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Permit No.: W A-000372-7  
Issuance Date: 9-15-2006  
Effective Date: 10-1-2006  
Expiration Date: 9-30-2011

**NATIONAL POLLUTANT DISCHARGE ELIMINATION  
SYSTEM WASTE DISCHARGE PERMIT NO. WA-000372-7**

State of Washington  
DEPARTMENT OF ECOLOGY  
Olympia, Washington 98504-8711

In compliance with the provisions of  
The State of Washington Water Pollution Control Law  
Chapter 90.48 Revised Code of Washington  
And  
The Federal Water Pollution Control Act  
(The Clean Water Act)  
Title 33 United States Code, Section 1251 et seq.

**AGRIUM U.S. INC.**  
PO BOX 5797  
KENNEWICK, WA 99336

<u>Facility Location:</u> Finley Area East end of Game Farm Road Kennewick, Washington	<u>Receiving Water</u> Columbia River (Groundwater for Sanitary Wastes)
<u>Water Body I.D. No.:</u> WA-CR-I028	<u>Discharge Location</u> Latitude: 46° 10' 30" N Longitude: 119° 04' 40" W
<u>Industry Type:</u> Ammonia Manufacture	

is authorized to discharge in accordance with the special and general conditions which follow.

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Merley F. McCall  
Industrial Section Manager  
Washington State Department of Ecology

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### SUMMARY OF PERMIT REPORT SUBMITTALS

Permit Section	Submittal	Frequency	First Submittal Date
S1D.	Notification of and Procedure for Cleaning Heat Exchangers	Each Change in Procedure	30 days prior to procedure
S3.	Discharge Monitoring Report	Monthly	
S6.	Spill Plan Update	updates submitted as necessary	
G1.	Notice of Change in Authorization	As necessary	
G7.	Application for permit renewal	1/permit cycle	At least 180 days prior to permit expiration

Refer to the Special and General Conditions of this permit for additional submittal requirements

**SPECIAL CONDITIONS**

**S1. DISCHARGE LIMITATIONS**

**A. Process Wastewater Discharges**

All discharges and activities authorized by this permit shall be consistent with the terms and conditions of this permit. The discharge of any pollutants more frequently than or at a concentration in excess of that authorized by this permit shall constitute a violation of the terms and conditions of this permit.

Beginning on the effective date of this permit and lasting through the expiration date, the Permittee is authorized to discharge non-contact cooling water and process water at the permitted location subject to meeting the following limitations:

Parameter	Monthly Average	Daily Maximum
Flow to the River	70 MGD	70 MG
Temperature		89 Degrees Fahrenheit
pH <sup>4</sup>	Within the range 5.6 to 9.0	
Ammonia (as N)	32.5 lbs./day <sup>1</sup>	65.0 lbs./day <sup>1</sup>
Oil and Grease		100 mg/L <sup>2</sup>

<sup>1</sup> Calculated difference between influent and effluent

<sup>2</sup> Limit applied at outflow of API oil/water separator

<sup>4</sup> All readings subject to reporting, consideration of excursions to be governed by 40 CFR 401.17, pH effluent limitations under continuous monitoring.

**B. Mixing Zone Description**

The boundaries of the mixing (dilution) zone are defined by an area that extends 50 feet beyond each side of the first and last riser in the discharge system, and extends downstream from the centerline of the pipe a distance of 300 feet. The top and bottom foot of the river profile are removed from the available dilution zone.

The discharge system contains a number of risers spaced at 9 1/2-foot intervals over a distance of 464 feet. The first riser is 145 feet out into the river from the high water mark and 120 feet out from the low water mark.

**C. Sanitary System Discharges**

Sanitary wastes from the facility are treated on site and discharged to a drainfield. The treatment works was designed to manage domestic waste from a much larger labor force than has been employed at the plant. Significant increases in numbers of personnel at the plant are not anticipated. The design capacity of 8600 gallons per day shall not be exceeded.

**D. Heat Exchanger Cleaning**

The facility's heat exchangers are cleaned every 12 to 18 months. After the exchangers are washed, they are double rinsed and the rinsate is pH adjusted to a range of 6.5 to 7.5. This cleaning procedure shall be regulated as follows.

The pH neutral cleaning solution may be discharged once each 12 months. The discharge shall be limited to a regulated rate not to exceed 35 gallons per minute. The procedure proposed by the vendor selected by Unocal shall be submitted to the Department for approval prior to initiating the procedure.

**S2. MONITORING REQUIREMENTS**

**A. Monitoring Schedule**

Parameter	Units	Sample Point	Minimum Sampling Frequency	Sample Type
Flow	mgd	Influent <sup>1</sup>	Continuous	Flow meter /totalizer
Temperature	°F	Effluent	Monthly	grab
pH	Standard Units	Effluent	Monthly	grab
NH <sub>3</sub> (as N)	mg/l	Effluent	Monthly	grab
NH <sub>3</sub> (as N)	mg/l	Influent	Monthly	grab
NH <sub>3</sub> (as N)	lbs/day <sup>2</sup>	Effluent	Monthly	grab
Oil & Grease	mg/l	API oil/water separator	Monthly during ammonia plant operation	grab

1. Reduce effluent flow, currently about 20% of historic, results in partial pipe discharge flow and does not allow for accurate metering. Influent flow is measured as a proxy for effluent flow.

2. Effluent lbs/day is calculated by subtracting influent ppm from effluent ppm and multiplying by flow.

**B. Sampling and Analytical Procedures**

Samples and measurements taken to meet the requirements of this permit shall be representative of the volume and nature of the monitored parameters, including representative sampling of any unusual discharge or discharge condition, including bypasses, upsets and maintenance-related conditions affecting effluent quality.

Sampling and analytical methods used to meet the water and wastewater monitoring requirements specified in this permit shall conform to the latest revision of the *Guidelines Establishing Test Procedures for the Analysis of Pollutants* contained in 40 CFR Part 136 or to the latest revision of *Standard Methods for the Examination of Water and Wastewater* (APHA), unless otherwise specified in this permit or approved in writing by the Department of Ecology (Department).

**C. Flow Measurement**

The Permittee employs an ultrasonic open channel sensor to continuously monitor and record flow. Any devices employed shall be installed, calibrated, and maintained to ensure that the accuracy of the measurements is consistent with the accepted industry standard for that type of device. Frequency of calibration shall be in conformance with manufacturer's recommendations and at a minimum frequency of at least one calibration per year. Calibration records shall be maintained for at least three years.

**D. Laboratory Accreditation**

All monitoring data required by the Department shall be prepared by a laboratory registered or accredited under the provisions of, *Accreditation of Environmental Laboratories*, Chapter 173-50 WAC . Flow, temperature, settleable solids, conductivity, pH, and internal process control parameters are exempt from this requirement. Conductivity and pH shall be accredited if the laboratory must otherwise be registered or accredited. The Department exempts crops, soils and hazardous waste data from this requirement pending accreditation of laboratories for analysis of these media.

**S3. REPORTING AND RECORDKEEPING REQUIREMENTS**

The Permittee shall monitor and report in accordance with the following conditions. The falsification of information submitted to the Department shall constitute a violation of the terms and conditions of this permit.

**A. Reporting**

The first monitoring period begins on the effective date of the permit. Monitoring results shall be submitted monthly; the permittee shall summarize data obtained during the previous month and shall report it on a form provided—or otherwise approved—by the Department. The permittee shall ensure that the Department receives the data no later than the 15th day of the month following the completed reporting period, unless otherwise specified in this permit. The entity receiving the report(s) shall send it to the Department of Ecology, Industrial Section, PO Box 47706, Olympia WA 98504-7600.

**B. Records Retention**

The Permittee shall retain records of all monitoring information for a minimum of three years. Such information shall include all calibration and maintenance records and all original recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit. This period of retention shall be extended during the course of any unresolved litigation regarding the discharge of pollutants by the Permittee or when requested by the Director.

**C. Recording of Results**

For each measurement or sample taken, the Permittee shall record the following information: (1) the date, exact place, method, and time of sampling; (2) the individual who performed the sampling or measurement; (3) the dates the analyses were performed; (4) who performed the analyses; (5) the analytical techniques or methods used; and (6) the results of all analyses.

**D. Additional Monitoring by the Permittee**

If the Permittee monitors any pollutant more frequently than required by this permit using test procedures specified by Condition S2 of this permit, then the results of this monitoring shall be included in the calculation and reporting of the data submitted in the Permittee's self-monitoring reports.

**E. Noncompliance Notification**

In the event the Permittee is unable to comply with any of the permit terms and conditions due to any cause, the Permittee shall:

1. Immediately take action to stop, contain and cleanup unauthorized discharges or otherwise stop the violation, and correct the problem;
2. Repeat sampling and analysis of any violation and submit the results to the Department within 30 days after becoming aware of the violation;
3. Immediately notify the Department of the failure to comply; and
4. Submit a detailed written report to the Department within thirty days (5 days for upsets and bypasses); unless requested earlier by the Department. The report should describe the nature of the violation, corrective action taken and/or planned, steps to be taken to prevent a recurrence, results of the resampling, and any other pertinent information.

Compliance with these requirements does not relieve the Permittee from responsibility to maintain continuous compliance with the terms and conditions of this permit or the resulting liability for failure to comply.

**S4. OPERATION AND MAINTENANCE**

The Permittee shall at all times be responsible for the proper operation and maintenance of any facilities or systems of control installed to achieve compliance with the terms and conditions of the permit.

**A. Operations and Maintenance Manual**

An Operations and Maintenance (O&M) Manual shall be prepared by the Permittee in accordance with WAC 173-240-150.

The Operations and Maintenance Manual shall be kept available at the permitted facility and all operators shall follow the instructions and procedures of this Manual.

The O&M Manual shall, at a minimum, include:

1. Emergency procedures for plant shutdown and cleanup in event of wastewater system upset Or failure; and
2. Plant maintenance procedures.

**S5. SOLID WASTE DISPOSAL**

**A. Solid Waste Handling**

The Permittee shall handle and dispose of all solid waste material in such a manner as to prevent its entry into state ground or surface water.

**B. Leachate**

The Permittee shall not allow leachate from its solid waste material to enter state waters without providing all known, available and reasonable methods of treatment, nor allow such leachate to cause violations of the State Surface Water Quality Standards, Chapter 173-201A WAC, or the State Ground Water Quality Standards, Chapter 173-200 WAC. The Permittee shall apply for a permit or permit modification as may be required for such discharges to state ground or surface waters.

**S6. SPILL PLAN**

Within 180 days of permit issuance, the Permittee shall submit to the Department an update to its spill control plan for the prevention, containment, and control of spills or unplanned discharges of: 1) oil and petroleum products, 2) materials, which when spilled, or otherwise released into the environment, are designated Dangerous (DW) or Extremely Hazardous Waste (EHW) by the procedures set forth in WAC 173-303-070, or 3) other materials which may become pollutants or cause pollution upon reaching state's waters. The Permittee shall review and update the Spill Plan, as needed, at least annually. Changes to the plan shall be sent to the Department. The plan and any supplements shall be followed throughout the term of the permit.

The updated spill control plan shall include the following:

- A description of the reporting system which will be used to alert responsible managers and legal authorities in the event of a spill.
- A description of preventive measures and facilities (including an overall facility plot showing drainage patterns) which prevent, contain, or treat spills of these materials.
- A list of all oil and chemicals used, processed, or stored at the facility, which may be spilled into state waters.

For the purpose of meeting this requirement, plans and manuals required by 40 CFR Part 112 and contingency plans required by Chapter 173-303 WAC may be submitted.

## GENERAL CONDITIONS

### G1. SIGNATORY REQUIREMENTS

All applications, reports, or information submitted to the Department shall be signed and certified.

A. All permit applications shall be signed by either a principal executive officer of at least the level of vice president of a corporation, a general partner of a partnership, or the proprietor of a sole proprietorship.

B. All reports required by this permit and other information requested by the Department shall be signed by a person described above or by a duly authorized representative of that person. A person is a duly authorized representative only if:

1. The authorization is made in writing by a person described above and submitted to the Department, and
2. The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility, such as the position of plant manager, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters. (A duly authorized representative may thus be either a named individual or any individual occupying a named position.)

C. Changes to authorization. If any authorization under paragraph B.2, above, is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of B.2 must be submitted to the Department prior to or together with any reports, information, or applications to be signed by an authorized representative.

D. Certification. Any person signing a document under this section shall make the following certification:

"I certify under penalty of law, that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

## **G2. RIGHT OF ENTRY**

The Permittee shall allow an authorized representative of the Department, upon the presentation of credentials and such other documents as may be required by law:

- A. To enter upon the premises where a discharge is located or where any records must be kept under the terms and conditions of this permit;
- B. To have access to and copy at reasonable times any records that must be kept under the terms of the permit;
- C. To inspect at reasonable times any monitoring equipment or method of monitoring required in the permit;
- D. To inspect at reasonable times any collection, treatment, pollution management, or discharge facilities; and
- E. To sample at reasonable times any discharge of pollutants.

## **G3. PERMIT ACTIONS**

This permit shall be subject to modification, suspension, or termination, in whole or in part by the Department for any of the following causes:

- A. Violation of any permit term or condition;
- B. Obtaining a permit by misrepresentation or failure to disclose all relevant facts;
- C. A material change in quantity or type of waste disposal;
- D. A material change in the condition of the waters of the state; or
- E. Nonpayment of fees assessed pursuant to RCW 90.48.465.

The Department may also modify this permit, including the schedule of compliance or other conditions, if it determines good and valid cause exists, including promulgation or revisions of regulations or new information.

## **G4. REPORTING A CAUSE FOR MODIFICATION**

The Permittee shall submit a new application, or a supplement to the previous application,

along with required engineering plans and reports, whenever a material change in the quantity or type of discharge is anticipated which is not specifically authorized by this permit. This application shall be submitted at least 60 days prior to any proposed changes. Submission of this application does not relieve the Permittee of the duty to comply with the existing permit until it is modified or reissued.

**G5. PLAN REVIEW REQUIRED**

Prior to constructing or modifying any wastewater control facilities, an engineering report and detailed plans and specifications shall be submitted to the Department for approval in accordance with Chapter 173-240 WAC. Engineering reports, plans, and specifications should be submitted at least 180 days prior to the planned start of construction. Facilities shall be constructed and operated in accordance with the approved plans.

**G6. COMPLIANCE WITH OTHER LAWS AND STATUTES**

Nothing in the permit shall be construed as excusing the Permittee from compliance with any applicable federal, state, or local statutes, ordinances, or regulations.

**G7. DUTY TO REAPPLY**

The Permittee must apply for permit renewal at least 180 days prior to the specified expiration date of this permit.

**G8. PERMIT TRANSFER.**

This permit is automatically transferred to a new owner or operator if:

- A. A written agreement between the old and new owner or operator containing a specific date for transfer of permit responsibility, coverage, and liability is submitted to the Department;
- B. A copy of the permit is provided to the new owner and;
- C. The Department does not notify the Permittee of the need to modify the permit.

Unless this permit is automatically transferred according to section A. above, this permit may be transferred only if the Department modifies it to identify the new Permittee and to incorporate such other requirements as determined necessary.

**G9. REDUCED PRODUCTION FOR COMPLIANCE**

The Permittee, in order to maintain compliance with its permit, shall control production and/or all discharges upon reduction, loss, failure, or bypass of the treatment facility until the facility is restored or an alternative method of treatment is provided. This requirement applies in the situation where, among other things, the primary source of power of the treatment facility is reduced, lost, or fails.

**G10. REMOVED SUBSTANCES**

Collected screenings, grit, solids, sludges, filter backwash, or other pollutants removed in the course of treatment or control of wastewaters shall not be resuspended or reintroduced to the final effluent stream for discharge to state waters.

**G11. TOXIC POLLUTANTS**

If any applicable 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 Clean Water Act for a toxic pollutant and that standard or prohibition is more stringent than any limitation upon such pollutant in the permit, the Department shall institute proceedings to modify or revoke and reissue the permit to conform to the new toxic effluent standard or prohibition.

**G12. OTHER REQUIREMENTS OF 40 CFR**

All other requirements of 40CFR 122.41 and 122.42 are incorporated in this permit by reference.

**G13. ADDITIONAL MONITORING**

The Department may establish specific monitoring requirements in addition to those contained in this permit by administrative order or permit modification.

**G14. PAYMENT OF FEES**

The Permittee shall submit payment of fees associated with this permit as assessed by the Department. The Department may revoke this permit if the permit fees established under Chapter 173-224 WAC are not paid.

**G15. PENALTIES FOR VIOLATING PERMIT CONDITIONS**

Any person who is found guilty of willfully violating the terms and conditions of this permit shall be deemed guilty of a crime, and upon conviction thereof shall be punished by a fine of up to ten thousand dollars and costs of prosecution, or by imprisonment in the discretion of the court. Each day upon which a willful violation occurs may be deemed a separate and additional violation.

Any person who violates the terms and conditions of a waste discharge permit shall incur, in addition to any other penalty as provided by law, a civil penalty in the amount of up to ten thousand dollars for every such violation. Each and every such violation shall be a separate and distinct offense, and in case of a continuing violation, every day's continuance shall be and be deemed to be a separate and distinct violation.