FERC ORDERS

Contents:
Order Granting Exemption from Licensing (Conduit)
Order Approving Revised Project Design Drawing
ORDER GRANTING EXEMPTION FROM LICENSING
(CONDUIT)
Issued November 9, 1993

On May 3, 1993, Massachusetts Water Resource Authority Inc. (MWRA), filed an application to exempt the Deer Island Hydro Project from the licensing requirements set forth in Part I of the Federal Power Act. The small conduit hydropower project is described in the attached public notice. The comments of interested agencies and individuals, have been fully considered in determining whether to issue this exemption from licensing.

Article 2 of this exemption requires compliance with the terms and conditions prepared by federal or state fish and wildlife agencies to protect fish and wildlife resources. Fish and wildlife agencies commented but did not file terms and conditions for this project.

Cultural Resources

The proposed project site is located in the vicinity of the Deer Island Pumping Station and the Superintendent's House, which are eligible for listing in the National Register of Historic Places (National Register), and two potentially eligible historic period burial grounds located at the New Resthaven cemetery and Piggery Point. However, the proposed project would consist of a hydroelectric facility constructed within the channel leading to the effluent outfall shaft, and thus it would not be expected to affect any of those properties. The Massachusetts State Historic Preservation Officer (SHPO) concurs that the project would have no effect on the significant architectural and historical characteristics of the National Register-eligible properties (letter to Marianne Connolly from Judith B. McDonough, State Historic Preservation Officer, Massachusetts Historical Commission, Boston Massachusetts, September 22, 1993).

However, the SHPO recommends that the Piggery Point burial ground be depicted on the project design plans to ensure the site would be protected from damage by construction activities. Therefore, article 401 requires the MWRA to file project design plans depicting the location of the Piggery Point burial grounds for Commission approval before beginning any project-related construction activities.

Preparation of an environmental assessment or an environmental impact statement is not required for this project.
pursuant to 1 380.4(a)(14) of the regulations. Nonetheless, we have considered the agency comments, the environmental information in the exemption application, and other public comments, and find that issuance of this order is not a major federal action significantly affecting the quality of the human environment.

The Director orders:

(A) The Deer Island Hydro Project is exempted from the licensing requirements of Part I of the Federal Power Act, subject to the attached articles. See 18 CFR section 4.94.

(B) Article 6 of this exemption is amended as follows:

Before transferring any property interests in the exempt project, the exemption holder must inform the transferee of the terms and conditions of the exemption. Within 30 days of transferring the property interests, the exemption holder must inform the Commission and the Regional Director of the identity and address of the transferee.

(C) The exemption is also subject to the following article:

Article 401. At least 90 days before commencing any project-related construction activities, the Exemptee shall file with the Commission, for approval, revised project design drawings and specifications depicting the location of the historic Piggery Point burial grounds, and describing measures that the Exemptee would implement to avoid any project-related construction activities at the historic burial grounds.

The Exemptee shall prepare the project drawings and specifications after consultation with the Massachusetts State Historic Preservation Officer (SHPO). The Exemptee shall include with the filing, copies of comments and recommendations from the SHPO and descriptions of how the SHPO's comments are accommodated by the project design drawings and specifications.

The Commission may require changes to the drawings and specifications to ensure that no project-related activities would take place at the historic Piggery Point burial grounds. No project-related construction activities shall begin until the Exemptee is notified that the requirements of this article have been fulfilled.

(D) The Exemptee shall serve copies of any Commission filing required by this order on any entity specified in this order to be consulted on matters related to that filing. Proof
of service on these entities must accompany the filing with the Commission.

(E) This order is issued under authority delegated to the Director and constitutes final agency action. Requests for rehearing by the Commission may be filed within 30 days of the date of issuance of this order, pursuant to 18 CFR section 385.713.

Dean L. Shumway
Director, Division of
Project Review

Public Notice of Application Accepted for Filing
(issued August 13, 1993)

a. Type of Application: Conduit Exemption
b. Project No.: 11412-000
c. Date Filed: May 3, 1993
d. Applicant: Massachusetts Water Resource Authority
e. Name of Project: Deer Island Hydro Project
f. Location: On Deer Island in the Boston Harbor, Suffolk, near Boston, Massachusetts
g. Filed Pursuant to: Federal Power Act, 16 U.S.C. 791(a)-825(r)
h. Applicant Contact: Mr. Walter Armstrong
   Massachusetts Water Resource Authority
   Program Management Division
   Charleston Navy Yard
   100 First Avenue
   Boston, MA 02129
   (617) 242-6000
i. FERC Contact: Ed Lee (202) 219-2809
j. Comment Date: October 18, 1993

Page 3
k. Status of Environmental Analysis: This application is accepted for filing and is categorically excluded from the preparation of an environmental assessment.

l. Description of Project: The proposed project consists of the following: (1) an electrical building; (2) a substation; (3) a powerhouse containing two 1,000-kw generators for a total installed capacity of 2,000 kw; (4) an intake conduit which conveys the wastewater from the disinfection facilities to the hydropower chute; and (5) appurtenant facilities. The applicant estimates that the total average annual generation would be 12,400 megawatthours.

m. Purpose of Project: Project power would be utilized by the applicant in its water treatment facilities.

n. This notice also consists of the following standard paragraphs: A2, A9, and B1.

o. Available Location of Application: A copy of the application, as amended and supplemented, is available for inspection and reproduction at the Commission's Public Reference and Files Maintenance Branch, located at 941 North Capitol Street, N.E., Room 3104, Washington, D.C., 20426, or by calling (202) 208-1371. A copy is also available for inspection and reproduction at Massachusetts Water Resource Authority, Charleston Navy Yard, 100 First Avenue, Boston, MA 02129 or by calling (617) 242-6000.
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ORDER APPROVING REVISED PROJECT DESIGN DRAWING

(issued May 3, 1994)

On February 17, 1994, the Massachusetts Water Resource Authority, exemptee for the Deer Island Hydro Project, filed a revised project design drawing and specifications showing the location of the historic Piggery Point burial ground (burial ground). This filing was required by article 401 of the exemption issued November 9, 1993.

Article 401 requires that the exemptee file with the Commission, for approval, revised drawings showing the historic burial ground and describing measures that the exemptee would implement to avoid any project-related construction activities at the historic burial ground. It further requires that the exemptee prepare the drawings and specifications after consultation with the Massachusetts State Historic Preservation Officer (SHPO).

Consultation

The exemptee consulted with SHPO. In a letter dated January 24, 1994, SHPO states that the burial site is located in an area of the island proposed to be used as open space in the future. SHPO further states that by placing its location on the site plans, the site can be protected from damage by construction-related activities associated with the new wastewater treatment facilities.

Discussion and Conclusion

The proposed project is located in the vicinity of the Deer Island Pumping Station and the Superintendent's House, which are eligible for listing on the National Register of Historic Places (Register). The proposed project would consist of a hydroelectric facility constructed within the channel leading to the effluent outfall shaft. Construction will take place over 500 feet away from the burial ground and is not expected to affect any of the properties eligible for listing in the Register.

The exemptee has located the historic site on the design drawing. By noting the location, all construction-related

1 65 FERC ¶ 62,121.
activities can be planned to ensure that the site is protected from damage. This filing meets the requirements of article 401 and should be approved.

The Director orders:

(A) The revised project drawing depicting the location of Piggery Point burial ground, filed on February 17, 1994 is approved and made part of the exemption.

(B) This order constitutes final agency action. Requests for rehearing by the Commission may be filed within 30 days of the date of issuance of this order, pursuant to 18 C.F.R. \( \text{\textcircled{1}} \) 385.713.

J. Mark Robinson  
Director, Division of Project Compliance and Administration
Deer Island Hydroelectric Facility Plan and Section Views
Resource Agency Consultation

Contents:
List of Agencies Contacted During FERC Consultation Process
Resource Agency Comment Letters
- USFWS
- NOAA
- EPA
- Corps of Engineers
- MADFw
- MA Division of Marine Fisheries
- MA DEP
- MA EOEa
APPENDIX 2
Attachment 1

List of Federal and State Agencies Contacted During Pre-filing Consultation

Mr. Alex Hoar, Director
U.S. Fish & Wildlife Service
Enhancement Division
1 Gateway Center
Newton Corner, MA  02158
(617) 965-5100

Ms. Kathy Middleton
Environmental Protection Assistant
National Oceanic Atmospheric Admin.
National Marine Fisheries Service
1 Blackburn Drive
Gloucester, MA  01930-2298
(508) 281-9300

Mr. Joseph Ignazio
Planning Directorate
U.S. Army Corps of Engineers
New England Division
424 Trapelo Road
Building 114 North
Waltham, MA  02154

Mr. Ronald Manfredonia, Chief
Water Quality Branch
U. S. Environmental Protection Agency
Mail Code: W.Q.B.
J.F.K. Building
Government Center
Boston, MA  02203
565-3400

Mr. Wayne MacCallum, Director
Mass. Division Fisheries & Wildlife
100 Cambridge Street
Boston, MA  02202
727-3151

Mr. Phil Coates, Director,
Mass. Division of Marine Fisheries
100 Cambridge Street
Boston, MA  02202
727-3151

Mr. Brian Donahoe, Director
Division of Water Pollution Control
One Winter Street
Boston, MA  02108

Mass. Coastal Zone Management Office
100 Cambridge Street
Boston, MA  02202
(617) 727-9530
United States Department of the Interior

FISH AND WILDLIFE SERVICE
400 RALPH PILL MARKETPLACE
22 BRIDGE STREET
CONCORD, NEW HAMPSHIRE 03301-4901

REF: Deer Island/Boston Harbor

March 12, 1992

Mr. David Reilly
Massachusetts Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston, MA 02129

Dear Mr. Reilly:

We have reviewed your letter dated February 13, 1992, which outlined the Massachusetts Water Resources Authority's proposal to install hydroelectric turbines at the Secondary Wastewater Treatment Facility at the Boston Harbor Project on Deer Island.

The proposed hydroelectric facility does not impact any fish and wildlife resources, and we do not object to the issuance of a Conduit Exemption by the Federal Energy Regulatory Commission.

Thank you for this opportunity to comment. If you have any questions, please contact John Warner of this office at (603) 225-1411.

Sincerely yours,

[Signature]

Gordon E. Beckett
Supervisor
New England Field Offices
April 8, 1993

Mr. David Reilly
Program Management Division
Massachusetts Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston, Massachusetts 02129

RE: FERC Review of Hydropower Facilities at Deer Island

Dear Mr. Reilly:

Thank you for your letter dated March 1, 1993 regarding the proposed hydropower plant at the Deer Island Treatment Plant. You have adequately addressed my concerns that were raised during my phone conversation with Michael Hinkard.

If you are in need of further consultation in the future please feel free to contact me at (508) 281-9115.

Sincerely,

Mary Colligan
Resource Management Specialist
March 1, 1993

Ms. Mary Colligan
Resource Management Specialist
National Oceanic & Atmospheric Administration
National Marine Fisheries Service
1 Blackburn Drive
Gloucester, MA 01930-2298

RE: Federal Energy Regulatory Commission Review
Hydropower Facilities at Deer Island - Boston Harbor Project

Dear Ms. Colligan:

This letter provides a response to your questions about the effect on temperature and dissolved oxygen concentration of the Deer Island Treatment Plant effluent due to the operation of the proposed hydropower plant. These questions were raised during a February 11, 1993 conversation with Michael Hankard of the Boston Harbor Project’s Construction Manager.

The only potential thermal input to the wastewater treatment plant effluent resulting from the operation of the hydropower plant would be a minor frictional heat load from the turbine. Based on an assumed turbine efficiency of 80% (and assuming all of this loss is converted to heat), 2 MW of combined generating power, and a minimum plant flow rate of 460 cfs, this heat input from friction was determined to have no measurable effect on the turbine discharge.

Operation of the turbine will have no impact on the dissolved oxygen concentration of the effluent between the inlets and outlets of the turbines.

I hope that this information sufficiently addresses your questions. If you require any further information please contact Michael Hankard at (617) 539-7734.

Sincerely yours,

Mr. David Reilly
Program Management Division

cc: M. Hankard
Document Control (2)
File: 304.01
February 21, 1992

Mr. David Reilly
Program Management Division
Massachusetts Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston, Massachusetts 02129

Dear Mr. Reilly:

We have received your letter dated February 13, 1992 regarding the Federal Energy Regulatory Commission Review of Hydroelectric Facilities at Deer Island and we concur with your assessment of the environmental impacts of the facilities.

Sincerely,

[Signature]

[Name]
Chief
Water Quality Branch
March 25, 1992

Mr. David Reilly
Massachusetts Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston, Massachusetts 02129

Dear Mr. Reilly:

This is in response to your letter of February 13, 1992, requesting that the Corps of Engineers, New England Division, review and provide comments on a submittal by your office on the Application for Conduit Exemption of Hydropower Facilities at Deer Island/Boston Harbor Project.

At this time, we offer the following comments for your consideration, however, the Corps will conduct a more extensive review of this project when requested to do so by the Federal Energy Regulatory Commission.

Projects for hydroelectric power generating facilities may require Department of Army permits under Section 404 of the Clean Water Act and under Section 10 of the Rivers and Harbors Act. You may contact the Regulatory Division (ATTN: CENED-OD-R) of the New England Division to receive information on these permit procedures. The toll free telephone number is 1-800-343-4789 (1-800-362-4367 if calling within Massachusetts).

Should you have any questions regarding this response, you may contact Mr. David Sward of my staff at (617) 647-8647.

Sincerely,

[Signature]
Joseph L. Igrejas
Director of Planning
Regulatory Division
CENED-OD-R-1993-00235

February 9, 1993

David Reilly
Mass Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston MA 02129

Dear Mr. Reilly:

We have received your application for a Department of the Army permit to construct a hydropower plant at the Deer Island Wastewater Treatment facility. All work will be in an upland location above the high tide line.

A Department of the Army permit is not required for this work. Our regulatory jurisdiction encompasses all work in or affecting navigable waters of the United States under Section 10 of the Rivers and Harbors Act of 1899 and the discharge of dredged or fill material into all waters of the United States including adjacent wetlands under Section 404 of the Clean Water Act. As shown on your attached plans entitled "HYDROPOWER PLANT AT DEER ISLAND / BOSTON HARBOR PROJECT" dated February 1993. No work will be performed in these areas. Hence, no further action is required.

Sincerely,

Karen Kirk Adams
Chief, Permits Branch
Regulatory Division
Commonwealth of Massachusetts

Division of Fisheries & Wildlife

Wayne F. MacCallum, Director
26 March 1992

David Reilly
Program Management Division
Massachusetts Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston, MA 02129

Re: Hydropower Facilities at Deer Island
Request for Conduit Exemption
Boston Harbor Project

Dear Mr. Reilly:

Thank you for contacting the Natural Heritage and Endangered Species Program regarding rare species in the vicinity of the proposed hydropower facilities at Deer Island as described in your letter of 13 February 1992.

At this time, we are not aware of any rare and endangered species within the vicinity of the proposed project. Therefore, we concur with your determination of no adverse impacts to rare species.

Please note that this determination is based on the most recent information available in the Natural Heritage database, which is constantly being expanded and updated through ongoing research and inventory. Should new rare species information become available, this determination may be reconsidered.

Please contact Jay Copeland, Environmental Reviewer, if you have any questions.

Sincerely,

Patricia Huckery-Tower
Assistant Environmental Reviewer

FHT/pht
March 10, 1992

Mr. David Reilly
Program Management Division
Massachusetts Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston MA  02129

Dear Mr. Reilly:

The Division of Marine Fisheries has reviewed your letter of February 13, 1992 and attachments. Please be advised that the Division has no objection to the installation of a 2-Unit Bevel Gear Bulb Hydropower system and conduit exemption as part of the Waste Water Treatment System presently under construction.

Sincerely yours,

W. Leigh Bridges
Assistant Director

cc: Philip G. Coates, Director
March 10, 1992

Re: MWRA, Deer Island POTW
Federal Energy Regulatory Commission Review
Hydropower Facility at Deer Island
Request for "Conduit Exemption"

David Reilly, PMD
Mass Water Resources Authority
Charlestown Navy Yard
100 First Avenue
Boston, MA 02129

Dear Mr. Reilly:

The Division of Water Pollution Control (Division) acknowledges receipt of your correspondence of February 13, 1992, relative to the request for a "Conduit Exemption" from the Federal Energy Regulatory Commission (FERC) for the Bevel Gear Bulb Hydropower System being installed in the Deer Island POTW’s effluent outfall channel. Specifically, you request that the Division indicate its concurrence with the proposed facilities. The Division in consultation with DEP’s Bureau of Municipal Facilities and Division of Air Quality Control reviewed all of the environmental documents and plan/specifications for the Deer Island Wastewater Treatment Facilities and as part of that review agreed with and approved MWRA’s proposal to install this hydropower system.

Please contact Steve Lipman if you or the FERC require any additional documentation relative to this issue.

Very Truly yours,

Brian Donahoe
Director

CC: Richard Fox, MWRA/PMD

David Reilly  
Program Management Division  
Massachusetts Water Resources Authority  
Charlestown Navy Yard  
100 First Avenue  
Boston, MA 02129

Re: Federal Energy Regulatory Commission Review, Hydropower Facilities at Deer Island; Boston

Dear Mr. Reilly;

Thank you for submitting information regarding the above referenced project to the Massachusetts Coastal Zone Management (MCZM) Office.

MCZM has reviewed the materials submitted and has no objection to the project as proposed. We are pleased that the MWRA is making efforts to provide for its own power needs for its new treatment plant on Deer Island.

Please note that this review has been for this project alone, and does not constitute a blanket concurrence of Federal Consistency with any other project regulated by the Federal Energy Regulatory Commission.

Very truly yours,

Jane W. Mead  
Project Review Coordinator

JWM/-