long-term future can be a bright one.

One clear indication of that future can be seen in Daishowa America's new recycled paper plant in Port Angeles, Washington that was recently dedicated on May 1, 1992. That new recycling fa-

cility will enable Daishowa to produce high quality, high recycled content directory paper to meet the needs of its nationwide customer network, Nynex, Bell South, Pacific Bell, U.S. West, and others. By moving into recycling, Daishowa has assured the future of over 300 family wage jobs at its Port Angeles plant. The new facility will also provide environmental benefits across the Nation in New Jersey, in Louisiana, in Colorado, California, Montana, North Dakota, Oregon, as well as Washington by substantially reducing the volume of used directories that are disposed of currently in landfills or are incinerated.

This legislation is also a tool to help enhance, restore, and steward the high quality natural resources that will have to serve as the basis of the Northwest's long-term economic development strategy. All along the Pacific coast, historically abundant, economically valuable salmon and steelhead resources have declined significantly. The very survival of some fish runs, including those on the Elwha, are in serious question.

Obviously, the Elwha River legislation being discussed here today itself cannot be expected to fully resolve this coast-wide situation with fish. However, by restoring fish and natural ecosystems that support fish on the Elwha River, we will make an important contribution to the fishing, wildlife appreciation, outdoor recreation, and tourism components of our Northwest industries.

The Elwha River Restoration Act serves a broad range of interests and provides a good framework for the comprehensive legislation that is needed to bring together diverse interests into balance.

Today's hearing is the first step in a legislative process that can help achieve the goal of a balanced policy for the Elwha. As we move forward, I am certain questions will be raised and criticisms directed at this legislation. Our challenge now is to answer the hard questions and address the criticisms so progress may continue.

On behalf of Governor Gardner, I respectfully request this committee and the Congress move the Elwha legislation forward in a timely manner. The State of Washington is committed to working with you to secure the passage and effective implementation of the Elwha River Ecosystem and Fisheries Restoration Act.

Thank you.

[The prepared statement of Governor Gardner follows:]

PREPARED STATEMENT OF HON. BOOTH GARDNER, GOVERNOR, STATE OF WASHINGTON

Thank you Mr. Chairman. I am pleased to present Governor Gardner's statement in support of the Elwha River Ecosystem and Fisheries Restoration Act.

For years we've debated the best ways to: (1) restore the Elwha's legendary salmon and steelhead resources, along with the ecosystems of the Olympic National Park; (2) protect existing businesses and jobs while encouraging economic growth and diversity in Clallam county; and (3) address and respect treaty rights while providing quality fishing opportunities for all. As we debated, fishery interests called for fish, national park interests argued for parks, and businesses pressed for jobs. Many real concerns got lost and resources continued to degrade. During the debate decades, diverse and disparate interests battled one another in regulatory, legal and political arenas, and in the news media.

The time has arrived to stop the battles and set aside the acrimony. Fortunately, through the cooperative efforts of all parties—Washington's congressional delegation, Senator Bradley and the staff of this committee, the federal agencies, the Elwha Tribe, environmental groups, Clallam County and the city of Port Angeles, Daishowa America and the James River Corporation, and the state of Washington—



we now have the appropriate vehicle to successfully conclude the Elwha dams debate. That vehicle is the Elwha Restoration Act.

Much of the Olympic Peninsula, including Clallam County, currently faces severe economic problems because of changes in its basic historic industry, timber, and the degradation of valuable fish and wildlife resources. Despite current difficulties, however, the area's long-term economic future can be bright.

A clear indication of that future can be seen in Daishowa America's new recycled directory paper plant that was dedicated on May 1, 1992. That new recycling facility will enable Daishowa to help lead the pulp and paper industry's effort to recover and recycle fiber and meet the need of its nationwide customer network—Nynex, Bell South, Pacific Bell, U.S. West and others—for high quality, recycled directory paper. By moving into recycling, Daishowa has assured the future of over 300 family wage jobs at its Port Angeles plant alone. The new facility will also provide environmental benefits across the Nation, in New Jersey, Louisiana, California, Colorado, Montana, North Dakota, California, Oregon as well as Washington State, by substantially reducing the volume of used directories that are disposed of in landfills or incinerated.

This legislation is a tool to help enhance, restore and steward the high quality natural resources that will serve as the basis of the Northwest's long-term economic recovery. All along the Pacific Coast, historically abundant, economically valuable salmon and steelhead resources have declined and even the survival of some runs, including Elwha fish, is in question. Elwha River legislation can not be expected to fully resolve this coast-wide situation. By restoring fish, and the natural ecosystems of the Elwha River, however, we will make important contributions to the fishing, wildlife appreciation, outdoor recreation and tourism components of our economy.

The Elwha River Restoration Act serves a broad range of interests and provides a good framework for the comprehensive legislation that is needed. When enacted, the bill will enhance one of the true gems of America's National Park system—Olympic National Park; help the Interior Department carry out its treaty obligations and provide new economic opportunities for Indian people; improve the ability of federal, state and tribal governments to successfully manage fishery resources; assure water supplies; respect the interests of property owners, including the state; and make positive contributions to state, regional and local economies.

The bill before you represents the great progress that has been made toward resolution of the full range of issues associated with the Elwha River Dams. Today's hearing is the first step in the critical legislative process that can bring final, positive resolution to these issues. As we move forward, I am certain questions will be raised, and criticisms directed at this legislation. Our challenge now is to answer the hard questions and address the criticisms so that progress can continue.

I respectfully request this committee and the Congress to move the Elwha legislation forward in a timely manner. The state of Washington is committed to working with you to secure the passage and effective implementation of the Elwha River Ecosystem and Fisheries Restoration Act.

Thank You.

Senator BRADLEY. Thank you very much, Mr. Isaki.

Let me begin with questions, and then we can each proceed with questions, if we would choose.

Senator ADAMS, are you comfortable with the fact that the bill does not mandate the removal of the two dams, but rather sets up a local process to decide how best to restore the Elwha's fisheries? Do you think that's good enough?

Senator ADAMS. I am comfortable with it. I would prefer that it happen sooner, but I also understand that there needs to be local cooperation. These are massive structures that require, under all the feasibility studies, that work carefully be done on them. So, I think the local process, as long as it moves forward at a reasonable and continuous rate, is the way to go about it.

Senator BRADLEY. I appreciate that.

What appropriations subcommittee would be responsible for funding?

Senator ADAMS. Well, there could be a potential conflict as to whether or not it was the Energy and Water Subcommittee, but I



believe it probably, because of its national park nature, would go into the Interior Subcommittee on the Senate side. Now, I would let Congressman——

Mr. Dicks. We have thought about this. If it is turned over to the Bureau of Reclamation, it would seem to me that it would be before the Energy and Water Subcommittee. That's the subcommittee in the House of Representatives that has jurisdiction over the Bureau of Reclamation. Now, they are the responsible agency and they are the ones that would be requesting the funds, or Congress would have to appropriate the funds. But it's going to be either one of the two. I agree with the Senator. It's either the Interior Subcommittee or Energy and Water Subcommittee.

Senator BRADLEY. Let me ask any of you, Representative Swift or Senator Adams, you, or Congressman Dicks. What do you think the outcome would be for Port Angeles if the Federal Government rejected this kind of settlement and instead exercised its rights under section 14 of the Federal Power Act to just take over the projects?

Mr. SWIFT. It seems to me that there will be three major problems for the City of Port Angeles.

First of all, the Daishowa mill, its economic viability would come into serious question. That's 300 and some jobs in a portion of our State that has been in a massive recession for a long time that is not attributable to the national situation, but rather to the current situation you find with regard to the timber products industry in our State. So, you would have that as a cumulative effect.

Secondly, the City of Port Angeles has two water systems, one which serves its residential area, and whatever you do with that river is going to raise some very serious problems as to how you keep that water supply from the Elwha River pure for the residences. So, that is one issue.

The second issue is it has a separate water system for industrial uses. There is a second paper mill in Port Angeles, ITT Rayonier, which uses a process that requires extraordinarily pure water. If the industrial water supply is then adversely affected and there is no means by which the city has the ability to have that created whole again, you have the possibility of adversely affecting a second mill and those jobs as well.

So, I come back to the fact that we have the pallet from which we can select the things that we need in order to be able to resolve this in a fashion that is good for the fish and without doing undue damage to the community. If we do it in some more rigid kind of way, such as the one that you suggested, I think in short the interests of the City of Port Angeles go hang.

Senator BRADLEY. What do you think the outcome would be for Port Angeles if the bill was simply rewritten to make the Secretary's takeover of the projects contingent upon some further study showing that dam removal was cost beneficial?

Mr. SWIFT. Well, it is going to get you into courts. If we could do that and then eliminate all judicial review, maybe that would work. I wouldn't support that, but maybe that would work. But we are not going to be able to do that.

So, what you will have is this great civil war that is going to go on: Federal agency fighting Federal agency, environmental lawsuits, lawsuits from the Indian tribe, lawsuits no doubt from James

River and some of the companies involved. You and I probably will be in the old folks home by the time that would get resolved.

Senator BRADLEY. So, the bottom line is that if we do nothing here, just drop it, let it go, and allow the current licensing process and litigation to proceed, we are just going to be in a paralysis. Is that it?

Senator ADAMS. That's correct, Mr. Chairman. It is a real possibility that that could occur. We have had it occur too many times in the State, and when that does happen, then there is no way of saving the fish. There is no way of saving the jobs, and the whole thing comes crashing down.

Senator BRADLEY. Let me ask one final question, and that is is there any better way, from the standpoint of Port Angeles to deal with the series of problems that you have outlined, than this bill?

Mr. SWIFT. Senator, I am not going to suggest that if we all want to go clear back to ground zero, we couldn't come up with another way that would achieve the same purposes. There are infinite ways to do things, but you would have to go back to ground zero. You would have to put all the parties back in the adversarial relationship they were in to begin with with all their skepticisms and all their paranoia, and you would have to start working out something else all over again. In my judgment, the chances it would be significantly better in any respect than what we have worked out are nil.

Senator BRADLEY. Well, I appreciate your comments. I think it is pretty clear, and I know that each of you have been involved in this process. While we would like to hear each of you speak for the rest of the morning, there are people who have come a long distance who actually would represent those interests.

So, Senator Murkowski, do you have a question for the panel, or shall we go on to the principals?

#### STATEMENT OF HON. FRANK H. MURKOWSKI, U.S. SENATOR FROM ALASKA

Senator MURKOWSKI. I have a short statement and observation and a few questions.

I am wondering, Mr. Chairman. It seems to me we are being asked to authorize a set of actions for which a scientific study has yet to be forthcoming. As I understand it, the tribe in question has contracted for a study, but I am wondering of the merits of the Bureau of Reclamation addressing the feasibility of taking the dams down. Evidently the technology is rather innovative, to say the least, and the costs are substantially unknown.

I have a General Accounting, GAO, estimate here that I would ask be entered in the record relative to the costs. The estimate capital costs, for removal of both dams is \$72 million, and the EIS places a value of the foregone electrical generation when the dams are removed at \$172 million and anticipates recurring annual expenses of \$315,000, plus fish restoration of \$3 million. The total costs calculated by FERC are \$247 million.

If we are contemplating taking that action based on the information we have, I question the adequacy of it. I think we have a situation where there seems to be a predominance of favoritism to simply take the dams down. I honor and appreciate the sentiments



which usually nothing is tops around here because it can always be topped by another top.

Senator BRADLEY. But that's not to the taxpayer. That \$247 million is not to the taxpayer.

Senator MURKOWSKI. Well, that was my next area of questioning.

With regard to the makeup of this, there is a proposal that there be participation, and how much of the \$247 million would you anticipate to be picked by the taxpayer?

Mr. HAYDEN. We are suggesting that the Secretary of the Interior get the parties together and, in fact, arrive at a reasonable cost-share, and only after that point would, in fact, we know.

I think, Senator Murkowski, it is fair to say that, obviously, the Bureau of Indian Affairs, the Fish and Wildlife Service, the National Park Service and NMFS have an overriding interest in the removal of these dams and the restoration of this ecosystem.

Senator MURKOWSKI. I wonder, Mr. Robertson, if you could comment on how you see this sharing, recognizing that there is a proposal to get the parties together and work out a "reasonable cost-share"—how much is the taxpayer going to pick up out of \$247 million?

Mr. ROBERTSON. Well, with respect to just the power aspects alone, which is what I want to focus on, Bonneville's position is that because of these other contributions ratepayers made to the Columbia River basin, we don't believe they should pick up, nor does the legislation I believe—and the committee has discussed this with us—allocate any cost to the ratepayers in the Northwest as it is so designed.

Under the bill, about \$29 million in net present value costs would accrue to the taxpayers as a result of a subsidy that occurs in our repayment methodology that is passed through.

Senator MURKOWSKI. I would just leave the question out there for any of you to address from the standpoint of what the theoretical cost to the U.S. taxpayer will be.

Senator BRADLEY. But that is what he answered.

Senator MURKOWSKI. Well, yes, but that just covers the power aspect of it.

Senator BRADLEY. \$80 million for capital costs for removal. So, it's \$110 million total.

Senator MURKOWSKI. Plus the fish enhancement program, which we haven't gotten into, and I don't want to prolong that. But clearly, you've got a watershed that has been closed for all practical purposes, since you don't have an anadromous run coming back you are going to have to enhance by bringing in, either through a hatchery or planting fry or whatever, to develop those runs again whether you want the pinks or the reds or the chinooks or whatever. I assume that a portion of that is going to be picked up by the State of Washington and a portion by the U.S. Fish and Wildlife Service. So, there is an additional cost of X amount. Right?

Mr. HAYDEN. Well, Senator Murkowski, let me say that we are concerned, just as you are, about the cost to the Federal Government. That is why we have suggested that the bill be amended and that there be a cost sharing.

Let me also say that the \$247 million assumes that these dams are going to be relicensed. It is doubtful that at least one of these



Daishowa plant onto the Bonneville power grid. As I look at it, they will purchase about 172 gigawatts, and that represents about two-tenths of a percent of Bonneville Power's 1991 power generation of 93,000 gigawatts. Right?

Mr. ROBERTSON. Correct, roughly.

Senator BRADLEY. In terms of load growth, BPA forecasts that load growth will grow at an annual rate of about eight-tenths of a percent over the next 20 years. Is that right?

Mr. ROBERTSON. In the medium to medium load cases, yes.

Senator BRADLEY. So, the additional Daishowa purchases would represent about a little bit less than 3 months of load growth. Is that correct?

Mr. ROBERTSON. Under those scenarios, yes. I should say, Senator Bradley, we are fully prepared to meet this load if it is placed on us. We have a responsibility to the local community.

Senator BRADLEY. The cost is, if we've got a fix on the cost, the \$29 million roughly over 40 years, less than \$1 million a year, and the 1991 electric sales of Bonneville Power, about \$2.1 billion. So, it represents about five-hundredths of a percent, about five-hundredths of Bonneville Power's 1991 sales?

Mr. ROBERTSON. Correct.

Senator BRADLEY. So, it's not a terrible amount of money given the total.

Mr. ROBERTSON. We will meet the obligation, yes. We can handle it.

Senator BRADLEY. Well, let me thank all three of you for your testimony, and now let's move on to the next panel. Carla Elofson, Tribal Chairwoman, the Lower Elwha Klallam Tribe; Dennis Gathard, Project Engineer, the Elwha River Restoration.

Let me tell the witnesses that we are under some time restraints. So, I am going to try to hold you, if you can, just tell us two or three points as to how you feel about this legislation, and then we will move on. I am going to have to start to gavel people because we are heading down toward conclusion.

Ms. ELOFSON. Mr. Chairman?

Senator BRADLEY. Yes?

Ms. ELOFSON. Can I ask that two of my councilmen sit at the table too?

Senator BRADLEY. Sure. You can have anybody there that you want.

Ms. ELOFSON. Women.

Senator BRADLEY. Welcome to the committee, and you should feel completely easy. Just tell us what you want to tell us.

**STATEMENT OF CARLA ELOFSON, TRIBAL CHAIRPERSON, LOWER ELWHA KLALLAM TRIBE, PORT ANGELES, WA; ACCOMPANIED BY BEATRICE CHARLES, TRIBAL ELDER; BEVERLY BENNETT, VICE CHAIRMAN; AND RACHEL KOWALSKI, SECRETARY-TREASURER AND FISHERIES MANAGER**

Ms. ELOFSON. Thank you, Mr. Chairman and members of this committee for inviting me to testify today. My name is Carla Elofson. I am chairperson for the Lower Elwha Tribe. With me are tribal council members. This is Rachel Kowalski. She is also our

fish manager. She is our Secretary-Treasurer. Beverly Bennett is our Vice Chairman at the end. Then Bea Charles is one of our tribal elders. Also in attendance at this hearing are some of the members of our staff who can assist in answering any questions you may have today.

On behalf of the Elwha Klallam people, we would like to thank you, Senator Adams and Senator Gorton, for bringing this important legislation to the Senate for consideration, along with the many other people involved. We also would like to thank our good friends, Congressman Al Swift and Congressman Norm Dicks, for their support and help over the years.

The Elwha Klallam Tribe supports this legislation. In our written testimony, we explain why we support it. We also ask for clarifications on a few points of special concern to the tribe and hope they will be carefully considered in this process.

One of the issues we are thankful was recognized in this bill is the economic devastation to the tribe caused by the dams being in place. In this regard, including an opportunity to acquire part of the former project at Ediz Hook is sincerely appreciated.

I notice that the City of Port Angeles is testifying later today. As you can see from our letter to the city, a copy of which is attached on the last two pages of our written testimony, we are very interested in working with the city on Ediz Hook and other matters.

Mr. Chairman, we are grateful to be here today because it has been many years since the tribe and the Senate discussed the issues before us. The last time was in 1855 when our ancestors signed the Treaty of Point No Point, and the U.S. Senate ratified it. When the treaty was signed, we were promised that in exchange for giving up our land, the United States would be sure we had a safe place to live and that our fish would be protected. For at least the past 80 years since the first dam was built on the Elwha River, it has been impossible for the United States to keep its promises. Mr. Chairman, I came here today to ask the United States to keep its word and stop the harm suffered by three generations of Klallam people, destruction of the wild salmon on the Elwha River, the heart of the Elwha Klallam people.

With me today is Bea Charles, one of our tribal elders. She grew up beside the river on her grandmother's farm and remembers very vividly the things told to her by her grandparents and other elders about the Elwha River, the Elwha Klallam people, and the effect the dams have had on our way of life. With your permission, I would like to ask Mrs. Charles to speak about some of the things she remembers, and at the conclusion of her remarks, we would be pleased to answer any questions you have.

[The prepared statement of Ms. Elofson follows:]

PREPARED STATEMENT OF CARLA ELOFSON, CHAIRPERSON, LOWER ELWHA KLALLAM TRIBE, PORT ANGELES, WA

Thank you Mr. Chairman and members of this Committee for inviting me to express the views of the Lower Elwha Klallam Tribe regarding S. 2527. On behalf of the Elwha S'Klallam people, I would also like to express our appreciation to Senator Adams and Congressman Swift for introducing this bill and to Senator Gorton, Congressman Dicks and the entire Washington State Delegation for Co-sponsoring this long-sought, first-step towards restoring the heart of the Elwha S'Klallam people—the wild salmon.



The Lower Elwha Tribe supports S. 2527 and urges its enactment. We do, however, request the following clarifications or amendments be made:

*A. Throughout S. 2527*

As presently drafted, S. 2527 postpones a decision on dam removal. There is no scientific basis for this. Once environmental review and engineering design is complete, the dams can come out. The Tribe urges you to include dam removal as the "preferred alternative" and direct the Secretary to start the removal process. Further delay only places the remaining salmon stocks in a more precarious position, increases construction costs, and imposes an additional burden on the Tribe.

*B. Sec. 5(c)(1)—Liability*

The Tribe requests clarification regarding the scope of owner/consumer liability assumed by the United States. Although Section 11 saves the Tribe's rights under its treaty or other law of the United States, others might interpret section 5 as satisfying or assuming liability to the Tribes for damages caused by the dams to the Tribe's fishery.

Pursuant to 25 U.S.C. § 2415(b), the Tribe's claim against private tortfeasors was preserved pending decision of the Department of Interior to file suit as the Tribes' trustee or recommend resolution through legislative settlement. If the United States intends to assume liability for damages to the tribal fishery, waiver of sovereign immunity for the entire period of the dams' existence should be made explicit.

If, on the other hand, the United States intends to continue preserving tribal claims against the private tortfeasors, it should be made clear in this section that the assumed obligations and liabilities do not include any claim for injury to the Tribes' fishery.

*C. Section 8(c)(1)—Restoration Plan*

As currently drafted, the Restoration Task Force is mandated to consider "all relevant factors" in preparing the Restoration Plan. Included last on the list of relevant factors is Indian Treaty Rights. We request clarification through either an amendment to this section or in report language that the listing does not subordinate or abrogate the Treaty rights and that listing is not intended to require a "balancing" of the Treaty rights against the other listed interests.

*D. Section 14—Project Lands Outside Park*

The Tribe supports the concept of the Elwha River National Fish Refuge. We recommend, however, the following amendments to subsections (a) and (b):

*1. Subsection (a)*

Additional language included to avoid any disturbance of the delicately balanced harvest management scheme that evolved following *United States v. Washington* ("the Boldt decision"). We recommend the following additional language:

Nothing in this Act shall be construed to modify or affect the fisheries management process instituted pursuant to *United States v. Washington*.

Further, in administering the refuge it must be clear that the Secretary must act in accordance with the Treaty of Point No Point. As currently drafted, others might interpret the Tribe's rights to fish their usual and accustomed grounds under the Treaty as subrogated or abrogated. Although the Secretary may permit the refuge to be administered to allow for the other activities, such as public recreation, it must be clear that the Treaty is not subrogated. We recommend the following language:

Such lands shall be administered by the Secretary under the provisions of the National Wildlife Refuge System Administration Act, as amended, and in accordance with all applicable federal law, including the Treaty of Point No Point. In administering this refuge, the Secretary shall permit the area to be used for tribal ceremonial, medicinal, and traditional uses, as well as for public recreation, including fishing, to the extent consistent with the refuge purposes of protecting and conserving fish and fish habitat (including upland areas which contribute to aquatic food supplies, watershed protection and water quality).

*2. Subsection (b)*

As currently drafted, this bill would create a new tribal-federal land ownership scheme in an already overly complicated system. To provide less confusion and more certainty for both the Tribe and the federal government, and at the same time preserve the intent of this section, we recommend subsection (b) be amended to read:

(b) To the extent consistent with the refuge purposes described in subsection (a) of this section, the Secretary is authorized and directed to take not more than 700 acres of the land located outside the exterior boundary of the Park into trust for the benefit of the Lower Elwha S'Klallam Tribe. Such lands shall be managed by the Tribe for tribal housing, cultural or economic development purposes only in accordance with a plan developed by the Lower Elwha Tribe in consultation with the Secretary.

#### *E. Section 16—Ediz Hook*

The Tribe already has initiated discussions with the City of Port Angeles regarding the provisions of this section. We hope to avoid controversy and advance the interests not only of the tribal community but the area at large. As discussed earlier in our testimony, Ediz Hook is a site of particular cultural significance to the Elwha S'Klallam people. In addition, it represents one of very few opportunities for the Tribe to develop an economic base that is not directly dependent on its fishery.

As described in our letter to the City, a copy of which is attached at the end of our testimony, we are very willing to work with the City in developing compatible economic plans and to continue current uses, particularly those consistent with our interest in low-impact, culturally appropriate development.

Should this Bill be enacted and a Restoration Plan prepared that leads to removal of the dams, the Tribe foresees several years before the fishery is restored during which time the tribal economy would be even further impacted negatively. We sincerely appreciate the sponsor's recognition of this impact through inclusion of Section 16.

The Tribe urges this Committee to continue supporting the concepts embodied in section 16. For clarification, we request either an amendment or report language that more precisely describes the land and the process by which the Secretary shall acquire the land for the benefit of the Tribe. For example, it is our understanding that the land is not "surplus" as such, but rather its status as federally withdrawn lands has been or will be relinquished. In addition, the Tribe requests that the land be held in trust by the Secretary for the benefit of tribal, cultural and economic development.

Mr. Chairman, I came here today to ask the United States to keep its word and put an end to the injury that has devastated our Tribe for three generations. In the next sections of my testimony, the history of the interrelationship between the dams and the Elwha S'Klallams is outlined briefly. I also describe the impact on the tribal economic base as well as the methods and prospects of restoring the wild salmon to the Elwha River once the dams are removed.

Mr. Chairman, for 80 years these dams have represented to us the failure of the federal government to live up to its promises; our great-grandparents were promised a safe place to live and that our right to fish the Elwha would be protected. We hope our grandchildren will not need to come back here for the next 80 years asking that these promises be kept. Please make S. 2527 into law and start the process of restoring the Elwha River.

#### **1. THE ELWHA S'KLALLAMS AND THE ELWHA RIVER**

Our Tribe has lived along the Elwha River for countless generations. The River and the salmon are at the center of our way of life. At a site presently located under the Elwha Hydroelectric Project, the Creator made the S'Klallam people out of the river rock.

In 1855, our ancestors signed a treaty with the United States which exchanged extensive landholdings on the Olympic Peninsula for a number of promises by the federal government, including its undertaking to protect our fisheries and provide us with a safe place to live. The treaty provides:

Article IV: the right of taking fish at usual and accustomed grounds and stations is further secured to said Indians, in common with all citizens of the United States; and of erecting temporary houses for the purpose of living; together with the privilege of hunting and gathering roots and berries on open and unclaimed kinds.

The usual and accustomed fisheries of the S'Klallam were in the rivers where their settlements were located and in the marine waters of the Strait of Juan de Fuca. Those S'Klallam who fished in the Elwha River, in Freshwater Bay, and in the Strait west of Freshwater Bay fished on Elwha River anadromous stocks.

Following the treaty, Elwha S'Klallam people continued to occupy the land which had always been their home. Between 1879 and 1892, a number of S'Klallam families had perfected title to Indian trust homesteads at Freshwater Bay and in the



Elwha Valley or had purchased lands in the vicinity. Many of these homesteads were located along the Lower Elwha River from the future site of the Olympic Power Company Dam to the outlet of the river at Freshwater Bay.

In 1942, Edward G. Swindell, an attorney with the Bureau of Indian Affairs, secured a joint affidavit from three members of the Lower Elwha Community regarding usual and accustomed fishing places of the Elwha S'Klallam Indians. The affiants, aged 66 to 80 years, provided information which refers to fishing along the lower mainstream Elwha and at the confluence of the main river and one of its main tributaries, Indian Creek. Among traditional village and fishing sites listed along the Elwha, the following description was included:

Elwha River: That there was an old permanent village located at the meeting place of Indian Creek and Elwha River; that the name of the creek as well as of the village was Tee-tee-ulth; that the village was located on the south bank of the river; that the site of this village was flooded out from the water backed up by the lower dam constructed by the Puget Sound Power and Light Company.

Prior to the building of the dams on this river, the S'Klallams had important fisheries at various places along the main river and its tributaries. Tribal members fished on Elwha River salmon stocks in the Strait of Juan de Fuca, at the mouth of the Elwha River, in the lower reaches of the Elwha River, at Indian Creek and other small streams in the vicinity which were part of the Elwha River system.

In the early 1890s the Elwha supported themselves entirely from their subsistence fisheries and from sale of fish to people in Port Angeles for local consumption and from sale to fish processors. From 1890 until the present time Elwha S'Klallams have continued to fish on Elwha stocks in the river and in the strait of Juan de Fuca, although subsistence from an Elwha River fishery is no longer possible because the dams have destroyed the runs.

In the period 1910 to 1914 a private developer named Aldwell built what is now known as the Elwha Dam. This dam, formerly known as the Aldwell Dam, or the Olympic Power Dam, backed up water creating Aldwell Lake and inundated the creation site and the village of the Tee-tee-ulth near the confluence of the Elwha with Indian Creek. The dam blocked all anadromous fish access to the river system above the dam. The second dam, Glines Dam, was completed in 1926 at about river mile 13.

Neither the lower dam (Elwha Dam) nor the upper dam (Glines Dam) were provided with fish passage facilities. At the time that the lower dam was built, it was contrary to State law for anyone to build an obstruction which would totally block anadromous fish from ascending a stream. The law permitting dam builders to provide funds for hatcheries in lieu of constructing fishways had not yet been enacted. Letters of protest to the State Department of fisheries describe hundreds of fish found dead at the base of the Elwha Dam—they died following unsuccessful attempts to leap over the 100 foot high spillways.

For a period covering at least 1916-1935, the State of Washington Department of Fisheries denied that the Elwha S'Klallams had treaty rights and arrested tribal members for fishing in the Elwha for their family food supply. With the dams in place, the fish runs diminished and officers carrying out the state's program of arresting S'Klallam fishers, the economic, social, and cultural well-being of the Tribe reached an all time low.

During the fall and winter of 1935, Federal Land Agents made appraisals of the farms in the Lower Elwha Valley for the purpose of acquiring 3,840 acres of land for the Elwha S'Klallam Tribe under the Indian Reorganization Act of June 18, 1934. In his "Statement concerning the Project", Mr. George G. Wren, Assistant Land Negotiator for the federal government made the following observations about the effects on and conditions of our parents and grandparents in 1935:

In the vicinity of Port Angeles, S'Klallam County, Washington, there are living at present a group of approximately 30 Indian families (120 individuals) known as the S'Klallam Bay Band. The people are landless and are living in dilapidated make-shift shacks on a narrow, barren, sandy spit, known as Ediz Hook, jutting out into the Strait of Juan de Fuca, are on relief rolls of S'Klallam County, Washington.

The other families are living in squalid shacks scattered along the shores of the bay and along the Elwha River on privately or on county owned lands. Several of the latter mentioned group have cultivated small patches of land among the stumps of the cut-over timber and are unsuccessfully attempting to raise garden vegetables. Odd jobs on neighboring farms, in nearby logging camps or saw mills and in the town of Port Angeles afford

these Indians their only opportunity for employment. During the berry and fruit picking seasons and during harvest time, there is a limited amount of work to be obtained on the valley farms. However, when whites are available for any of this work they are given the preference.

The Indians depend largely upon beach-combing for their living. In bygone years, salmon, trout, crab, and other fishing and clam digging activities furnished a means of livelihood for most of the Indians of the area. However, the Indians cannot compete with the large fishing industries now established. The Washington State Fish and Game Laws now prevent the Indians from catching enough fish for their own use as food. When an Indian is caught fishing out of season he is given the choice of either a jail sentence or a fine. Out of necessity, his choice is invariably a jail sentence.

A dam on the Elwha River, owned and maintained by a pulp company, has ruined the spawning grounds of the trout and salmon. The opening of this dam several times each year results in killing thousands of fish. The Indians gather the dead fish in order to replenish their food supply. However, the president of the S'Klallam Indian Tribal council informed the writer that even the possession of fish thus killed has, in several instances, resulted in jail sentences for the possessor.

Only 12 Elwha S'Klallam families were allowed to move on the 500 acres finally purchased for their benefit. Because of local opposition, however, the 3840 acre land acquisition program was never completed and the 500 acres that were purchased were not formally declared a reservation until 33 years later.

The land that eventually became our reservation is located at the mouth of the Elwha River. In addition to the destruction of the Tribe's fishery, tribal members living downstream from the dams have lived with the constant fear of dam failure, flooding resulting from sudden release of stored water, and tidal flooding on the reservation because river sediments are trapped in reservoirs upstream.

The fear of failure is not imaginary. The Elwha Dam blew out on October 31, 1912 during initial filling of the reservoir behind the dam. Tribal families living downstream had not been warned and barely escaped the wall of water released downstream. To repair the dam, a plug of logs, rock and concrete was placed in the breach.

In the 1970's the Tribe began a program to construct housing and initiate economic development on the Reservation. Although funding was available for economic development and housing, engineers employed by Crown Zellerbach, the owner of the dams at the time, found that Elwha Dam remained unsafe. The Tribe's initiatives were set aside while it attempted to force repair of the dam. A series of repairs was completed in the mid-1980's but the dams still threaten life and property on the Reservation. The Tribe remains concerned that neither dam is designed to withstand the "great" earthquakes, far in excess of 7.5, expected along the coastal fault zone.

It has been suggested that the two hydroelectric reservoirs could provide flood control for the reservation. Tribal and federal engineers have told us that this is not feasible. The projects are too small, and the watershed is too large, for the dam owners to do much more than just open the spillways during flooding to protect the dam structures from being overtopped. When spillways were suddenly opened in the past to prevent flooding in the reservoirs, or just to clean "trash" out of the forebays, tribal members lost fishing gear and narrowly escaped drowning.

Tribal elders remember the reservation beach as sloping more gradually and farther out into the Strait of Juan De Fuca. There were shellfish beds. Now, because the river sediments that replenished the beach are trapped behind the dams, our shoreline is continually eroding and tribal homes are threatened by both river and saltwater flooding during winter storms. Erosion and flooding is getting more severe. There are no longer many shellfish.

## II. TRIBAL ECONOMIC CONDITION

The economic base of Lower Elwha Tribe has been devastated by the existence of the dams. Over the past 80 years, tribal members have insured and subsidized the "cheap" power produced from the project.

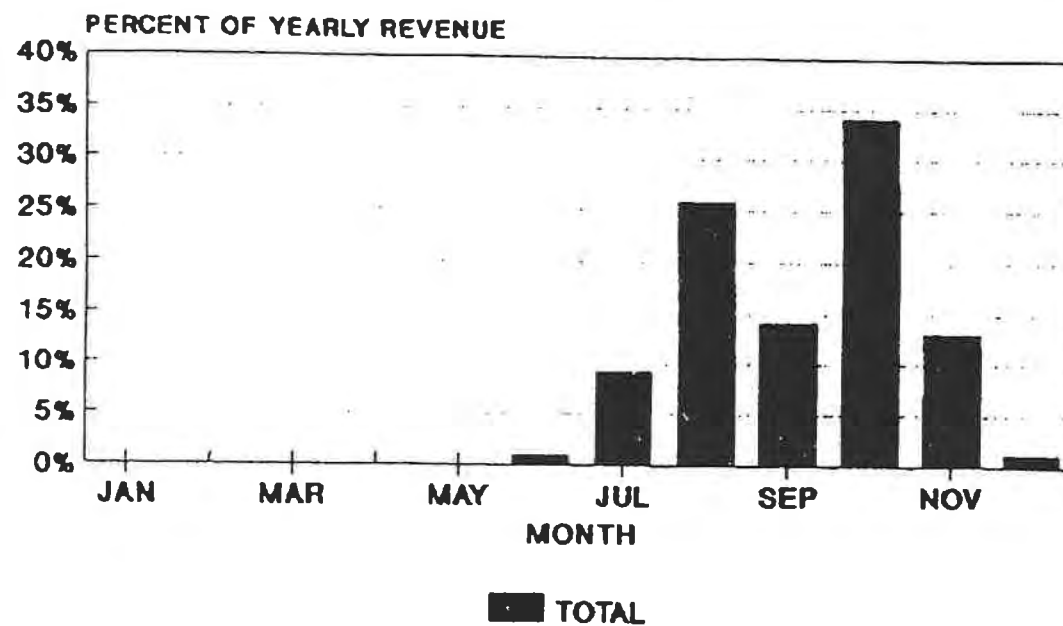
A general understanding of the economic condition of the Elwha S'Klallam Tribe can be obtained from the Bureau of Indian Affairs' "Indian Service Population and Labor Force Estimates." In the 1984-89 period, the unemployment rate fluctuated between 63% and 80%. During that time period, only 7% to 26% of those employed earned more than \$7000 per annum.



The fisheries potential of the Elwha River is the Tribe's only significant asset. The Tribe has more than 60% unemployment in a predominantly timber-based economy which is already depressed. Most tribal fishermen rely to some degree on the river's fisheries, receive relatively small income from those fisheries, and have varying degrees of success in those fisheries from year to year.

As the following tables illustrate, what fisheries remain in the river are extremely seasonal. There is a marginal coho fishery from late September to early November and a modest steelhead fishery from Christmas through January. Compare this to the nearly year-round potential run for 6 anadromous (third table) returning to the river after the dams are removed.

**LOWER ELWHA KLALLAM TRIBAL FISHERIES  
PERCENTAGE YEARLY REVENUE PER MONTH  
FROM ALL FISHERIES**



**MUCH LESS THAN 1% OF FISHERIES REVENUE  
RESULTS FROM JANUARY THRU MAY HARVESTS**

SUAGEE DEC.  
127

80



# Lower Elwha Klallam In-River Fisheries, Elwha River

| SPECIES   | JA | FE | MA | AP | MA | JU | JU | AU | SE | OC | NO | DE |
|-----------|----|----|----|----|----|----|----|----|----|----|----|----|
| CHINOOK   |    |    |    |    |    |    |    |    |    |    |    |    |
| CHUM      |    |    |    |    |    |    |    |    |    |    |    |    |
| COHO      |    |    |    |    |    |    |    |    |    |    |    |    |
| PINK      |    |    |    |    |    |    |    |    |    |    |    |    |
| SOCKEYE   |    |    |    |    |    |    |    |    |    |    |    |    |
| STEELHEAD |    |    |    |    |    |    |    |    |    |    |    |    |

Legend:      - - - - - Limited or occasional fisheries  
                     Common fisheries

### Timing of salmon upstream migration in the Elwha River

| SPECIES   | JA | FE | MA | AP | MA | JU | JU | AU | SE | OC | NO | DE |
|-----------|----|----|----|----|----|----|----|----|----|----|----|----|
| CHINOOK   |    |    |    |    |    |    |    |    |    |    |    |    |
| CHUM      |    |    |    |    |    |    |    |    |    |    |    |    |
| COHO      |    |    |    |    |    |    |    |    |    |    |    |    |
| PINK      |    |    |    |    |    |    |    |    |    |    |    |    |
| SOCKEYE   |    |    |    |    |    |    |    |    |    |    |    |    |
| STEELHEAD |    |    |    |    |    |    |    |    |    |    |    |    |



It is apparent that an increase in productive capacity of the Elwha River would have a significant beneficial effect on the tribal economy. It is also apparent that the increase should occur in the whole spectrum of anadromous species in order to alleviate the extreme seasonality of the current fishery.

The Elwha watershed, which once supported all species of Pacific Salmon, now supports limited runs of Coho, Chinook and Steelhead salmon each year. An experienced tribal fisher who consistently fishes from the beginning of the fishing season to the end, can derive an income in the range of \$6,000 to \$9,000 per year. This is well below the average yearly income of a Clallam County head-of-household income of \$15,490.

In comparison to the Clallam County area, the Elwha families survive on extremely small annual incomes. Because of the less abundant fishery resource available in the watershed, Elwha fishers have had to seek employment with minimal success in an already depressed job market to subsidize the minute fishery income available from the Elwha watershed (and elsewhere in our area) from one fishery season to the next.

Removal of Glines and Elwha Dams and restoration of the fishery and recreational capacity of the Elwha River not only would positively impact the tribal economy—the entire county would benefit. The final magnitude of dams removal and Elwha River restoration activities has not yet been fully determined. Mr. Philip A. Meyer, an economist hired by the Tribe, nevertheless has developed estimates of the business benefits that can be anticipated from dam removal.

These estimates suggest that the project will create between 1,900 and 3,700 man months of new employment in the area, depending on project scale. Of these, half are estimated to involve hiring of Clallam County residents. Total direct, indirect and induced employment associated with the project is estimated between 5,500 man months and 10,900 man months, again depending on project scale.

The project is estimated to generate a total payroll of between \$24 million and \$47 million. Responding of these funds within Clallam County is estimated to generate at least between \$3 million and \$5.6 million for Clallam County businesses.

Purchase or rental of machinery, equipment and materials associated with the project is estimated to amount to between \$38 million and \$75 million. We estimate that between \$19 million and \$37 million of these purchases could occur in Clallam County. It is estimated that these purchases would generate State taxes of between \$3 million and \$6 million—of which the Clallam County share would be between \$500,000 and \$1,000,000.

### III. RESTORING THE WILD SALMON

During the 1980's, after the dams came before the Federal Energy Regulatory Commission for licensing, tribal, state and federal fisheries agencies began studying the prospects for fish restoration with the dams in place. The studies indicate that only a small part of the fisheries can be replaced by artificial means, and that the "dam passage" alternative will actually result in a reduction in tribal fisheries. For that reason, the Joint Fish and Wildlife Agencies have recommended dam removal. The basis for this recommendation and prospects for restoration are described below.

#### A. Background

The Elwha River watershed is unique because of its broad diversity of anadromous fish habitat. Before the construction of the dams, the Elwha River supported large runs of spring and summer/fall chinook salmon, coho salmon, chum salmon, pink salmon, sockeye salmon, summer and winter steelhead trout, cutthroat trout, and dolly varden char. No other system on the Olympic Peninsula had runs of all these species and sub-species. The unique habitat characteristics of the Elwha River which allowed for such a tremendous diversity of the species also forced unique genetic adaptations of each stock. For example, most chinook salmon stocks average 25 to 30 pounds. Before the dams existed, chinook returning to the Elwha River were uncommonly large: some fish reached 100 pounds in weight. Preservation of these unique runs and adaptations depends on the full restoration of the Elwha watershed, which can only be achieved if the two dams on the river are removed.

#### B. Current Status

Pacific salmon and trout are anadromous fish species, spending the first few months to two years of their lives in fresh water before migrating to salt water where they will live two to five more years before returning to their native streams to spawn their eggs into the streambed gravel. The length of time a fish spends in fresh and salt water varies both within and between species. After spawning, the

adult salmon die. With the main part of their feeding and growth occurring in salt water and their death and decay occurring in fresh water, a large gain in nutrients and nourishments to the fresh water ecosystem is accomplished.

The homing instinct in salmon and trout is very strong. Adults usually return to the stream of their birth, and some have been found to spawn within the very same stream section where they first swam up from the gravel. Although there is a small percentage of the adults which will stray to other rivers, the tendency to return to their native rivers leads to the virtual genetic isolation of individual river systems, allowing the development of fish runs uniquely adapted to surviving in their home stream. Maintaining this genetic diversity is important to the viability and resiliency of the salmon population as a whole.

Unfortunately, since the construction of the Elwha and Glines Canyon dams, at least one of the Elwha River's fish runs, the sockeye salmon run, has become extinct. Spring chinook, pink salmon, chum salmon and summer steelhead trout exist only as extremely small remnant populations. In the article "Pacific Salmon at the crossroads: Stocks at Risk from California, Oregon, Idaho and Washington" in Trout, Winter, 1992, four of the Elwha stocks are listed as being at high risk of extinction. In addition, summer/fall chinook, coho and winter steelhead populations are preserved only as hatchery runs while the status of cutthroat trout and dolly varden char is unknown.

With dam removal, the goal of restoring the fish runs to the Elwha River can be accomplished. There are numerous examples where salmon populations have been driven to extremely low numbers, only to recover when given the opportunity. For example:

Spring chinook in the Umatilla River in Oregon were extinct for nearly 70 years after irrigation withdrawals dried up the river. In the mid 1980's, a program was begun to bring the fish back. In 1988, just thirteen fish returned from these restoration efforts. By 1991, the number of returns had grown to 1,330 fish.

In 1980, the Toutle River was devastated by the eruption of Mount St. Helens. Many experts thought that the damage to habitat caused by the sedimentation had destroyed the fishery. But 10 years later, naturally spawning runs had successfully reestablished themselves in their former range.

A land slide on the Fraser River blocked migration to sockeye salmon for one year and hindered migration for a number of years until construction of the Hells Gate fishway in 1945. Since then, the runs have rebuilt to the point where record return have been seen in recent years.

Based on the various studies and other information available, the fisheries agencies have prepared a chart comparing the prospects for restoration of each Elwha River anadromous stock under the two alternatives: removal of the dams and retention of the dams under the dam owner's mitigation proposal. Only three stocks—winter steelhead, summer steelhead, and coho—have even a "fair" chance of restoration if the dams stay in.

#### RESTORATION PROSPECTS

| Species               | Without dams | With dams          |
|-----------------------|--------------|--------------------|
| Steelhead             |              |                    |
| Winter.....           | Good .....   | Fair .....         |
| Summer.....           | Good .....   | Fair .....         |
| Coho.....             | Good .....   | Fair .....         |
| Chinook               |              |                    |
| Spring.....           | Fair .....   | Poor/Unknown ..... |
| Summer/Fall.....      | Good .....   | Poor/Unknown ..... |
| Pink.....             | Good .....   | None .....         |
| Chum.....             | Good .....   | None .....         |
| Sockeye.....          | Fair .....   | None .....         |
| Searun Cutthroat..... | Good .....   | Unknown .....      |
| Dolly Varden.....     | Good .....   | Unknown .....      |
| Shellfish.....        | Good .....   | Poor .....         |

On the Elwha River, it is not possible to achieve full restoration under the dam retention alternative because: (a) Habitat in the deltas, impoundments, and scour zones remains inaccessible; (b) stream temperatures are elevated due to reservoir



heating; (c) nutrient transport is impaired; and, (d) cumulative stress causes additional mortality. Without the dams, however, restoration of the wild salmon populations of the Elwha is possible.

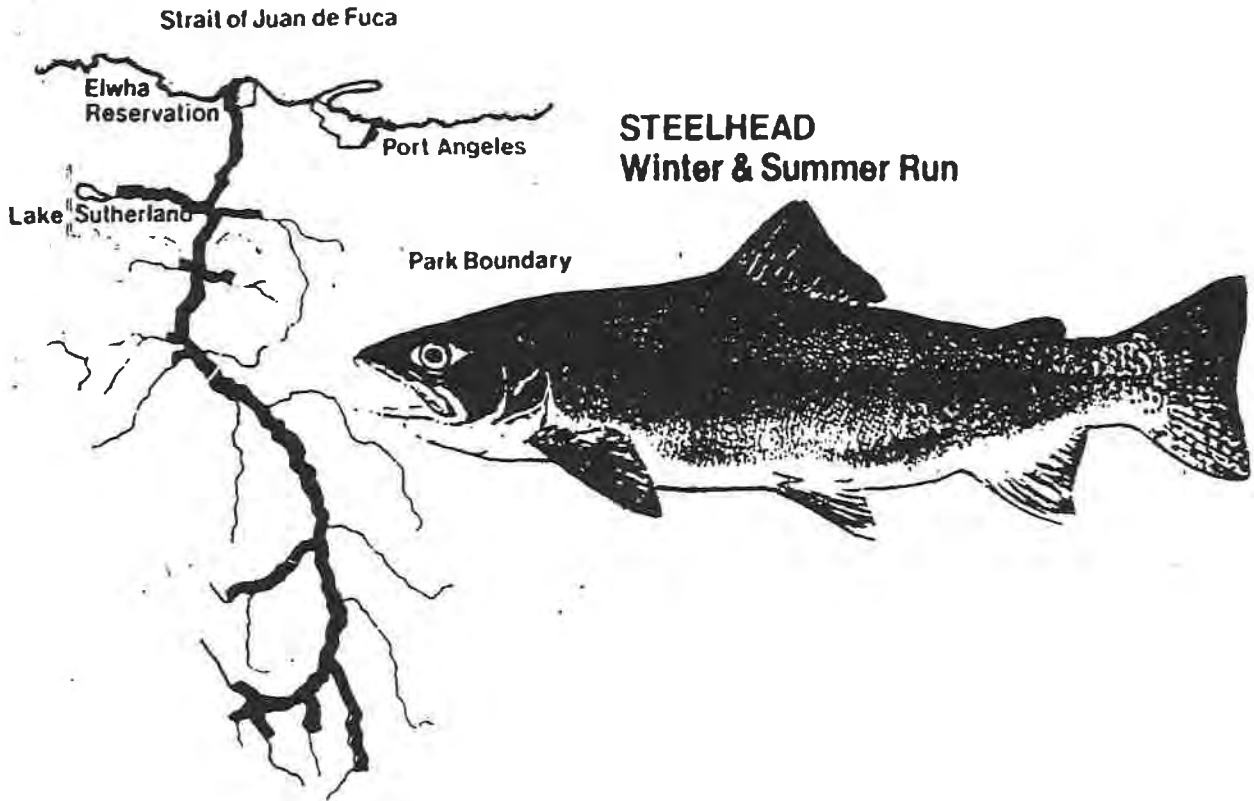
Although the overall cause of the declines and potential for restoration is a complex subject which should be approached on a river by river basis, in nearly all cases, the decline is the result of cumulative effects of varying degrees of habitat destruction, over harvest, genetic alterations, and annual variations in environmental conditions. On the Olympic Peninsula, the far greatest component causing the decline in fish numbers undoubtedly has been habitat destruction.

A case in point is Deep Creek, located about 30 miles west of the Elwha River. Historically, the river supported moderate runs of fall chinook, chum, coho and steelhead. Today, the chinook run is extinct and only remnant runs of chum, coho and steelhead persist.

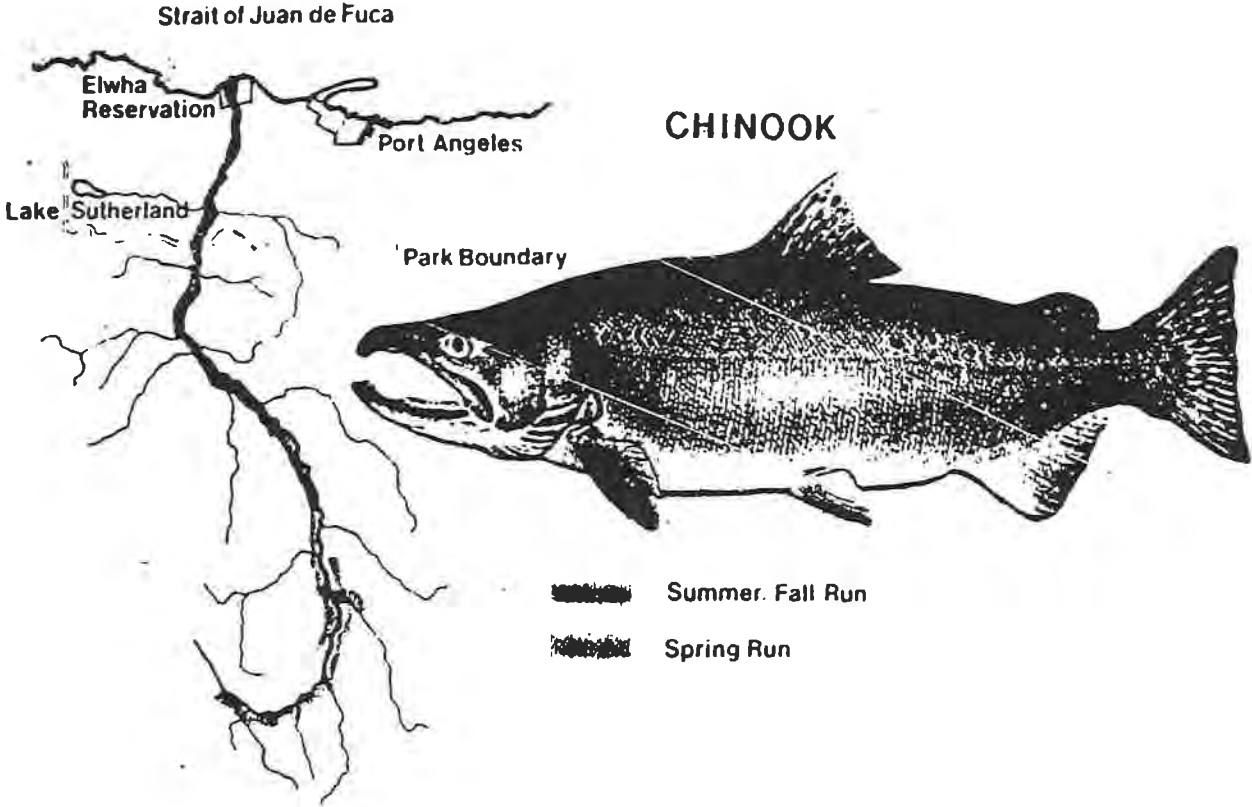
Deep Creek is an excellent example of what happens when geologically sensitive drainages are logged excessively. Deep Creek got its name for a reason—the depth of its pools. Pool area and volume directly correlate to rearing area for species such as coho and pool area is related to the amount of large trees that fall into the Creek. If all the riparian old growth is cut, four things occur: (1) the amount of sediment entering the river drastically increases; (2) recruitment of large trees is stopped, and loss of those trees in the channel exceeds the rate of replacement; (3) pool area begins to decrease; and (4) fish production starts to drop. Add to this the increase in average stream temperature, and other negative effects of increased sedimentation, and it's easy to understand why Deep Creek, and the majority of other creeks on the Olympic Peninsula, is less productive than it once was. By contrast, relatively undisturbed rivers such as the Lyre River (just to the west of the Elwha) are still productive.

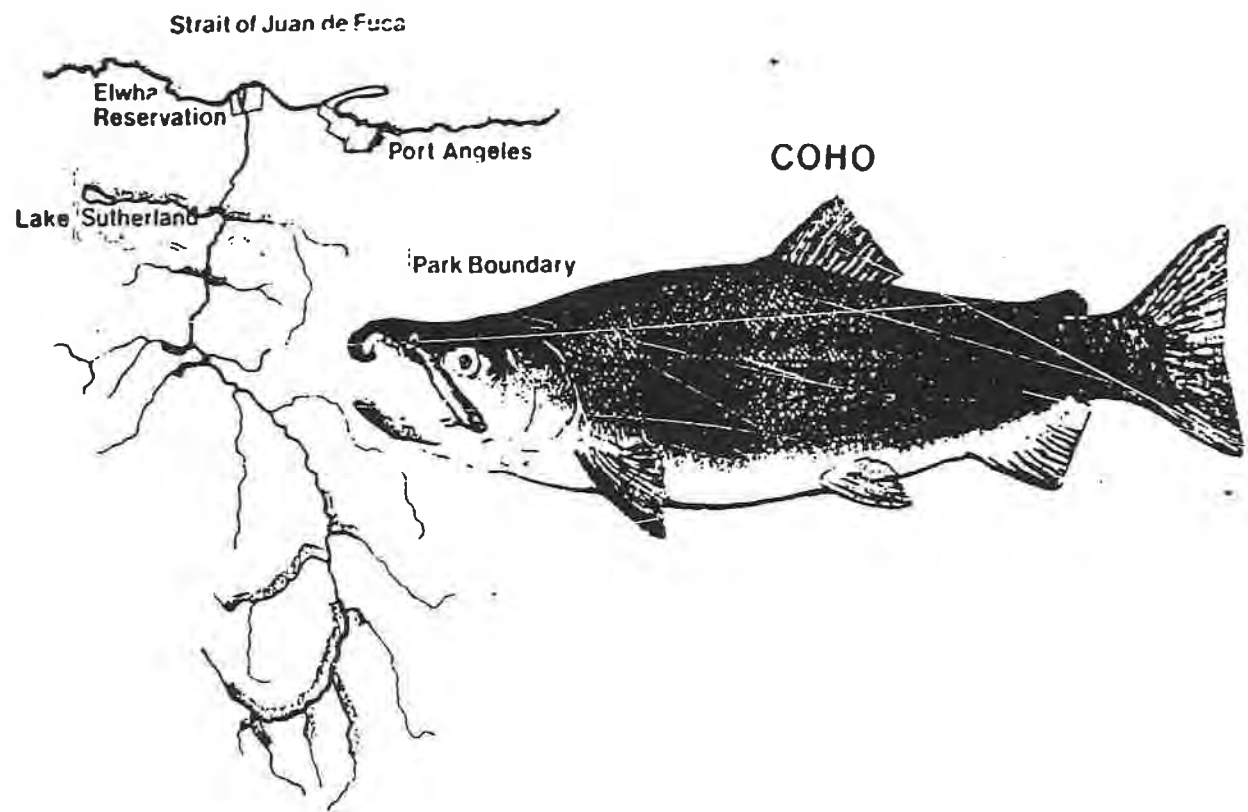
Unlike Deep Creek and many other Olympic Peninsula rivers, the habitat in Elwha River above the Glines Canyon Dam is pristine. The Elwha River drainage represents twenty one percent of the total area of the Olympic National Park and eighty-six percent of the drainage is located within the Park's boundaries. No other river drainage is so well protected. In addition, the lower sections of the Elwha River outside the Park boundaries are only moderately developed.

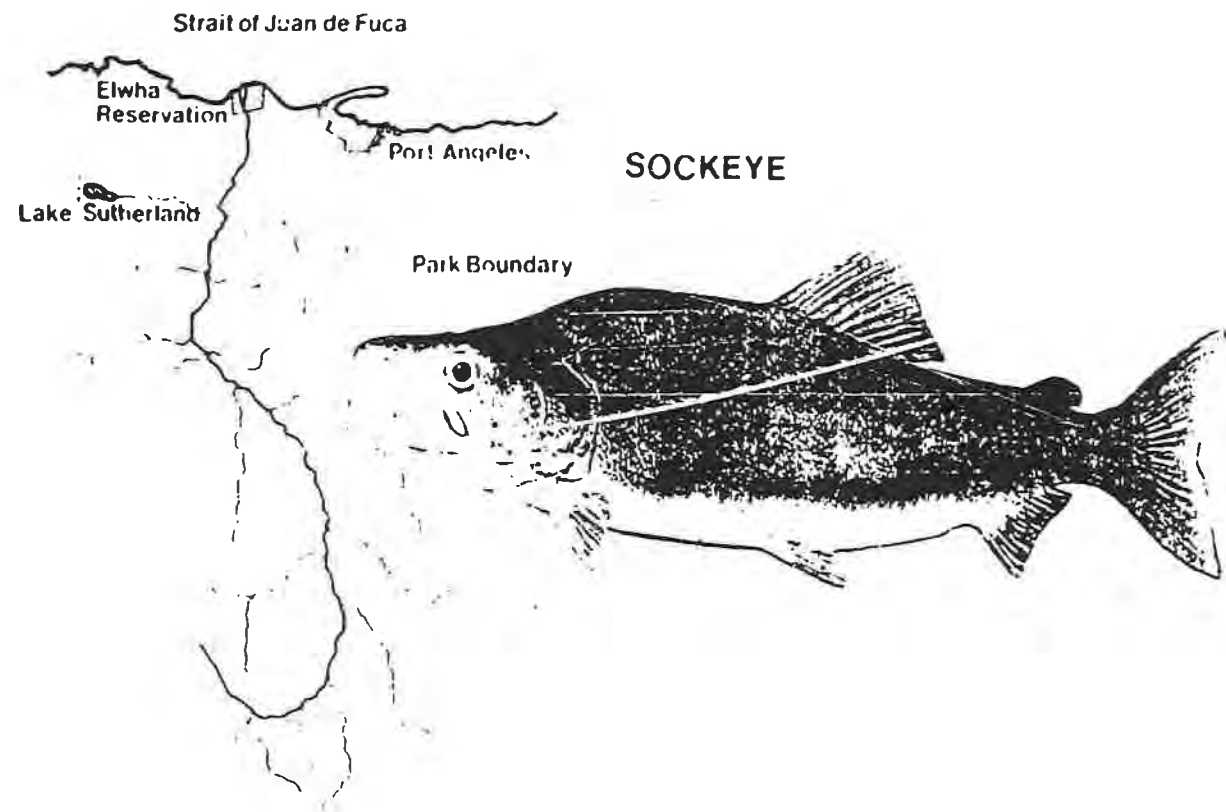
The creation of the Elwha River National Fish Refuge to protect another three miles of the River would leave only five miles of river without maximum habitat protection. If the dams are removed, habitat would not be a limiting factor to restoration of the river's fish runs. The following pictographs illustrate the potential run available to several species when the dams are removed.



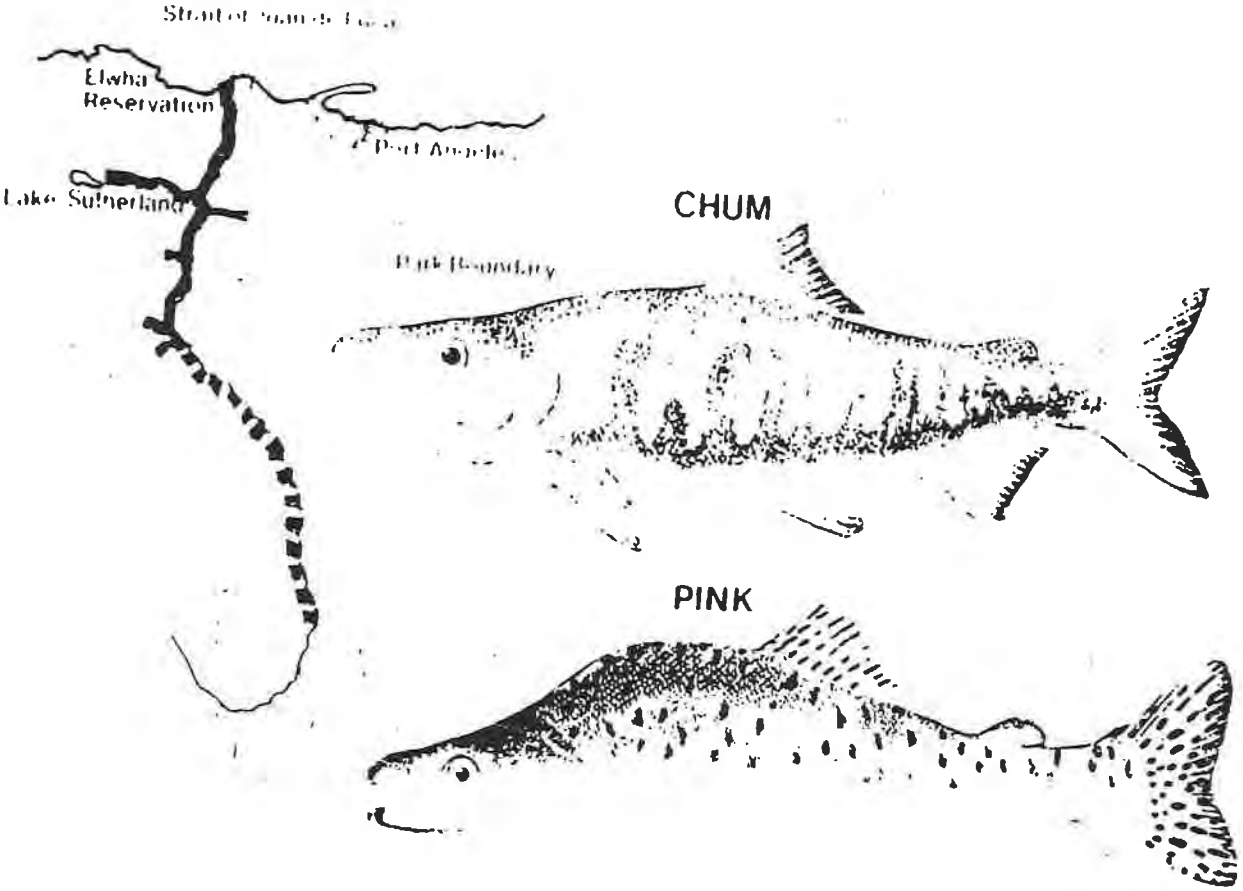












If the dams are not removed, the first sixteen miles of river habitat—the most productive and accessible—would be virtually useless for spawning. Currently, six miles are under lakes created by the dams and the dams cut off the other 10 miles from downstream migration of gravel needed by the salmon to spawn. Retaining the dams would eliminate any chance of rebuilding the wild stocks of chum and pink salmon and cut the available habitat for summer/fall chinook in half.

The chart below sets out present and future total adult production, harvest, and escapement for the listed species if both dams are removed:

|                | Adult production |         | Harvest rate |        | Harvest |         | Escapement |        |
|----------------|------------------|---------|--------------|--------|---------|---------|------------|--------|
|                | Present          | Future  | Present      | Future | Present | Future  | Present    | Future |
| Chinook.....   | 13,500           | 34,000  | 0.80         | 0.78   | 10,000  | 26,520  | 3,500      | 7,480  |
| Coho.....      | 22,000           | 39,500  | 0.90         | 0.65   | 19,800  | 25,675  | 2,200      | 13,825 |
| Steelhead..... | 4,000            | 10,200  | 0.30         | 0.43   | 3,600   | 4,386   | 400        | 5,184  |
| Chum.....      | <1,000           | 36,000  | 0.50         | 0.50   | .....   | 18,000  | .....      | 18,000 |
| Pink.....      | <100             | 274,286 | 0.65         | 0.65   | .....   | 178,286 | .....      | 96,000 |

<sup>1</sup> Note: Figures may be very high, e.g., Coho production in 1991 = @ 2,700.

The Tribe and other members of the Joint Fish and Wildlife Agencies began a number of studies necessary to the development of a detailed restoration plan. A brief description of the studies planned or underway follows:

#### 1. Spring Chinook

With the United States Fish and Wildlife Service, the Tribe has begun the first year of a five-year spring chinook stock assessment study. The federal government has committed funds for the first two years of this project. The Tribe is conducting a test of fishery in the river from April 27-June 20 to ascertain the abundance and run-timing of the Elwha River spring chinook stock. The final report from the first year's efforts will be available approximately September 30, 1992.

If the test fishery identifies a suitable population size, future years activities will include the investigation of alternatives for utilizing these fish as the brood source for restoration. Options may include a hatchery supplementation program, which would involve collecting eggs from returning adults, rearing at the Elwha Hatchery to release size, and then scatter planting throughout the upper watershed following dam removal. Additional options could include a captive brood program or a cross breeding program with outside stocks.

If a remnant population of the original spring chinook run can not be identified through this test fishery or if the run is too small to prove viable, other potential brood sources include the Dungeness spring chinook stock, the Sol Duc spring chinook stock or other coastal spring chinook stocks.

#### 2. Pink Salmon

In September and October of 1991, the Tribe independently conducted pink salmon spawning ground surveys which continued efforts begun in 1989. Results of these surveys confirm that the River's pink salmon population is at critically low levels—likely much less than 100 fish. Two fish were seen on redds in the river while approximately a dozen pink salmon were observed at the Washington Department of Fisheries spawning channel or the Tribal hatchery. It is important to note that the probable primary cause of the pink salmon decline in the Elwha is habitat degradation caused by the two dams. For this reason, if the dams remain it is likely that this stock cannot be restored.

The preservation of the Elwha River pink salmon stock is important to restoration efforts in the watershed as well as maintaining the genetic diversity of pink salmon populations in general. If significant efforts in this direction do not begin immediately, it is very likely that this stock will be lost. Beginning in 1993 and continuing in 1995, the Tribe plans to conduct an extensive pink salmon studies. Funding is already dedicated for 1993.

Efforts will include intensive spawning ground surveys, possible collection of eggs, and a habitat evaluation. Obviously, Elwha River pinks are the preferred stock for restoring the river. However, if the Elwha River run has declined to the point of nonviability, cross breeding with Dungeness River stock or utilizing Dungeness River stock exclusively would also be suitable.

### *3. Rainbow Trout*

Under the guidance of the Olympic National Park and the USFWS, the Tribe and other members of the JFWA have begun collection of up-river rainbow trout, which may be a remnant population of the original Elwha River steelhead run. Adults will be spawned at the Tribal hatchery and off-spring will be reared there to release size.

Concurrently, the USFWS will investigate methods of re-establishing the anadromy of these fish. If successful, these fish will be available as a brood source for the restoration of the Elwha River steelhead run. At this point, the JFWA is uncertain as to whether these fish represent the winter run or summer run stock.

If the results of this study indicate that the up-river rainbow trout are not a suitable brood source for restoration purposes, a number of other options exist. For the winter run, other suitable stock may include the wild component of the down-river run or the Tribal hatchery stock. The down-river wild summer run would be suitable for summer run restoration.

### *4. Chum Salmon*

Beginning in October 1992, the Tribe will begin the first year of a planned five-year investigation of the abundance and integrity of the Elwha River chum salmon stock. Funding for these studies are committed for 1992 and 1993.

The study plan for these investigations is not yet complete, but it will include GSI evaluations to determine if hatchery operations have significantly influenced the genetic composition of the stock. Studies will also focus on population size and run-timing for harvest management purposes. The final report from the first year's studies should be available in mid-1993.

As with pink salmon, the native chum salmon stock in the Elwha River, appears to be approaching critically low numbers. Each year, a few fish are taken incidental to the commercial coho fishery on the river and several fish return to the Tribal or State hatcheries, but the total number is small and declining. The probable cause for the decline in the chum salmon stock is habitat degradation and restoration is not likely if the dams remain. If this stock is to be preserved as the preferred stock for restoration, immediate action is necessary. However, if insufficient numbers remain, either the Lyre River stock or the Dungeness stock could be utilized.

### *5. Tribal Hatchery Modifications*

This year, the Tribe has committed funds to identify and begin modifications to the Tribal hatchery necessary to meet the needs of stock specific fish restoration in the Elwha River. Additional work may be scheduled for 1993. Modifications may include development of additional water sources, expansion of incubation and rearing facilities to handle pink and chum salmon, development of a satellite facility for the incubation and rearing of sockeye salmon, expansions of support facilities (storage, freezers, etc.), and design of a brood collection system (conventional weir, electric weir, fish trap, etc.). It may also be necessary to have the capability to isolate small groups of fish for testing purposes (i.e., coded wire tag groups, fish health studies, stock genetics, etc.). Construction plans and cost estimates should be available by the end of 1992 or early 1993.

It should be noted that these hatchery modifications will be necessary for restoration of the Elwha River regardless of the future operation of the two dams. The Lower Elwha Hatchery is presently the only facility operating on the Elwha River capable of rearing salmon throughout their development from egg to out-migrating smolts. The State's facility can only be used for the final stages of rearing, as it has no incubational facilities and water temperatures during the summer months are too high to successfully rear the fish.

### *6. Harvest Management*

Beyond habitat issues, harvest management in the Pacific Northwest has and will continue to undergo substantial changes in the next few years, as fisheries agencies attempt to rebuild wild stocks throughout the region. The United States Congress with its efforts to stop high seas gillnetting has already helped to reduce the interceptions of Northwest salmon stocks. In another arena the State of Washington and NWIFC Tribes have committed to a significant cutback in West Coast Vancouver Island troll and sports harvest when the U.S. and Canada sit down to negotiate new annexes for the U.S.-Canada Pacific Salmon Treaty. In addition, Canada is beginning to experience serious declines in their wild stocks and may soon be altering their harvest strategies unilaterally. In local management an unprecedented two month closure of sport fisheries has been implemented in the Strait of Juan de Fuca, right in front of the Elwha, while additional outbacks are scheduled for the coastal fisheries. In 1992, the Tribe is assembling and evaluating available coded wire tag information, genetic stock identification data, and any other stock specific



information relating to harvests of Elwha River and other strait of Juan de Fuca salmon stocks in mixed stock, terminal, and extreme-terminal fisheries. This information is necessary to outline specific harvest management strategies during the period of restoration of the Elwha River.

#### IV. THE ENGINEERING ASPECTS OF RESTORING THE ELWHA RIVER

The Tribe, with money appropriated by Congress, has completed engineering studies proving that dam removal, storage and stabilization of sediments in the reservoirs, protection of water supplies downstream, and prevention of other dam removal impacts, are feasible. At the invitation of this Committee, the Tribe's consulting engineers have prepared separate testimony on the engineering aspects of dam removal.

Mr. Chairman, this concludes our written testimony. The Lower Elwha S'Klallam community appreciates your interest and support for this important legislation.

LOWER ELWHA TRIBAL COUNCIL,  
Port Angeles, WA, May 12, 1992.

Mr. TIM HALLETT,  
Mayor, Port Angeles City Council, Port Angeles, WA.

DEAR MAYOR HALLETT: As you know, S. 2527 and H.R. 4844, entitled the "Elwha River Ecosystem and Fisheries Restoration Act," provide for the return of aboriginal lands located on Ediz Hook to the Lower Elwha S'Klallam Tribe. Like river restoration, return of land on the Hook will achieve a long-term goal of the Tribe: restoration of those areas of strong cultural and historic significance to our members. The Hook was the site of a major S'Klallam village until historic times and home for several Elwha S'Klallam families until they were moved off by the federal government in 1937. Tribal members alive today remember the times spent there with their grandparents and the pain of seeing their homes burnt after eviction. The Tribe is gratified that the United States Congress has recognized its long standing concern for this land.

We understand, however, that the City of Port Angeles also has an interest as well as a variety of lease obligations in the Ediz Hook land and has sought title to the same land. In initial meetings with your staff and after reviewing your Bureau of Land Management (BLM) application, we have come to a better understanding of your interests.

We believe our interests are compatible. We also believe an agreement could be reached that would include accommodations to the City's interests. In a spirit of cooperation we hope will set the tone for future City-Tribe relationships, the Tribe offers the following proposals for the City Council's consideration and concurrence.

Should the Tribe obtain title to the Ediz Hook land with the support of the City of Port Angeles, we would in turn agree to continuing the subleases pursuant to the current lease terms as long as the sublessor remained in compliance with all federal, state and local laws. We would also agree to the implementation of the planned extension of the trail system for walking, jogging and biking along the waterfront on the property at issue. We see this as consistent with our own goal of low-impact recreational and cultural development taking advantage of the natural setting.

With regard to uses that either the Tribe or city might propose in the future, we suggest that a six member Advisory Committee composed of representatives of the Tribe, city and local industry review all use proposals. For example, other recreational uses included in the City's BLM application, such as picnic and park areas, boat launch facilities, and recreational vehicle parking, would be considered and, if approved, could be implemented as a joint effort of the City and Tribe. The Advisory Committee should consist of three Tribal representatives and three representatives of the City, one of whom could represent local industry.

We believe these proposals allow current activities to continue, if the City so desires, and allow the parties to reach agreement after an opportunity to fully discuss future uses of benefit to our adjacent communities. We further recommend that both the Tribe and the City agree to use their best efforts to secure resources available to them as cooperating governments to implement the joint efforts agreed to by the City and Tribe, including protection of Ediz Hook from erosion.

In addition to the agreement regarding compatible land uses on Ediz Hook, the Tribe is willing to support the City's request to Congress that legislative language protecting instream flow be placed in a section separate from legislative language protecting the City's water quality.

property rights in the project real estate and improvements (the land and physical structures); it is the finding of a "right" to generate power at the projects in the current bill which we believe is contrary to existing federal law. Specifically, current language in Sections 2, 4, and 5 finds

"property rights and related interests . . . in the power generated by the projects."

We propose revised language which reads

"any and all property rights and any and all other rights and interests . . . in the power generated by the projects."

The language more accurately reflects the contested status of power generation at the Elwha and Glines projects while maintaining a "Legally neutral" position on issues before FERC and the Courts.

2. Dam Removals. The restoration plan developed under Section 8 of the Act needs to build upon existing knowledge and studies regarding ecosystem and fisheries restoration. Multiple studies and reports, including the FERC draft Environmental Impact Statement, all indicate that removal of the Projects can successfully restore wild salmon runs to the Elwha. Legislation to restore the Elwha should be based these facts.

3. Task Force Membership. The Task Force established by the Secretary under Section 8 of the Act should include representatives of the public interest groups which have a major stake in the restoration project. TU has specific expertise and unique interest in the development of the plan not represented by any of the current Task Force members. For over six years, both local and national conservation organizations have played a central and valuable role in advocating for restoration of the Elwha River ecosystem; it is fully appropriate that we have a voice in the development of the Elwha Restoration Plan. We propose that new language be inserted into Section 8(c) to include as members of the Task Force

"representatives of the public interest conservation organizations."

Finally, I want to commend this committee and the numerous groups that have joined together to produce this cooperative piece of legislation. TU recognizes that this was not an easy effort and the fact that this legislation represents a solution to a complex problem is outstanding.

Thank you for the opportunity to provide TU support for S. 2527.

Senator AKAKA. Thank you very much, Mr. Maxon, for your testimony.

May I call on Shawn Cantrell for your testimony?

**STATEMENT OF SHAWN S. CANTRELL, ASSISTANT NORTHWEST REPRESENTATIVE, FRIENDS OF THE EARTH, SEATTLE, WA**

Mr. CANTRELL. Thank you. On behalf of Friends of the Earth, as well as 10 other environmental, conservation, and fish advocacy groups that I am speaking on behalf of today, we want to give our full heartfelt support for the intent and purposes of this legislation.

I would submit my entire testimony for the record at this time, but I would like to highlight just one or two very important points I think that reflect upon some of the things that have been said here today.

Many of the questions that came from the committee, as well as some of the testimony, seemed to be based on an assumption that we don't know whether or not we can restore these fish, that we don't know whether or not it is feasible to remove the dams. I would point out that there have been over 7 years worth of very detailed, very specific scientific study done by Federal agencies that have reached the conclusion that, yes, the fish in the Elwha can be restored. I would refer to one of the attachments in my testimony for more details on that.

This analysis by the Federal fish and wildlife agencies is backed up by additional studies and reports and analyses by other entities, including the tribe, including FERC itself in their draft EIS, includ-



ing a report by the GAO. So, I want to make sure that the committee is clear when they talk about the possibility of fish restoration, that it's not just a possibility. It is a capability. It is completely feasible to fully restore the salmon runs to the Elwha.

The second point that I would want to make is questions regarding whether or not dam removal is feasible. We heard from the engineer with the tribal panel, and he would be better able to answer specific questions. But I think that that point needs to be very much emphasized that dam removal is feasible, that this is not some wild idea that some environmentalists sitting in Seattle or Washington, D.C. or anywhere else dreamed up, but this is completely feasible and capable with existing technologies and existing engineering practices.

The third point that I want to make and they talk about the replacement power. There are many questions about whether or not in the current energy situation in the Northwest if it's feasible and if it makes sense to take a power producing source off line. I would respond in a couple of ways, but first I would say that it is important to keep in context how power these two dams produce or how much they don't produce in comparison to the Northwest as a whole.

The power grid in the Northwest represents over 20,000 megawatts on average. These two dams produce 19 megawatts on average. So, you are talking about less than one one-thousandth of the entire power supply in the Northwest. Needless to say, it is a very small portion.

Nonetheless, if we are talking about removing the dams for fish restoration, how do you respond or how do our organizations respond to the question of can we afford to take any power resources off line?

The representative for Bonneville Power testified that they have 650 megawatts in their conservation opportunities in the next 10 years. What he didn't mention is that there is an additional 350 megawatts that are available that they have chosen not to pursue, but it is available. It is achievable. It is cost effective. It is cheaper than going out and building a new dam or new generating facilities of any kind. So, I think that in response to the question, can we afford to take these power sources off line, I would point to the ample opportunities in the Northwest for alternative means for filling these energy power needs.

Then the last question that I would want to emphasize is whether or not this is a wise investment. In the overall picture of what the Federal Government is trying to do, particularly under tight budgets and other issues, it doesn't make sense for the Federal Government to pursue this course of action on restoring the Elwha. I would point out three important, what I would feel are very compelling national reasons why this, in fact, is a priority for the Federal Government.

First of all, the Federal Government, as Senator Adams has pointed out a couple of times today, has already made a major national Federal commitment to restoration and enhancement of fishery resources in the Northwest. This restoration project fits very nicely into that overall strategy. If you look at the possibilities of restoration on the Elwha compared to other basins in the North-



west, the likelihood of success on the Elwha is extremely high. So, if you want to get your best bang for the buck on the Federal investment in fish in the Northwest, the Elwha is a very compelling place to do so.

Second that makes it a national interest is the national park issues that have been addressed fully, and I don't think I need to go into them other than to say that the Federal Government is making a strong commitment to national parks around the Nation, as well as the Northwest, and this restoration fits into that strategy.

Finally, the tribe is best able to address it, but the tribal treaty rights, as well as the Federal Government's trust responsibility to those tribes add to the compelling nature of this legislation.

So, I would conclude by saying that our organizations fully support the efforts on behalf of Senator Bradley, Senator Adams, Senator Gorton who is also signed on as a cosponsor, as well as members in the House delegation from Washington. We do have specific concerns that we think we can work constructively with the committee to improve the bill along the lines of some of the comments I have made, and we are eager to do so.

But I thank the committee for the opportunity to testify and would be happy to answer any questions.

[The prepared statement of Mr. Cantrell follows:]

PREPARED STATEMENT OF SHAWN S. CANTRELL, ASSISTANT NORTHWEST  
REPRESENTATIVE, FRIENDS OF THE EARTH, SEATTLE, WA

My name is Shawn S. Cantrell. I am Assistant Northwest Representative for Friends of the Earth, based in our Northwest office in Seattle, Washington. I appreciate the opportunity to testify today on S. 2527, the "Elwha River Ecosystem and Fisheries Restoration Act."

Today, in addition to Friends of the Earth, I am representing the position of the 15 conservation organizations which have intervened in the Federal Energy Regulatory Commission's (FERC) licensing proceedings for the Elwha and Glines Canyon hydroelectric projects located on the Elwha River. (see attachment 1 for a listing of these organizations.)

Mr. Chairman, the conservation community supports the intent and purposes of this legislation. It is our intent to work with you and this committee to pass a strong Elwha River Restoration bill year.

ORGANIZATIONAL INVOLVEMENT WITH THE ELWHA ISSUE

Conservation groups in Washington state have a long history of involvement with the Elwha River. One of the very first outings conducted by the Mountaineers was a expedition up the Elwha in 1907. In the years that have followed that early trip, the Elwha River and its magnificent valley has remained a very popular destination for the members of our organizations. Hiking, camping, boating, fishing, picnicking, and wildlife viewing along the Elwha continue to be important activities for our members, as well as for other visitors from around the world.

Our members were also instrumental in the establishment of Olympic National Park, which encompasses most of the Elwha basin. The management of and conditions within Olympic National Park remain priority issues for our organizations. We continue to participate in a full range of citizen forums, committees, and advisory groups regarding the park.

Our direct involvement with the issues surrounding the two hydroelectric projects on the Elwha River formally began in 1986, when four of our organizations intervened in the FERC licensing proceeding. In 1990 and 1991, a additional eleven conservation groups were granted intervenor status by FERC. In May, 1991, we filed an appeal in the U.S. Ninth Circuit Court of Appeals against FERC, challenging FERC's legal jurisdiction to issue a new operating license for the Glines Canyon dam.

## OVERVIEW OF THE ELWHA RIVER ECOSYSTEM

Eighty years ago, the Elwha River was synonymous with salmon. Flowing steeply down from the heart of Washington state's Olympic mountains, the Elwha River offered ideal conditions for anadromous (ocean-migrating) fish—clean and cold water, extensive beds of gravel in which fish can build their nests called redds, and no insurmountable obstacles to upstream passage.

Prior to 1911, the Elwha was one of only a few rivers in the entire Pacific Northwest to support all five species of Pacific salmon (chinook, coho, sockeye, pink and chum), along with three species of anadromous trout (steelhead, cutthroat, and Dolly Varden). When the adult pink salmon returned to the river to spawn, they would number over 250,000. Among the region's Native American people, Elwha chinook salmon held legendary status, often exceeding 100 pounds. The other species of Elwha salmon were also impressive in size and number, contributing to one of the finest anadromous fisheries resources in the nation.

These fish were central to the ecology of the Elwha watershed. So many varieties and numbers of anadromous fish meant a roast and reliable food chain. The National Park Service has identified 22 species of birds and animals, including cougars, black bears and bald eagles, which fed on the salmon. The spawned out carcasses also returned rich nutrients to the soil, providing tons of natural fertilizer for the vegetation along the river banks. This process extended a surprising distance from the river and its tributaries, as animals dragged carcasses from the stream for good distances into the brush to be devoured.

The Elwha River forms the largest watershed within Olympic National Park. Established by Congress in 1938, the purpose of the park is to reserve and protect the "... primeval forests ... [and] the native Roosevelt elk and other wildlife indigenous to the area." One of the great treasures of the American people, Olympic National Park is a unique combination of ocean shores, temperate rain forests, mighty rivers, alpine meadows, rugged mountains and glaciers. Over 95 percent of the park is in designated wilderness, including the majority of the Elwha watershed. In recognition of these facts, the park has been designated an International Biosphere Reserve and a World Heritage Site by the United Nations.

## THE PROBLEM

Unfortunately, the complex and diverse ecosystem of the Elwha was tragically altered by the construction of two hydroelectric dams on the river. Between 1911 and 1914, the 105-foot high Elwha dam was constructed five miles from the mouth of the river. In 1926, the 210-foot high Glines Canyon dam was erected at river mile 12 of the Elwha. Built without any fish passage facilities such as fish ladders, these two dams have completely blocked access to the middle and upper reaches of the Elwha River for all anadromous fish runs.

Together, these dams decimated the fabled salmon runs of the Elwha. Sockeye salmon in the Elwha are now extinct. Pink salmon, once numbering over 250,000 returning spawners, have been reduced to less than 100 adults. And the runs of chinook, coho, chum, steelhead, cutthroat and Dolly Varden are similarly depressed. What was once one of the finest salmon rivers in the country is now at serious risk of seeing all of its anadromous fish stocks driven to extinction.

The loss of salmon access to spawning areas above the dams has had a corresponding, detrimental impact on the animal and plant species in the Elwha basin. Without the salmon to feed on, numerous species must forage elsewhere for food. And the vegetation in the Elwha watershed above the dams has suffered from the loss of the rich nutrients once supplied by decaying salmon carcasses.

In addition to blocking fish passage upstream to pristine river habitat, the dams have also prevented the downstream movement of gravels and other bedload materials to the lower river, the delta, and ocean shoreline. This has resulted in the few remaining miles of river accessible to salmon being robbed of vital gravels needed for successful spawning. The natural clam beds at the mouth of the river have also been decimated by the lack of replenishing materials from upriver.

And perhaps the most costly aspect to date for the U.S. taxpayers is the loss of natural gravel recruitment to Ediz Hook. A natural gravel spit which extends into the Strait of Juan de Fuca to form the natural harbor of Port Angeles, Ediz Hook was formed in large part by rock and other materials naturally flushed down the Elwha River. Today, more than 13,000 cubic yards of material are being lost annually from this spit, largely due to the blockage of the river by the two dams. Well over one million dollars has been spent to date by the U.S. Army Corps of Engineers to try to halt and correct the erosion of Ediz Hook.

-SUAGEE DEC.



It is also important to note that the Glines Canyon project lies wholly within Olympic National Park. The presence of a hydroelectric dam within the park is clearly incompatible with the purposes and goals of the park. Thus we maintain that when the 50-year operating license for the Glines Canyon project expired in 1976, the dam became an illegal intrusion on Olympic National Park. As I noted earlier, the conservation organization intervenors have filed an appeal in federal court challenging FERC's legal jurisdiction to issue a new operating license for the Glines Canyon dam. In two legal opinions released in 1990, the General Accounting Office (GAO) agreed with our position, stating that the dam cannot receive a new license due to its intrusion on the park.

In addition, the two dams have had disturbing impacts on the Lower Elwha Klallam Tribe. In 1855, when the Tribe signed the Treaty of Point No Point with the U.S. government, they retained the right to fish the river in perpetuity. Yet by blocking fish passage to most of the river, the dams have effectively negated the Tribe's treaty rights to fish there.

#### THE CASE FOR RESTORATION

Today, despite the devastating impacts these dams have had on the Elwha River fisheries and ecosystem, there is good news. After seven years of study, federal resource agency biologists concluded in March, 1990 that all of the Elwha anadromous fish runs can be restored to the river. They determined that the prospect for restoring native runs are "good" for all species except sockeye and spring chinook, which are rated as at least "fair." (see attachment 2)

Corresponding analyses and reports by the Tribe and by GAO, and even FERC's own draft Environmental Impact Statement for the projects, have reached the same basic conclusion: restoring Elwha River salmon is feasible.

Restoring the Elwha River ecosystem is of compelling regional and national significance. Salmon in the Northwest are the subject of great social, cultural, and economic impact. Students in grade school learn with pride the story of the magnificent journey of salmon, from natal stream to the ocean and then back home again. Recreational and commercial fishing have been central to the Northwest way of life since the arrival of the first white settlers. Entire Native American cultures revolve around salmon. And the economic benefit salmon harvests have provided to the Northwest is in the billions of dollars.

In light of the importance of Northwest anadromous fish and the "at-risk" status of many of these runs, Congress has established numerous programs to assist with fisheries restoration and enhancement efforts throughout the region. The federal government has recognized the importance of these salmon runs to the nation and is currently spending millions of dollars each year in the Northwest to reverse the decline in salmon and steelhead populations.

The opportunity to restore the bountiful salmon runs to the Elwha is in keeping with this recognized national priority of protecting and enhancing Northwest anadromous fisheries. Furthermore, the Elwha River represents the single best opportunity to restore salmon anywhere in the entire Northwest. This is due to the combination of pristine habitat protected within the park and the ability to remove the only obstacles to access that habitat. The scientific evidence is overwhelming: the Elwha River salmon runs can be successfully restored.

There is also a compelling national interest in restoring the ecosystem of Olympic National Park. This is an historic opportunity to restore an internationally recognized ecosystem damaged by past exploitation. This would be of benefit to the countless fish, wildlife and plants species in the park, as well as the millions of tourists who visit the park.

In addition, restoration of the Elwha is in keeping with the United States' trust responsibility to the Lower Elwha Klallam Tribe. The Tribe retains treaty-reserved fishing rights on the Elwha, and restoring the anadromous fish runs to the river would be consistent with protecting those rights.

It should also be noted that if power generation at the dams were to be discontinued as part of a restoration plan for the Elwha, it would have significant impact on the power supply for the local Port Angeles community or the Northwest as a whole. The power supply for the region (WA, OR, ID, MT) is over 20,000 megawatts; the combined average output of the two dams is approximately 19 megawatts, or less than 1/1,000 of the total power on the Northwest grid. Furthermore, the Bonneville Power Administration (BPA), in its draft Resource Program, has identified over 1,000 megawatts of cost effective conservation which is currently available and achievable in the Northwest. Thus the potential loss of 19 megawatts from the Elwha dams could easily be replaced by BPA through conservation acquisition and without the need for any new generating facilities.



This unique combination of factors—a federal commitment to restoring anadromous fish, the presence of the dam in a national park, the tribal treaty rights, and the availability of cost-effective replacement power—add up to a compelling case for Congress to act to restore the Elwha. Since 1989, the conservation community has advocated a negotiated solution to the Elwha River controversy. We have pressed for restoration of the Elwha both before FERC and in federal court, and we will continue to pursue all our legal options. But we firmly believe that it is Congress which is best situated to resolve this issue through comprehensive legislation which addresses the legitimate concerns of all parties.

It is in the best interests of the environment, Olympic National Park, the Tribe, the local community, and the nation as a whole that Congress resolve this ongoing controversy through timely legislation mandating restoration of the Elwha River ecosystem while protecting local jobs and the economy.

#### S. 2527. THE ELWHA RIVER ECOSYSTEM AND FISHERIES RESTORATION ACT

We applaud the sponsors of S. 2527, Senators Bradley, Adams, and Gorton, for recognizing the urgent nature of this issue and their leadership in bringing together all parties to craft a comprehensive solution. The conservation community strongly supports the intent and purposes of this bill. It represents the desire of our organizations and others to find a constructive solution to a long-running problem. Without such a solution, this issue is likely to remain mired in protracted litigation for several years.

In order to better accomplish the intent and purposes of this bill, the conservation community urges certain changes in S. 2527 to clarify and strengthen key provisions.

Specifically, we recommend S. 2527 be amended as follows:

Delete language in Sections 2, 3, and 4 which recognize a "right" to generate power at the projects. One of the principle issues in the FERC licensing proceeding and in our legal appeal before the court is the question of whether any such "right" exists. We acknowledge the companies' property rights in the project real estate; it is the assertion of a "right" to generate power currently contained in the bill which we believe is contrary to existing federal law and would create an unacceptable precedent. It is our firm belief that this bill should be "legally neutral," and not establish any precedent for other project licensing proceedings.

Include language in Section 8(a) which recognizes project removal as the primary alternative or analysis by the Task Force in preparing the restoration plan. The bill should reflect the conclusions of the numerous existing federal agency studies and reports on the Elwha dams which indicate that only removal of the projects can successfully restore wild salmon runs to the Elwha, that project removal is feasible, and that concerns regarding the local economy and water quality can be addressed under a project removal scenario. Legislation to restore the Elwha should be based on these facts and not go back to square one, re-inventing the wheel.

Include language in Section 8(c) to include as members of the Task Force two representatives of the conservation organizations which have intervened in the FERC proceeding for the projects. We have specific expertise and unique interests in the development of the restoration plan not represented by any of the current Task Force members. For over six years, both the local and national conservation organizations have played a central and valuable role in advocating for restoration of the Elwha River ecosystem; it is fully appropriate that we have a voice in the development of the Elwha restoration plan.

Delete language in Section 12 which would allow the state to "veto" the entire restoration plan by refusing to enter into an instream flow agreement. While we appreciate and support the intent of language to protect Elwha River instream flows necessary for fisheries restoration, the current language creates a much larger problem than it attempts to solve.

Amend language in Section 12 to protect "existing water quality" instead of "high quality water." The current language is very subjective and difficult to quantify; our recommended new language is a more objective and quantifiable term which would provide a more definable measure of water quality.

It is the intent of the conservation organizations I represent here today to work with you and this committee, Mr. Chairman, as well as with all the members of the Washington state delegation to pass a strong Elwha River restoration bill. There is an urgent need to act now; the fish in the Elwha can't afford to wait for several more years while protracted legal battles are fought out in the courts. We have an

rare opportunity to rectify an ecological tragedy by restoring the fisheries and ecosystem of the Elwha River.

In conclusion, Mr. Chairman, I would state that this legislation can provide a positive solution to an issue which is vital to the interests of the Northwest and the nation as a whole. I thank you for your interest in this matter and for the opportunity to present our views to you and the committee. I would be happy to respond to any questions you may have.

[Attachment 1]

CONSERVATION ORGANIZATION INTERVENORS FOR THE ELWHA RIVER PROJECTS FERC  
# 588 AND #2683)

*Intervened in 1986*

Friends of the Earth  
Olympic Park Associates\*  
Seattle Audubon Society  
Sierra Club

*Intervened in 1990*

Trout Unlimited\*

*Intervened in 1991*

American Rivers  
Friends of the Elwha  
Long Live the Kings  
Mountaineers  
National Parks and Conservation Association  
National Wildlife Federation  
Northwest Conservation Act Coalition  
Northwest Rivers Council  
Olympic Rivers Council\*  
Washington Wilderness Coalition

\* Indicates organizations also presenting separate testimony.

Note.—The following table was submitted by the U.S. Department of Commerce, National Oceanic and Atmospheric Administration, Office of the General Counsel, GCNW, Seattle, WA.

[Attachment 2]

| Species                | Restoration prospects    |                           |
|------------------------|--------------------------|---------------------------|
|                        | Without dams             | With dams <sup>1</sup>    |
| Steelhead              |                          |                           |
| Winter .....           | Good .....               | Fair <sup>2</sup>         |
| Summer .....           | Good .....               | Fair <sup>3</sup>         |
| Coho .....             | Good .....               | Fair <sup>4</sup>         |
| Chinook                |                          |                           |
| Spring .....           | Fair <sup>5</sup> .....  | Poor/Unknown <sup>6</sup> |
| Summer/Fall .....      | Good .....               | Poor/Unknown <sup>7</sup> |
| Pink .....             | Good .....               | None <sup>8</sup>         |
| Chum .....             | Good .....               | None <sup>9</sup>         |
| Sockeye .....          | Fair <sup>10</sup> ..... | None <sup>11</sup>        |
| Searun Cutthroat ..... | Good .....               | Unknown <sup>12</sup>     |
| Dolly Varden .....     | Good .....               | Unknown <sup>13</sup>     |
| Shellfish .....        | Good .....               | Poor <sup>14</sup>        |

<sup>1</sup> Because habitat in the deltas, impoundments, and scour zones remains inaccessible; stream temperatures are elevated due to reservoir heating; nutrient transport is impaired; and cumulative stress causes additional mortality, it is not possible to achieve ecosystem restoration under the dam retention alternative.

<sup>2</sup> Prospects may be greater depending on the degree of reservoir related mortality imposed on downstream migrants. Late run winter steelhead may be "poor/unknown." The Tribe has additional reservations about the chances of passage restoration for steelhead.

<sup>3</sup> As with winter steelhead, prospects may be greater depending on the degree of reservoir-related mortality imposed on downstream migrants. Conversely, reservoir-related temperature increases in the lower river may adversely affect summer steelhead adults to a greater degree than winter steelhead adults.

<sup>4</sup> As with steelhead, prospects may be greater depending on the degree of reservoir-related mortality imposed on downstream migrants. The Tribe has additional reservations about the chances of passage restoration for coho.

<sup>5</sup> Constraining factors include broodstock availability and difficulties with artificial propagation.

<sup>6</sup> Poor to unknown prospects mainly because of potential adult passage losses and uncertainty over broodstock availability. Possible late outmigration timing, and resultant downstream passage problems in the reservoirs, add to restoration uncertainties. The Tribe has additional reservations about the chances of passage restoration for chinook.

<sup>7</sup> Poor to unknown prospects mainly because of late outmigration timing and possible problems with reservoir-related mortality. Potential adult passage losses and prespawning mortality also add to restoration uncertainties. Resolution of concerns about reservoir related mortality and adult passage would markedly improve restoration prospects. The Tribe has additional reservations about the chances of passage restoration for chinook.

<sup>8</sup> Reservoir-related losses of downstream migrants would likely preclude development of an upriver run.

<sup>9</sup> As with pink, reservoir related losses of downstream migrants would likely preclude development of an upriver run.

<sup>10</sup> Constraining factors include broodstock availability and difficulties with artificial propagation.

<sup>11</sup> Downstream and upstream passage problems, coupled with limited broodstock availability and difficulties with artificial propagation, are expected to preclude development of an upriver run.

<sup>12</sup> Little information exists regarding the response of this species to upstream and downstream passage facilities.

<sup>13</sup> As with searun cutthroat, little information exists regarding response to upstream and downstream passage facilities.

<sup>14</sup> Continued reduction of habitat is expected to severely limit restoration prospects.

Senator AKAKA. Are there any further comments or questions?  
[No response.]

Senator AKAKA. As Chair, I would like to thank this panel and thank the other four panels that preceded you on your statements on S. 2527, a bill to restore the Olympic National Park and to restore the Elwha River ecosystem and fisheries in the State of Washington. All of your testimonies will be helpful. On behalf of the committee, I want to thank all of you who participated as witnesses and all of you who are attending because of your interest in this bill. I want to say thank you very much. The committee looks upon your testimonies as being helpful to what will happen. I thank you again very much for your appearance here.

The hearing is adjourned.

[Whereupon, at 12:23 p.m., the hearing was adjourned.]



## APPENDIXES

### APPENDIX I

#### Responses to Additional Questions

DEPARTMENT OF COMMERCE,  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION,  
NATIONAL MARINE FISHERIES SERVICE,  
Silver Spring, MD, June 24, 1992.

HON. J. BENNETT JOHNSTON,  
Chairman, Committee on Energy and Natural Resources, U.S. Senate, Washington,  
DC.

Dear Mr. Chairman: Thank you for your letter regarding our testimony on S. 2527, a bill to restore Olympic National Park and the Elwha River ecosystem and fisheries in the State of Washington. Enclosed with your letter were two questions for the National Marine Fisheries Service (IFS) from Senator Murkowski:

*Question 1.* How many other Federally owned dams in the U.S. have been removed because of concerns or impacts to fish and wildlife resources?

Answer. NMFS limits its involvement with Federally-owned dams to those affecting its trust fishery resources. Thus, we have concentrated primarily on anadromous fishery resources of the Columbia River Basin. We have no records showing that Federally-owned dams have been removed in this area or elsewhere because of impacts on fishery resources.

*Question 2.* Please provide a list of other dams in the U.S. where fish and wildlife resources are also threatened because of dams.

Answer. We do not have a listing of this type. It is apparent, however, that nationwide, there are thousands of impoundments, dams and other water retaining structures which affect fish and wildlife resources. A survey of licensed non-Federal hydroelectric projects by our Northwest Regional Office identified 41 dams in that area, all affecting migration of anadromous fish adversely.

In 1985, the American Fisheries Society (AFS) published the proceedings of: "A Symposium on Small Hydropower and Fisheries." This 497-page report includes several case histories and covers numerous issues relating to effects of dams on natural resources. It is available from AFS in Bethesda, Maryland 20814.

We appreciate your concern for the Nation's fishery resources.

Sincerely,

WILLIAM W. FOX, JR.,  
Assistant Administrator for Fisheries.

#### RESPONSE OF THE LOWER ELWHA S'KLALLAM TRIBAL COUNCIL TO QUESTIONS FROM SENATOR MURKOWSKI

*Question.* According to your written testimony the Tribe has requested clarification regarding the scope of liability assumed by the United States as proposed by this bill. Please provide your estimate of the liabilities resulting from damages caused by the dams to the Tribe's fishery.

Answer. From the time the lower dam (Elwha Dam) was erected in 1910-1914, the Tribe's treaty-secured right to take anadromous fish has been infringed upon, diminished and, in the instance of some species, destroyed. Both the construction of the Dams, which resulted in a total barrier to anadromous fish reaching tribal fishing areas, as well as the continued operation of the Dams without fish passage facilities for almost 80 years, have caused significant and quantifiable injury to the

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Tribe's fishery. Private parties, including the current Dam owners, constructed and operated the Dams thereby causing the injuries and, therefore, would be among the parties liable to the Tribe for the injuries they caused.

The extent of damages, a dollar valuation of the harm, and apportionment of liability has not been determined by a court of law. Although the United States, in its role as trustee to the Lower Elwha S'Klallam Tribe, previously preserved the tort claim for past injury, it has not filed an action on the Tribe's behalf to date.

*Question.* The Department of the Interior's position relative to the restoration of the Elwha River Basin is that the cost of the project should be borne by the beneficiaries of the project. As a beneficiary of this proposal, what do you think your share should be?

*Answer.* If the Department of the Interior is saying that those who benefited from the hydropower project over the years should pay for the river restoration, the Tribe's position is that it was not a beneficiary but rather the party that subsidized the "cheap power" through destruction of its economic and cultural base. On the other hand, if the Department is suggesting that those who may benefit in the future should contribute to the river's restoration, the Lower Elwha S'Klallam Tribe anticipates making an in-kind contribution towards that restoration. When the actual removal of the Dams is undertaken, the Tribe expects that it will need to implement additional and significant restrictions on its Treaty-guaranteed fish harvesting opportunity in order to restore the anadromous fish stocks to the Elwha River. The Tribe accepts that its opportunity to fish may be restricted for at least 10 years and is willing to pay that price in order to restore the runs. In addition, the Tribe expects to contribute through its fish hatchery programs to the restoration of the River. The Tribe operates the only facility on the Elwha River capable of rearing stock specific fish throughout their development from egg to out-migrating smolts.

RESPONSE OF DAISHOWA AMERICA CO., LTD., TO QUESTIONS FROM SENATOR  
MURKOWSKI

*Question 1.* The Department of Interior's position relative to the restoration of the Elwha River Basin is that the cost of the project should be borne by the beneficiaries of the project. As a beneficiary of this proposal, what do you think your share should be?

*Answer.* Insofar as Daishowa America is concerned, the thrust of S. 2527 is an acquisition by the Federal Government (in this case, the Secretary of Interior) of all right, title and interests of Daishowa America and James River Corporation in two operating hydroelectric facilities that, for over 60 years, have functioned as an integral part of the Port Angeles Pulp and Paper Mill. Notwithstanding the complexities of the current FERC licensing proceedings, the Elwha and Glines Canyon Dams are today valuable assets, and they would continue to be valuable assets after relicensing by FERC.

The approach taken in S. 2527, which represents a negotiated compromise of many competing interests, is that the Federal Government would acquire the respective interests of James River and Daishowa America in the Elwha and Glines Canyon Dams for fair and adequate consideration—in the form of (i) assumption of all further operating and ownership responsibility for the projects and (ii) "Project Replacement Power" supplied to the Port Angeles Mill. Because the rates established for Project Replacement Power, as set forth in Section 6 of the Bill, were calculated to reflect as closely as possible the levelized cost of power production from the Hydroelectric Projects, if they were in fact relicensed by FERC, the value of the Project Replacement Power over the 40-year term should be approximately the same as the economic value of the Hydroelectric Projects, if fully licensed. This is in effect an agreed condemnation transaction, in which the Federal Government acquires private property rights for fair and adequate consideration.

Daishowa America's Port Angeles Mill will not derive any particular benefit as a result of this legislation or the restoration of the Elwha River Basin as contemplated by S. 2527. Rather, it is being asked to forfeit its interests in an operating hydroelectric facility and the low cost power generated by the Dams so that other public purposes may be served. The quid pro quo is that Daishowa America will receive in return fair value in the form of Project Replacement Power.

Having said that, it should be noted that Daishowa America is, in fact, prepared to make a substantial financial contribution to the public policy goals of this legislation. The replacement power rates calculated for purposes of section 6 of the Bill reflect assumed capital investments for fisheries mitigation, if the Dams were reli-