

A CMS Energy Company

*William A. Schoenlein* Manager, Hydro and Renewable Generation

October 24, 2017

Kimberly D. Bose, Secretary Nathaniel J. Davis, Sr., Deputy Secretary Federal Energy Regulatory Commission Dockets Room, Room 1A 888 First Street, NE Washington, D.C. 20426

## FERC PROJECT NO. 2680-113 Ludington Pumped Storage Hydroelectric Project Responses To July 27, 2017 Staff Comments on the Final License Application under Extension Request

Dear Ms. Bose,

On June 28, 2017 Consumers Energy Company ("Consumers Energy") and DTE Electric Company ("DTEE") (collectively, "Licensees") co-Licensees of the Ludington Pumped Storage Hydroelectric (FERC Project No. P-2680), filed an Application for new license. By letter dated July 27, 2017, FERC Staff ("Staff") provided a deficiency and Additional Information Request ("AIR"): (1) Schedule A - Application deficiencies and (2) Schedule B - request for additional information for the Application for new license for the Ludington Pump Storage Project ("Project"). Responses to Staff's request were filed on September 25, 2017. The Licensees requested a 30-day extension for Schedule B items numbers 9, 18, and 19 (i.e., by October 25, 2017), which was granted by FERC Staff in an October 3, 2017 letter. The initial responses to these three Schedule B items indicated that some information provided in Exhibits D and E (and subsequently Exhibit H as well) needed to be revised. The extension permitted the Licensees to provide the revisions without undue delay.

During the preparation of the September 25, 2017 responses, the Licensees determined that several values discussed in Exhibits D, E and H of the Application were not correctly defined based on the co-ownership of the Project. Values for the estimated average cost of the Project, property taxes, Project revenue, cost of pumping, and production cost provided in the Application were presented on a total project basis. However, it was determined that the values provided were Consumers' specific and equivalent values for DTEE were not included. Based on the new information changes were identified for Exhibits D, E and H of the application. Enclosure 1 contains revisions to select portions of Exhibits D, E and H.

Additionally, in the September 25, 2017 response for Schedule B Item 19, a change was identified to Table E-4.3.3-9 to change the total annual cost of the seasonal barrier net.

However, a revised table was not provided with the response. Table E-4.3.3-9 was taken from the 2016 Phase 3 Fisheries Studies Report by Alden Labs. Alden developed an estimate for the total annual barrier net costs of \$2,817,000 and used this value in their evaluation of the different engineered alternatives. When preparing the Final License Application, Consumers changed the annual cost to reflect the 2016 actual cost determined in Exhibit D Table D-4.6-2. When reviewing the changes for Schedule B Item 19 the licensees determined that the values used in Table E-4.3.3-9 should not have been changed from the values originally provided by Alden. The table is to be used within the context of the Phase 3 study results and as such the values should represent those determined by Alden. [Note: in Schedule B Item 13 Staff requested the Licensees to revise Table E-4.3.3-8 from 2015\$ to 2016\$. This revision was provided in the September 25, 2017 response. Table E-4.3.3-8 was taken from the Alden Phase 2 Fisheries Study Report. Since the requested change was made to all values in the table, consistency with the Phase 2 results was maintained, unlike changing a single value from Table E-4.3.3-9.1 Enclosure 2 contains a revision to Exhibit E Table E-4.3.3-9, changing the barrier net annual cost from the \$3.2 million value used in the Final License Application to the original, Alden value of \$2.817 million. Footnote 5 to the table has been deleted.

Questions regarding the Licensees' responses should be directed to David McIntosh of my staff at (231) 779-5506.

/s/ William A. Schoenlein William A. Schoenlein

Copy to: Mailing List (attached)

CC: Shana Wiseman <Shana.Wiseman@FERC.GOV>

## Enclosure 1

Revised Sections of License Application Exhibits D, E and H

#### **EXHIBIT D Changes**

#### 4.0 ESTIMATED AVERAGE ANNUAL COST OF THE PROJECT

This section describes the annual costs of the Project as proposed. The estimated average cost of the total Project will be approximately \$26,912,918 \$20,715,617 per year, based on an 8-year period <sup>1</sup>of analysis. This estimate includes the direct plant costs associated with existing and projected project operations and maintenance, ongoing costs of installing, maintaining, repairing and storing the seasonal barrier net and local property and real estate taxes. Income taxes, depreciation, and costs of financing are excluded from this estimate. Table D-4.0-1 provides the annual costs for the 8-year average.

#### 4.2 Taxes

Property taxes for 2016 were \$15,625,283, representing the combined tax payments for Consumers and DTEE. are expected to be approximately \$7,945,529. Property taxes in Michigan are paid directly to the local community(s) hosting the Project. For the Ludington Project, these property taxes are paid to Mason County, distribution to Pere Marquette and Summit Townships is in accordance with the respective millage rate for each township and PMCT. Income taxes for the Project are incorporated into costs of the Licensee's consolidated business and are not separated out for the Project.

#### 4.4 Operation and Maintenance Expenses

There are two components to the project Operations and Maintenance (O & M) costs. First there are the direct costs associated with project operations and maintenance activities. These are costs incurred by Consumers as the majority owner and operator of the project (i.e. plant staff, office supplies, testing, etc.). Second, separated out from these costs are those associated with the barrier fish net (installation, retrieval, cleaning, repair, monitoring and storage). These direct costs are divided according to the ownership percentages of each licensee (51% for Consumers and 49% for DTEE). Table D-4.0-1 provides a summary of these O & M costs for the last 8-years (2009 through 2016).

The estimated 2017 annual direct operation and maintenance expense for the Project will be approximately \$18,500,000. This estimate includes the expected cost for barrier net maintenance and monitoring, property taxes are not included. The electrical energy costs for pumping costs are separated from the direct O & M costs and reflect MISO rates for energy used at the time pumping occurs. For 2016, the Consumers the average cost of pumping was \$22.01/MWH while the DTEE cost of pumping was \$22.39/MWH (based on day ahead and real time pumping costs, and weighted by the amount of pumping).

The cost for pumping is specific for each licensee and depends on how each licensee dispatches the units as pumps based on the licensee's generation, the MISO electrical rates at the time pumping occurs and on how the electrical energy cost is treated with each licensees Power Supply Cost Recovery (PSCR) factor, which is determined through the Michigan Public Service Commission (MPSC). The PSCR portion

<sup>&</sup>lt;sup>1</sup> An 8-year average was selected because of a computer software upgrade that occurred in 2009. Data prior to the upgrade is difficult to retrieve and was not pursued.

of a utility's electrical rate is a variable component and can be adjusted on a monthly basis as actual power supply costs fluctuate. The power supply costs are reviewed for prudency and reconciled to corresponding PSCR revenues on an annual basis. Any under or over recovery of PSCR revenues are charged or refunded to the customer through an increase or decrease in a subsequent month's PSCR factor. The PSCR is reconciled at the corporate level and not at the project level thus the effect on project pumping costs cannot be estimated.

#### 5.0 ESTIMATED ANNUAL VALUE OF PROJECT POWER

Power generated by the project is sold through Midcontinent Independent System Operator (MISO), and power used to pump water off peak is also purchased from MISO at prevailing market rates (the cost for electric power for pumping is also subject to each licensees PSCR factor as discussed in Exhibit D Section 4.4). The value of the project power is licensee specific depending upon how and when each licensee dispatches the units and the hours of generation by each licensee. The Licensees estimate total annual energy production of about 2,658,200<sup>2</sup> megawatt-hours, which will be sold at the prevailing market rates. The average market clearing price for energy can be estimated based on the MISO website.

For In 2016, the value of the Project power for Consumers was \$42.48/MWH and \$38.34/MWH for DTEE, based on actual generation and MISO market rates.

<sup>&</sup>lt;sup>2</sup> The energy generation is calculated for the Project using upgraded unit capacity of 297.5 MW and using the current capacity factor (17%).

						-				
	2009	2010	2011	2012	2013	2014	2015	2016	Total	8 Year Average
	(millions)									
Direct Plant dollars	\$11.25	\$12.23	\$10.83	\$11.23	\$12.79	\$12.50	\$13.33	\$11.53	\$95.69	\$11.96
Net Maintenance & Effectiveness	\$1.92	\$2.16	\$2.17	\$2.24	\$2.43	\$2.26	\$2.40	\$3.04	\$18.62	\$2.33
<b>Property Taxes</b>										
Consumers Energy	\$5.87	\$5.86	\$5.97	\$6.10	\$6.20	\$6.52	\$6.93	\$7.95	\$51.40	\$6.43
DTEE	\$5.66	\$5.69	\$5.76	\$5.87	\$5.97	\$6.28	\$6.71	\$7.68	\$49.58	\$6.20
Total	\$24.70	\$25.89	\$24.73	\$25.45	\$27.39	\$27.56	\$29.38	\$30.19	\$215.3	\$26.92

Table D-4.0-1: Annual Breakdown of Average Costs<sup>3</sup>

<sup>&</sup>lt;sup>3</sup> This table was included in the September 25, 2017 response to the July 27, 2017 FERC Staff questions regarding the Final License Application.

#### Exhibit E

## 5.1 **Power and Economic Benefits of the Project**

The Project has six 297.5 MW generating units operating in a pump storage facility with an installed capacity of 1,785 MW and a total estimated hydraulic capacity of 76,290 cfs during generation and 84,000 cfs during pumping.

In order to estimate the economic benefit of the project, the differences in how each licensee utilizes the project needs to be taken into consideration. As discussed in Exhibit D Section 4.0 each licensee has specific values for their respective project revenues and costs of pumping. Additionally, the production costs are discussed in Exhibit H Section 2.3.1. Table E-5.1-1 summarizes these values.

Pumping Cost Licensee Ownership Revenue Production Cost \$/MWH \$/MWH \$/MWH Consumers 51% 42.48 22.01 22.16 DTEE 49% 38.34 22.39 22.39 Weighted 40.45 22.20 22.27 Average

Table E-5.1-1: Estimated Economic Factors

## 5.1.1 Current Annual Value of Developmental Resources Associated with the Project

The Project receives operating revenues from power sales to wholesale customers, market-based power sales, and the provision of ancillary services to the MISO electricity market.

The Project revenue based on for 2016 using the weighted average energy values of is \$40.4542.48/MWH and the long term average energy generation of 2,357,000 MWH (Exhibit H, Section 2.3.1 and Exhibit B, Table B-1.4-1.) is or estimated to be \$95,343,950100,125,360.

Therefore, under the No-Action Alternative, the Project is expected to generate approximately \$95.3 100.1 million annually.

## 5.1.2 Current Annual Cost of Operations, Maintenance, and Administration

The weighted average production cost of \$22.2722.16/MWH (based on 2016 costs), or \$52,490,39052,231,120 using a long term average energy generation of 2,357,000 MWH. (Exhibit H, Section 2.3.1 and Exhibit B, Table B-1.4-1.) This includes the 2016 operations and maintenance costs, property taxes, and annual cost of capital and depreciation. The weighted average pPumping cost is \$22.2022.01/MWH (based on day ahead and real time costs), or \$72,349,80071,730,590 using a long-term average pumping energy requirement of 3,259,000 MWH. (Exhibit B, Table B-1.4-1)

Therefore, under the No-Action Alternative, the Project is expected to have operational costs of approximately \$52.5<del>52.2</del> million annually. This does not include the cost for pumping. As discussed in

Exhibit D Section 4.4, the cost for electric power for pumping is subject to each licensees' Power Supply Cost Recover factor and is reconciled on a corporate basis and not at the project level, thus the effect on the cost of pumping has not been estimated.

## 5.2.2 Proposed Action

Under the Proposed Action the average annual value of Project power is expected to <del>remain the same as the No Action Alternative,</del> be valued at \$107,524,190<del>112,920.336</del><sup>4</sup> using the weighted average energy value of \$40.45/MWH and the long term average energy generation of 2,658,200 MWH (Exhibit D, Section 5.0).

<sup>&</sup>lt;sup>4</sup> Note this is the value provided in the licensees' September 25, 2017 response to the July 27, 2017 FERC Staff questions regarding the Final License Application. The value in the Final License Application was \$100.1 million.

## Exhibit H

## 2.2 Need for the Electricity Generated by the Project

## 2.2.1 The Reasonable Costs and Availability of Alternative Sources of Power

The electricity the Project generates is generally used to meet daily peak electrical demand. The electrical output from the Project is sold wholesale into the MISO administered wholesale market.

The Project's authorized capacity under a new license is 1,785 MW. At the time of filing, three of the six upgrades were completed and the Project has an authorized capacity of 1,700 MW. In 2016, the Project's weighted average production cost was approximately \$22.27<del>22.16per</del> MWH (Exhibit E Section 5.1).

In 2016, the Licensees' peak load, marginal annual production costs and marginal capacity costs are in Table H-2.2.1-1.

## 2.3 Need, Reasonable Cost, and Availability of Alternative Sources of Power

The Licensees are electric utilities and have an obligation to serve load and provide capacity in their electric service territories.

#### 2.3.1 Average Annual Cost of Project Power

From Exhibit E Section 5.1 the The weighted average cost of producing electricity at the Project is \$22.2722.16 dollars per megawatt-hour (\$/MWH). Production costs are expected to change annually by the change in the Consumer Price Index (CPI). This estimate is based on historical routine Operating and Maintenance (O&M) expenses, including Commission fees, property taxes, labor costs and routine/repetitive non-labor costs. It also includes an estimate of annual depreciation expenses, non-routine construction and maintenance and license initiatives. The estimate assumes annual generation of approximately 2,357,066 MWH, which is the average annual generation produced by the Project between October 1999 and September 2016.

# Enclosure 2

Revised Table E-4.3.3-9 Cost Comparison of Evaluated Engineering Alternatives

	]	nitial Capital Costs		Annual O&M Costs					
Alternative	Total Project Construction Costs (2016 \$)	Replacement Power During Construction (2016 \$) <sup>1</sup>	Total Capital Costs (2016 \$)	Energy (2016 \$) <sup>1,2</sup>	Labor (2016 \$) <sup>2</sup>	Component Replacemen t (2016 \$) <sup>2,3</sup>	Total Annual Costs (2016 \$) <sup>2,4,5</sup>	Incremental Annual O&M Costs (2016 \$)	
Existing Barrier Net	NA	NA	NA	\$440,000	\$2,053,000	\$324,000	\$ <mark>2,817,000</mark> <del>3,200,000</del>	\$0	
Alt 13B	\$4,021,565,000	\$217,800,000	\$4,239,365,000	\$1,221,000	\$22,000	\$0	\$1,243,000	-\$1,574,000	
Alt 13C	\$827,310,000	\$99,000,000	\$926,310,000	\$863,500	\$60,000	\$0	\$923,500	-\$1,893,500	
Alt 13D	\$1,792,855,000	\$178,200,000	\$1,971,055,000	\$1,457,500	\$65,000	\$0	\$1,522,500	-\$1,294,500	
Alt 20A	\$64,400,000	\$19,800,000	\$84,200,000	\$781,000	\$2,053,000	\$324,000	\$3,158,000	\$341,000	
Alt 20B	\$33,061,000	\$13,200,000	\$46,261,000	\$440,000	\$2,053,000	\$324,000	\$2,817,000	\$0	
Alt 13B + Acoustic Barrier	\$4,024,691,000	\$225,017,000	\$4,249,708,000	\$1,223,000	\$82,000	\$74,000	\$1,379,000	-\$1,438,000	
Alt 13C + Acoustic Barrier	\$832,898,000	\$113,222,000	\$946,120,000	\$867,500	\$185,000	\$135,000	\$1,187,500	-\$1,629,500	
Alt 13D + Acoustic Barrier	\$1,795,371,000	\$185,417,000	\$1,980,788,000	\$1,459,500	\$190,000	\$60,000	\$1,709,500	-\$1,107,500	

 Table E-4.3.3-9:
 Cost Comparison of Evaluated Engineering Alternatives

1. Assumes 1,000 Mwh per day per Unit and a cost of \$55 per MWh.

2. Includes existing O&M effort required to maintain the barrier nets when applicable

3. For the existing barrier net, net replacement is considered a capital cost by the owners.

4. Does not include annual fisheries compensation costs.

5. Existing barrier net costs have been updated based on data from 2016 and includes installation/removal, cleaning, maintenance, effectiveness monitoring, and component replacement. Details are provided in Exhibit D.

Advisory Council on Historic Preservation Executive Director 401 F Street NW Suite 308 Washington, DC 20001-2637 Federal Emergency Management Agency Director Alyson Vert 500 C Street SW Washington, DC 20472

Federal Emergency Management Agency Regional Administrator - Region 5 Andrew Velasquez, III 536 South Clark Street 6th Floor Chicago, IL 60605 Federal Emergency Management Agency Regional Administrator - Region 4 Major Phillip May 3003 Chamblee Tucker Road Alanta, GA 30341

U.S. House of Representatives Michigan 2nd District Representative Bill Huizenga 1217 Longworth HOB Washington, DC 20515

U.S. SenateU.S. Senator Gary Peters731 Hart Senate Office Building Suite 724Washington, DC 20510

U.S. Senate U.S. Senator Debbie Stabenow 731 Hart Senate Office Building Washington, DC 20510-2204 FERC Chicago Regional Office - Federal Building Regional Engineer John A. Zygaj 230 South Dearborn Street, Room 3130 Chicago, IL 60604

National Oceanic and Atmospheric Administration Chief Administrative Officer Edward Horton 1305 East-West Hwy Silver Spring, MD 20910 Northeast Fisheries Science Center Director Northeast Region Dr. William Karp 166 Water Street Woods Hole, MA 02543-1026 Administration Fisheries Regional Office Regional Administrator - Northeast Region John Bullard 55 Great Republic Drive Gloucester, MA 01930-2298 Naval Facilities Engineering Command Naval Seafloor Cable Protection Office - NAVFAC-OFP/C Ocean/Tidal Hydrokinetics 1322 Patterson Ave SE Suite 1000 Washington, DC 20374-5065

U.S. Army Corps of Engineers Division Commander - Great Lakes and Ohio River Division Brigadier General Margaret W. Burcham 550 Main Street Room 10032 Cincinnati, OH 45202-3222

US Army Corps of Engineering Detroit Commander Lieutenant Colonel Robert Ells 477 Michigan Ave. Room 700 Detroit, MI 48226-2547

U.S. Army Corps of Engineers Commander Lieutenant General Thomas P. Bostick 441 G Street NW Washington, DC 20314

U.S. Army Corps of Engineers - Louisville P.O. Box 59 Louisville, KY 40201-0059

U.S. Coast Guard - MSO Detroit Sector Commander Captain Jeff Ogden 110 Mount Elliott St Detroit, MI 48207-4319

U.S. Coast Guard Navigation Standards Division 2703 Martin Luther King Jr. Ave SE Washington, DC 20593-7000

U.S. Coast Guard Waterways Management Branch - District Nine 1240 E. 9th Street Cleveland, OH 44199 U.S. Forest Service Acting Regional Forester - Eastern Region 9 Mary Beth Borst 626 East Wisconsin Avenue Milwaukee, WI 53202 U.S. Forest Service Tom Tidwell 1400 Independence Ave SW Washington, DC 20250-0003 U.S. Department of Commerce Secretary Penny Pritzker 1401 Constitution Avenue NW Washington, DC 20230

NPS Hydropower Coordinator Great Lakes Region Angela Tornes 626 E. Wisconsin Ave. Suite 400 Milwaukee, WI 53202 National Park Service Director Jonathan B. Jarvis 1849 C Street NW Washington, DC 20240

National Park Service Regional Director - Midwest Region Michael Reynolds 601 Riverfront Drive Omaha, NE 68102-4226 Bureau of Indian Affairs Regional Director - Midwest Region Diane Rosen Norman Pointe II Building 5600 W. American Blvd., Suite 500 Bloomington, MN 55347

Bureau of Indian Affairs Director Michael Black 1849 C Street NW MS-4606-MIB Washington, DC 20240 U.S. Bureau of Land Management State Director - Eastern States Office Karen Mouritsen 20 M Street SESuite 950 Washington, DC 20003

U.S. Bureau of Land Management Director Neil Kornze 1849 C Street NW MIB 5655 Washington, DC 20240 U.S. Bureau of Reclamation Commissioner Michael Connor 1849 C Street NW Washington, DC 20240 United States Geological Survey Director Suzette Kimball 12201 Sunrise Valley Dr Reston, VA 20192 U.S. Fish and Wildlife Service Director Dan Ashe 1849 C Street NW Room 3238 Washington, DC 20240-0001

National Park Service Regional Environmental Coordinator Nick Chevance 601 Riverfront Drive Omaha, NE 68128 U.S. Environmental Protection Agency Regional Administrator - Region V Susan Hedman 77 W Jackson Blvd Chicago, IL 60604-3511

U.S. Environmental Protection Agency Administrator Lisa Jackson Ariel Rios Building 1200 Pennsylvania Ave NW Washington, DC 20460 U.S. Environmental Protection Agency Supervisor Region 5: Chicago- NEPA Implementation Office of Enforcement & Compliance Assurance 77 West Jackson Boulevard Mailcode: E-197 Chicago, IL 60604-3507

U.S. Fish and Wildlife Service Regional Director - Region 3 Midwest 5600 American Blvd. West, Suite 990 Bloomington, MN 55437-1458

U.S. Fish and Wildlife Service Field Supervisor - Region 3 Midwest Scott Hicks 2651 Coolidge Road Suite 101 East Lansing, MI 48823

US Fish and Wildlife Service East Lansing Field Office Burr Fisher 2651 Coolidge Road, Suite 101 East Lansing, MI 48823 US Fish and Wildlife Service East Lansing Field Office Jessica Pruden 2651 Coolidge Road, Suite 101 East Lansing, MI 48823 US Fish and Wildlife Service East Lansing Field Office Rachael Pierce 2651 Coolidge Road, Suite 101 East Lansing, MI 48823 US Fish and Wildlife Service Green Bay Fishery Resources Mark Holey 2661 Scott Tower Drive New Franken, WI 54229

US Fish and Wildlife Service Charles Wooley 5600 American Blvd. West, Suite 990 Bloomington, MN 55437-1458 Michigan Department of Environmental Quality Air Quality Division Chief G. Vinson Hellwig PO Box 30260 Lansing, MI 48909-7760

Michigan Department of Environmental Quality Coastal Management Program Chris Antieau PO Box 30458 Lansing, MI 48909-7760 Michigan Department of Environmental Quality Coastal Management Program Chief Rhonda Wuycheck PO Box 30473 Lansing, MI 48909-7973

Michigan Department of Environmental Quality Office of the Great Lakes Director Jon Allen PO Box 30473 Lansing, MI 48909-7973 Michigan Department of Environmental Quality Air Quality Division - Environmental Quality Analyst Rob Dickman 120 West Chapin Street Cadillac, MI 49601

Michigan Department of Environmental Quality Surface Water Assessment Admin Manager Diana Klemans PO Box 30458 Lansing, MI 48909-7958 Michigan Department of Environmental Quality Water Resources Division Lake Michigan Unit Gary Kohlhepp PO Box 30458 Lansing, MI 48909-7958 Michigan Department of Natural Resources FERC Program Manager - Fisheries Division Jessica Mistak P.O. Box 30446 Lansing, MI 48909 Michigan Department of Natural Resources Habitat Management Program Manager - Fisheries Division Gary Whelan P.O. Box 30028 Lansing, MI 48909-7528

Michigan Department of Natural Resources Director Keith Creagh Mason Bldg PO Box 30028 Lansing, MI 48909 Michigan Department of Natural Resources Environmental Assessment Sub-Unit Kyle Kruger 191 S Mt Tom Road Mio, MI 48647

Michigan Department of Natural Resources Wildlife Division - State Threatened and Endangered Species Coordinator Lori Sargent P.O. Box 30444 Lansing, MI 48909

Michigan Department of Natural Resources Senior Water Policy Advisor Tammy Newcomb - SAT Co-Chair P.O. Box 30028 Lansing, MI 48909

Michigan Department of Natural Resources William Moritz P.O. Box 30028 Lansing, MI 48909 Michigan Department of Natural Resources Fisheries Division Chief Jim Dexter P.O. Box 30446 Lansing, MI 48909

Michigan Department of Natural Resources Forest Resources Division Acting Chief Bill O'Neil PO Box 30452 Lansing, MI 48909

Michigan Department of Natural Resources Parks Division Chief Ron Olson P.O. Box 30257 Lansing, MI 48909 Michigan Department of Natural Resources Wildlife Division Chief Russ Mason P.O. Box 30444 Lansing, MI 48909 Michigan Historical Center Director Sandra Clark 702 West Kalamazoo St. P.O. Box 30740 Lansing, MI 48909

Michigan State University Department of Fisheries and Wildlife Bill Taylor 7 Natural Resources Building Michigan State University East Lansing, MI 48224

Governor Office of the Governor Rick Snyder P.O. Box 30013 Lansing, MI 48909

Office of the Michigan Attorney General Attorney General Bill Schuette P.O. Box 30212 Lansing, MI 48909 Office of the Michigan Attorney General Assistant Attorney General Pamela Stevenson P O Box 30755 Lansing, MI 48909

Office of the Michigan Attorney General ENRA Division Chief Peter Manning G. Mennen Williams Bldg, 7th floor 525 W. Ottawa St. P.O. Box 30212 Lansing, MI 48909 Office of the Michigan Attorney General ENRA- First Assistant Robert Reichel G. Mennen Williams Bldg, 7th floor 525 W. Ottawa St. P.O. Box 30212 Lansing, MI 48909

Michigan State Housing Development Authority Cultural Resource Management Specialist Brian G. Grennell 735 E Michigan Ave P.O. Box 30044 Lansing, MI 48909 Michigan Historical Center Department of History, Arts and Libraries Environmental Review Coordinator Martha L. MacFarlane-Faes 702 West Kalamazoo Street Lansing, MI 48909 89 District State Representative Jim Lilly N-1193 House Office Building P.O. Box 30014 Lansing, MI 48909 101 District State Representative Curt VanderWall S-1385 House Office Building P.O. Box 30014 Lansing, MI 48909

35th District State Senator Darwin Booher P.O. Box 30036 Lansing, MI 48909-7536 30th District State Senator Arlan Meekhof P.O. Box 30036 Lansing, MI 48909-7536

Bay Mills Indian Community Chairman Kurt Perron 12140 W. Lakeshore Drive Brimley, MI 49715 Burt Lake Band of Ottawa and Chippewa Indians MAGPRA rep Curtis Chambers 6461 Brutus Rd Brutus, MI 49716

Chippewa-Ottawa Treaty Fishery Management Authority Tom Gorenflo 179 West Three Mile Road Sault Ste Marie, MI 49783 Grand River Band of Ottawa Chairman Ronald F Yob PO Box 2937 Grand Rapids, MI 49501

Grand Traverse Band of Ottawa and Chippewa Indians Chairperson Alvin Pedwaydon 2605 N.W. Bayshore Dr. Suttons Bay, MI 49682 Grand Traverse Band of Ottawa and Chippewa Indians Fisheries Management Building JoAnne Cook 2605 NW Bay Shore Drive Suttons Bay, MI 49682 Grand Traverse Band of Ottawa and Chippewa Indians Fisheries Management Building Erik Olsen 2605 NW Bay Shore Drive Peshawbestown, MI 49682

Hannahville Indian Community Cultural Director Kenneth Meshigaud N-14911 Hannahville B1 Rd. Wilson, MI 49896-9728

Lac Vieux Desert Band of Lake Superior Chippewa Indians Tribal Historic Preservation Officer Giiwegiizhigookway Martin E23857 Poplar Circle, Choate Road P.O. Box 249 Watersmeet, MI 49969

Little River Band of Ottawa Indians Larry Romanelli 2608 Government Center Dr. Manistee, MI 49660

Keweenaw Bay Indian Community Tribal Historic Preservation Officer

Gary Loonsfoot Jr.

107 Beartown Road

Baraga, MI 49908

Little River Band of Ottawa Indians Natural Resources Department Director Barry Weldon 2608 Government Center Dr. Manistee, MI 49660

Little Traverse Bay Band of Odawa Indians Natural Resources Director Doug Craven 7500 Odawa Circle Harbor Springs, MI 49740 Little Traverse Bay Band of Odawa Indians Kevin Donner 7500 Odawa Circle Harbor Springs, MI 49740

Little Traverse Bay Bands of Odawa Indians Chairman Fred Kiogima 7500 Odawa Circle Harbor Springs, MI 49740 Match-e-be-nash-she-wish Band of Potawatomi Indians of Michigan Chairperson David K. Sprague 2872 Mission Drive Shelbyville, MI 49544 Nottawaseppi Huron Band of Potawatomi Tribal Environmental Director John Rodwan 2221 One Half Mile Road Fulton, MI 49025 Ottawa Tribe of Oklahoma Chief Ethel Cook P.O. Box 110 Miami, OK 74355

Pokagon Band of Potawatomi Indians Vice Chair Maxine Margiotta P.O. Box 180 Dowagiac, MI 49047 Red Lake Band of Chippewa Indians of Minnesota Chairman Floyd Jourdain P.O. Box 550 Red Lake, MN 56671

The Saginaw Chippewa Indian Tribe Office of the Tribal Clerk 7070 East Broadway Road Mt. Pleasant, MI 48858 Sault Ste. Marie Tribe of Chippewa Indians of Michigan Chairperson Aaron Payment 523 Ashmun Street Sault Ste. Marie, MI 49783

Wyandotte Tribe of Oklahoma Chief Billy Friend 64700 E. Highway 60 Wyandotte, OK 74370 Grand Traverse Band of Ottawa and Chippewa Indians William Rastetter 6724 County Road 645 Cedar, MI 49621

American Canoe Association Executive Director Wade Blackwood 503 Sophia St.Suite 100 Fredericksburg, VA 22401 American Whitewater Executive Director Mark Singleton P.O. Box 1540 Cullowhee, NC 28723 Anglers of Au Sable President Tom Baird 471 S. Stephan Bridge Road Grayling, MI 49738 Michigan Public Service Commission Executive Secretary PO Box 30221 Lansing, MI 48909-7721

Hydropower Reform Coalition National Coordinator Rupak Thapaliya 1101 14th Street NW Suite 1400 Washington, DC 20005 Michigan Hydro Relicensing Coalition P.O. and Federation of Fly Fishers President, GLC Executive Board James Schramm P.O. Box 828 Pentwater, MI 49949

Michigan United Conservation Clubs Dan Eichinger 2101 Wood StreetP.O. Box 30235 Lansing, MI 48909 Michigan United Conservation Clubs Gary Towns 855 Oakhurst Road Fowlerville, MI 48836

Mountain Beach Association President Michael O. Lareau 894 Bradford Holw NE Grand Rapids, MI 49525 National Wildlife Federation - Great Lakes Natural Resource Center Director Mike Shriberg 213 W Liberty St Ste 200 Ann Arbor, MI 48104

National Wildlife Federation Julie Hinderer Great Lakes Fishery Commission 2100 Commonwealth Blvd., Suite 100 Ann Arbor, MI 48105 School of Natural Resources and Environment University of Michigan Professor of Zoology J David Allen Dana Building 440 Church Street Ann Arbor, MI 48109 National Office Trout Unlimited 1777 N. Kent St., Suite 100 Arlington, VA 22209 Allegan County Clerk-Register Joyce A. Watts Allegan County Building 113 Chestnut Street Allegan, MI 49010

Blendon Township Township Clerk Phil DeLange 7161 72nd Avenue Hudsonville, MI 49426

Allendale Township Township Clerk Candy Kraker 6676 Lake Michigan Drive PO Box 539 Allendale, MI 49401

Charter Township of Pere Marquette Zoning Administrator Terry Wahr 1699 S. Pere Marquette Rd Ludington, MI 49431 Charter Township of Pere Marquette Township Supervisor Paul Keson 1699 S. Pere Marquette Rd Ludington, MI 49431

Charter Township of Pere Marquette Township Clerk Rachelle Enbody 1699 S. Pere Marquette Rd Ludington, MI 49431 City of Grand Haven Clerk Linda Schmidt 519 Washington Avenue Grand Haven, MI 49417

City of Holland Deputy Clerk Anna Perales 270 South River Avenue Holland, MI 49423 City of Ludington City Clerk Deborah Luskin 400 S. Harrison Ludington, MI 49431 City of Zeeland Clerk Karen Jipping 21 South Elm Street Zeeland, MI 49464

Grand Haven Township Township Clerk Sue Buitenhuis 13300 168th Street Grand Haven, MI 49417

Holland Township Township Clerk Michael Dalman 353 North 120th Avenue PO Box 8127 Holland, MI 49422

Laketown Township Township Clerk Wendy VanHuis 4338 Beeline Road Holland, MI 49423

Marquette County Board of Commissioners Chairman Gerald Corkin County Court House Annex 234 West Baraga Marquette, MI 49855

Mason County District 2 Commissioner Bill Carpenter 602 E Ludington Avenue Ludington, MI 49431

Mason County Drain Commissioner David Hasenbank 102 East Fifth St. Scottville, MI 49454 Mason County Parks and Recreation Chairman David McClean 102 East Fifth St. Scottville, MI 49454

Mason County County Clerk Jim Riffle 304 E. Ludington Ave. Ludington, MI 49431 Mason County District Library Directors Robert Dickson and Susan Carlson 217 E Ludinton Ave Ludington, MI 49431 Ottawa County County Clerk Daniel Krueger 12220 Fillmore St. Room 130 West Olive, MI 49460 Park Township Township Clerk Skip Keeter 52 152nd Avenue Holland, MI 49424

Port Sheldon Township Township Clerk Kathy Van Voorst 16201 Port Sheldon Road West Olive, MI 49460

Robinson Township Township Clerk Jackie Frye 12010 120th Avenue Grand Haven, MI 49417

Spring Lake Township Township Clerk H. Carolyn Boersma 106 South Buchanan Spring Lake, MI 49456 Summit Township Township Clerk Mary Anthony Samuels 4560 W. Anthony Rd Ludington, MI 49431

Consumers Energy Company Manager Renewable Generation William A Schoenlein 330 Chestnut St Cadillac, MI 49601

Consumers Energy Company Regulatory Attorney James Roush One Energy Plaza, EP11-240 Jackson, MI 49201

Bad River Band of Lake Superior Tribe of Chippewa Indians Chairman P.O. Box 39 Odanah, WI 54861-0039

DTE Energy Company Jon Christinidis One Energy Plaza #688-WCB Detroit, MI 48226 Michigan Department of Natural Resources Kelly Smith PO Box 30446 Lansing, MI 48909

DTE Energy Company Jim Musial One Energy Plaza #688-WCB Detroit, MI 48226

DTE Energy Company Manager - Federal Regulatory Affairs Rosemary Smalls-Tilford One Energy Plaza #688-WCB Detroit, MI 48226 DTE Energy Corporate Services LLC Matt Shackelford H-136 Warren Service Center 7940 Livernois Detroit, MI 48210

TRC Lesley Brotkowski 904 Shenandoah Drive Papillion, NE 68046 U.S. Department of Agriculture State Conservationist 3001 Coolidge Rd Ste 250 East Lansing, MI 48823-6362

Michigan Bureau of History Michigan State Historic Preservation Officer Brian Conway and Martha L Mac Farlane-Faes 735 E. Michigan Ave PO Box 30044 Lansing, MI 48909

U.S. Coast Guard C/O Cg Group MSO Sault Ste. Marie Sault Ste. Marie, MI 49783-9501

U.S. Department of Agriculture PO Box 30017 Lansing, MI 48909-7517 U.S. Coast Guard - MSO CHICAGO FERC Contact 555 Plainfield Rd, Ste A Willowbrook, IL 60527 U.S. Bureau of Land Management Field Manager 626 E Wisconsin Ave Ste 200 Milwaukee, WI 53202-4618 Michigan Departement of Attorney General Legal Secretary Robin L Novak 525 West Ottawa StreetP.O. Box 30755 Lansing, MI 48933