

FERC ORDER AMENDING EXEMPTIONS ISSUED May 5, 2009

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127 FERC ¶ 62,107
UNITED STATES OF AMERICA
FEDERAL ENERGY REGULATORY COMMISSION

Mini-Watt Hydroelectric LLC

Project No. 6096-012

ORDER AMENDING EXEMPTION

(Issued May 05, 2009)

On March 31, 2009, Mini-Watt Hydroelectric (exemptee) filed an application to amend its exemption for the New Home Dam Project, FERC No. 6096. The project is located on the Millers River in Franklin County, Massachusetts.

BACKGROUND

On December 28, 1984, the New Home Dam Project was exempted from licensing.¹ The project was authorized with four generating units with a total installed capacity of 677 kW. The project, with construction completed in 1995, consists of two powerhouses, one on the North Bank of the river and one on the South Bank. The North Bank Development contains a single turbine/generator unit rated at 175 kW, and the South Bank Development contains two units rated at 120 kW each, for a total installed capacity of 415 kW.

PROPOSED AMENDMENT

The exemptee proposes to amend the project's installed capacity from 415 kW to 495 kW by replacing one existing propeller turbine/generator unit rated at 120 kW with a new double regulated Kaplan turbine/generator unit rated at 200 kW at the South Bank Development. The proposed construction will begin in September 2009 with completion in August 2010. The operation of the project will remain at run-of-river mode, with a minimum bypass flow of 10 cubic feet per second.

¹ 29 FERC ¶61,356 (1984).

AGENCY CONSULTATION

The exemptee consulted with the U.S. Fish and Wildlife Service (FWS) and the Massachusetts Division of Fisheries and Wildlife (MDFW). The FWS provided the exemptee with two environmental concerns related to the proposal: (1) water quality in the bypassed reach, and (2) the intake velocity. After the exemptee provided further information and the FWS verified the data, the concerns were resolved to the FWS's satisfaction. In addition, the FWS recommended that the exemptee update the existing streamflow compliance monitoring plan, which we are requiring in ordering paragraph (D). The MDFW stated that it concurred with the FWS assessment and has no objection to the proposal.

DISCUSSION

A. Design Changes

The exemptee's proposal to replace one existing propeller turbine/generator with a new double regulated Kaplan turbine unit would result in an increase in hydraulic and generating capacities. The hydraulic capacity of the project would increase from 166 cfs to 200 cfs. The project's generating capacity would increase from 415 kW to 495 kW.

B. Exhibits A and G Drawings

The Exhibit A describes the as-built project features, as authorized, and the proposed replacement of the unit. The exemptee also includes two Exhibit G drawings related to the turbine replacement: (1) G-1, Existing Plan and Cross Section View of the turbine replacement; and (2) G-2, Proposed Plan and Cross Section View of the turbine replacement. The Exhibit A and Exhibit G drawings conform to the Commission's rules and regulations and are approved in ordering paragraph (E) of this order. In ordering paragraph (F), we are requiring the exemptee to file the approved exhibit drawings in aperture card and electronic file formats. The filed G-1 and G-2 drawings are redesignated as G-6 and G-7, respectively, to preserve the original G-1 and G-2 drawings filed on December 28, 1984.

C. Environmental Review

All work will take place in the South Bank Development powerhouse, and the construction area will be closed off by installing stop logs in the tailrace and closing the headgates. The operation will remain run-of-river mode throughout all

activities and after the construction. The FWS's analyses of the proposal indicated that it is unlikely that impairment to water quality would occur and the intake velocity will meet its velocity design criterion. In addition, the exemptee indicated that: (1) the monitoring system would be modified to make the new turbine, with a wider operating range, be the first on and last off; and (2) the North Bank Development unit would be tied to the system. As such, the project would improve its ability to maintain and verify compliance with operational requirements of the exemption.

CONCLUSION

The increase in project capacity from 415 kW to 495 kW is within the project's authorized capacity of 677 kW. The new turbine is estimated to produce an additional 350,000 kWh annually. In addition, the modifications to the monitoring system would improve the project's compliance with operational requirements.

The Commission's staff finds that the increase in the project's installed capacity would not result in any additional adverse environmental effects other than those identified during processing of the exemption. Therefore, this order will amend the exemption to replace one existing propeller turbine/generator unit rated at 120 kW with a new double regulated Kaplan turbine/generator unit rated at 200 kW at the South Bank Development.

The Director orders:

(A) The exemption for the New Home Dam Project, FERC No. 6096, is amended as provided by this order, effective the date this order is issued.

(B) The total authorized installed capacity of the New Home Dam Project, FERC No. 6096, is 495 kW.

(C) Appendix A, subparagraph j, of the Order Granting Exemption from Licensing is revised, in part, to read as follows:

j. Description of Project:The North Bank Development would consist of: (2) an existing powerhouse containing one generating unit with an installed capacity of 175 kW;

The South Bank Development would consist of: (3) a powerhouse with two generating units with a total installed capacity of 320 kW; The estimated annual generation of the project would be 1,700,000 kWh.

(D) Within one year from the date this order is issued, the exemptee shall file for Commission approval, a revised stream flow compliance monitoring plan, incorporated with the modification and improvement. The system must monitor and document compliance with the minimum flow release requirement under Article 2 of the exemption and the terms and conditions provided by the U.S. Fish and Wildlife Service. The plan shall include location of monitoring equipment, and shall provide for gage system calibration, the method of flow data collection and for providing flow data to the U.S. Fish and Wildlife Service, the Massachusetts Division of Fisheries and Wildlife, and the Massachusetts Department of Environmental Protection within 30 days of the agency's request for the data. The Flow Monitoring Plan shall be prepared in consultation with the U.S. Fish and Wildlife Service, the Massachusetts Division of Fisheries and Wildlife, and the Massachusetts Department of Environmental Protection. The exemptee shall include with the Plan documentation of consultation, copies of comments and recommendations on the completed Plan after it has been prepared and provided to the consulted agencies, and specific descriptions of how the agencies' comments are accommodated by the Plan. The exemptee shall allow a minimum of 30 days for the agencies to comment and make recommendations prior to filing the Plan with the Commission for approval. If the exemptee does not adopt a recommendation, the filing shall include a discussion of the exemptee's reasons, based on project specific information. The Commission reserves the right to require changes to the Plan.

(E) The Exhibit A and the following Exhibit G drawings filed on March 31, 2009, are approved and made part of the exemption.

Exhibit No.	FERC Drawing No.	Drawing Title	Superseded FERC Drawing No.
G-6	6096-8	Existing Plan and Cross Section View of Turbine Replacement	---
G-7	6096-9	Proposed Plan and Cross Section View of Turbine Replacement	---

Exhibit G drawings shall be filed in the Commission's electronic format as specified in ordering paragraph (F). Superseded exhibits are eliminated from the exemption.

(F) Within 45 days of the date of issuance of this order, the exemptee shall file the approved exhibit drawings in aperture card and electronic file

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formats.

a) Three sets of the approved exhibit drawings shall be reproduced on silver or gelatin 35mm microfilm. All microfilm shall be mounted on type D (3-1/4" X 7-3/8") aperture cards. Prior to microfilming, the FERC Drawing Number (i.e., P-6096-8 and P-6096-9) shall be shown in the margin below the title block of the approved drawing. After mounting, the FERC Drawing Number shall be typed on the upper right corner of each aperture card. Additionally, the Project Number, FERC Exhibit (i.e., G-6 and G-7), Drawing Title, and date of this order shall be typed on the upper left corner of each aperture card. See Figure 1.

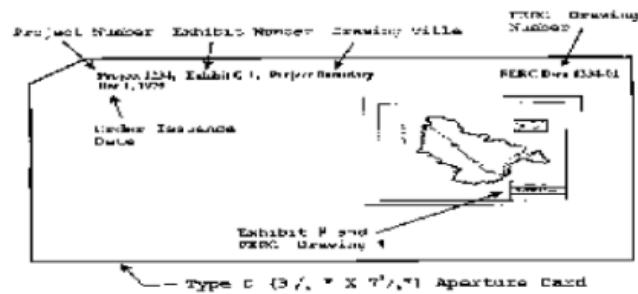


Figure 1. Sample Aperture Card Format

Two of the sets of aperture cards shall be filed with the Secretary of the Commission, ATTN: OEP/DHAC. The third set shall be filed with the Commission's Division of Dam Safety and Inspections New York Regional Office.

b) The exemptee shall file two separate sets of exhibit drawings in electronic raster format with the Secretary of the Commission, ATTN: OEP/DHAC. A third set shall be filed with the Commission's Division of Dam Safety and Inspections New York Regional Office. The approved exhibit drawings must be segregated from other project exhibits and identified as (CEII) material under 18 CFR § 388.113(c). Each drawing must be a separate electronic file, and the file name shall include: FERC Drawing Number, FERC Exhibit, Drawing Title, date of this order, and file extension [i.e., P-6096-8, G-6, Existing Plan and Cross Section View of Turbine Replacement, MM-DD-YYYY.TIF]. Electronic drawings shall meet the following format specification:

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IMAGERY - black & white raster file
FILE TYPE - Tagged Image File Format, (TIFF) CCITT Group 4
RESOLUTION - 300 dpi
DRAWING SIZE FORMAT - 24" X 36" (min), 28" X 40" (max)
FILE SIZE - less than 1 MB

(G) This order constitutes final agency action. Requests for rehearing may be filed within 30 days of the date of issuance of this order, pursuant to 18 C.F.R. §385.713.

William Guey-Lee, Chief
Engineering and Jurisdiction Branch
Division of Hydropower
Administration and Compliance