



WATER WITHDRAWAL PERMIT APPLICATION

Michigan Department of Environmental Quality
Water Bureau

Required under Part 327 of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended. Failure to follow the provisions of the act may result in a civil fine up to \$1,000.

Please PRINT or TYPE the following information:

I. Facility/Contact Information

Facility Name Benton Charter Township Water Treatment Plant	Contact Person Carolyn Phillips	Phone (269) 925-0616
Facility County Berrien	Mailing Address 1725 Territorial Road	
Facility Township(s) Benton Charter Township	City/State/Zip Benton Harbor, MI 49022	
Water Supply Serial Number (only if a public water supply) 605	Email address	

II. Proposed Withdrawal Information

Withdrawal Capacity: <u>12.0</u>	<input type="checkbox"/> GPM <input checked="" type="checkbox"/> MGD	Purpose of Use: <u>Drinking water</u>
----------------------------------	---	--

III. Source of Water Withdrawal (see instructions)

Water Source	Code*	Latitude	Longitude	% of Total Water Withdrawn
Lake Michigan	GLCW	42.139668	-86.479096	100
*Code: GW = Groundwater ISW = Inland Surface Water GLCW = Great Lakes and Connecting Waterways				Total = 100%

IV. Water Discharge Locations (see instructions)

Name of Location	Code*	Latitude	Longitude	% of Original Withdrawal Discharged
Benton Harbor-St. Joseph Joint WWTP	GLCW	42.104025	-86.469815	100
*Code: GW = Groundwater ISW = Inland Surface Water GLCW = Great Lakes and Connecting Waterways				

RECEIVED

MICH. DEPT. OF ENVIRONMENTAL QUALITY

NEW 1-2009

MICH. DEPT. OF ENVIRONMENTAL QUALITY
Water Bureau - DWEL:IS

EOP5947 WURF

V. Does this facility hold a permit issued under Part 31 for a cooling water intake structure?

YES Please attach a copy of the signed Part 31 discharge authorization, certificate of coverage, or other substantiating documentation.

NO

VI. Permit Application Return and Payment

When completed, mail this form and a \$2,000.00 permit application fee to the address at right. Please make your check payable to STATE OF MICHIGAN (do not send cash). Thank you.

I hereby certify that all information provided in this application is true.

Candace Phillips - Township Clerk 8-21-09
Date

Owner or authorized representative's signature

RETURN TO: MICHIGAN DEPT. OF ENVIRONMENTAL QUALITY
CASHIER'S OFFICE - WURF
PO BOX 30657
LANSING, MI 48909-8157

FOR DEQ CASHIER'S USE ONLY: 37000-40570-9175

551370-1-1 08/28/09
37000 40570 9175
AY 2009 \$2,000



JENNIFER M. GRANHOLM
GOVERNOR

STATE OF MICHIGAN
DEPARTMENT OF ENVIRONMENTAL QUALITY
LANSING



STEVEN E. CHESTER
DIRECTOR

September 10, 2009

Carolyn Phillips, Township Clerk
Benton Charter Township
1725 Territorial Road
Benton Harbor, MI 49022

Dear Ms. Phillips:

This letter is to request additional information relative to the Benton Charter Township permit application for a new or increased large quantity withdrawal (NILQW) of water from Lake Michigan.

As you are aware, Benton Charter Township submitted a water withdrawal permit application that was received by this office on August 31, 2009. The application was made on the form "Water Withdrawal Permit Application," which reflects information requirements for a permit as identified in Part 327, Great Lakes Preservation, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (Act 451). Recent developments in the submittal and review of water withdrawal permits has brought to the attention of the Department of Environmental Quality (DEQ) the need to consider large quantity withdrawals of more than two million gallons per day (MGD) relative to the requirements of Part 342, Great Lakes-St. Lawrence River Basin Water Resources Compact (Compact), of Act 451.

The Compact is an agreement among the Great Lakes states that outlines the manner in which the states will regulate NILQWs within their jurisdiction. The primary difference in the information requirements of Part 327 and the Compact are in demonstration that the proposed withdrawal is reasonable. Part 327 requires the use be "...reasonable under common law principles of water law in Michigan." The Compact requires consideration of six specific factors in determining if the use is reasonable. The six factors are as follows:

1. Whether the proposed withdrawal is planned in a fashion that provides for the efficient use of the water and will minimize the waste of water.
2. If the proposal is for an increase withdrawal, whether efficient use is made of existing water supplies.
3. Discussion on the balance between economic development, social development, and environmental protection of the proposed withdrawal and use and other existing or planned withdrawals and uses sharing the same water source.
4. The supply potential of the water source, considering quantity, quality, reliability, and safe yield of hydrologically interconnected water sources.
5. Probable degree and duration of any adverse impacts caused or expected as a result of the proposed withdrawal under foreseeable conditions, to other lawful uses of the waters and water dependent natural resources of the Great Lakes Basin.
6. Consideration of the restoration of hydrologic conditions or functions if proposed by the applicant.

It is herein requested that you provide information and discussion on the Benton Charter Township withdrawal relative to the six factors for consideration on the reasonableness of the proposed NILQW.

Carolyn Phillips
Page 2
September 10, 2009

Also, as of January 1, 2009, the approval of a NILQW greater than two MGD requires the person making the withdrawal to "self certify" compliance with environmentally sound and economically feasible water conservation measures developed by the applicable water user's sector. The Michigan Section of the American Water Works Association developed Guidelines for Generally Accepted Water Management Practices for the Public Water Supply Sector on behalf of community water supplies. A copy of the conservation measures is available at the following Web site:

<http://www.michigan.gov/deqwateruse>

Please look under the Information heading for Water Conservation Measures and review Guidelines for Generally Accepted Water Management Practices for the Public Water Supply Sector. Upon review, please submit a description of the water conservation measures applicable to the public water supply sector that you currently have in place, or intend to incorporate into your public water supply operations in the future.

In closing, the DEQ is obligated to consider your permit application for a NILQW from Lake Michigan as incomplete until the information requested by this correspondence has been submitted. Be advised, no further action on the permit application is possible until the information is received. If you have any questions or comments with regards to the information that must be submitted, please contact me.

Sincerely,



Brant O. Fisher, Environmental Engineer Specialist
Water Withdrawal and Contamination
Investigation Unit (WWCIU)
Drinking Water and Environmental Health Section
Water Bureau
Phone: 517-241-1415
Fax: 517-241-1328
E-mail: fisherb@michigan.gov

BOF:DLR

cc: Mr Gary Wozniak, P.E., District Engineer, DEQ
Mr. Joe Lovato, WWCIU, DEQ



RECEIVED

SEP 22 2009

Water Bureau - DWEHS

consulting engineers

Lawrence H. Merritt, P.E.
John K. Olson, P.E.
Robert C. Andrew, P.E.
Jeffrey S. Wingard, P.E.

September 18, 2009

Mr. Brant O. Fisher
Water Withdrawal and Contamination Investigation Unit
Drinking Water and Environmental Health Section - Water Bureau
Michigan Department of Environmental Quality
P.O. Box 30272
Lansing, MI 48909-7773

SUBJECT: Benton Charter Township Permit Application for Water Withdrawal
Project No. 20956

Dear Mr. Fisher:

On behalf of Benton Charter Township, we are responding to your letter of September 10 requesting additional information related to the Township's permit application for new or increased large quantity withdrawal (NILQW) of water from Lake Michigan.

Benton Charter Township believes that the proposed withdrawal is reasonable under common law principles of water law in Michigan. The withdrawal will not interfere with public access to or use of Lake Michigan, the public interest in Lake Michigan as a natural resource, or maintenance of Lake Michigan for drinking and recreational purposes.

Regarding the six factors as required by the Great Lakes Compact:

1. Efficient use of the water: The proposed withdrawal is for a new municipal water treatment system which will make efficient use of the water. The proposed water treatment plant will allow the Township to separate itself from an existing water system which has a relatively large percentage of lost water. Benton Charter Township believes that the new treatment plant and separate system will allow for better tracking of water use and reduction in water loss. Also, as noted below, the Township will certify to the AWWA recommended practices.
2. Efficient use of existing water supplies: The application is for a new withdrawal and this item is not applicable.
3. Balance between economic development, social development and environmental protection: The new withdrawal will allow the Township to separate its customers from an existing water supply which has had numerous deficiencies noted by MDEQ over a long period of time. There will be economic and social benefits in providing a safe and more reliable supply of water. The proposed water system will also allow for interconnection and redundant supply to the neighboring water system. The increased reliability will result in social and economic benefits. The proposed water system construction is projected to result in over \$19 million in labor, materials and professional services over the projected two year construction period. This

September 18, 2009

construction spending will provide direct and indirect economic benefit to the area. The net positive social and economic effects of the withdrawal would be obtained with nearly imperceptible impact on the environment.

4. Supply potential: The proposed withdrawal does not present any known or anticipated threat to the quantity or quality of Lake Michigan as a water source. The proposed withdrawal would have no impact on the reliability or safe yield of others using Lake Michigan or hydrologically connected sources.
5. Degree and duration of likely adverse impacts: Due to the factors noted above, Benton Charter Township does not believe that the proposed withdrawal will create an adverse impact.
6. Restoration of hydrologic conditions: The water withdrawn will be returned to the watershed as treated wastewater. There may be some consumptive use, however, the entire water system is located within the watershed, and consumptive use would not cross the watershed boundary. The hydrologic conditions of Lake Michigan will not be affected, so no restoration is necessary.

In relation to compliance with environmentally sound and economically feasible water conservation measures, the required actions are very much in line with the Township's goals. The Township will certify compliance with the measures outlined in the Guidelines for Generally Accepted Water Management Practices for the Public Water Supply Sector as compiled by the Michigan Section of the AWWA. Currently, operation and maintenance of the existing public water system is provided by the City of Benton Harbor. The Township has no water department staff or operations. The conservation measures will be adopted when the Township establishes its own independently operated water system and assumes its own operation and maintenance responsibilities. The Township believes that these actions will result in much improved efficiencies and better conservation within the system.

We hope that this response answers the concerns noted in your letter. Thank you for your assistance, and please do not hesitate to call with any questions.

Sincerely,
MERRITT ENGINEERING, INC.



Robert C. Andrew, P.E.

RCA/jrh

Cc: Carolyn Phillips, Benton Charter Township Clerk
Mr. Gary Wozniak, P.E., District Engineer, MDEQ
Mr. Joe Lovato, WWCIU, MDEQ

Page, Ronda (DEQ)

From: Fisher, Brant (DEQ)
Sent: Monday, September 28, 2009 10:02 AM
To: Lovato, Joe (DEQ)
Cc: Page, Ronda (DEQ)
Subject: Benton Township

I contacted Robert Andrew, Merritt Engineering, Inc. this morning and informed him that the correspondence "certifying compliance with ESEFWCM" would have to come directly from Benton Township (the applicant).

Brant Fisher, Environmental Engineer Specialist
Water Withdrawal and Contamination Investigation Unit
Phone: 517-241-1415



RECEIVED
OCT 07 2009
Water Bureau - DWEHS

1725 Territorial Road, Suite B
Benton Harbor, MI 49022

Tel: (269) 925-0616
Fax: (269) 925-7134

October 6, 2009

Mr. Brant O. Fisher
Water Withdrawal and Contamination Investigation Unit
Drinking Water and Environmental Health Section - Water Bureau
Michigan Department of Environmental Quality
P.O. Box 30272
Lansing, MI 48909-7773

SUBJECT: Benton Charter Township Permit Application for Water Withdrawal

Dear Mr. Fisher:

This letter is a follow up to the information provided by Merritt Engineering, Inc. on behalf of Benton Charter Township related to the Townships permit application for new or increased large quantity withdrawal (NLQW) of water from Lake Michigan. We understand that additional information is necessary, from the Township, regarding the Townships commitment to environmentally sound and economically feasible water conservation measures. This includes the Township certifying compliance with the Michigan Section AWWA 'Guidelines for Generally Accepted Water Management Practices for the Public Water Supply Sector.'

More specifically:

Items 1,2 and 3 Metering, Meter Calibration and Replacement Programs, and System Audits: Benton Charter Township has only recently become aware of the poor state of many customer meters within the system. The Township intends to correct deficiencies in customer metering and to accurately track and bill water usage within the system. We are also committed to accurately metering and tracking non-customer use within the proposed water plant and other system components to insure efficient use of resources.

Item 4 Leak Detection and Repair Programs: We are not currently aware of the level of unmetered or lost water within the system. This has not been accurately tracked in the past. Once accurate water production and usage values are available for the system, the Township can determine if significant leakage is occurring. Any significant leakage can then be isolated and repaired.

Item 5 Full Cost Pricing: Benton Charter Township intends to use cost of service accounting and generally accepted accounting practices in rate determination. The Township plans to fully cover system costs through usage billing.

Items 6 and 7 Usage Restrictions, and Conservation Pricing: The Township does not currently have usage restrictions. However, if necessary, the Township would enact irrigation or other restrictions as necessary to control demand during drought or other

emergency conditions. Conservation pricing would also be considered as a tool to control peak demands.

Items 6 and 7 Usage Restrictions, and Conservation Pricing: The Township does not currently have usage restrictions. However, if necessary, the Township would enact irrigation or other restrictions as necessary to control demand during drought or other emergency conditions. Conservation pricing would also be considered as a tool to control peak demands.

Items 8 and 9 Public Information and Education Initiatives: Water bills will be understandable, clearly identifying usage, rates, charges and other pertinent information. Water bills will also periodically include information on home conservation, and provide contact information for reporting problems and making suggestions. The annual Consumer Confidence Report will also be used for public information purposes. Benton Charter Township looks forward to providing educational opportunities to schools and other community groups, once the new Township Water Department and system infrastructure are established.

Items 10, 11 and 12 Irrigation System Efficiency Programs, Water Efficient Landscaping, and Water Efficient Fixtures and Appliances: As noted in the Guidelines, Benton Charter Township does not have direct control over all of these issues. However, the Township does enforce building code issues and will encourage efficient uses of water in irrigation and landscaping.

Item 13 Efficiency Based Boiler and Steam Systems, Cooling Equipment and Towers, and High Water Using Processes: Benton Charter Township will certainly encourage and assist any commercial or industrial users in water usage efficiency efforts.

Items 14, 15, and 16 Water Reuse and Recycling, Land Use Planning, and Additional Opportunities: Benton Charter Township will endeavor to stay informed and evaluate new developments in the fields of water reuse and recycling. The Township will interact with area groups and organizations in planning for efficient use of natural resources through land planning and other means.

In summary, Benton Charter Township fully supports the goals outlined in the Michigan Section AWWA "Guidelines for Generally Accepted Water Management Practices for the Public Water Supply Sector" and certifies that it will conform to the Guidelines in an effort to provide municipal water supply in an environmentally sound and economically feasible manner.

Benton Charter Township looks forward to the issuance of a permit for withdrawal of water from Lake Michigan and thanks you for your assistance in this process.

Sincerely,



Carolyn Phillips, Township Clerk

cc: Mr. Gary Wozniak, P.E., District Engineer, MDEQ
Mr. Joe Lovato, WWCIU, MDEQ
Mr. John K. Olson, P.E., Merritt Engineering, Inc.