

# Vermont Department of Environmental Conservation

Watershed Management Division 103 South Main Street, Building 10 North Waterbury, VT 05671-0408

Agency of Natural Resources

[phone] [fax]

802-241-3777 802-338-4890

January 18, 2012

OMYA, Inc. Attn: Andy McIntosh 62 Main Street Proctor, VT 05765

RE: Discharge Permit No. 3-0349 – Middlebury Quarry

Dear Mr. McIntosh,

Enclosed is your copy of Discharge Permits No. 3-0349 which has been signed on behalf of the Commissioner of the Department of Environmental Conservation. This permit authorizes the discharge of treated commingled quarry dewatering water, process wastewater, and stormwater from your Middlebury facility to Foster and Muddy Brooks.

Please review the permit carefully and make note of the effluent limitations, monitoring requirements, and other special conditions. As proposed in the draft permit sampling has been included to address several potential pollutants. First, since blasting occurs at this facility, perchlorate sampling is required (see Condition I.A.5). Second, to assess the potential for metals to be present in these discharges and the potential for these discharges to cause eutrophication in the receiving waters, metals and nutrient monitoring must be conducted (See Condition I.A.3).

Since we did not receive any comments on this draft permit during the public notice period, the final permit is unchanged from the draft that was placed on public notice for comment.

Please note that this permit does not become effective until April 1, 2012 and if there are any questions regarding this permit please contact me at 802 338-4809.

Sincerely.

Randy Bean, Environmental Analyst V

Watershed Management Division

Attachments

Liz Dickson, VT DEC WSMD

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# AGENCY OF NATURAL RESOURCES DEPARTMENT OF ENVIRONMENTAL CONSERVATION WATERSHED MANAGEMENT DIVISION 103 SOUTH MAIN STREET, - BUILDING 10 NORTH WATERBURY, VERMONT 05671-0408

Permit No.: 3-0349 File No.: 01-11 PIN: RU96-0029

NPDES No.: VT0000990

#### DISCHARGE PERMIT

In compliance with the provisions of the Vermont Water Pollution Control Act, as amended, (10 V.S.A. Chapter 47 §1251 et. seq), the Vermont Water Pollution Control Permit Regulations, and the Federal Clean Water Act, as amended (33 U.S.C. § 1251 et. seq),

OMYA, Inc. 62 Main Street Proctor, VT 05765

(hereinafter referred to as the "permittee") is authorized, by the Secretary, Agency of Natural Resources, to discharge from a facility located at:

1975 Route 7 South Middlebury, Vermont

to the Foster Brook and Muddy Brook, Class B at the point of discharge in accordance with effluent limitations, monitoring requirements, and other conditions set forth in Parts I, II, III hereof.

This permit shall become effective on April 1, 2012.

This permit and the authorization to discharge shall expire on March 31, 2017.

David K. Mears, Commissioner

Department of Environmental Conservation

Peter LaFlamme, Director

Watershed Management Division

Dated: January 18, 2012

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#### **PART I**

# A. EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS

1. From April 1, 2012 through March 31, 2017, the permittee is authorized to discharge from outfall serial number S/N 001 (Foster Brook): quarry dewatering water and quarry process wastewater. Such discharges shall be limited and monitored by the permittee as specified below:

	Discharge	Limitations	Monitoring Requirements			
Effluent Characteristic	Annual Average	Daily Maximum	Measurement Frequency	Sample Type		
Flow (1)		2.8 MGD	Daily (2)	Total Flow		
Turbidity	10 NTU <sup>(3)</sup>		1 x month	Grab		
Total Suspended Solids		10 mg/l	1 x month	Grab		
pН		6.5 to 8.5 SU	1 x month	Grab		

Samples taken in compliance with the monitoring requirements specified above shall be taken at prior to discharge to Foster Brook.

2. From April 1, 2012 through March 31, 2017, the permittee is authorized to discharge from outfall serial number S/N 002 (Muddy Brook): quarry dewatering water and quarry proces water. Such discharges shall be limited and monitored by the permittee as specified below:

	Discharge	Limitations	<b>Monitoring Requirements</b>			
<b>Effluent Characteristic</b>	Annual Average	Daily Maximum	Measurement Frequency	Sample Type		
Flow (1)		2.8 MGD	Daily (2)	Total Flow		
Turbidity	10 NTU <sup>(3)</sup>		1 x month	Grab		
Total Suspended Solids		10 mg/l	1 x month	Grab		
pH		6.5 to 8.5 SU	1 x month	Grab		

Samples taken in compliance with the monitoring requirements specified above shall be taken prior to discharge to Muddy Brook.

- The total volume from **both** discharges shall be limited to 2.8 mgd. The combine and individual flows for each discharge point shall be reported on the monthly discharge monitoring report.
- Flow shall be measured as an estimate based on pump run times and the discharge rate of the pumps.
- (3) Annual average during dry weather conditions

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# 3. Metals and Nutrient Analyses

**By June 30, 2013**, the permittee shall collect and analyze effluent grab samples from discharge points S/N 001 and S/N 002 for the following total metals: antimony, arsenic, cadmium, chromium, copper, iron, lead, nickel, selenium, silver, and zinc and total phosphorus and total nitrogen. The analytical results shall be included as an addendum to the appropriate discharge monitoring report:

Based upon the results of these analyses or any other pollutant analyses conducted on this discharge, this permit may be amended to require additional metals analyses or to establish specific metal effluent limitations.

# 4. Special Conditions

- a. The quarry shall be dewatered as necessary to maintain a constant water level below the production block.
- b. The pump inlets at the sedimentation sumps shall be located sufficiently above the top layer of any settled material to prevent pumping settled solids to the receiving water.
- c. Any material removed from the sumps or settling basins shall be disposed of in accordance with applicable state and federal regulations.
- d. The permitte shall inspect the area downgradient of the discharge points regularly (at least quarterly) for signs of erosion. The permittee shall take prompt action to correct any instances of erosion resulting from these discharges.
- e. The permittee shall implement a spill prevention and control plan to prevent any fuel, chemical spills, or leaks from entering the wastewater treatment system. The permittee shall immediately implement all reasonable steps to prevent any equipment spills or leaks from entering the wastewater treatment collection system. The discharge of any fuels, chemicals, or other pollutants not specifically authorized by this permit is prohibited.
- f. These discharges shall not cause a violation of water quality standards in the receiving waters.

# 5. Perchlorate Analyses

In May 2012 and in September 2012, the permittee shall collect and analyze effluent grab samples from discharge points S/N 001 and S/N 002 for perchlorate.

The result of these analyses shall be included as an addendum to the appropriate discharge monitoring report.

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Based upon the results of these analyses or any other analyses conducted on this discharge, this permit may be amended to require additional analyses or to establish specific effluent limitations

#### B. REAPPLICATION

If the permittee desires to continue to discharge after the expiration date of this permit, he shall apply on the application forms then in use at least 180 days before the permit expires.

Reapply for a Discharge permit by September 30, 2016.

#### C. OPERATING FEES

This discharge is subject to operating fees. The permittees shall submit the operating fees in accord with the procedures provided by the Secretary.

#### D. MONITORING AND REPORTING

# 1. Sampling and Analysis

The sampling, preservation, handling, and analytical methods used shall conform to regulations published pursuant to Section 304(g) of the Clean Water Act, under which such procedures may be required. Guidelines establishing these test procedures have been published in the Code of Federal Regulations, Title 40, Part 136 (Federal Register, Vol. 56, No. 195, July 1, 1999 or as amended).

If applicable, *Escherichia coli* shall be tested using one of the following methods:

- a. "Most Probable Number" (MPN) method 9223B found in Standard Methods for the Examination of Water and Wastewater, 18<sup>th</sup> or subsequent approved edition(s). Premade formulations are available as Colilert and Colilert 18 from IDEXX Labs Inc., Westbrook, ME;
- b. EPA "membrane filtration" (MF) method 1603 using modified mTEC; or
- c. A single step <u>membrane filtration</u> (MF) method using mColiBlue 24 available from Hach Company, Loveland, CO.

Samples shall be representative of the volume and quality of effluent discharged over the sampling and reporting period. All samples are to be taken during normal operating hours. The permittee shall identify the effluent sampling location used for each discharge.

#### 2. Reporting

The Permittee is required to submit monitoring results as specified on a Discharge Monitoring Report (Form WR-43). Reports are due on the 15th day of each month, beginning with the month following the effective date of this permit.

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If, in any reporting period, there has been no discharge, the permittee must submit that information by the report due date.

Signed copies of these, and all other reports required herein, shall be submitted to the Secretary at the following address:

Agency of Natural Resources
Department of Environmental Conservation
Watershed Management Division
103 South Main Street
Waterbury, Vermont 05671-0408

All reports shall be signed:

- a. In the case of corporations, by a principal executive officer of at least the level of vice president, or his/her duly authorized representative, if such representative is responsible for the overall operation of the facility from which the discharge described in the permit form originates;
- b. In the case of a partnership, by a general partner;
- c. In the case of a sole proprietorship, by the proprietor;
- d. In the case of a municipal, State, or other public facility, by either a principal executive officer, ranking elected official, or other duly authorized employee.

#### 3. Recording of Results

The permittee shall maintain records of all information resulting from any monitoring activities required including:

- a. The exact place, date, and time of sampling;
- b. The dates and times the analyses were performed;
- c. The person(s) who performed the analyses;
- d. The analytical techniques and methods used including sample collection handling and preservation techniques;
- e. The results of all required analyses.
- f. The records of monitoring activities and results, including all instrumentation and calibration and maintenance records;
- g. The original calculation and data bench sheets of the operator who performed analysis of the influent or effluent pursuant to requirements of Section I.(A) of this permit.

The results of monitoring requirements shall be reported (in the units specified) on the Vermont reporting form WR-43 or other forms approved by the Secretary.

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# 4. Additional Monitoring

If the permittee monitors any pollutant at the location(s) designated herein more frequently than required by this permit, using approved analytical methods as specified above, the results of such monitoring shall be included in the calculation and reporting of the values required in the Discharge Monitoring Report Form WR-43. Such increased frequency shall also be indicated.

#### **PART II**

# A. MANAGEMENT REQUIREMENTS

# 1. Facility Modification / Change in Discharge:

All discharges authorized herein shall be consistent with the terms and conditions of this permit. The discharge of any pollutant more frequently than, or at a level in excess of, that identified and authorized by this permit shall constitute a violation of the terms and conditions of this permit. Such a violation may result in the imposition of civil and/or criminal penalties pursuant to V.S.A. Chapters 47, 201 and /or 211. Any anticipated facility expansions, production increases, or process modifications which will result in new, different, or increased discharges of pollutants must be reported by submission of a new permit application or, if such changes will not violate the effluent limitations specified in this permit, by notice to the permit issuing authority of such changes. Following such notice, the permit may be modified to specify and limit any pollutants not previously limited.

#### 2. Noncompliance Notification

In the event the permittee is unable to comply with any of the conditions of this permit due, among other reasons, to:

- a. breakdown or maintenance of waste treatment equipment (biological and physical-chemical systems including, but not limited to, all pipes, transfer pumps, compressors, collection ponds or tanks for the segregation of treated or untreated wastes, ion exchange columns, or carbon absorption units),
- b. accidents caused by human error or negligence, or
- c. other causes such as acts of nature,

the permittee shall notify the Secretary within 24 hours of becoming aware of such condition or by the next business day and shall provide the Secretary with the following information, in writing, within five (5) days:

i. cause of non-compliance

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ii. a description of the non-complying discharge including its impact upon the receiving water;

- iii. anticipated time the condition of non-compliance is expected to continue or, if such condition has been corrected, the duration of the period of non-compliance;
- iv. steps taken by the permittee to reduce and eliminate the non-complying discharge; and
- v. steps to be taken by the permittee to prevent recurrence of the condition of non-compliance.

# 3. **Operation and Maintenance**

All waste collection, control, treatment, and disposal facilities shall be operated in a manner consistent with the following:

- a. The permittee shall, at all times, maintain in good working order and operate as efficiently as possible all treatment or control facilities or systems installed or used by the permittee to achieve compliance with the terms and conditions of this permit.
- b. The permittee shall provide an adequate operating staff which is duly qualified to carry out the operation, maintenance, and testing functions required to insure compliance with the conditions of this permit.

#### 4. Quality Control

The permittee shall calibrate and perform maintenance procedures on all monitoring and analytical instrumentation at regular intervals to ensure accuracy of measurements, or shall ensure that both activities will be conducted.

The permittee shall keep records of these activities and shall provide such records upon request of the Secretary.

The permittee shall analyze any additional samples as may be required by the Agency of Natural Resources to ensure analytical quality control.

#### 5. Bypass

The diversion or bypass of facilities, necessary to maintain compliance with the terms and conditions of this permit, is prohibited, except where authorized under terms and conditions of an emergency pollution permit issued pursuant to 10 V.S.A. Section 1268.

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#### 6. Duty to Mitigate

The permittee shall take all reasonable steps to minimize or prevent any adverse impact to waters of the State resulting from non-compliance with any condition specified in this permit, including accelerated or additional monitoring as necessary to determine the nature and impact of the non-complying discharge.

#### 7. Records Retention

All records and information resulting from the monitoring activities required by this permit including all records of analyses performed, calibration and maintenance of instrumentation, and recordings from continuous monitoring instrumentation shall be retained for a minimum of three (3) years, and shall be submitted to Department representatives upon request. This period shall be extended during the course of unresolved litigation regarding the discharge of pollutants or when requested by the Secretary.

# 8. Solids Management

Collected screenings, sludges, and other solids removed in the course of treatment and control of wastewaters shall be stored, treated and disposed of in accord with 10 V.S.A., Chapter 159 and with the terms and conditions of any certification, interim or final, transitional operation authorization or order issued pursuant to 10 V.S.A., Chapter 159 that is in effect on the effective date of this permit or is issued during the term of this permit.

#### 9. Emergency Pollution Permits

Maintenance activities, or emergencies resulting from equipment failure or malfunction, including power outages, which result in an effluent which exceeds the effluent limitations specified herein, shall be considered a violation of the conditions of this permit, unless the permittee immediately applies for, and obtains, an emergency pollution permit under the provisions of 10 V.S.A., Chapter 47, Section 1268. The permittee shall notify the Department of the emergency situation by the next working day.

#### 10 V.S.A., Chapter 47, Section 1268 reads as follows:

"When a discharge permit holder finds that pollution abatement facilities require repairs, replacement or other corrective action in order for them to continue to meet standards specified in the permit, he may apply in the manner specified by the secretary for an emergency pollution permit for a term sufficient to effect repairs, replacements or other corrective action. The permit may be issued without prior public notice if the nature of the emergency will not provide sufficient time to give notice; provided that the secretary shall give public notice as soon as possible but in any event no later than five days after the effective date of the emergency pollution permit. No emergency pollution permit shall be issued unless the applicant certifies and the secretary finds that:

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(1) there is no present, reasonable alternative means of disposing of the waste other than by discharging it into the waters of the state during the limited period of time of the emergency;

- (2) the denial of an emergency pollution permit would work an extreme hardship upon the applicant;
- (3) the granting of an emergency pollution permit will result in some public benefit;
- (4) the discharge will not be unreasonably harmful to the quality of the receiving waters;
- (5) the cause or reason for the emergency is not due to wilful or intended acts or omissions of the applicant."

Application shall be made to the Secretary of the Agency of Natural Resources, Department of Environmental Conservation, 103 South Main Street, Waterbury, Vermont 05671-0408.

#### 10. Power Failure

In order to maintain compliance with the effluent limitations and prohibitions of this permit, the permittee shall either:

- a. Provide an alternative power source sufficient to operate the wastewater control facilities, or if such alternative power source is not in existence,
- b. Halt, reduce, or otherwise control production and/or all discharges upon the reduction, loss, or failure of the primary source of power to the wastewater control facilities.

#### B. RESPONSIBILITIES

#### 1. Right of Entry

The permittee shall allow the Secretary or authorized representative, upon the presentation of proper credentials:

- a. to enter upon the permittee's premises in which an effluent source or any records required to be kept under terms and conditions of the permit are located;
- b. to have access to and copy any records required to be kept under the terms and conditions of the permit;
- c. to inspect any monitoring equipment or method required in the permit; or

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d. to sample any discharge of pollutants.

# 2. Transfer of Ownership or Control

This permit is not transferable without prior written approval of the Secretary. All application and operating fees must be paid in full prior to transfer of this permit. In the event of any change in control or ownership of facilities from which the authorized discharges emanate, the permittee shall provide a copy of this permit to the succeeding owner or controller and shall send written notification of the change in ownership or control to the Secretary. The permittee shall also inform the prospective owner or operator of their responsibility to make an application for transfer of this permit.

This request for transfer application must include as a minimum:

- a. A properly completed application form provided by the Secretary and the applicable processing fee.
- b. A written statement from the prospective owner or operator certifying:
  - i.. The conditions of the operation that contribute to, or affect, the discharge will not be materially different under the new ownership.
  - ii. The prospective owner or operator has read and is familiar with the terms of the permit and agrees to comply with all terms and conditions of the permit.
  - iii. The prospective owner or operator has adequate funding to operate and maintain the treatment system and remain in compliance with the terms and conditions of the permit.
- c. The date of the sale or transfer.

The Secretary may require additional information dependent upon the current status of the facility operation, maintenance, and permit compliance.

# 3. Confidentiality

Pursuant to 10 V.S.A. 1259(b):

"Any records, reports or information obtained under this permit program shall be available to the public for inspection and copying. However, upon a showing satisfactory to the secretary that any records, reports or information or part thereof, other than effluent data, would, if made public, divulge methods or processes entitled to protection as trade secrets, the secretary shall treat and protect those records, reports or information as confidential. Any records, reports or information accorded

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confidential treatment will be disclosed to authorized representatives of the state and the United States when relevant to any proceedings under this chapter."

#### 4. Permit Modification

After notice and opportunity for a hearing, this permit may be modified, suspended, or revoked in whole or in part during its term for cause including, but not limited to, the following:

- a. violation of any terms or conditions of this permit;
- b. obtaining this permit by misrepresentation or failure to disclose fully all relevant facts; or
- c. a change in any condition that requires either a temporary or permanent reduction or elimination of the permitted discharge.

#### 5. Toxic Effluent Standards

That if a toxic effluent standard or prohibition (including any schedule of compliance specified in such effluent standard or prohibition) is established under section 307(a) of the Federal Act for a toxic pollutant which is present in the permittee's discharge and such standard or prohibition is more stringent than any limitation upon such pollutant in the permit, the secretary shall revise or modify the permit in accordance with the toxic effluent standard or prohibition and so notify the permittee.

# 6. Oil and Hazardous Substance Liability

Nothing in this permit shall be construed to preclude the institution of legal action or relieve the permittee from any responsibilities, liabilities, or penalties to which the permittee is or may be subject under 10 V.S.A. §1281.

#### 7. Civil and Criminal Liability

Except as provided in, "Bypass" (Part II, paragraph A.5.), "Power Failure" (Part II, paragraph A.10.), and "Emergency Pollution Permits" (Part II, paragraph A.9.), nothing in this permit shall be construed to relieve the permittee from civil or criminal penalties for noncompliance. Civil and criminal penalties for noncompliance are provided for in 10 V.S.A. Chapters 47, 201 and 211.

#### 8. State Laws

Nothing in this permit shall be construed to preclude the institution of any legal action or relieve the permittee from any responsibilities, liabilities, or penalties established pursuant to any applicable State law or regulation under authority preserved by Section 510 of the Clean Water Act.

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# 9. Property Rights

Issuance of this permit does not convey any property rights in either real or personal property, or any exclusive privileges, nor does it authorize any injury to private property or any invasion of personal rights, nor any infringement of Federal, State, or local laws or regulations.

# 10. Severability

The provisions of this permit are severable, and if any provision of this permit, or the application of any provision of this permit to any circumstance, is held invalid, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected thereby.

# 11. Authority

This permit is issued under authority of 10 V.S.A. Section 1258 and 1259 of the Vermont Water Pollution Control Act, the Vermont Water Pollution Control Regulations and Section 402 of the Clean Water Act. 10 V.S.A. Section 1259 states that: "No person shall discharge any waste, substance, or material into waters of the State, nor shall any person discharge any waste, substance, or material into an injection well or discharge into a publicly owned treatment works any waste which interferes with, passes through without treatment, or is otherwise incompatible with those works or would have a substantial adverse effect on those works or on water quality, without first obtaining a permit for that discharge from the Secretary".

#### **PART III**

### A. OTHER REQUIREMENTS

This permit shall be modified, suspended or revoked to comply with any applicable effluent standard or limitation issued or approved under Sections 301(b) (2) (C), and (D), 304(b) (2), and 307 (a) (2) of the Clean Water Act, if the effluent standard or limitation so issued or approved:

- 1. Contains different conditions or is otherwise more stringent than any effluent limitation in the permit; or
- 2. Controls any pollutant not limited in the permit.

The permit as modified under this paragraph shall also contain any other requirements of the Vermont Water Pollution Control Act then applicable.

#### **B. DEFINITIONS**

For purposes of this permit, the following definitions shall apply:

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The Act - The Vermont Water Pollution Control Act, 10 V.S.A. Chapter 47

**Annual Average** - The highest allowable average of daily discharges calculated as the sum of all daily discharges (mg/l, lbs or gallons) measured during a calendar year divided by the number of daily discharges measured during that year.

**Average** - The arithmetic means of values taken at the frequency required for each parameter over the specified period.

**The Clean Water Act** - The federal Clean Water Act, as amended.

**Composite Sample** - A sample consisting of a minimum of one grab sample per hour collected during a 24-hour period (or lesser period as specified in the section on Monitoring and Reporting) and combined proportionally to flow over that same time period.

**Daily Discharge** - The discharge of a pollutant measured during a calendar day or any 24-hour period that reasonably represents the calendar day for purposes of sampling.

For pollutants with limitation expressed in pounds the daily discharge is calculated as the total pounds of pollutants discharged over the day.

For pollutants with limitations expressed in mg/l the daily discharge is calculated as the average measurement of the pollutant over the day.

**Grab Sample** - An individual sample collected in a period of less than 15 minutes.

**Incompatible Substance (Pollutant)** - Any waste being discharged into the treatment works which interferes with, passes through without treatment, or is otherwise incompatible with said works or would have a substantial adverse effect on these works or on water quality. This includes all pollutants required to be regulated under the Federal Clean Water Act.

**Instantaneous Maximum** - A value not to be exceeded in any grab sample.

**Major Contributing Industry** - One that: (1) has a flow of 50,000 gallons or more per average work day; (2) has a flow greater than five percent of the flow carried by the municipal system receiving the waste; (3) has in its wastes a toxic pollutant in toxic amounts as defined in standards issued under Section 307(a) of the Act; or (4) has a significant impact, either singly or in combination with other contributing industries, on a publicly owned treatment works or on the quality of effluent from that treatment works.

**Maximum Day** (maximum daily discharge limitation) - The highest allowable "daily discharge" (mg/l, lbs or gallons).

**Mean** - The mean value is the arithmetic mean.

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**Monthly Average** - (Average monthly discharge limitation) - The highest allowable average of daily discharges (mg/l, lbs or gallons) over a calendar month, calculated as the sum of all daily discharges (mg/l, lbs or gallons) measured during a calendar month divided by the number of daily discharges measured during that month.

**NPDES** - The National Pollutant Discharge Elimination System.

**Secretary** - The Secretary of the Agency of Natural Resources

**State Certifying Agency** Agency of Natural Resources

Department of Environmental Conservation

Watershed Management Division

103 South Main Street

Waterbury, Vermont 05671-0408

**Weekly Average** - (Average weekly discharge limitation) - The highest allowable average of daily discharges (mg/l, lbs or gallons) over a calendar week, calculated as the sum of all daily discharges (mg/l, lbs or gallons) measured during a calendar week divided by the number of daily discharges measured during that week.

07/2000; u.4/2007

# AGENCY OF NATURAL RESOURCES DEPARTMENT OF ENVIRONMENTAL CONSERVATION WASTEWATER MANAGEMENT DIVISION 103 SOUTH MAIN STREET WATERBURY, VERMONT 05671-0405

# FACT SHEET December 2011

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT TO DISCHARGE TO WATERS OF THE UNITED STATES

FILE NO.: 01-11

PROJECT ID NO.: RU96-0029 NPDES NO: VT0000990 PERMIT NO.: 3-0349

NAME AND ADDRESS OF APPLICANT:

OMYA, Inc. 62 Main Street Proctor, VT 05765

NAME AND ADDRESS OF FACILITY WHERE DISCHARGE OCCURS:

"Middlebury Quarry" 1975 Route 7 South Middlebury, VT

RECEIVING WATERS AND CLASSIFICATION: Foster Brook and Muddy Brook, Class B. Class B waters are suitable for bathing and recreation; irrigation and agricultural uses; good fish habitat; good aesthetic value; acceptable of public water supply with filtration and disinfection.

# I. Proposed Action, Type of Facility, and Discharge Location

The above named applicant has applied to the Vermont Department of Environmental Conservation for a renewal of a discharge permit to discharge into the designated receiving water. The discharge is from the Middlebury Quarry, Middlebury, VT to Foster Brook and Muddy Brook. The facility is a quarry operation with dust control.

# II. <u>Description of Discharge</u>

This permit authorizes the discharge of a commingled wastewater consisting of quarry dewatering water, quarry process water from a dust control and stormwater runoff. A quantitative description of the discharge in terms of significant effluent parameters is presented in section IV. below.

#### III. Limitations and Conditions

The effluent limitations of the permit, the monitoring requirements, and any implementation schedule (if required), may be found on the following pages of the permit:

Effluent Limitations:

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Monitoring Requirements: Page 2

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# IV. Permit Basis and Explanation of Effluent Limitation Derivation

# **History & Summary**

OMYA, Inc owns and operates the "Middlebury Quarry" in Middlebury, VT. The quarry process consists of the extraction of marble for use in OMYA's production facility. Several sources of wastewater are generated on the site and commingle in the collection and treatment system prior to discharge. Specifically:

- 1. Quarry Dewatering Water is generated at the site. Stormwater and groundwater seepage is removed from the quarry to allow for the removal of rock.
- 2. Quarry Operations Waste water is used for various purposes, including dust suppression for transportation and drilling activities.
- 3. Stormwater Runoff is generated on the site from haul roads, storage piles, buildings, etc is conveyed via swales, culverts, and grading back into the quarry.

The Agency has determined that the commingled discharges from the quarrying and stone crushing operations are subject to 40 CFR Part 436, Subpart B — Crushed Stone Subcategory. Subpart B defines process generated wastewater as follows:

"(e) The term "process generated waste water" shall mean any waste water used in the slurry transport of mined material, air emissions control, or processing exclusive of mining. The term shall also include any other water which becomes commingled with such waste water in a pit, pond, lagoon, mine, or other facility used for treatment of such waste water."

Since the quarry dewatering water and the site stormwater runoff combine with the water from dust control in the treatment facility (Sedimentation Sump) the entire commingled discharge from the Sedimentation Sump is defined as process wastewater and subject to the terms and condition of this permit.

The Department has made a determination to reissue a discharge permit for this discharge. Following is a discussion of the specific factors considered in the renewal of this permit.

#### **Effluent Limitations**

Water is discharged from the quarry at two different locations. Specifically:

S/N 001: Water from the southern end of the quarry is collected in a sedimentation sump, then pumped from the quarry through a series of swales and is discharged into Foster Brook.

S/N 002: Water from the northern end of the quarry is collected in a sedimentation sump then pumped from the quarry and through series of swales and is discharged into Muddy Brook.

#### Flow

The flow limitation is 2.8 mgd, maximum day. This limitation applies to the combined discharge from S/N 001 and S/N 002 and is unchanged from the previous permit. Flow monitoring is required daily. The discharge from this facility is variable and depends on the operation of the quarry, rainfall, and groundwater seepage.

# Turbidity

The permit contains a turbidity limitation of 10 NTU, annual average, during dry weather conditions. This limitation is based on Section 3-04.B of the Vermont Water Quality Standards effective January 1, 2008. This limitation applies to both discharge points and is unchanged from the previous permit. Turbidity sampling is required once per month.

# **Total Suspended Solids (TSS)**

The permit contains a TSS limitation of 10 mg/l. This limitation applies to both discharge points. This limitation is based on the best professional judgment of the Agency regarding the proper operation of this type of treatment system and is unchanged from the pervious permit. TSS sampling is required once per month.

#### $\mathbf{H}\mathbf{q}$

A pH limitation has been included in this permit. The proposed pH limitation is 6.5 to 8.5 SU. and is based on Section 3-01.B.9 of the Vermont Water Quality Standards. pH sampling will be required once per month.

#### **Metals and Nutrients**

Since heavy metals are occasionally associated with rock formations in the state, Condition A.3. requires the permittee to conduct a total metals (antimony, arsenic, cadmium, chromium, copper, iron, lead, nickel, selenium, silver, and zinc) analysis of each discharge point by June 30, 2013.

In addition to gather data on various types of discharges and their potential to cause or contribute to instream eutrophication, the draft permit requires that the discharges be sampled for total phosphorus and total nitrogen.

#### **Other Permit Conditions**

Condition A.4.a requires the quarry to be dewatered as necessary to maintain a constant water level below the production block.

Condition A.4.b. requires the pump inlets at the sedimentation sumps shall be located sufficiently above the top layer of any settled material to prevent pumping settled solids to the receiving water.

Condition A.4.c. requires that material removed from the sumps or settling basins shall be disposed of in accordance with applicable state and federal regulations.

Condition A.4.d. requires that the area downgradient of the discharge points be inspected regularly for signs of erosion and any erosion corrected.

Condition A.4.e. requires the permittee to immediately implement a spill prevention and control plan and take all reasonable steps to prevent any equipment spills or leaks from entering the wastewater treatment system.

#### Perchlorate

Since blasting has been done at this quarry, the draft permit contains a monitoring requirement for perchlorate. Perchlorate was present in some types of explosives previously used in the mining and quarrying industry and has been detected in the discharges from other quarries.

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Therefore perchlorate monitoring is being required. Specifically, perchlorate sampling is required once during May and September 2014.

#### VI. Procedures for Formulation of Final Determinations

The public comment period for receiving comments on this draft permit is from December 12, 2011 through January 12, 2012, during that time interested persons may submit their written views on the draft permit. All written comments will be retained by the Department and considered in the formulation of the final determination to issue, deny or modify the draft permit. The period of comment may be extended at the discretion of the Department.

Written comments should be sent to:

Vermont Agency of Natural Resources Department of Environmental Conservation Wastewater Management Division - Sewing Building 103 South Main Street Waterbury, VT 05671-0405

Comments may also be submitted by e-mail using the e-mail comment provisions included at http://www.anr.state.vt.us/dec/ww/Drafts.htm

Any interested person or groups of persons may request or petition for a public hearing with respect to this draft permit. Any such request or petition for a public hearing shall be filed within the public comment period described above and shall indicate the interest of the party filing such request and the reasons why a hearing is warranted.

The Department will hold a hearing if there is significant public interest in holding such a hearing. Any public hearing brought in response to such a request or petition will be held in the geographical area of the draft discharge or other appropriate area, at the discretion of the Department and may, as appropriate, consider related groups of draft permits. Any person may submit oral or written statements and data concerning the draft permit at the public hearing. The Department may establish reasonable limits on the time allowed for oral statements and may require the submission of statements in writing. All statements, comments, and data presented at the public hearing will be retained by the Department and considered in the formulation of the final determination to issue, deny, or modify the draft permit.

The complete application, proposed permit, and other information are on file; and may be inspected at the VANR, VSAC Building, East Allen Street, Winooski, VT. Copies of the permit may be obtained by calling (802) 338-4809; cost of copies is 10 cents per page or at www.anr.state.vt.us/dec/ww/wwmd.cfm. Office hours are 7:45 a.m. to 4:30 p.m., Monday through Friday



State of Vermont

Agency of Natural Resources

Drinking Water and Groundwater Protection Division 103 South Main St – Old Pantry Building Waterbury VT 05671-0403 Telephone: 802-241-3822

January 17, 2012

James Donaldson POB 2123 Waitsfield VT 05673

SUBJECT: Designer License Expiration Notice

License Number 546

Class A

Dear Mr. Donaldson,

A completed request for renewal of your Class A designer license was required to be submitted on or before <u>December 31<sup>st</sup> 2011.</u>

The Wastewater System and Potable Water Supply Rule (ss1-705) states that "All Class A and B designer licenses shall expire annually on December 31<sup>st</sup> unless renewed. Class A and Class B designers shall maintain their licenses by annually filing a request for renewal, accompanied by the applicable fee, and if required that year, an affidavit of proof of continuing education. Expiration of a license for a period exceeding 2 years shall require re-examination prior to relicensing."

Because we have not received a complete license renewal request from you, **your license has expired**. Your name has been removed from the Class A Designer License Lists and until your designer license is renewed you will be unable to work as Class A designer.

If you intend to renew your designer license please complete the "Application for Renewal", "Statement of Applicant" and, if applicable, "Continuing Education Affidavit for Reporting Attendance at Approved Courses" and submit with the renewal fee of \$40.00. Please submit these forms and the renewal fee to the address in the upper right hand corner.

If you have any questions, please contact Dolores Kuhn at <u>dolores.kuhn@state.vt.us</u> or 802-885-8848.

Sincerely,

Dolores L. Kuhn

Assistant Regional Engineer

Dolores & Kuhn

Drinking Water and Groundwater Protection Division

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