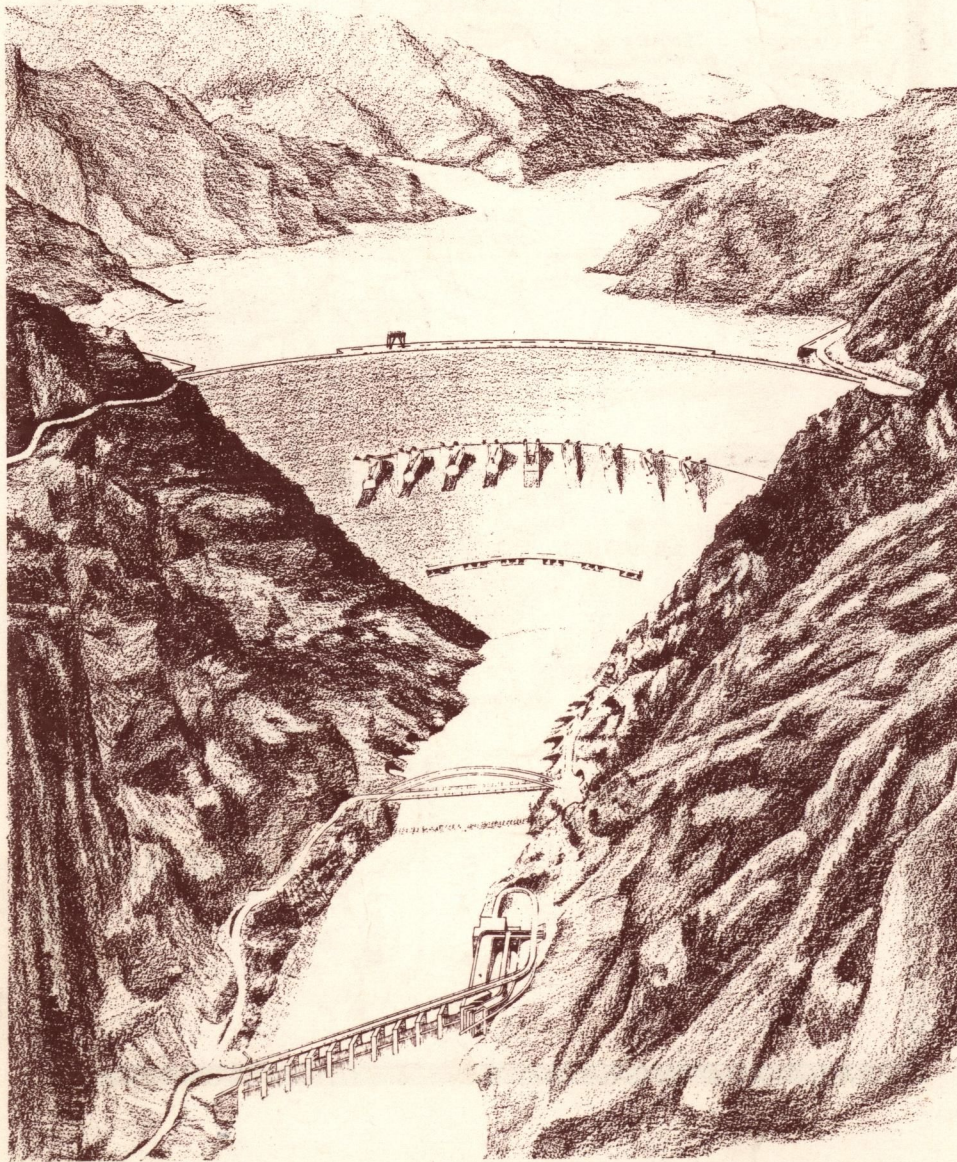


● *What Does Nez Perce Mean to YOU ?*



More Jobs



Higher Income



Lower Taxes



Controlled Rivers



Expanded Recreation



Enhanced Fishery

PUBLIC UTILITY DISTRICT NO. 1 OF KICKITAT COUNTY
GOLDENDALE, WASHINGTON

February 5, 1962

THE NEZ PERCE PROJECT AND NORTHWEST ECONOMY

(Information of interest to community leaders).

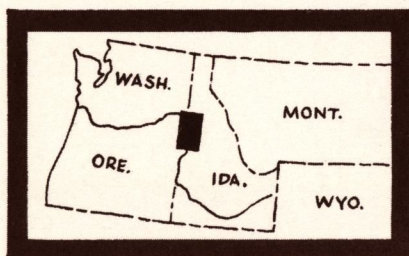
Enclosed you will find a copy of our booklet,
"What Does Nez Perce Mean to You?".

We would be most pleased if you could have
time to study this important power problem. The
facts, I am sure, will be of interest to you. This
is a project which is vital to our whole Northwest
economy.



Emmet E. Clouse
General Manager

Enclosure



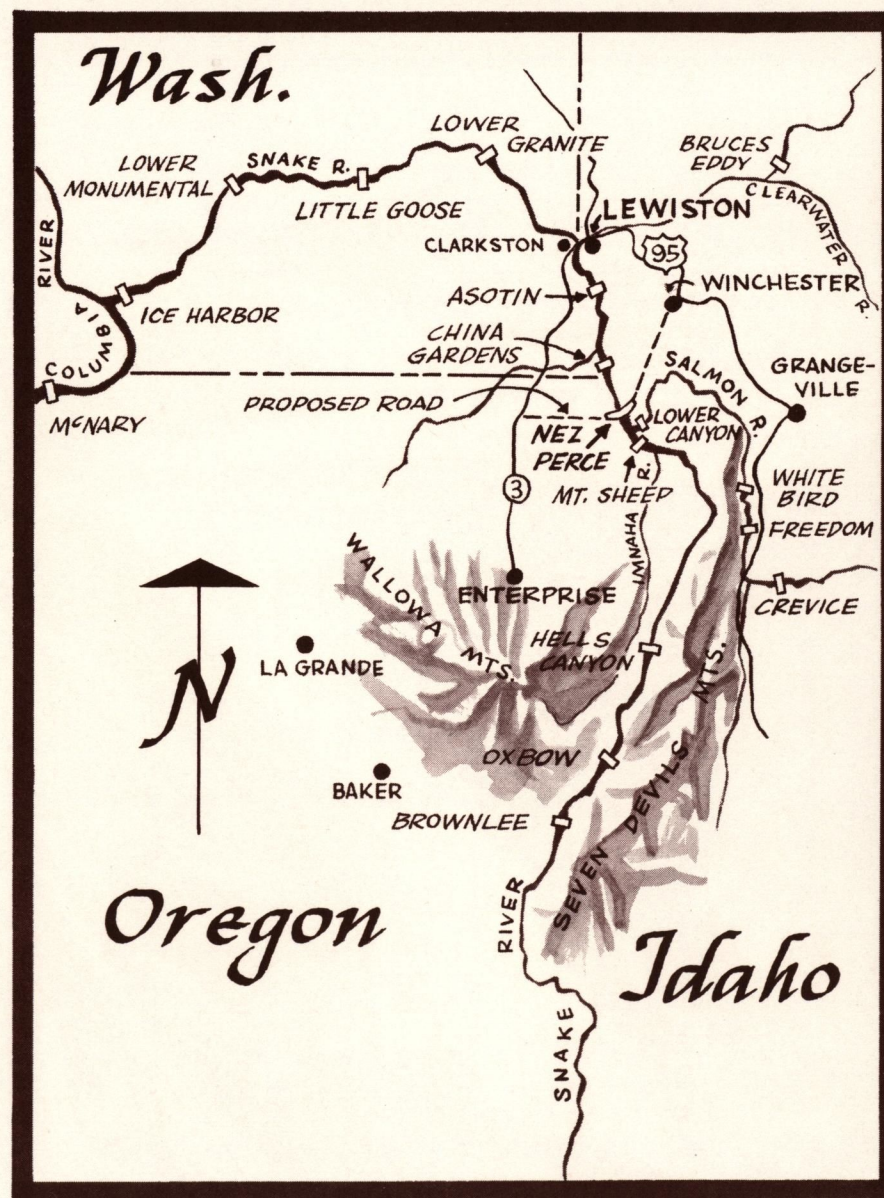
LOCATION MAP

Washington Public Power Supply System and its affiliated utilities have prepared this brochure in the hope of promoting better understanding of the Nez Perce Project in terms of benefits to individual residents of the entire Pacific Northwest region. For additional details concerning the Supply System, its affiliated utilities and the Nez Perce Project, please address inquiries to:

WASHINGTON PUBLIC POWER SUPPLY SYSTEM

130 Vista Way

Kennewick, Washington



General Information

WHAT IS THE NEZ PERCE PROJECT AND WHERE WILL IT BE LOCATED?

The Nez Perce Project is a multi-purpose dam recognized by the U.S. Corps of Engineers, Federal Power Commission and the Oregon Hydroelectric Commission as the most comprehensive means of developing the Middle Reach of the Snake River and its tributaries, the Salmon and Imnaha Rivers. It will be located between Oregon and Idaho in the Snake River Canyon 47 miles south of Clarkston, Washington and Lewiston, Idaho. (See map on facing page).

HOW DOES THE NEZ PERCE PROJECT COMPARE WITH OTHER HYDRO PROJECTS?

Nez Perce Project will include the largest arch dam and generating plant in the Western Hemisphere. Its installed capacity will be greater than that of Grand Coulee and even exceed the combined capacity of all TVA dams on the Tennessee River and its tributaries. Power costs will be less than from any undeveloped site in the Northwest.

WHO HAS PROPOSED TO BUILD THE NEZ PERCE DAM?

Washington Public Power Supply System has applied for a license to build Nez Perce Dam. This application, sponsored by 56 consumer-owned utility systems throughout the Pacific Northwest, is currently pending before the Federal Power Commission.

WHEN WAS THE APPLICATION FOR A LICENSE TO BUILD THE NEZ PERCE PROJECT FILED?

The Nez Perce license application was filed March 13, 1960, more than two years after the FPC had declared the Nez Perce Project desirable and feasible for construction by a non-federal agency. The Nez Perce application by the consumer-owned utilities is motivated by their individual self interest for a low-cost power supply and the compelling obligation to insure maximum development of the region's water resources.

HOW WILL THE NEZ PERCE PROJECT BE FINANCED?

The consumer-owned utilities sponsoring the Nez Perce Project will sell revenue bonds to be secured by long-term power sales contracts with utilities, industries and other Nez Perce power users. The financing of Nez Perce does not depend on appropriations by Congress.

WILL TAX FUNDS, FEDERAL OR STATE, BE USED TO FINANCE THE NEZ PERCE PROJECT?

No. Power revenues, not taxes, will pay all costs of the Nez Perce Project.

WILL THE SUPPLY SYSTEM PAY TAXES?

Yes. Applicable state and local taxes will be paid by the Supply System. Because the Supply System is a non-profit organization, federal and other profit taxes would not be applicable, since there

would not be any profits to tax.

ISN'T THERE A COMPETING APPLICATION TO THE NEZ PERCE PROPOSAL?

Yes. A license application has been filed by the Pacific Northwest Power Company for the High Mountain Sheep Dam to be located on about the same reach of the Snake River approximately three miles upstream from the Nez Perce site. The Mountain Sheep Dam would have about half the power capabilities and useful reservoir storage of Nez Perce.

WHERE DOES THE LOWER CANYON DAM COME IN?

The Lower Canyon Dam, which would be located on the Salmon River just above its confluence with the Snake River, is a "paper dam" used by PNPC to try to build up the benefits of High Mountain Sheep to equal those of Nez Perce.

PNPC has stated that it has no present plans to construct Lower Canyon Dam because of fish passage problems. In other words, Lower Canyon is a "now-you-see-it, now-you-don't" proposition which slides in and out of the PNPC plan depending on the audience and the time.

The High Mountain Sheep-Lower Canyon combination, if it were ever implemented, would require the construction of two dams, each approximately the same size as Nez Perce. Obviously, costs would be greater without offsetting benefits and the fish passage facilities more costly and complex than at Nez Perce.

Studies by the U.S. Corps of Engineers show that of six possible plans of development for the Middle Snake River, the plan incorporating Nez Perce provides the maximum economic value.

WHAT IS PACIFIC NORTHWEST POWER COMPANY?

Pacific Northwest Power Company, which has proposed High Mountain Sheep Dam, is a combine of four private utility companies operating primarily in Montana, Washington and Oregon. PNPC is not an operating utility, but was formed primarily for purposes of obtaining a license for a project in the Middle Reach of the Snake River.

WHAT HAS BEEN DONE BY PNPC IN ITS EFFORTS TO OBTAIN A LICENSE FOR A PROJECT IN THE MIDDLE SNAKE?

In 1955, PNPC applied for a license to build Low Mountain Sheep and Pleasant Valley Projects which would have been located in the same reach of the Snake River as High Mountain Sheep Dam.

After extensive hearings and despite the fact that there was no competing application, PNPC was denied a license for the Low Mountain Sheep-Pleasant Valley Projects. In denying the application, the Federal Power Commission cited the superiority of the Nez Perce Project and invited PNPC to apply for a license to construct Nez Perce Project. PNPC chose to ignore this invitation and in 1958 filed an application to build High Mountain Sheep.

What the Nez Perce Project Means to Him

For the Head of the Family - - -

It's a Matter

of Economics



HOW WILL THE NEZ PERCE PROJECT BE OF SPECIFIC BENEFIT TO THE AVERAGE WAGE EARNER?

An abundance of low-cost power has been a stimulus to the Northwest's economic development. This economic advantage can be maintained only through wise utilization of our remaining hydro-electric resources. Nez Perce is the best of all remaining undeveloped hydro sites in the Columbia Basin.

The benefits to be derived from the Nez Perce Project as they relate specifically to the average wage earner are twofold: (1) an immediate stimulus to the economy from the construction of the project, and (2) the long-range benefits from low-cost power.

The impact of the actual construction work on the Nez Perce Project will be reflected in terms of new payrolls for Northwest workmen including laborers, ironworkers, mechanics, carpenters, cement workers, electricians, operating engineers,

boilermakers, pipefitters and others. In addition, benefits will accrue directly to Northwest suppliers of such materials as lumber, steel, aluminum as well as for transportation, warehousing and other services.

The fact that the Nez Perce Project will have twice the output of the Mountain Sheep Project insures that a correspondingly larger number of workmen, more materials and services will be required with a resulting increase in the size of payrolls to Northwest residents.

In addition to the immediate stimulus to the region's economy from the construction of the Nez Perce Project, the more lasting benefits from the availability of low-cost power to be generated by the project are most significant.

Some 40 electro-process industrial plants are located in the three Northwest states to take advantage of the region's low-cost electrical energy. Included are eight aluminum plants with a total annual capacity of more than 700,000 tons. One new plant and one plant expansion representing a combined annual capacity of an additional 125,000 tons are currently under active consideration. Other electro-process plants located in Oregon, Washington and Idaho include 3 chlorine, 1 caustic, 4 ferro-alloy, 3 steel rolling, 1 ingot forging, 7 steel casting, 2 calcium carbide, 3 elemental phosphorus, 1 hydrogen peroxide, 1 artificial abrasives, 4 copper and zinc and 2 titanium, zirconium and other rare metals plants.

The Nez Perce Project, by contributing an additional source of low-cost power, would help maintain this influx of power-consuming industries to the long term-benefit of the entire Pacific Northwest.

A forecast of the anticipated growth of Pacific Northwest electro-process industries during the next 20 years indicates that power requirements will increase four times. These industries will need to make the fullest possible use of low-cost hydroelectric power to the extent it will be available. The need for power from the Nez Perce Project and other low-cost power sources in helping to meet this demand from the electro-process industry for electrical energy is readily apparent to all of those who are concerned about our industrial growth.

WHAT IS THE HISTORIC RELATIONSHIP BETWEEN ABUNDANT LOW-COST POWER AND POWER-CONSUMING INDUSTRIES?

Nearly one-third of the nation's aluminum capacity is located in the Pacific Northwest because of the availability of low-cost power.

For such industries, electricity is a vital ingredient in the production process. Proximity to markets, convenience to transportation facilities, or availability of essential raw materials are major factors in plant location. But access to an abundance of cheap power has been the principal inducement for locating these plants in the Northwest.

Because of the natural advantages of the site, the cost of Nez Perce power will be low. In addition, power from the Nez Perce Project will be sold at cost to Northwest utilities and industries, to further insure the greatest savings.

The importance of low-cost power to the economy of the Northwest region has been demonstrated conclusively by the offering of so-called "surplus" power made to industries recently by the Bonneville Power Administration. This offer resulted in the acquisition of two new industries and expansion of two existing plants. The response indicated that demand was three times greater than the available supply could accommodate. It proved conclusively that there was a shortage, not a surplus, of firm power.

HOW CAN I EXPECT TO REALIZE ANY TAX BENEFITS FROM THE NEZ PERCE PROJECT?

As a result of making available to the Northwest, particularly to new industries, an abundant source of low-cost power, the entire tax base will be broadened greatly for the benefit of everyone. New industries pay their own way taxwise in addition to creating new payrolls and stimulating the general economy.

The Supply System itself, as the operator of the Nez Perce Project, will pay taxes, also. Both public and private utilities pay state and local taxes.

It also should be remembered that electrical bills for schools, street lighting, city and county agencies are paid with tax dollars. Low-cost Nez Perce power will result in low rates and provide tax benefits by keeping the cost of these services low.

WILL THE NEZ PERCE PROJECT BE SUBSIDIZED BY THE FEDERAL GOVERNMENT AND THEREBY INCREASE MY TAXES?

No. As a non-federal, local public agency, the Supply System will finance the construction of the Nez Perce Project through the sale of revenue bonds rather than by any form of governmental appropriation. Money to finance Nez Perce will be obtained from private money market sources.

WHAT ABOUT RATES—IS THE COST OF ELECTRICITY SUPPLIED BY CONSUMER-OWNED UTILITIES LOWER THAN POWER DISTRIBUTED BY PRIVATE UTILITIES?

Yes. From the consumer's standpoint, the difference in distribution systems might be compared to owning your own home vs. renting. It is less costly to own a home than rent because of the fact that you are acquiring an equity in the property.

As a customer of the consumer-owned utility system, the individual acquires an equity. Normally, the major costs of a system and its facilities are paid for in a period of about 45 years. From then on this debt-free system is confronted only with operating expenses, which results in even lower cost power. In addition, subsequent generations continue to enjoy this debt-free advantage. Under the private utility system, the consumer continues to pay "rent" indefinitely in addition to operating expenses which include a profit to the company's stockholders.

Wholesale power costs represent at least 50 per cent of the ultimate cost to the average residential consumer. Thus, the cost of distribution is a major factor in determining electrical rates.

WHAT IS MEANT BY NON-PROFIT OPERATION?

Consumer-owned utilities operate on a non-profit basis. That is, they do not pay a profit to stockholders. Income from a project like Nez Perce would be used to retire outstanding bonds, establish a reserve fund for future needs or emergencies or reduce rates.

WILL THE NEZ PERCE PROJECT JEOPARDIZE THE CONSERVATION OF OUR WATER RESOURCES?

No. On the contrary, the Nez Perce Project will insure full protection of the water resources of the Snake and Salmon Rivers. Water from these rivers represents "perpetual motion" in providing the energy to generate power from a project like Nez Perce. In reality this water resource is now being wasted because there is no project to take advantage of the potential power available.

A hydroelectric project represents the ultimate degree of conservation. By utilizing water power, we are also conserving such expendable fuels as oil and gas. The water resources of the Snake, Salmon or any other river are self renewing. That is nature continues to make this resource available on a continuing basis. Utilization of water for power production does not remove any value from the resource.

What the Nez Perce Project Means to Her

For Mrs. Average Homemaker - - - It's Cost, Convenience, Safety

I'M CONCERNED ABOUT COSTS, TOO, BUT STRICTLY AS THEY APPLY TO MY HOUSEHOLD, HOW WILL NEZ PERCE HELP ME?

Nez Perce will be the best possible insurance for keeping your electrical rates at the lowest possible level. In granting a license for the construction of the Nez Perce Project, the Federal Power Commission will be insuring comprehensive development of the best remaining site in the Columbia Basin System.

Developing the best site to produce the most power at the lowest possible cost is the answer for the individual homeowner as well as industry. You need more power every year to run your household, just the same as commercial customers do.

IN SPITE OF LOW ELECTRICAL RATES, HOW DO YOU EXPLAIN THE FACT THAT MY ELECTRICAL BILLS SEEM TO INCREASE EVERY YEAR?

The average family's increased use of new and improved electrical appliances, labor-saving devices and lighting means far greater consumption of electrical energy over the years. Thus despite lower rates, the monthly bill may increase. As use increases, power generating costs become an ever-increasing percentage of the consumer's electrical bill. For example, wholesale power costs represent only 50 percent of ultimate cost for the average residence, but in an all-electric home, especially where space heating is involved, the cost of manufacturing electricity jumps to approximately 75 per cent of the bill. Therefore, Nez Perce being a source of low-cost power at the wholesale level, will insure low rates to the consumer.



I LIKE THE CONVENIENCE OF PUSH-BUTTON ELECTRICAL APPLIANCES AND HOPE TO HAVE MORE OF THEM, BUT I'M CONCERNED ABOUT HAVING PLENTY OF POWER. WILL NEZ PERCE HELP INSURE A POWER SUPPLY FOR ALL OF US?

Yes. Everyone wants and needs more power. That's why Nez Perce is so vital to everyone. It will add the most attractive undeveloped site to the region's power supply and will prove beneficial for hundreds of years.

The Nez Perce Project's average annual production of electrical energy will be sufficient to meet the needs of more than one million Pacific Northwest households, even though residential consumers in the Northwest use more than twice as much electrical energy as comparable consumers nationally.

I'M ALSO CONCERNED ABOUT SECURITY— THAT IS, PROTECTION FROM FLOODS SUCH AS THE TERRIBLE VANPORT DISASTER IN 1948. WILL NEZ PERCE HELP SAFEGUARD US FROM SUCH CATASTROPHIES?

Nez Perce, by virtue of its strategic location below the confluence of the Snake and Salmon River, represents the ideal means of controlling the waters of both rivers with a single, multi-purpose project.

This location is the basis for the statement by the U.S. Army Corps of Engineers that the "Nez Perce Project... is regarded as the most desirable in the reach of the Snake River between Weiser and Lewiston. Its large storage capacity and location below the mouth of the Salmon River would make it especially effective in regulating the run-off from both streams." The Nez Perce project will be an important factor in attaining the goal of the Army Engineers to regulate the maximum flows at The Dalles to 600,000 cubic feet per second, approximately 60 per cent of the partially controlled flood waters which caused the Vanport disaster.

The Nez Perce reservoir will be one of the largest in the United States, impounding 6.6 million acre-feet of water to provide maximum flood control storage and protect the lower reaches of the Columbia River, particularly below Bonneville Dam. Industrial sites, agricultural land and other valuable property, including homesites, would be protected from a recurrence of the devastating floods of previous years, which cost many lives and millions of dollars in damage.

The High Mountain Sheep reservoir, by contrast, would impound only 3.6 million acre-feet of water, approximately one-half of the storage capacity of Nez Perce. More important, however, High Mountain Sheep would not control the Salmon River, by far the more serious flooder of the two major rivers.

HOW WILL NEZ PERCE INSURE THE SECURITY OF MY FAMILY'S INCOME?

Basically Nez Perce means more job opportunities, new payrolls, greater security by attracting permanent new industries. Your family will enjoy greater security in any event, whether you are directly involved in the construction work or as a supplier of materials and services, or indirectly as the general economy of the region improves with a new source of low-cost power to attract industry and payrolls.

WILL MY CHILDREN BENEFIT FROM NEZ PERCE, ALSO?

Yes, because they, too, have a stake in comprehensive development of the Middle Snake River. They would benefit from total conservation of all resources—power, flood control, recreation. Nez Perce has the built-in advantage of representing an all-time benefit by providing comprehensive development.

The service life of a hydroelectric plant has been generally accepted as 100 years, which is 50 years beyond the period required to pay for it. Thus even lower cost power will result from such plants after they are paid for.

What the Nez Perce Project Means to Us

For the Family - - - It's Recreation



WE ARE INTERESTED IN RECREATION. WILL NEZ PERCE HAVE RECREATIONAL FACILITIES?

Yes. The Nez Perce plan of development provides for four recreational sites: The inspiring dam structure itself rising more than 700 feet above the river bed, the Imnaha upper pool at the mouth of Pumpkin Creek, Pittsburg Landing at the Mouth of Kurry Creek and Whitebird and vicinity on the Salmon River. Facilities are to be provided for camping, picnicking, fishing, hunting and boating in addition to spectacular sightseeing such as the nearby Wallowa Mountains.

DO YOU ANTICIPATE A GREAT INFLUX OF TOURISTS AS A RESULT OF THIS DEVELOPMENT?

Conservative estimates indicate that the Nez Perce development will attract 400,000 tourists annually. Access roads to the Nez Perce site as well as the three-pronged reservoir itself will open up what is now an almost inaccessible area. At present a mere 4,000 visitors are able to take advantage of this remote area each year.

By increasing tourism at least one-hundredfold in the Nez Perce reach of the Middle Snake, it has been conservatively estimated that at least \$1,240,000 would be injected annually into the economy of the adjacent region for the benefit of the entire Pacific Northwest.

WHAT PROTECTION WILL BE GIVEN AGAINST OVERDEVELOPMENT AND INTENSE COMMERCIALIZATION OF THE NEZ PERCE AREA?

The recreational development of the Nez Perce site and reservoir areas will be planned and carried out by appropriate federal and state agencies. This insures that development of recreational facilities will have the utmost consideration for the public's interest.

The entire concept of the Nez Perce recreational area will be undertaken with the public in mind. At present the Middle Reach of the Snake River has, of necessity, been the private domain of only the most rugged of sportsmen. New roads, campsites, picnic grounds and other facilities will provide everyone with an opportunity to visit and enjoy this natural playground.

COULD YOU BE MORE SPECIFIC AS TO WHAT TYPES OF RECREATIONAL EXPERIENCE WE MIGHT EXPECT TO ENJOY IN THE NEZ PERCE AREA?

BOATING: The three-pronged Nez Perce reservoir would extend 62 miles up the Salmon River, 61 miles up the Snake River and 10 miles up the Imnaha River, providing a surface area of approximately 30,000 acres. This area is at present largely inaccessible because the hazardous river access and lack of adequate roads. The Nez Perce development would open up more than 120 miles of scenic canyon to boats of all sizes. It is the belief of various authorities who have studied the recreational potential of the area that sightseeing by boat would become the reservoir's most significant recreational use.

Boating has become the most rapidly expanding pasttime in the nation during recent years. This trend is even more accelerated in the Pacific Northwest where facilities already available to the residents have spurred the sale of boats and recreational supplies to new highs.

CAMPING AND PICNICKING: Overnight facilities would be available at all major points of access in the Nez Perce reservoir area. A number of small side streams entering the reservoir would become exploration points for boat campers and small campsites could be located in such areas for their convenience.

FISHING: It is anticipated that such warm water species as bass and perch as well as native trout would find agreeable habitat in the Nez Perce reservoir. Sports fishing would be another outstanding recreational attraction in the area.

HUNTING: Already on the increase, hunting, should be greatly stimulated by the creation of the Nez Perce reservoir. This would allow boat-hunting and mean easier removal of game from the Canyon than is now possible.

SIGHTSEEING: Proposed approach roads would provide outstanding vistas, including a number of dramatic views of the reservoir, the dam itself and the nearby snow-capped peaks of such spectacular mountain ranges as the Wallowas in Oregon and the Seven Devils in Idaho. The imposing Nez Perce dam structure would be a major sightseeing attraction, also.

WOULDN'T THE HIGH MOUNTAIN SHEEP PROJECT ALSO INCLUDE RECREATIONAL FACILITIES?

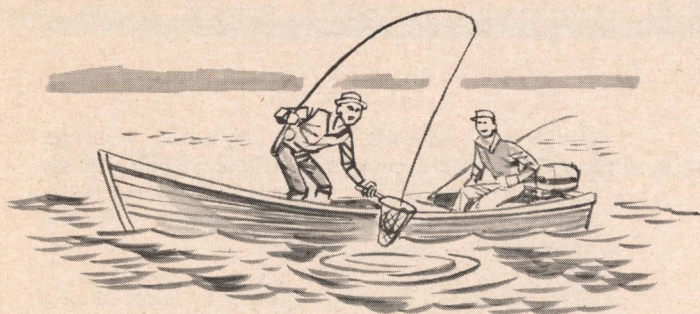
The chief difference between the Mountain Sheep and Nez Perce recreational developments would be the greater scope of the Nez Perce plan.

Whereas Nez Perce would allow single access by boat to a 136-mile scenic waterway, the High Mountain Sheep plan would provide less than half the reservoir area for boating and other recreational pursuits.

The fishing potential of the larger Nez Perce reservoir would be greater because of its continuous nature and easier access.

The Nez Perce Project would provide at least 100,000 more man days of initial recreation use than High Mountain Sheep, and thus Nez Perce will mean a correspondingly greater economic return to the adjacent area.

Is There a 'Fish Problem' at Nez Perce? *For the Sportsman - - - It's Conservation*



CAN YOU SUCCESSFULLY PASS FISH OVER A HIGH DAM LIKE NEZ PERCE?

Yes. Detailed proposals made by the Supply System are based on successful experience elsewhere for passing adult salmon above Nez Perce to their spawning grounds and bringing the fingerlings back downstream. The plans, supported by expert testimony, are on file with the Federal Power Commission. The Supply System's proposal anticipates an investment of 30 million dollars, nearly twice that at any other Northwest project, and a willingness to have the plans tested prior to installation.

IS THERE A "FISH PROBLEM" AT HIGH MOUNTAIN SHEEP?

Yes, indeed. The "fish problem" at High Mountain Sheep is identical to that of Nez Perce, except for the magnitude of the salmon runs involved. To maintain the fish runs on the Snake and Imnaha Rivers, the salmon would have to pass over a high dam at Mountain Sheep, also. In the case of Nez Perce the fish runs are greater because of the Salmon River, but the problem is identical. The Supply System's proposal would save the historic salmon runs on the Snake River, whereas the proponents of High Mountain Sheep are willing to "write off" this valuable natural resource.

ARE MORE FISH INVOLVED AT NEZ PERCE THAN AT OTHER DAMS IN THE NORTHWEST?

All downstream hydroelectric projects on the Snake and Columbia Rivers are confronted with greater numbers of migratory fish than would be the case at the Nez Perce Project. Eventually, at least ten projects, including Bonneville, The Dalles, John Day, McNary, Ice Harbor, Lower Monumental, Little Goose, Lower Granite, Asotin and China Gardens will be faced with the problem of handling greater numbers of fish than Nez Perce.

EXACTLY WHAT ARE THE PLANS FOR PASSING FISH AT NEZ PERCE?

Briefly, the proposal calls for providing passage for the adult upstream migrants by means of a conventional fish ladder, passing them through a fish lock into the reservoir where they will proceed to their spawning grounds.

The tiny fingerlings migrating downstream are to be collected at the headwaters of the reservoir. They will then be transported safely downstream through the reservoir in specially equipped barges and finally released into the river below the dam, all without handling.

For additional details on the fish collection and passage facilities proposed for the Nez Perce Project, please write the Supply System for a free copy of a special brochure on this specific subject.

ISN'T THE HEIGHT OF THE LADDER THE FISH WILL HAVE TO CLIMB AT NEZ PERCE TOO GREAT?

No. Although Nez Perce Dam will rise 700 feet, the fish ladder only reaches a height of 200-300

feet to the fish lock. Experiments conducted by the U. S. Fish and Wildlife Service prove that there is no limit to the height to which an adult fish will climb. These tests allowed a blueback salmon to climb 6,000 feet and chinook and blueback salmon and steelhead trout to climb 1,000 feet without hesitation. Fatigue was not a factor and the authorities concluded that the energy expended by a fish in climbing a well-designed ladder is essentially the same as in normal swimming in a stream.

WHAT IS THE "FISH LOCK" AND HOW DOES IT WORK?

This device, located in the dam, allows adult upstream salmon to pass through the structure into the reservoir at a point considered by biologists to be ideal from the standpoints of temperature, water quality and current. The "fish lock" has been thoroughly tested in laboratories as well as in actual use at McNary Dam.

HOW CAN YOU BE CERTAIN THE FISH WILL FIND THEIR WAY THROUGH THE NEZ PERCE RESERVOIR?

Once in the reservoir above the dam, the adult upstream migrating fish seek their own home tributaries leading to their spawning grounds where they complete their life cycles. There is no known explanation of the homing ability of anadromous fish like the salmon. However, by the time these fish have reached the Nez Perce site they have completed a 1,000-mile journey up the Columbia River.

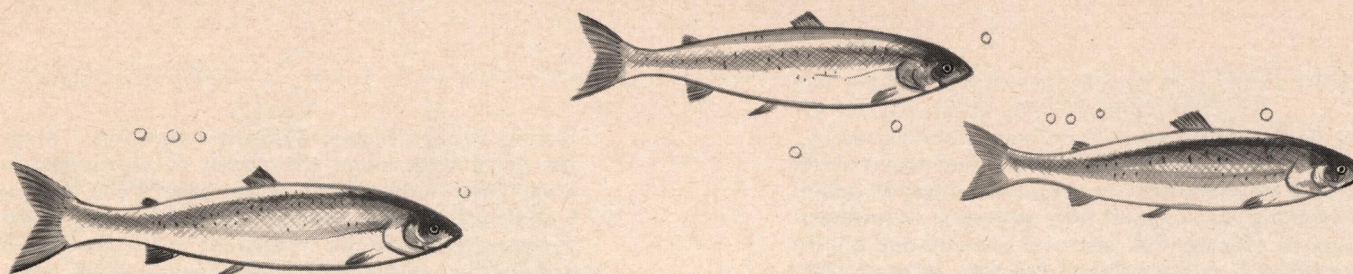
During this prolonged upstream migration, these fish have first found the mouth of the Columbia River after having been out at sea in the Pacific Ocean for several years. Secondly, they have bypassed innumerable tributaries to the Columbia and finally selected the Snake River, where there must have been considerable inter-mixing of the waters from the two rivers.

WILL MANY OF THE DOWNSTREAM MIGRATING FINGERLINGS BE LOST AS A RESULT OF THE NEZ PERCE DAM?

No. Far less of these tiny downstream migrants will be lost at Nez Perce than at any project downstream on the Snake or Columbia Rivers where they do not have any facilities whatsoever for handling fingerlings. The louver collection system and barge transportation system through the reservoir proposed for Nez Perce eliminates such in-reservoir problems encountered at all other major hydro projects as predators, disease, pollution, unfavorable temperature conditions and passage through the turbines.

PLEASE EXPLAIN THE LOUVER COLLECTION SYSTEM.

The heart of the Nez Perce proposal for handling the tiny downstream fingerlings is a collection system at the head of the reservoir on the Salmon and Imnaha Rivers which embodies the louver system. The louver system resembles a series of vertical venetian blinds set at a scientifically predetermined angle to create a current to which the tiny fish are extremely sensitive. The current diverts the fingerlings into a bypass canal where they are collected for transportation downstream through the reservoir.



The success of the louver already has been demonstrated conclusively at Tracy, California, where it was proved better than 97 per cent effective in handling more than 12 million fingerlings annually. Other projects which utilize the louver system include Mayfield Dam on the Cowlitz River in Washington and the Ideal Cement Company Project on Rogue River near Gold Hill in Oregon.

HAVE THE PROPONENTS OF NEZ PERCE "WRITTEN OFF" THE SALMON RUNS IN THE SNAKE RIVER?

By no means. "Writing off" the Snake River salmon runs refers to the widely circulated rumor that there will be no salmon in the Middle Snake because of the apparent failure of fish passage facilities at the Idaho Power Company's complex of projects. The proponents of Nez Perce definitely do not subscribe to the theory of "writing off" fish runs anywhere—including the Middle Snake River.

HOW CAN THE FISH RUNS ON THE MIDDLE SNAKE BE REHABILITATED SUCCESSFULLY?

The proposals for handling fish at Nez Perce can be used to rehabilitate the salmon runs at the existing Oxbow and Brownlee Projects as well as

the Low Hells Canyon Dam, now under construction.

WHAT IS THE INTERIOR DEPARTMENT'S PROPOSAL TO RESEARCH AND TEST FISH PASSAGE FACILITIES?

Secretary of Interior Stewart Udall proposed that a program of research and testing be undertaken on a greatly accelerated basis. This program would be conducted under the supervision of the Fish and Wildlife Service with the cooperation of the state fish and game agencies. The Supply System is also cooperating fully with the responsible agencies in the research and testing program.

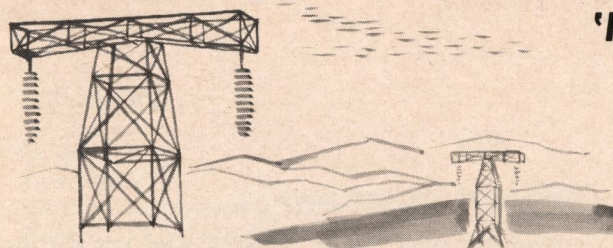
WHAT FACTORS WILL DETERMINE THE FUTURE OF FISH RUNS IN THE COLUMBIA AND ITS TRIBUTARIES?

Overfishing, pollution, predation and disease are the chief factors in determining the future of Columbia Basin fish runs. These problems must be solved to insure maintenance of the present runs.

HOW WILL THE NEZ PERCE PROJECT ENHANCE THE FISHERY RESOURCES OF THE COLUMBIA RIVER?

By providing safe passage for downstream migrants, by reducing predation in the reservoir and by releasing colder water for the upstream migrants.

The Need for More Power



IS THERE A REAL NEED FOR POWER IN THE NORTHWEST?

Yes. An analysis of the supply and demand for electrical energy in the Pacific Northwest indicates that even with all authorized hydroelectric projects coming into production as well as the New Production Reactor at Hanford and the projects to be built as a result of the Canadian Storage Agreement there will be a continuing shortage of power starting in 1964-65.

The defeat of the reactor in Congress and the delay in implementing the Canadian Storage Agreement intensified this shortage of power, making doubtful the availability of these potential new resources of low-cost power. At the present rate of growth, even the Nez Perce Project, with its average annual production in excess of 10 billion kilowatt hours of energy, would only be able to accommodate the load growth of the region for a two-year period.

WHAT IS THE RELATIONSHIP BETWEEN CANADIAN STORAGE PROJECTS AND NEZ PERCE?

The feasibility of the Nez Perce Project is in no way dependent on decisions made with regard to the Canadian Storage Agreement. Power from the Upper Columbia River Storage Projects will be needed in addition to Nez Perce.

'Need' vs. 'Surplus' Creates Confusion

WHAT ABOUT THE INTER-REGIONAL CONNECTIONS AND NEZ PERCE?

High voltage, high capacity inter-regional transmission lines have been proposed for the marketing and utilization of seasonal power which temporarily may have no market in the Northwest due to the intermittent nature of its availability. These lines call for inter-connection of the Northwest's power supply with adjacent regions. Studies have shown the Pacific Northwest-Pacific Southwest Intertie would result in substantial benefits to the region and be sound from engineering and economic standpoints.

The financial feasibility of the Nez Perce Project does not depend on the markets that would be created by the inter-regional tie lines. Nez Perce, like all other hydroelectric plants in the Northwest, would have, at times, excess capacity and energy which could be sold or exchanged in adjoining regions to the financial benefit of the Northwest and at the same time make a contribution to the conservation of expendable resources.

WHAT ABOUT THE HANFORD REACTOR AND NEZ PERCE?

The addition of power facilities to the Hanford New Production Reactor now under construction is for the purpose of utilizing waste heat and, on the schedules contemplated, would be available to supply new industrial loads prior to the availability of Nez Perce power. The delay or failure to obtain this low cost energy source will create a greater urgency for Nez Perce power.

WHY SHOULD THE NEZ PERCE PROJECT BE BUILT WITHOUT DELAY?

We urgently need the flood control protection afforded by the Nez Perce Project as insurance against further devastating losses to life and property downstream particularly on the Columbia River below Bonneville Dam.

The benefits to be derived from an abundant source of low cost power in terms of industrial and economic development for the region and the entire country are far too important to waste our resources by delay or underdevelopment.

The early development of the Middle Snake will result in conservation of an irreplaceable resource.

WHAT ARE THE SPECIFIC COSTS OF DELAY?

Studies have been made to show the effect of delay in developing the Salmon River as proposed by PNPC under the High Mountain Sheep plan.

The cumulative costs to the region in terms of power benefits only for licensing High Mountain Sheep instead of Nez Perce during the period of 1967-68 and 2011-12 would range upwards to one half billion dollars. The cost in terms of flood control benefits during the same period could amount to 160 million dollars. There is no possible way of estimating the cost of delay in terms of increased recreational values foregone or inability to attract new industries to the region because of the

shortage of low-cost power.

WHAT EFFORTS HAVE BEEN MADE TO CAUSE DELAY IN LICENSING THE NEZ PERCE PROJECT?

The competing applicant for the alternative project has used the so-called "fish problem" at Nez Perce as the chief device in a campaign to delay licensing the Nez Perce Project.

The fish issue, developed over a four-year period and supported by seemingly unlimited financial resources and personnel, has been used to sidestep the real issue at stake in the Middle Snake River—comprehensive development of the last remaining site of low-cost power.

WHEN CAN WE EXPECT NEZ PERCE POWER TO BE ON THE LINE?

The licensing of the Nez Perce Project and decision when construction would start rests solely with the Federal Power Commission. Assuming that a license was issued in the summer of 1962 and considering that the law provides construction must start not more than two years later power should be available from Nez Perce in 1968-69.

The construction schedule proposed by the Supply System calls for the first power to be available 4-1/2 years after the start of construction. This schedule will allow both adequate time for the fish research and testing program and yet bring power on the line at a time of greatest need.

Nez Perce - High Mt. Sheep Comparative Statistics

LOCATION	NEZ PERCE	HIGH MT. SHEEP
River	SNAKE	SNAKE
River Mile	186.2	189.2
Distance to Lewiston, Idaho (miles)	47.	50.
Distance to Salmon River (miles)	2.5 below	.5 above
Approximate Air Miles To:		
Boise, Idaho	167	165
Portland, Oregon	266	266
Seattle, Washington	300	302
Spokane, Washington	132	134
HYDROLOGY (RIVERS)	SNAKE & SALMON	SNAKE
Design Flood (cfs)	500,000	300,000
Drainage Area (square miles)	88,700	74,700
Normal Annual Precipitation (inches)	17	16
Annual Average Runoff (acre-feet)	22,200,000	14,200,000
Annual Average Runoff (inches)	4.7	3.5
Average River Discharge (cfs)	30,600	19,000
Extreme Low Flow (cfs)	7,800	4,900
Extreme High Flow (cfs)	250,000	135,000
DAM AND RESERVOIR	NEZ PERCE	HIGH MT. SHEEP
Type of Dam	Arch	Arch
Type of Powerhouse	Underground	Surface
Maximum Height (feet)	700	670
Maximum Pool Elevation (feet, msl)	1,510	1,510
Normal Tailwater Elevation (feet, msl)	903	925
Gross Head (feet)	607	585
Reservoir Gross Capacity (acre-feet)	6,600,000	3,600,000
Pool Surface (acres)	31,500	17,000
Flood Control Storage (acre-feet)	4,700,000	
Initial Power Installation:		
Number of Units	10	5
Total Nameplate Rating (kilowatts)	2,000,000	875,000
Total Maximum Capacity (kilowatts)	2,235,000	1,000,000

DAM AND RESERVOIR

NEZ PERCE

HIGH MT. SHEEP

Ultimate Power Installation:

Number of Units	16	10
Total Nameplate Rating (kilowatts)	3,200,000	1,750,000
Power Production Initial Period:		
January Peak Capability, Minimum Year (Megawatts)	1,850	930
Avg. Annual Energy Generation (megawatts) <u>1/</u>	1,181	666
Avg. Annual Energy Generation (megawatt-hours) <u>1/</u>	10,345,560	5,834,000

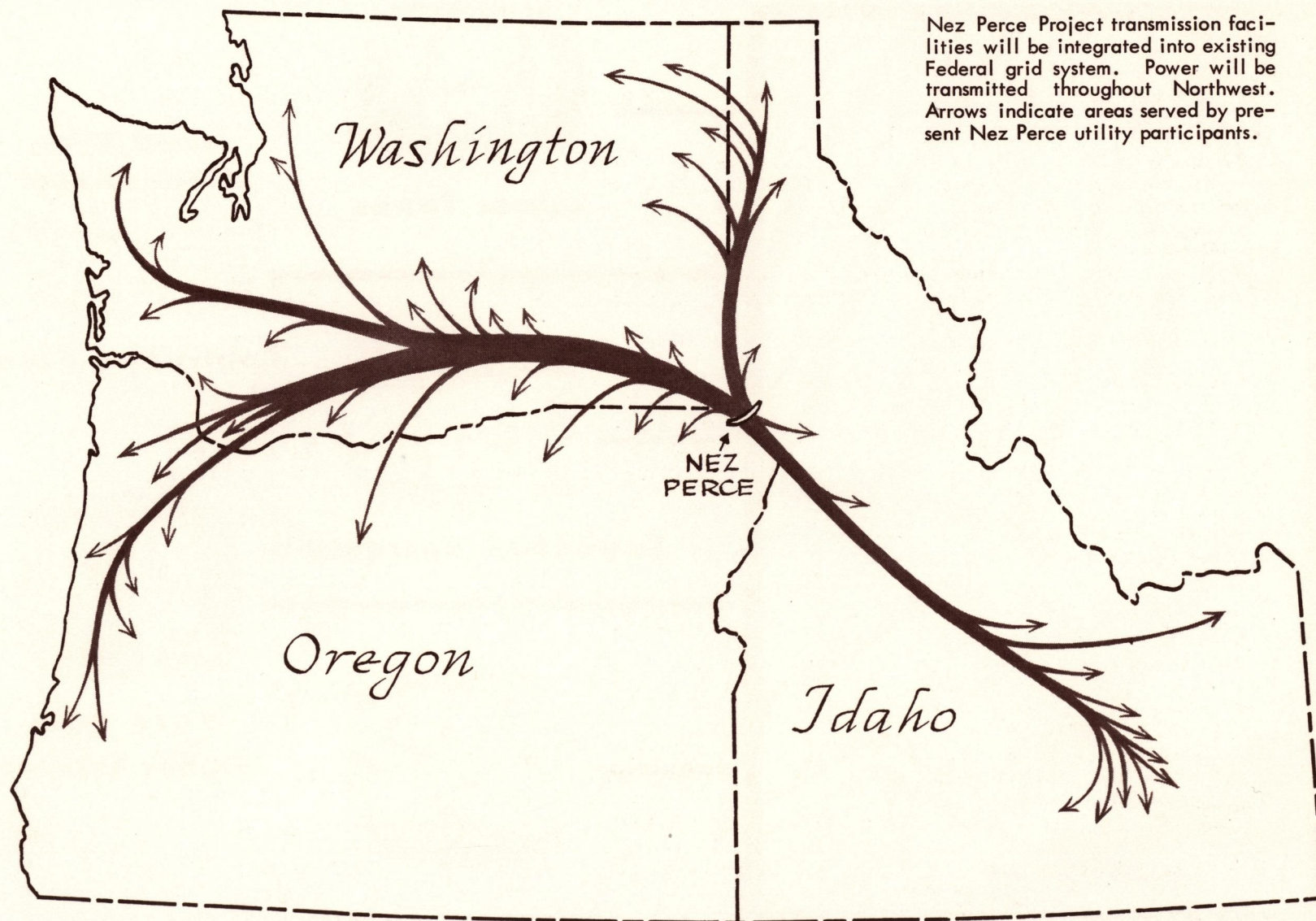
PROJECT COSTS

NEZ PERCE

HIGH MT. SHEEP

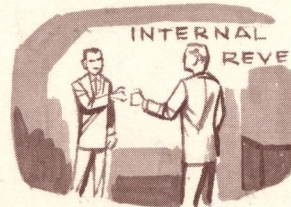
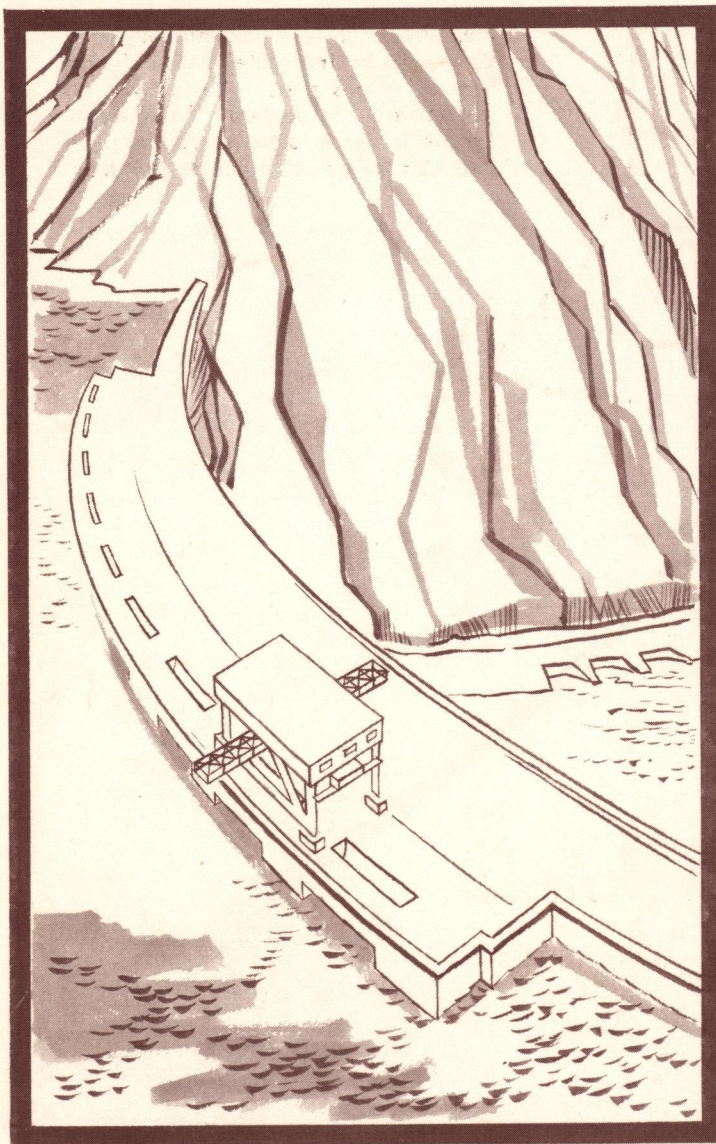
Land & Land Rights	\$ 8,048,000	\$ 4,500,000
Power Plant Structures and Improvements	22,727,000	5,500,000
Reservoirs, Dams & Waterways	115,471,000	64,985,000
Turbines, Governors, & Generators	47,060,000	22,300,000
Accessory Electrical Equipment	5,000,000	1,655,000
Misc. Power Plant Equipment	2,580,000	2,350,000
Roads & Bridges	7,885,000	7,100,000
Substation & Substation Facility	12,475,000	5,550,000
Upstream Fish Passage Facilities	13,086,000	—
Downstream Fish Passage Facilities	13,946,000	—
Contingencies (and escalation) for Fish Passage Facilities	4,055,000	—
Total Fish	31,087,000	19,700,000
Indirect Construction Costs (Included in above items)		5,675,000
Contingencies (and escalation) for Production and Transmission Plant	33,197,000	24,985,000
Engineering, Supervision and Overhead	22,370,000	5,300,000
Total Construction Cost	\$ 308,000,000	\$ 169,600,000

1/ For 20-year water period, 1928-1948.

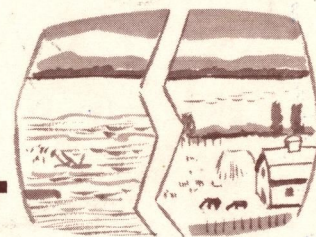


Nez Perce Project transmission facilities will be integrated into existing Federal grid system. Power will be transmitted throughout Northwest. Arrows indicate areas served by present Nez Perce utility participants.

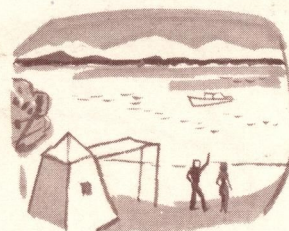
Nez Perce Dam: Key to Full Development of the Middle Snake River



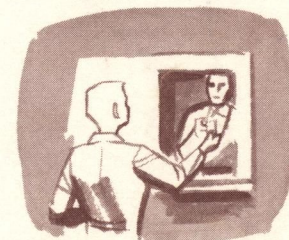
Lower Taxes



Controlled Rivers



Expanded Recreation



**More Jobs
Higher Income**



Enhanced Fishery

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