

10-16-72

BEFORE THE UNITED STATES
ATOMIC ENERGY COMMISSION

In the Matter of
Consolidated Edison Company of
New York, Inc.
Indian Point Station Unit No. 2.

}
Docket No. 50-247
}

MOTION TO RULE FINAL ENVIRONMENTAL
STATEMENT ON INDIAN POINT 2 INADEQUATE
IN CERTAIN RESPECTS AND TO REQUIRE
FURTHER FACTUAL EVIDENCE FROM THE STAFF.

Intervenors, Hudson River Fishermen's Association and Environmental Defense Fund, respectfully request that the Licensing Board rule that the Final Environmental Statement released by the Directorate of Licensing in September, 1972 is inadequate under 10 CFR 50, App. D, §D1 on the basis of its failure to consider the environmental impact of Indian Point 2 in the context of the operation of the steam electrical plants at Bowline Point and Roseton. The operation of these plants has already begun to effect the environment of the biota of the Hudson on which Indian Point 2 will make its major impact. The impact of Indian Point 2 can be rationally understood and weighed only if the effect of those plants is analyzed and set forth. Other executive agencies, Congress and the public can be informed of the environmental circumstances in which the impact of Indian Point 2 must be measured

only if the effect of the operation of Bowline Point and Roseton on the aquatic biota of the Hudson is set forth and analyzed. To this end the Staff must submit further evidence to the Board on Bowline and Roseton and the evidence of other parties on this issue must be ruled admissable at the hearing on environmental matters.

STATEMENT OF FACTS

Bowline Point is located 5 river miles below the Indian Point site. At Bowline Point there are now under construction two fossil fuel electrical generating units with a capacity of 620 megawatts each (Final Environmental Statement, III-9). Orange and Rockland Utilities has primary responsibility for the construction and operation of these units, but Con Edison will own two-thirds of the generating units and will receive at least two-thirds of the electrical power generated by the plants (Information supplied by Con Edison in informal discovery). The first unit is scheduled to go into operation for the summer of 1972 and the second unit is scheduled to go into operation in the summer of 1974 (LFES, III-8).

Both units at Bowline Point will operate with once-through cooling, withdrawing water from and discharging water to the Hudson Estuary. 768,000 gallons of water per minute

will pass through the condensers when the plant is operating at full capacity under normal conditions. The water passing through the condensers will be heated 13.5°F before being discharged to the Hudson (1 FES, III-9).

Roseton is located 22 river miles above Indian Point. At Roseton there are now under construction two fossil fuel electrical generating units with a capacity of 600 megawatts each (1 FES, III-8). Central Hudson Gas and Electric has primary responsibility for the construction and operation of these units, but Con Edison is a tenant in common with Central Hudson and will initially own 40% of the Roseton units although its ownership may decline to 0% by 2003. Con Edison will receive a percentage of the power generated by the Roseton units which is equal to its percentage of ownership (Information supplied by Con Edison in informal discovery). The first unit is scheduled to go into operation in November 1972 and the second in May 1973 (1 FES, III-8).

Both units at Roseton will operate with once-through cooling, withdrawing water from and discharging water to the Hudson. 650,000 gallons of water per minute will pass through the condensers when the plant is operating at full capacity under normal conditions. The water passing through the

condensors will be heated 15.4°F before being discharged to the Hudson (1 FES, III-9).

Both sites are within the spawning and nursery grounds of the Hudson fishery. Both plants are cooled by methods similar to that at Indian Point 2. Thus whatever effect Indian Point 2 may have on the Hudson fishery, a similar, additional impact may be expected from the operation of Bowline Point and Roseton. HRFA and EDF contend that the combined operation of Bowline Point, Roseton and Indian Point Units 1 and 2 will kill off approximately 56% of the annual striped bass production in the Hudson. This is an increase of 16% over the effect which has been estimated as resulting from the operation of Indian Point Units 1 and 2 alone. The factual basis for this contention is spelled out in the supporting affidavit of John R. Clark, submitted with this Motion.

The Staff's final environmental statement discusses the impact of Bowline Point and Roseton in describing the physical situation of the Indian Point plant (1FES, II-8), and in analyzing the heat load in the Hudson (1 FES, III-7 et seq.). The operation of the plants is also discussed and assumed in analyzing future sources of power supply (e.g., 1 FES, XI-2, 6). The final statement does not analyze the

impact of Bowline Point and Roseton in discussing the impact of power plant operation on fish and other aquatic biota in the Hudson (LFES, XII-42 through 44).

MEMORANDUM OF LAW
IN SUPPORT OF MOTION

The National Environmental Policy Act, 42 USC §4332(2)(C), and the regulations of the Atomic Energy Commission, 10 CFR 50, App. D, §§All, D1, require that every recommendation on the licensing of a nuclear power plant by the Commission -- an action which significantly affects the quality of the human environment -- must include a detailed statement on, inter alia, the environmental impact of the proposed action and the alternatives to the proposed action. The Atomic Safety and Licensing Board must determine whether the terms of NEPA and the AEC regulations have been met. 10 CFR 50, App.D, §§All, D1.

The first step in studying the impact of any proposed action on the environment must be to analyze and set forth what that environment is and will be during the period in which the proposed action will take place. For instance, if a nuclear power plant is sited on a river or lake quite different results would be anticipated than if

it is sited on an estuary. If it is sited on a river so polluted as to have no aquatic life its effect will be much different from what would be anticipated in a rich and pristine body of water.

Indian Point 2 will begin operating on a rich and valuable segment of the Hudson which is an important nursery ground for striped bass, white perch, tomcod, bay anchovy, smelt, blueback herring, alewife and Atlantic Silverside. (1 FES, V-25.) As the Intervenors have consistently contended, the Staff has estimated that the effect of the operation of Indian Point 1 and 2 on the striped bass, the most studied fish in the area, will be significant, decimating the annual production of the Hudson by 30 - 50%. (1 FES, V-48). In addition, two to five million fish will be killed annually at the intake screens to the plant. (1 FES, iii) All of this damage is the direct result of the present once-through cooling system.

Indian Point 2 will also begin operating on a reach of the Hudson which is undergoing extensive exploitation as a source of cooling water for stream electric plants. About 23 miles north of Indian Point the Danskammer plant has for some years been producing 500 MW of electricity and using the Hudson as a cooling source. Opposite Indian Point the Lovett plant has also been using the Hudson to cool the

condensers which produce 500 MW of electricity. By the middle of 1973 a vast expansion of that impact on the Hudson will take place. This summer the first 620 MW unit at Bowline Point, five miles downstream from Indian Point, began operation and it is using the Hudson for its cooling water. Con Edison owns two-thirds of Bowline Point. This fall, probably before hearings in this proceeding begin, the first 600 MW unit at Roseton is scheduled to begin operation. Next spring, probably before Indian Point 2 can reach full power, the second unit at Roseton will go on line. Both units are cooled by a single pass of Hudson water. Con Edison presently owns 40% of Roseton. Thus Indian Point 2 can only realistically be viewed as part of a massive exploitation of the River by Con Edison and its sister utilities. Of course, behind Indian Point 2 stands yet more demand on the Hudson -- Indian Point 3, probably the vast pumped storage project at Storm King, perhaps the plan to produce 2230 MW from nuclear plants at Verplanck a mile or so south of Indian Point.

The environment on which Indian Point will have its impact can only be rationally understood if some analysis is made of how that environment will be changed by the operation of the other plants on the River, particularly Bowline Point and Roseton, whose operation is now beginning and whose effects

are as clearly foreseeable as those of Indian Point. This point is an obvious and common sensical one. It was pointed out repeatedly by the state and federal agencies and private parties in their comments on the Staff's draft statement. N.Y.S. Department of Environmental Conservation, 2 FES 57-58; Department of the Interior, 2 FES 43; Federal Environmental Protection Agency, 2 FES 16; N.Y.S. Attorney General, 2 FES 89-90; Congressman Bingham, 2 FES 143; Congressman Dow, 2 FES 144-145. This analysis is crucial for two reasons. First, only in the light of such a full analysis can the AEC insure that it has before it the full record on which to base its decision as to what steps should be taken to protect the aquatic biota of the Hudson at Indian Point. Second, one of the essential purposes of the National Environmental Policy Act was to produce environmental impact statements which, by developing a full factual record, would give to the President, the Congress and the public, the information necessary to assure informed and rational decision-making at all levels of government. Both of these purposes of NEPA can be served only by an environmental impact statement on Indian Point 2 which considers the changes in the environment which can be anticipated as a result of the operation of Bowline Point and Roseton.

I. NEPA REQUIRES THE AEC TO DEVELOP A FULL RECORD INCLUDING THE CUMULATIVE IMPACT OF BOWLINE POINT AND ROSETON AS A BASIS ON WHICH TO REACH ITS DECISION.

By now it is axiomatic that an agency which prepares an environmental impact statement on a proposed agency action must develop a full factual record on which to base its statement and the decision which flows from the statement. Thus in considering alternatives to the proposed action, the agency must do more than simply consider the alternatives which are within its jurisdictional power, it must analyze and discuss the courses which it could not itself take but which might reasonably be taken by others. For instance in analyzing a proposed off-shore oil and gas lease, the Department of the Interior was required to consider not only other leases but other methods of producing the oil and gas such as a change in the oil-import quota scheme. Natural Resources Defense Council, Inc. v. Morton, ___ F.2d ___, 3 ERC 1558 (D. C. Cir. 1972). The scope of this analysis must be determined in the light of reason and does not require examination of remote and speculative possibilities. Id.

In the present case Intervenor ask only that the changes in the Hudson environment which will be caused by Bowline Point and Roseton be analyzed. The operation of the Storm King project is sufficiently far in the future and sufficiently uncertain so that the Intervenor believe that

it enters the realm of remote speculation. Indian Point 3 and Verplanck will, of course, receive later consideration from the AEC and may await that later analysis. But Bowline Point and Roseton will have effects on the Hudson in the immediate future and therefore must be analyzed in order to produce the full record required at Indian Point 2.

The question of multiple project analysis has been addressed in Natural Resources Defense Council, Inc. v. Grant, ___ F. Supp. ___, 3 ERC 1883, 1890 (E.D.N.C. 1972), in which the court held that the statutory phrase "significantly affecting the quality of the human environment" required that the Soil Conservation Service project under consideration be viewed in the context of the total array of projects planned for the area. "The cumulative impact with other projects must be considered." 3 ERC at 1890. Just as the Chicod Creek Project could only be understood as part of the multitude of plans and construction in eastern North Carolina, so Indian Point 2 can only be understood within the context of the other plants on the Hudson.

The AEC could properly consider the environmental impact statements of other agencies in its full analysis or take into account the studies of other agencies. NRDC v. Morton, supra, 3 ERC at 1563.

Unfortunately, such reliable studies are lacking

here. No final environmental impact statement on Roseton or Bowline Point has been filed with the CEQ by the Army Corps of Engineers or any other federal agency. The Corps did circulate in early 1971 a draft environmental statement on Bowline Point which was clearly inadequate on its face, having been drawn up by the applicant for the discharge permit. Greene County Planning Board v. FPC, 455 F.2d 412, 3 ERC 1595 (2d Cir. 1972). But the failure of other agencies to analyze these plants will not place a heavy burden on the Staff. The major combined effect of Indian Point, Bowline Point and Roseton will be on the aquatic biota of the Hudson. The heart of the Staff analysis on this issue has been the analysis of striped bass production. The effects of Bowline Point and Roseton on striped bass production can be calculated by the Staff on the basis of its model without additional research. The basic facts are to hand, only the calculations must be made.

The AEC must develop a full factual record on which to base its decision on whether the Indian Point 2 license should be denied, granted or granted with conditions. This is required both by the law of the administrative process and by the decisions under NEPA. Scenic Hudson Preservation Conference v. FPC, 354 F.2d 608 (2d Cir. 1965),

cert denied, 384 US 941 (1969); Greater Boston Television Corp v. FCC, 444 F.2d 841 (D. C. Cir. 1970); Calvert Cliffs Coordinating Committee v. AEC, ___ F.2d ___, 2 ERC 1779 (D. C. Cir. 1971). ("The requirement of environmental consideration 'to the fullest extent possible' sets a high standard for the agencies, a standard which must be rigorously enforced by the reviewing courts." 2 ERC at 1782). In this particular case a full record and one which will allow a rational decision by the Commission must take into account the effects of the Bowline Point and Roseton plants which will change, both in the short and long run, the environment on which Indian Point 2 will have its effect. This is the teaching of common sense, of the case law in NRDC v. Grant, and of the statute. Congressman Bingham, 2 FES 143; Congressman Dow, 2 FES 144-45. Such a record may well indicate the necessity of further conditions on the operation of Indian Point in addition to those recommended by the Staff in the Final Environmental Statement. It is therefore essential that this further analysis be provided by the Staff.

II. NEPA REQUIRES THE AEC TO DEVELOP A FULL RECORD INCLUDING THE CUMULATIVE IMPACT OF BOWLINE POINT AND ROSETON SO AS TO INFORM THE CONGRESS AND OTHER AGENCIES ON MATTERS RELEVANT TO POLICIES AND PROGRAMS WHICH COME BEFORE THEM.

One of the basic purposes of the National Environmental Policy Act is to provide information on the environmental

effects of a proposed action not only to the decision makers within the agency but to Congress, other executive agencies and the public. In this way present and future programs and policies of other agencies can be modified to minimize or eliminate environmental damage either by the action of other agencies, by Congressional action or by state or private action initiated by an informed public.

This purpose of NEPA and its corollary requirement that a full record be developed by the agency preparing the environmental impact statement has been twice underscored by the Court of Appeals for the District of Columbia Circuit. In Committee for Nuclear Responsibility v. Seaborg, ___ F.2d ___, 3 ERC 1126, 1128 (D. C. Cir. 1971), the court stated that an impact statement had to set forth the range of responsible scientific opinion on the proposed action. The AEC was required to do this not only for its importance to ultimate decision makers within the Commission but also because

the statement has significance in focusing environmental factors for informed appraisal by the President, who has broad concern even when not directly involved in the decisional process, and in any event by Congress and the public. 3 ERC at 1128.

The point is reiterated in NRDC v. Morton, supra, in which the question was raised of considering alternatives

outside the jurisdictional power of the agency to effect:

Congress contemplated that the Impact Statement would constitute the environmental source material for the information of the Congress as well as the Executive, in connection with the making of relevant decisions, and would be available to enhance enlightenment of -- and by -- the public. 3 ERC at 1561.

In the Morton case the Department of Interior argued that it need not consider alternatives which were beyond its power or jurisdiction to effect. The Court of Appeals rejected this argument and required that such alternatives be considered:

While the Department of the Interior does not have the authority to eliminate or reduce oil import quotas such action is within the purview of both Congress and the President, to whom the impact statement goes. The impact statement is not only for the exposition of the thinking of the agency, but also for the guidance of these ultimate decision-makers, and must provide them with the environmental effects of both the proposal and the alternatives for their consideration along with the various other elements of the public interest. 3 ERC at 1562.

In light of the ruling of the District of Columbia Circuit in the Morton case, the argument of the Staff that "[t]he Commission has no jurisdiction over the operation of fossil plants on the river and thus has limited its assessment to the incremental impacts of Indian Point Units Nos. 1 and 2" is without merit, 1 FES, XII-43. The Intervenor and

other agencies and parties, including two Congressmen, have indicated to the Staff in their comments on the Draft Statement the necessity of considering Bowline Point and Roseton both so that a rational decision can be made at Indian Point and so that other agencies and the Congress may take appropriate action. The Staff may misconceive this as a contention that the AEC exert jurisdiction over Bowline Point and Roseton. No such proposition is advanced. What is needed and required is the information which will inform other, appropriate groups of the factual situation in the environment of the Hudson, so that they can take appropriate action at Bowline Point and Roseton.

The Staff obviously recognizes the importance of Bowline Point and Roseton to the Hudson environment on which Indian Point 2 will operate when it includes in the Final Environmental Statement on Indian Point 2 an analysis of the plant's physical relation to the Indian Point site (1 FES, II-8), their contribution to the heat load on the Hudson (1 FES, III-7, et seq.) and their importance to the future power supply in the area (e.g. 1 FES, XI-2, 6). The only logical step to take is to consider the impact of Bowline Point and Roseton on the fish and aquatic life of the Hudson as well.

In addition, putting off consideration of Bowline Point and Roseton to any later date will only fragment consideration of a single problem into a multitude of small pieces. Such fragmentation does not make sense in scientific terms or in terms of administrative efficiency.

Only by developing a record which includes the effect of Bowline Point and Roseton on the Hudson environment on which Indian Point 2 will have its impact can the informative record required for other agencies, the Congress and the public be developed. Such a record is required by the statute and the case law and must be developed in this proceeding.

CONCLUSION

The Staff's Final Environmental Statement must be held inadequate for its failure to analyze and set forth the effect on the Hudson environment, on which Indian Point 2 will operate, of the plants at Bowline Point and Roseton. The Staff must be required to supplement the Final Environmental Statement with further discussion and analysis of the effect of those plants on the Hudson and its aquatic biota, and evidence on those plants from other parties to the

proceeding must be ruled admissable in the evidentiary
hearings.

Respectfully submitted,

Angus MacBeth

ANGUS MACBETH, ESQ.
Attorney for Hudson River
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Dated: New York, New York

October 16, 1972

BEFORE THE UNITED STATES
ATOMIC ENERGY COMMISSION.

In the Matter of)
)
Consolidated Edison Company of) Docket No. 50-247
New York)
(Indian Point Unit No. 2))

CERTIFICATE OF SERVICE

I hereby certify that I have served a document entitled:
"Motion To Rule Final Environmental Statement On Indian Point
2 Inadequate In Certain Respects and To Require Further Factual
Evidence From The Staff", and attached affidavit of John R.
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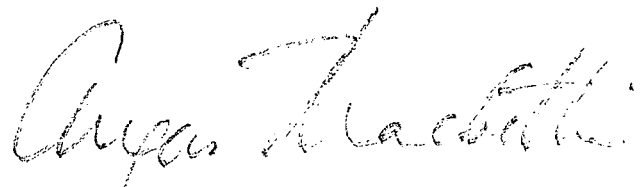
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