



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 6  
1445 ROSS AVENUE, SUITE 1200  
DALLAS, TX 75202-2733

OCT 24 2008

CERTIFIED MAIL: RETURN RECEIPT REQUESTED (7007 0710 0002 1387 2397)

REPLY TO: 6WQ-NP

Mr. Rick Carpenter  
City of Santa Fe  
Buckman Direct Diversion  
801 West San Mateo  
Santa Fe, NM 87505

Re: Application to Discharge to Waters of the United States Permit No. NM0030848 –  
Buckman Direct Diversion

Dear Mr. Carpenter:

This package constitutes EPA's final permit decision for the above referenced facility. Enclosed are the responses to comments received during the public comment period and the final permit. According to EPA regulations at [40 CFR 124.19], within 30 days after a final permit decision has been issued, any person who filed comments on that draft permit or participated in the public hearing may petition the Environmental Appeals Board to review any condition of the permit decision.

Should you have any questions regarding the final permit, please feel free to contact Scott Stine of the NPDES Permits and TMDL Branch at the above address or by telephone: (214) 665-7182, by fax: (214) 665-2191, or by E-mail: [stine.scott@epa.gov](mailto:stine.scott@epa.gov). Should you have any questions regarding compliance with the conditions of this permit, please contact the Water Enforcement Branch at the above address or by telephone: 214-665-6468.

Sincerely yours,

A handwritten signature in black ink, appearing to read "Miguel I. Flores".

Miguel I. Flores

Director  
Water Quality Protection Division

Enclosures

cc w/enclosures:  
New Mexico Environment Department



REGION 6  
1445 ROSS AVENUE  
DALLAS, TEXAS 75202-2733

NPDES Permit No NM0030848

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## AUTHORIZATION TO DISCHARGE UNDER THE NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM

In compliance with the provisions of the Clean Water Act, as amended, (33 U.S.C. 1251 et. seq; the "Act"),

City of Santa Fe  
Buckman Direct Diversion  
801 West San Mateo  
Santa Fe, NM 87505

is authorized to discharge from a facility located on the east bank of the Rio Grande on Buckman Road in Santa Fe County, New Mexico. The effluent from the site is discharged into the Rio Grande in Waterbody Segment Code No. 20.6.4.114 of the Rio Grande Basin.

The discharge is located on that water at the following coordinates:

Outfall 001: Latitude 35° 50' 10" North, Longitude 106° 09' 43" West

in accordance with this cover page and the effluent limitations, monitoring requirements, and other conditions set forth in Part I, Part II, Part and III hereof.

This permit is a first time issuance.

This permit shall become effective on December 1, 2008

This permit and the authorization to discharge shall expire at midnight, November 30, 2013

Issued on October 24, 2008

Prepared by

Miguel I. Flores  
Director  
Water Quality Protection Division (6WQ)

Scott W. Stine, Ph.D.  
Environmental Scientist  
Permits & Technical Section (6WQ-PP)

**SECTION A. LIMITATIONS AND MONITORING REQUIREMENTS.**

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge gravity separated wastewater from outfall 001. Such discharges shall be limited and monitored by the permittee as specified below:

EFFLUENT CHARACTERISTICS		DISCHARGE LIMITATIONS			MONITORING REQUIREMENTS	
		MINIMUM	MAXIMUM	Standard Units	MEASUREMENT FREQUENCY	SAMPLE TYPE
POLLUTANT	STORET CODE					
pH	00400	6.6	9.0		Once/Week	Grab

  

EFFLUENT CHARACTERISTICS		DISCHARGE LIMITATIONS			MONITORING REQUIREMENTS			
		MONTHLY AVG	DAILY MAX	Lbs/day, unless noted	MONTHLY AVG	DAILY MAX	MEASUREMENT FREQUENCY	SAMPLE TYPE
Flow, outfall 001	50050	Report MGD	Report MGD	Report MGD	***	***	Continuous	Record
Flow, stream, instantaneous (*1)	00061	Report CFS	Report CFS	Report CFS	***	***	Continuous	Record
Settleable Solids, influent (*2)	00545	N/A	N/A	N/A	Report (ml/l)	Report (ml/l)	Once/Week	Grab
Settleable Solids, effluent	00545	N/A	N/A	N/A	Report (ml/l)	Report (ml/l)	Once/Week	Grab
Total Suspended Solids, influent (*2)	00503	N/A	N/A	N/A	Report	Report	Once/Week	Grab
Total Suspended Solids, effluent	00530	N/A	N/A	N/A	Report	Report	Once/Week	Grab
Turbidity - Instream Upstream (*3, 4)	52330	N/A	N/A	N/A	N/A	Report (*5)	Daily (*15)	Grab (*16)
Turbidity - Instream Downstream (*4, 6)	52350	N/A	N/A	N/A	N/A	Report (*5)	Daily (*15)	Grab (*16)
Turbidity (*7, 8)	51517	N/A	N/A	N/A	N/A	0	Daily (*15)	Calculate
Antimony, dissolved (*9)	01097	N/A	N/A	N/A	Report	Report	Once/Quarter	Grab

Arsenic, dissolved (*9)	01000	N/A	N/A	Report	Report	Once/Quarter	Grab
Nickel, dissolved (*9)	01065	N/A	N/A	Report	Report	Once/Quarter	Grab
Selenium, total (*9)	01145	N/A	N/A	Report	Report	Once/Quarter	Grab
Thallium, dissolved (*9)	01059	N/A	N/A	Report	Report	Once/Quarter	Grab
Zinc, dissolved (*9)	01080	N/A	N/A	Report	Report	Once/Quarter	Grab
Cyanide, weak acid dissociable (*9)	00718	N/A	N/A	Report	Report	Once/Quarter	Grab
2,3,7,8-TCDD (*9)	34675	N/A	N/A	Report	Report	Once/Quarter	Grab
Acrolein (*9)	34210	N/A	N/A	Report	Report	Once/Quarter	Grab
Acrylonitrile (*9)	34215	N/A	N/A	Report	Report	Once/Quarter	Grab
Benzene (*9)	34030	N/A	N/A	Report	Report	Once/Quarter	Grab
Bromoform (*9)	32104	N/A	N/A	Report	Report	Once/Quarter	Grab
Carbon Tetrachloride (*9)	32102	N/A	N/A	Report	Report	Once/Quarter	Grab
Chlorobenzene (*9)	34301	N/A	N/A	Report	Report	Once/Quarter	Grab
Chlorodibromomethane (*9)	32105	N/A	N/A	Report	Report	Once/Quarter	Grab
Chloroform (*9)	32106	N/A	N/A	Report	Report	Once/Quarter	Grab
Dichlorobromomethane (*9)	32101	N/A	N/A	Report	Report	Once/Quarter	Grab
1,2-Dichloroethane (*9)	34531	N/A	N/A	Report	Report	Once/Quarter	Grab
1,1-Dichloroethylene (*9)	34501	N/A	N/A	Report	Report	Once/Quarter	Grab
1,2-Dichloropropane (*9)	34541	N/A	N/A	Report	Report	Once/Quarter	Grab
1,3-Dichloropropene (*9)	34561	N/A	N/A	Report	Report	Once/Quarter	Grab
Ethylbenzene (*9)	34371	N/A	N/A	Report	Report	Once/Quarter	Grab
Methyl Bromide (*9)	34413	N/A	N/A	Report	Report	Once/Quarter	Grab
Methylene Chloride (*9)	34423	N/A	N/A	Report	Report	Once/Quarter	Grab
1,1,2,2-Tetrachloroethane (*9)	34516	N/A	N/A	Report	Report	Once/Quarter	Grab
Tetrachloroethylene (*9)	34475	N/A	N/A	Report	Report	Once/Quarter	Grab
Toluene (*9)	34010	N/A	N/A	Report	Report	Once/Quarter	Grab
1,2-trans-Dichloroethylene (*9)	34546	N/A	N/A	Report	Report	Once/Quarter	Grab
1,1,2-Trichloroethane (*9)	34511	N/A	N/A	Report	Report	Once/Quarter	Grab
Trichloroethylene (*9)	39180	N/A	N/A	Report	Report	Once/Quarter	Grab
Vinyl Chloride (*9)	39175	N/A	N/A	Report	Report	Once/Quarter	Grab
2-Chlorophenol (*9)	34586	N/A	N/A	Report	Report	Once/Quarter	Grab
2,4-Dichlorophenol (*9)	34601	N/A	N/A	Report	Report	Once/Quarter	Grab
2,4-Dimethylphenol (*9)	34606	N/A	N/A	Report	Report	Once/Quarter	Grab

2-Methyl-4,6-Dinitrophenol (*9)	34657	N/A	N/A	Report	Report	Once/Quarter	Grab
2,4-Dinitrophenol (*9)	34616	N/A	N/A	Report	Report	Once/Quarter	Grab
Pentachlorophenol (*9)	39032	N/A	N/A	Report	Report	Once/Quarter	Grab
Phenol (*9)	34694	N/A	N/A	Report	Report	Once/Quarter	Grab
2,4,6-Trichlorophenol (*9)	34621	N/A	N/A	Report	Report	Once/Quarter	Grab
Acenaphthene (*9)	34205	N/A	N/A	Report	Report	Once/Quarter	Grab
Anthracene (*9)	34220	N/A	N/A	Report	Report	Once/Quarter	Grab
Benzidine (*9)	39120	N/A	N/A	Report	Report	Once/Quarter	Grab
Benzo(a)anthracene (*9)	34526	N/A	N/A	Report	Report	Once/Quarter	Grab
Benzo(a)pyrene (*9)	34247	N/A	N/A	Report	Report	Once/Quarter	Grab
Benzo(b)fluoranthene (*9)	34230	N/A	N/A	Report	Report	Once/Quarter	Grab
Benzo(k)fluoranthene (*9)	34242	N/A	N/A	Report	Report	Once/Quarter	Grab
Bis(2-chloroethyl)Ether (*9)	34273	N/A	N/A	Report	Report	Once/Quarter	Grab
Bis(2-chloroisopropyl)Ether (*9)	34283	N/A	N/A	Report	Report	Once/Quarter	Grab
Bis(2-ethylhexyl)Phthalate	39100	N/A	N/A	Report	Report	Once/Quarter	Grab
Butyl Benzyl Phthalate (*9)	34292	N/A	N/A	Report	Report	Once/Quarter	Grab
2-Chloronaphthalene (*9)	34581	N/A	N/A	Report	Report	Once/Quarter	Grab
Chrysene (*9)	34320	N/A	N/A	Report	Report	Once/Quarter	Grab
Dibenzo(a,h)anthracene (*9)	34556	N/A	N/A	Report	Report	Once/Quarter	Grab
1,2-Dichlorobenzene (*9)	34536	N/A	N/A	Report	Report	Once/Quarter	Grab
1,3-Dichlorobenzene (*9)	34566	N/A	N/A	Report	Report	Once/Quarter	Grab
1,4-Dichlorobenzene (*9)	34571	N/A	N/A	Report	Report	Once/Quarter	Grab
3,3'-Dichlorobenzidine (*9)	34631	N/A	N/A	Report	Report	Once/Quarter	Grab
Diethyl Phthalate (*9)	34336	N/A	N/A	Report	Report	Once/Quarter	Grab
Dimethyl Phthalate (*9)	34341	N/A	N/A	Report	Report	Once/Quarter	Grab
Dibutyl Phthalate (*9)	39110	N/A	N/A	Report	Report	Once/Quarter	Grab
2,4-Dinitrotoluene (*9)	34611	N/A	N/A	Report	Report	Once/Quarter	Grab
1,2-Diphenylhydrazine (*9)	34346	N/A	N/A	Report	Report	Once/Quarter	Grab
Fluoranthene (*9)	34376	N/A	N/A	Report	Report	Once/Quarter	Grab
Fluorene (*9)	34381	N/A	N/A	Report	Report	Once/Quarter	Grab
Hexachlorobenzene (*9)	39700	N/A	N/A	Report	Report	Once/Quarter	Grab
Hexachlorobutadiene (*9)	34391	N/A	N/A	Report	Report	Once/Quarter	Grab
Hexachlorocyclopentadiene (*9)	34386	N/A	N/A	Report	Report	Once/Quarter	Grab

Hexachloroethane (*9)	34396	N/A	N/A	Report	Report	Once/Quarter	Grab
Indeno(1,2,3-cd)Pyrene (*9)	34403	N/A	N/A	Report	Report	Once/Quarter	Grab
Isophorone (*9)	34408	N/A	N/A	Report	Report	Once/Quarter	Grab
Nitrobenzene (*9)	34447	N/A	N/A	Report	Report	Once/Quarter	Grab
n-Nitrodimethylamine (*9)	34438	N/A	N/A	Report	Report	Once/Quarter	Grab
n-Nitrosodi-n-Propylamine (*9)	34428	N/A	N/A	Report	Report	Once/Quarter	Grab
n-Nitrosodiphenylamine (*9)	34433	N/A	N/A	Report	Report	Once/Quarter	Grab
Pyrene (*9)	34469	N/A	N/A	Report	Report	Once/Quarter	Grab
1,2,4-Trichlorobenzene (*9)	34551	N/A	N/A	Report	Report	Once/Quarter	Grab
Aldrin (*9)	39330	N/A	N/A	Report	Report	Once/Quarter	Grab
Alpha-BHC (*9)	39337	N/A	N/A	Report	Report	Once/Quarter	Grab
Beta-BHC (*9)	39338	N/A	N/A	Report	Report	Once/Quarter	Grab
Gamma-BHC (*9)	39340	N/A	N/A	Report	Report	Once/Quarter	Grab
Chlordane (*9)	39350	N/A	N/A	Report	Report	Once/Quarter	Grab
4,4'-DDT and derivatives (*9)	39300	N/A	N/A	Report	Report	Once/Quarter	Grab
Dieldrin (*9)	39380	N/A	N/A	Report	Report	Once/Quarter	Grab
Alpha-Endosulfan (*9)	34361	N/A	N/A	Report	Report	Once/Quarter	Grab
Beta-Endosulfan (*9)	34356	N/A	N/A	Report	Report	Once/Quarter	Grab
Endosulfan sulfate (*9)	34351	N/A	N/A	Report	Report	Once/Quarter	Grab
Endrin (*9)	39390	N/A	N/A	Report	Report	Once/Quarter	Grab
Endrin Aldelyde (*9)	34366	N/A	N/A	Report	Report	Once/Quarter	Grab
Heptachlor (*9)	39410	N/A	N/A	Report	Report	Once/Quarter	Grab
Heptachlor Epoxide (*9)	39420	N/A	N/A	Report	Report	Once/Quarter	Grab
PCBs (*9, 14)	39516	N/A	N/A	Report	Report	Once/Quarter	Grab
Toxaphene (*9)	39400	N/A	N/A	Report	Report	Once/Quarter	Grab
Aluminum, dissolved (*9)	01106	N/A	N/A	Report	Report	Once/Quarter	Grab
Asbestos (*9, 11)	00948	N/A	N/A	Report	Report	Once/Quarter	Grab
Barium, dissolved (*9)	01005	N/A	N/A	Report	Report	Once/Quarter	Grab
Beryllium, dissolved (*9)	01012	N/A	N/A	Report	Report	Once/Quarter	Grab
Boron, dissolved (*9)	01022	N/A	N/A	Report	Report	Once/Quarter	Grab
Cadmium, dissolved (*9)	01025	N/A	N/A	Report	Report	Once/Quarter	Grab
Chromium, dissolved (*9)	01034	N/A	N/A	Report	Report	Once/Quarter	Grab
Cobalt, dissolved (*9)	01037	N/A	N/A	Report	Report	Once/Quarter	Grab
Copper, dissolved (*9)	01042	N/A	N/A	Report	Report	Once/Quarter	Grab

Lead, dissolved (*9)	01049	N/A	N/A	Report	Report	Once/Quarter	Grab
Mercury, total (*9)	71890	N/A	N/A	Report	Report	Once/Quarter	Grab
Molybdenum, dissolved (*9)	01062	N/A	N/A	Report	Report	Once/Quarter	Grab
Silver, dissolved (*9)	01077	N/A	N/A	Report	Report	Once/Quarter	Grab
Ra-226 and Ra-228 (*9, 12)	11503	N/A	N/A	Report	Report	Once/Quarter	Grab
Uranium, dissolved (*9)	22706	N/A	N/A	Report	Report	Once/Quarter	Grab
Vanadium, dissolved (*9)	01087	N/A	N/A	Report	Report	Once/Quarter	Grab
Adjusted gross alpha (*9, 12)	80029	N/A	N/A	Report	Report	Once/Quarter	Grab
Strontium (*9, 12)	13501	N/A	N/A	Report	Report	Once/Quarter	Grab
Tritium (*9, 12)	04124	N/A	N/A	Report	Report	Once/Quarter	Grab
Nitrate (as N) (*9)	00620	N/A	N/A	Report	Report	Once/Quarter	Grab
Nitrite and Nitrate (*9)	00630	N/A	N/A	Report	Report	Once/Quarter	Grab
Plutonium-238 (*9, 12)	22012	N/A	N/A	Report	Report	Once/Quarter	Grab
Plutonium-239 (*9, 12)	22014	N/A	N/A	Report	Report	Once/Quarter	Grab
Americium-241 (*9, 12)	29865	N/A	N/A	Report	Report	Once/Quarter	Grab

EFFLUENT CHARACTERISTICS WHOLE EFFLUENT TOXICITY TESTING (48-Hour Static Renewal)	DISCHARGE MONITORING		MONITORING REQUIREMENTS	
	30-DAY AVG MINIMUM	48-HR MINIMUM	MEASUREMENT FREQUENCY	SAMPLE TYPE
Daphnia pulex	Report	Report	Once/Quarter (*13)	24-Hr Composite
Pimephales promelas	Report	Report	Once/Quarter (*13)	24-Hr Composite

There shall be no discharge of floating solids or visible foam in other than trace amounts.

There shall be no formation of any depositional structures that reach the surface of the receiving stream downstream of the discharge.

Sampling Location

Samples taken in compliance with the monitoring requirements specified above shall be taken at the discharge from the final treatment unit, unless otherwise noted.

Footnotes

- \* 1 The permittee shall report flow data from USGS gauging station USGS 01313000 "Rio Grande at Otowi Bridge, NM." The permittee is prohibited to discharge to the receiving stream during any period in which the instantaneous stream flow is 150 cfs or less.
- \* 2 Influent sample point, 01G is located no greater than 30 feet upstream of the diversion.
- \* 3 Instream upstream sample point, 01U is located at least 30-feet upstream but not greater than 100-feet of Outfall 001. Sample must be taken within one (1) hour of sample from instream downstream sample point 01D.
- \* 4 The permittee shall report all turbidity measurements taken at sample points 01U and 01D within the reporting period. Results cannot be averaged for reporting purposes (See Part II, Section D, Turbidity Testing).
- \* 5 Nephelometric turbidity units (NTU).
- \* 6 Instream downstream sample point 01D is located at least 100-feet downstream but not greater than 150-feet of Outfall 001. Sample must be taken within one (1) hour of sample from instream upstream sample point 01U.
- \* 7 The permittee shall report the total number of test failures for each reporting period. (See Part II, Section D, Turbidity Testing).
- \* 8 Example calculations are provided in Part II, Section D.4.
- \* 9 Once per quarter. The permittee shall conduct four (4) quarterly samples during the first year that the facility discharges. Additionally, the permittee shall conduct upstream sampling for these pollutants at least 30-feet upstream but not greater than 100-feet upstream of the discharge. These samples shall be taken concurrent with and within one (1) hour of the samples taken at the discharge. The permittee must report the results to EPA Region 6, Water Quality Division, NPDES Permits and TMDL Branch (6WQ-P), EPA Region 6, Compliance Assurance and Enforcement Division, Water Enforcement Branch (6EN-W), and NMED, Surface Water Quality Bureau. The permittee may discontinue monitoring after the completion of one year of quarterly sampling.
- \* 11 fibers/l
- \* 12 pCi/l
- \* 13 Once per quarter. If the four (4) quarterly tests occurring during the first full year of testing pass, then the monitoring frequency for *Ceriodaphnia dubia* may be reduced to once/six-months and *Pimephales promelas* may be reduced to once/year. See Part II of the Permit for monitoring frequency reduction. If any test failures occur subsequent to monitoring frequency reduction, the frequency shall return to once/quarter for the remainder of the permit. The frequency shall revert to once/quarter on the last day of the term of the permit. If any test demonstrates significant toxic effects, testing for the affected species will continue at once/quarter until the expiration date of the permit. Additionally, for this failure, TRE requirements, as defined in Part II, Section F, Whole Effluent Toxicity Testing Requirements, will be conducted. At the expiration date of this permit, until a renewal permit is issued, biomonitoring frequency monitoring reverts to

once per quarter until the permit is re-issued. See Part II, Section F of the permit.

\* 14 See Part II, Section A.1 of the permit.

\* 15 Turbidity measurements are required on a daily basis only on days when the river diversion is operating.

\* 16 The permittee may utilize an instream probe for the purpose of measuring turbidity. However, the same sample type shall be used to measure both upstream and downstream turbidity.

**PART II - OTHER CONDITIONS****A. MINIMUM QUANTIFICATION LEVEL (MQL)**

See list of MQL's at Appendix A of the Part II below. For pollutants listed on Appendix A of Part II with MQL's, analyses must be performed to the listed MQL. If any individual analytical test result is less than the MQL listed, a value of zero (0) may be used for that pollutant result for the Discharge Monitoring Report (DMR) calculations and reporting requirements.

In addition, any additional pollutant sampling for purposes of this permit, including renewal applications or any other reporting, shall be tested to the MQL shown on the attached Appendix A of Part II. Results of analyses that are less than the listed MQL may be reported as "non detect" (ND).

**1. PCBs**

The permittee shall use EPA Method 1668 Revision A: Chlorinated Biphenyl Congeners in Water, Soil, Sediment, and Tissue by HRGC/HRMS [EPA No EPA-821-R-00-002] as the analytical test protocol for all PCB analysis. The minimum quantification level (MQL) for PCB shall be  $MQL = 3.3 \times \text{minimum detection level (MDL)}$ , as determined according to EPA Region 6 policy (i.e., 40 CFR 136 Appendix B). This value shall supersede the MQL listed in Appendix A of Part II of the permit.

**B. 24-HOUR ORAL REPORTING: DAILY MAXIMUM LIMITATION VIOLATIONS**

Under the provisions of Part III.D.7.b.(3) of this permit, violations of daily maximum limitations for the following pollutants shall be reported orally to EPA Region 6, Compliance and Assurance Division, Water Enforcement Branch (6EN-W), Dallas, Texas, and concurrently to NMED within 24 hours from the time the permittee becomes aware of the violation followed by a written report in five days.

None

**C. PERMIT MODIFICATION AND REOPENER**

In accordance with 40 CFR 122.44(d), the permit may be reopened and modified during the life of the permit if relevant portions of New Mexico's Water Quality Standards for Interstate and Intrastate Streams are revised, new or revised TMDL's or new State water quality standards are established and/or remanded by the New Mexico Water Quality Control Commission.

**SECTION B. COMPLIANCE SCHEDULES.**

None.

**SECTION C. MONITORING AND REPORTING.**

Monitoring information shall be on Discharge Monitoring Report Form(s) EPA 3320-1 as specified in Part III.D.4 of this permit and shall be submitted monthly.

1. Reporting periods shall end on the last day of the month.
2. The permittee is required to submit regular monthly reports as described above postmarked no later than the 15th day of the month following each reporting period.
3. If any 7-day average or daily maximum value exceeds the effluent limitations specified in Part I.A, the permittee shall report the excursion in accordance with the requirements of Part III.D.
4. Any 30-day average, 7-day average, or daily maximum value reported in the required Discharge Monitoring Report which is in excess of the effluent limitation specified in Part I.A shall constitute evidence of violation of such effluent limitation and of this permit.

In accordance with 40 CFR Part 122.62 (s) (2), the permit may be reopened and modified if new information is received that was not available at the time of permit issuance that would have justified the application of different permit conditions at the time of permit issuance. Permit modifications shall reflect the results of any of these actions and shall follow regulations listed at 40 CFR Part 124.5.

The permit may be reopened and modified to evaluate the facility's actual flow and determine the appropriateness of the critical dilution stated in Part II, Section E of the permit.

#### D. TURBIDITY TESTING

##### 1. Reporting Turbidity Measurements at Instream Sample Points 01U and 01D

The permittee shall report all turbidity measurements taken at Instream Sample Points 01U and 01D within the reporting period. Instream Sample Point 01U shall be reported as STORET Code No. 52330 and Instream Sample Point 01D shall be reported as STORET Code No. 52350. These values shall not be averaged for reporting purposes.

##### 2. Determining Turbidity Test Results

(a) If turbidity reported at Instream Sample Point 01U is 50 NTU or less:

If the difference of the measured turbidity at Instream Sample Points 01U and 01D is greater than 10 NTU, assign a "1" to the turbidity test; otherwise, assign a "0."

(b) If turbidity reported at Instream Sample Point 01U is greater than 50 NTU:

If the difference of the measured turbidity at Instream Sample Points 01U and 01D is greater than 20% of the turbidity recorded from Sample Point 01U, assign a "1" to the turbidity test; otherwise, assign a "0."

##### 3. Reporting Total Turbidity Test Failures

(a) If turbidity test failures occur during the reporting period:

Sum the numerical values assigned to each turbidity test taken within the reporting period. Enter this amount for STORET Code No. 51517 in the report.

(b) If no turbidity test failures occur during the reporting period:

Enter a "0" for STORET Code No. 51517 in the report.

4. Example Calculations

In this example, the permittee is required to sample four (4) times within a reporting period:

(a) Sample 1

Instream Sample Point 01U turbidity measurement: 20 NTU  
Instream Sample Point 01D turbidity measurement: 25 NTU

Instream Sample Point 01U turbidity is less than 50 NTU, therefore Part II D.2(a) criteria will be used. The difference of the turbidity at Instream Sample Points 01U and 01D is 5 NTU, which is less than the 10 NTU criteria. Therefore, this sample is a "Pass" and would have a value of "0."

(b) Sample 2

Instream Sample Point 01U turbidity measurement: 20 NTU  
Instream Sample Point 01D turbidity measurement: 40 NTU

Instream Sample Point 01U turbidity is less than 50 NTU, therefore Part II D.2(a) criteria will be used. The difference of the turbidity at Instream Sample Points 01U and 01D is 20 NTU, which is greater than the 10 NTU criteria. Therefore, this sample is a "Fail" and would have a value of "1."

(c) Sample 3

Instream Sample Point 01U turbidity measurement: 100 NTU  
Instream Sample Point 01D turbidity measurement: 115 NTU

Instream Sample Point 01U turbidity is greater than 50 NTU, therefore Part II D.2(b) criteria will be used. Twenty percent (20%) of Instream Sample Point 01U turbidity is 20 NTU. The difference of the turbidity at Instream Sample Points 01U and 01D is 15 NTU, which is less than the 20 NTU criteria. Therefore, this sample is a "Pass" and would have a value of "0."

(d) Sample 4

Instream Sample Point 01U turbidity measurement: 100 NTU  
Instream Sample Point 01D turbidity measurement: 150 NTU

Instream Sample Point 01U turbidity is greater than 50 NTU, therefore Part II D.2(b) criteria will be used. Twenty percent (20%) of Instream Sample Point 01U turbidity is 20 NTU. The difference of the turbidity at Instream Sample Points 01U and 01D is 50 NTU, which is greater than the 20 NTU criteria. Therefore, this sample is a "Fail" and would have a value of "1."

(e) Sample Reporting

The permittee will report all turbidity measurements from Instream Sample Points 01U and 01D.

The permittee shall also sum each pass/fail test result. In this example,

Sample 1:	0
Sample 2:	1
Sample 3:	0
<u>Sample 4:</u>	<u>1</u>
Total:	2

Therefore, the permittee would enter a "2" for STORET Code No. 51517.

**E. STREAM BOTTOM DEPOSITS**

The permittee shall conduct a study that includes physical and biological assessments for the purpose of evaluating the impact of the discharge on streambed morphology and aquatic species. The permittee shall design the study and submit an outline to the EPA and NMED for approval at least ninety (90) days prior to the first discharge.

The physical assessment shall include a morphological evaluation of a cross section of the stream downstream of Outfall 001. A baseline assessment shall be conducted at least thirty (30) days prior to the first discharge, and subsequent assessments shall be conducted quarterly thereafter. These assessments shall be used to monitor the accumulation of sediment and the formation of depositional features.

The biological component of the study shall include a baseline survey that will be conducted at least thirty (30) days prior to the first discharge, and subsequent assessments shall be conducted quarterly thereafter. These assessments shall be used to determine the occurrence of adverse impacts on aquatic life. If adverse impacts to aquatic life exist, the permittee shall notify EPA and NMED in writing within five days. The permittee shall reevaluate discharge alternatives, including the termination of discharge.

The results of the study shall be submitted in writing to EPA Region 6, Water Quality Division, NPDES Permits and TMDL Branch (6WQ-P), EPA Region 6, Compliance and Assurance Division, Water Enforcement Branch (6EN-W), and NMED, Surface Water Quality Bureau once a year.

**F. WHOLE EFFLUENT TOXICITY TESTING (48 HOUR ACUTE NOEC FRESHWATER)**

*It is unlawful and a violation of this permit for a permittee or his designated agent, to manipulate test samples in any manner, to delay sample shipment, or to terminate or to cause to terminate a toxicity test. Once initiated, all toxicity tests must be completed unless specific authority has been granted by EPA Region 6 or the State NPDES permitting authority.*

**1. SCOPE AND METHODOLOGY**

- a. The permittee shall test the effluent for toxicity in accordance with the provisions in this section.

APPLICABLE TO FINAL OUTFALL(S): 001

REPORTED ON DMR AS FINAL OUTFALL: 001

CRITICAL DILUTION (%): 6.0%

EFFLUENT DILUTION SERIES (%): 2.5, 3.4, 4.5, 6.0, 8.0%

COMPOSITE SAMPLE TYPE: Defined at PART I

TEST SPECIES/METHODS: 40 CFR Part 136

Daphnia pulex acute static renewal 48 hour definitive toxicity test using EPA 821 R 02 012, or the latest update thereof. A minimum of five (5) replicates with eight (8) organisms per replicate must be used in the control and in each effluent dilution of this test.

Pimephales promelas (Fathead minnow) acute static renewal 48 hour definitive toxicity test using EPA 821 R 02 012, or the latest update thereof. A minimum of five (5) replicates with eight (8) organisms per replicate must be used in the control and in each effluent dilution of this test.

- b. The NOEC (No Observed Lethal Effect Concentration) is defined as the greatest effluent dilution at and below which lethality that is statistically different from the control (0% effluent) at the 95% confidence level does not occur. Acute test failure is defined as a demonstration of a statistically significant lethal effect at test completion to a test species at or below the critical dilution.

- c. This permit may be reopened to require whole effluent toxicity limits, chemical specific effluent limits, additional testing, and/or other appropriate actions to address toxicity.

## 2. PERSISTENT LETHALITY

The requirements of this subsection apply only when a toxicity test demonstrates significant lethal effects at or below the critical dilution. Significant lethal effects are herein defined as a statistically significant difference at the 95% confidence level between the survival of the appropriate test organism in a specified effluent dilution and the control (0% effluent). The purpose of additional tests (also referred to as 'retests' or confirmation tests) is to determine the duration of a toxic event. A test that meets all test acceptability criteria and demonstrates significant toxic effects does not need additional confirmation.

Such testing cannot confirm or disprove a previous test result.

If any valid test demonstrates significant lethal effects to a test species at or below the critical dilution, the frequency of testing for this species is automatically increased to once per quarter with no option for frequency reduction.

### a. Part I Testing Frequency Other Than Monthly

- i. The permittee shall conduct a total of three (3) additional tests for any species that demonstrates significant lethal effects at or below the critical dilution. The two additional tests shall be conducted monthly during the next three consecutive months. If testing on a quarterly basis, the permittee may substitute one of the additional tests in lieu of one routine toxicity test. A full report shall be prepared for each test required by this section in accordance with procedures outlined in Item 4 of this section and submitted with the period discharge monitoring report (DMR) to the permitting authority for review.
- ii. If any of the additional tests demonstrates significant lethal effects at or below the critical dilution, the permittee shall initiate Toxicity Reduction Evaluation (TRE) requirements as specified in Item 5 of this section. The permittee shall notify EPA in writing within 5 days of the failure of any retest, and the TRE initiation date will be the test completion date of the first failed retest. A TRE may be also be required due to a demonstration of intermittent lethal effects at or below the critical dilution, or for failure to perform the required retests.
- iii. The provisions of Item 2.a are suspended upon submittal of the TRE Action Plan.

### b. Part I Testing Frequency of Monthly

The permittee shall initiate the Toxicity Reduction Evaluation (TRE) requirements as specified in Item 5 of this section when any two of three

consecutive monthly toxicity tests exhibit significant lethal effects at or below the critical dilution. A TRE may also be required due to a demonstration of intermittent lethal effects at or below the critical dilution, or for failure to perform the required retests.

### 3. REQUIRED TOXICITY TESTING CONDITIONS

#### a. Test Acceptance

The permittee shall repeat a test, including the control and all effluent dilutions, if the procedures and quality assurance requirements defined in the test methods or in this permit are not satisfied, including the following additional criteria:

- i. Each toxicity test control (0% effluent) must have a survival equal to or greater than 90%.
- ii. The percent coefficient of variation between replicates shall be 40% or less in the control (0% effluent) for: *Daphnia pulex* survival test; and Fathead minnow survival test.
- iii. The percent coefficient of variation between replicates shall be 40% or less in the critical dilution, unless significant lethal effects are exhibited for: *Daphnia pulex* survival test; and Fathead minnow survival test.

Test failure may not be construed or reported as invalid due to a coefficient of variation value of greater than 40%. A repeat test shall be conducted within the required reporting period of any test determined to be invalid.

#### b. Statistical Interpretation

For the *Daphnia pulex* survival test and the Fathead minnow survival test, the statistical analyses used to determine if there is a statistically significant difference between the control and the critical dilution shall be in accordance with the methods for determining the No Observed Effect Concentration (NOEC) as described in EPA 821 R 02 012 or the most recent update thereof.

If the conditions of Test Acceptability are met in Item 3.a above and the percent survival of the test organism is equal to or greater than 90% in the critical dilution concentration and all lower dilution concentrations, the test shall be considered to be a passing test, and the permittee shall report an NOEC of not less than the critical dilution for the DMR reporting requirements found in Item 4 below.

#### c. Dilution Water

- i. Dilution water used in the toxicity tests will be receiving water collected as close to the point of discharge as possible but unaffected by the discharge. The permittee shall substitute synthetic dilution water of

similar pH, hardness, and alkalinity to the closest downstream perennial water for;

- (A) toxicity tests conducted on effluent discharges to receiving water classified as intermittent streams; and
  - (B) toxicity tests conducted on effluent discharges where no receiving water is available due to zero flow conditions.
- ii. If the receiving water is unsatisfactory as a result of instream toxicity (fails to fulfill the test acceptance criteria of Item 3.a), the permittee may substitute synthetic dilution water for the receiving water in all subsequent tests provided the unacceptable receiving water test met the following stipulations:
- (A) a synthetic dilution water control which fulfills the test acceptance requirements of Item 3.a was run concurrently with the receiving water control;
  - (B) the test indicating receiving water toxicity has been carried out to completion (i.e., 48 hours);
  - (C) the permittee includes all test results indicating receiving water toxicity with the full report and information required by Item 4 below; and
  - (D) the synthetic dilution water shall have a pH, hardness, and alkalinity similar to that of the receiving water or closest downstream perennial water not adversely affected by the discharge, provided the magnitude of these parameters will not cause toxicity in the synthetic dilution water.
- d. Samples and Composites
- i. The permittee shall collect two flow weighted composite samples from the outfall(s) listed at Item 1.a above.
  - ii. The permittee shall collect a second composite sample for use during the 24 hour renewal of each dilution concentration for both tests. The permittee must collect the composite samples so that the maximum holding time for any effluent sample shall not exceed 36 hours. The permittee must have initiated the toxicity test within 36 hours after the collection of the last portion of the first composite sample. Samples shall be chilled to 4 degrees Centigrade during collection, shipping, and/or storage.

- iii. The permittee must collect the composite samples such that the effluent samples are representative of any periodic episode of chlorination, biocide usage or other potentially toxic substance discharged on an intermittent basis.
- iv. If the flow from the outfall(s) being tested ceases during the collection of effluent samples, the requirements for the minimum number of effluent samples, the minimum number of effluent portions and the sample holding time are waived during that sampling period. However, the permittee must collect an effluent composite sample volume during the period of discharge that is sufficient to complete the required toxicity tests with daily renewal of effluent. When possible, the effluent samples used for the toxicity tests shall be collected on separate days. The effluent composite sample collection duration and the static renewal protocol associated with the abbreviated sample collection must be documented in the full report required in Item 4 of this section.

#### 4. REPORTING

- a. The permittee shall prepare a full report of the results of all tests conducted pursuant to this Part in accordance with the Report Preparation Section of EPA 821 R 02 012, for every valid or invalid toxicity test initiated, whether carried to completion or not. The permittee shall retain each full report pursuant to the provisions of PART III.C.3 of this permit. The permittee shall submit full reports upon the specific request of the Agency. For any test which fails, is considered invalid or which is terminated early for any reason, the full report must be submitted for agency review.
- b. A valid test for each species must be reported on the DMR during each reporting period specified in PART I of this permit unless the permittee is performing a TRE which may increase the frequency of testing and reporting. Only ONE set of biomonitoring data for each species is to be recorded on the DMR for each reporting period. The data submitted should reflect the LOWEST Survival results for each species during the reporting period. All invalid tests, repeat tests (for invalid tests), and retests (for tests previously failed) performed during the reporting period must be attached to the DMR for EPA review.
- c. The permittee shall report the following results of each valid toxicity test on the subsequent monthly DMR for that reporting period in accordance with PART III.D.4 of this permit. Submit retest information clearly marked as such with the following month's DMR. Only results of valid tests are to be reported on the DMR.
  - i. *Pimephales promelas* (Fathead minnow)

- (A) If the No Observed Effect Concentration (NOEC) for survival is less than the critical dilution, enter a "1"; otherwise, enter a "0" for Parameter No. TEM6C.
  - (B) Report the NOEC value for survival, Parameter No. TOM6C.
  - (C) Report the highest (critical dilution or control) Coefficient of Variation, Parameter No. TQM6C.
- ii. *Daphnia pulex*
- (A) If the NOEC for survival is less than the critical dilution, enter a "1"; otherwise, enter a "0" for Parameter No. TEM3D
  - (B) Report the NOEC value for survival, Parameter No. TOM3D.
  - (C) Report the highest (critical dilution or control) Coefficient of Variation, Parameter No. TQM3D.
- d. Enter the following codes on the DMR for retests only:
- i. For retest number 1, Parameter 22415, enter a "1" if the NOEC for survival is less than the critical dilution; otherwise, enter a "0."
  - ii. For retest number 2, Parameter 22416, enter a "1" if the NOEC for survival is less than the critical dilution; otherwise, enter a "0."

## 5. TOXICITY REDUCTION EVALUATION (TRE)

- a. Within ninety (90) days of confirming lethality in the retests, the permittee shall submit a Toxicity Reduction Evaluation (TRE) Action Plan and Schedule for conducting a TRE. The TRE Action Plan shall specify the approach and methodology to be used in performing the TRE. A Toxicity Reduction Evaluation is an investigation intended to determine those actions necessary to achieve compliance with water quality based effluent limits by reducing an effluent's toxicity to an acceptable level. A TRE is defined as a step wise process which combines toxicity testing and analyses of the physical and chemical characteristics of a toxic effluent to identify the constituents causing effluent toxicity and/or treatment methods which will reduce the effluent toxicity. The TRE Action Plan shall lead to the successful elimination of effluent toxicity at the critical dilution and include the following:
- i. **Specific Activities.** The plan shall detail the specific approach the permittee intends to utilize in conducting the TRE. The approach may include toxicity characterizations, identifications and confirmation activities, source evaluation, treatability studies, or alternative approaches. When the permittee conducts Toxicity Characterization

Procedures the permittee shall perform multiple characterizations and follow the procedures specified in the documents "Methods for Aquatic Toxicity Identification Evaluations: Phase I Toxicity Characterization Procedures" (EPA 600/6 91/003) or alternate procedures. When the permittee conducts Toxicity Identification Evaluations and Confirmations, the permittee shall perform multiple identifications and follow the methods specified in the documents "Methods for Aquatic Toxicity Identification Evaluations, Phase II Toxicity Identification Procedures for Samples Exhibiting Acute and Chronic Toxicity" (EPA/600-R-92/080) and "Methods for Aquatic Toxicity Identification Evaluations, Phase III Toxicity Confirmation Procedures for Samples Exhibiting Acute and Chronic Toxicity" (EPA/600-R-92/081), as appropriate.

The documents referenced above may be obtained through the National Technical Information Service (NTIS) by phone at (703) 487 4650, or by writing:

U.S. Department of Commerce  
National Technical Information Service  
5285 Port Royal Road  
Springfield, VA 22161

- ii. Sampling Plan (e.g., locations, methods, holding times, chain of custody, preservation, etc.). The effluent sample volume collected for all tests shall be adequate to perform the toxicity test, toxicity characterization, identification and confirmation procedures, and conduct chemical specific analyses when a probable toxicant has been identified;  
  
Where the permittee has identified or suspects specific pollutant(s) and/or source(s) of effluent toxicity, the permittee shall conduct, concurrent with toxicity testing, chemical specific analyses for the identified and/or suspected pollutant(s) and/or source(s) of effluent toxicity. Where lethality was demonstrated within 24 hours of test initiation, each composite sample shall be analyzed independently. Otherwise the permittee may substitute a composite sample, comprised of equal portions of the individual composite samples, for the chemical specific analysis;
  - iii. Quality Assurance Plan (e.g., QA/QC implementation, corrective actions, etc.); and
  - iv. Project Organization (e.g., project staff, project manager, consulting services, etc.).
- b. The permittee shall initiate the TRE Action Plan within thirty (30) days of plan and schedule submittal. The permittee shall assume all risks for failure to achieve the required toxicity reduction.

- c. The permittee shall submit a quarterly TRE Activities Report, with the Discharge Monitoring Report in the months of January, April, July and October, containing information on toxicity reduction evaluation activities including:
- i. any data and/or substantiating documentation which identifies the pollutant(s) and/or source(s) of effluent toxicity;
  - ii. any studies/evaluations and results on the tractability of the facility's effluent toxicity; and
  - iii. any data which identifies effluent toxicity control mechanisms that will reduce effluent toxicity to the level necessary to meet no significant lethality at the critical dilution.

A copy of the TRE Activities Report shall also be submitted to the state agency.

- d. The permittee shall submit a Final Report on Toxicity Reduction Evaluation Activities no later than twenty eight (28) months from confirming lethality in the retests, which provides information pertaining to the specific control mechanism selected that will, when implemented, result in reduction of effluent toxicity to no significant lethality at the critical dilution. The report will also provide a specific corrective action schedule for implementing the selected control mechanism.

A copy of the Final Report on Toxicity Reduction Evaluation Activities shall also be submitted to the state agency.

- e. Quarterly testing during the TRE is a minimum monitoring requirement. EPA recommends that permittees required to perform a TRE not rely on quarterly testing alone to ensure success in the TRE, and that additional screening tests be performed to capture toxic samples for identification of toxicants. Failure to identify the specific chemical compound causing toxicity test failure will normally result in a permit limit for whole effluent toxicity limits per federal regulations at 40 CFR 122.44(d)(1)(v).

6. MONITORING FREQUENCY REDUCTION

- a. The permittee may apply for a testing frequency reduction upon the successful completion of the first four consecutive quarters of testing for one or both test species, with no lethal effects demonstrated at or below the critical dilution. If granted, the monitoring frequency for that test species may be reduced to not less than once per year for the less sensitive species (usually the Fathead minnow) and not less than twice per year for the more sensitive test species (usually the *Daphnia pulex*).
- b. CERTIFICATION - The permittee must certify in writing that no test failures have occurred and that all tests meet all test acceptability criteria in item 3.a. above. In addition the permittee must provide a list with each test performed

including test initiation date, species, NOECs for lethal effects and the maximum coefficient of variation for the controls. Upon review and acceptance of this information the agency will issue a letter of confirmation of the monitoring frequency reduction. A copy of the letter will be forwarded to the agency's Permit Compliance System section to update the permit reporting requirements.

- c. SURVIVAL FAILURES - If any test fails the survival endpoint at any time during the life of this permit, three monthly retests are required and the monitoring frequency for the affected test species shall be increased to once per quarter until the permit is re-issued. Monthly retesting is not required if the permittee is performing a TRE.
- d. This monitoring frequency reduction applies only until the expiration date of this permit, at which time the monitoring frequency for both test species reverts to once per quarter until the permit is re-issued.

## APPENDIX A of PART II

The following Minimum Quantification Levels (MQL's) are to be used for reporting pollutant data for NPDES permit applications and/or compliance reporting.

POLLUTANTS	MQL µg/l	POLLUTANTS	MQL µg/l
<b>METALS, RADIOACTIVITY, CYANIDE and CHLORINE</b>			
Aluminum	2.5	Molybdenum	10
Antimony	60	Nickel	0.5
Arsenic	0.5	Selenium	5
Barium	100	Silver	0.5
Beryllium	0.5	Thallium	0.5
Boron	100	Uranium	0.1
Cadmium	1	Vanadium	50
Chromium	10	Zinc	20
Cobalt	50	Cyanide	10
Copper	0.5	Cyanide, weak acid dissociable	10
Lead	0.5	Total Residual Chlorine	33
Mercury *1	0.0005 0.005		
<b>DIOXIN</b>			
2,3,7,8-TCDD	0.00001		
<b>VOLATILE COMPOUNDS</b>			
Acrolein	50	1,3-Dichloropropylene	10
Acrylonitrile	20	Ethylbenzene	10
Benzene	10	Methyl Bromide	50
Bromoform	10	Methylene Chloride	20
Carbon Tetrachloride	2	1,1,2,2-Tetrachloroethane	10
Chlorobenzene	10	Tetrachloroethylene	10
Clorodibromomethane	10	Toluene	10
Chloroform	50	1,2-trans-Dichloroethylene	10
Dichlorobromomethane	10	1,1,2-Trichloroethane	10
1,2-Dichloroethane	10	Trichloroethylene	10
1,1-Dichloroethylene	10	Vinyl Chloride	10
1,2-Dichloropropane	10		
<b>ACID COMPOUNDS</b>			
2-Chlorophenol	10	2,4-Dinitrophenol	50
2,4-Dichlorophenol	10	Pentachlorophenol	5
2,4-Dimethylphenol	10	Phenol	10
4,6-Dinitro-o-Cresol	50	2,4,6-Trichlorophenol	10

<b>POLLUTANTS</b>	<b>MQL µg/l</b>	<b>POLLUTANTS</b>	<b>MQL µg/l</b>
<b>BASE/NEUTRAL</b>			
Acenaphthene	10	Dimethyl Phthalate	10
Anthracene	10	Di-n-Butyl Phthalate	10
Benzidine	50	2,4-Dinitrotoluene	10
Benzo(a)anthracene	5	1,2-Diphenylhydrazine	20
Benzo(a)pyrene	5	Fluoranthene	10
3,4-Benzofluoranthene	10	Fluorene	10
Benzo(k)fluoranthene	5	Hexachlorobenzene	5
Bis(2-chloroethyl)Ether	10	Hexachlorobutadiene	10
Bis(2-chloroisopropyl)Ether	10	Hexachlorocyclopentadiene	10
Bis(2-ethylhexyl)Phthalate	10	Hexachloroethane	20
Butyl Benzyl Phthalate	10	Indeno(1,2,3-cd)Pyrene	5
2-Chloronaphthalene	10	Isophorone	10
Chrysene	5	Nitrobenzene	10
Dibenzo(a,h)anthracene	5	n-Nitrosodimethylamine	50
1,2-Dichlorobenzene	10	n-Nitrosodi-n-Propylamine	20
1,3-Dichlorobenzene	10	n-Nitrosodiphenylamine	20
1,4-Dichlorobenzene	10	Pyrene	10
3,3'-Dichlorobenzidine	5	1,2,4-Trichlorobenzene	10
Diethyl Phthalate	10		
<b>PESTICIDES AND PCBS</b>			
Aldrin	0.01	Beta-Endosulfan	0.02
Alpha-BHC	0.05	Endosulfan sulfate	0.02
Beta-BHC	0.05	Endrin	0.02
Gamma-BHC	0.05	Endrin Aldehyde	0.1
Chlordane	0.2	Heptachlor	0.01
4,4'-DDT and derivatives	0.02	Heptachlor Epoxide	0.01
Dieldrin	0.02	PCBs	(*2)
Alpha-Endosulfan	0.01	Toxaphene	0.3

(MQL's Revised November 1, 2007)

**Footnotes:**

\*1 Default MQL for Mercury is 0.005 unless Part I of your permit requires the more sensitive Method 1631 (Oxidation / Purge and Trap / Cold vapor Atomic Fluorescence Spectrometry), then the MQL shall be 0.0005.

\*2 See Part II, Section A.1 of the permit.

**PART III - STANDARD CONDITIONS FOR NPDES PERMITS****A. GENERAL CONDITIONS****1. INTRODUCTION**

In accordance with the provisions of 40 CFR Part 122.41, et. seq., this permit incorporates by reference ALL conditions and requirements applicable to NPDES Permits set forth in the Clean Water Act, as amended, (hereinafter known as the "Act") as well as ALL applicable regulations.

**2. DUTY TO COMPLY**

The permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the Act and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application.

**3. TOXIC POLLUTANTS**

a. Notwithstanding Part III.A.5, if any toxic effluent standard or prohibition (including any schedule of compliance specified in such effluent standard or prohibition) is promulgated under Section 307(a) of the Act for a toxic pollutant which is present in the discharge and that standard or prohibition is more stringent than any limitation on the pollutant in this permit, this permit shall be modified or revoked and reissued to conform to the toxic effluent standard or prohibition.

b. The permittee shall comply with effluent standards or prohibitions established under Section 307(a) of the Act for toxic pollutants within the time provided in the regulations that established those standards or prohibitions, even if the permit has not yet been modified to incorporate the requirement.

**4. DUTY TO REAPPLY**

If the permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, the permittee must apply for and obtain a new permit. The application shall be submitted at least 180 days before the expiration date of this permit. The Director may grant permission to submit an application less than 180 days in advance but no later than the permit expiration date. Continuation of expiring permits shall be governed by regulations promulgated at 40 CFR Part 122.6 and any subsequent amendments.

**5. PERMIT FLEXIBILITY**

This permit may be modified, revoked and reissued, or terminated for cause in accordance with 40 CFR 122.62-64. The filing of a request for a permit modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance, does not stay any permit condition.

**6. PROPERTY RIGHTS**

This permit does not convey any property rights of any sort, or any exclusive privilege.

**7. DUTY TO PROVIDE INFORMATION**

The permittee shall furnish to the Director, within a reasonable time, any information which the Director may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. The permittee shall also furnish to the Director, upon request, copies of records required to be kept by this permit.

**8. CRIMINAL AND CIVIL LIABILITY**

Except as provided in permit conditions on "Bypassing" and "Upsets", nothing in this permit shall be construed to relieve the permittee from civil or criminal penalties for noncompliance. Any false or materially misleading representation or concealment of information required to be reported by the provisions of the permit, the Act, or applicable regulations, which avoids or effectively defeats the regulatory purpose of the Permit may subject the Permittee to criminal enforcement pursuant to 18 U.S.C. Section 1001.

**9. OIL AND HAZARDOUS SUBSTANCE LIABILITY**

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 to which the permittee is or may be subject under Section 311 of the Act.

**10. 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 Act.

#### 11. 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.

#### B. PROPER OPERATION AND MAINTENANCE

##### 1. NEED TO HALT OR REDUCE NOT A DEFENSE

It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. The permittee is responsible for maintaining adequate safeguards to prevent the discharge of untreated or inadequately treated wastes during electrical power failure either by means of alternate power sources, standby generators or retention of inadequately treated effluent.

##### 2. DUTY TO MITIGATE

The permittee shall take all reasonable steps to minimize or prevent any discharge in violation of this permit which has a reasonable likelihood of adversely affecting human health or the environment.

##### 3. PROPER OPERATION AND MAINTENANCE

- a. The permittee shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by permittee as efficiently as possible and in a manner which will minimize upsets and discharges of excessive pollutants and will achieve compliance with the conditions of this permit. Proper operation and maintenance also includes adequate laboratory controls and appropriate quality assurance procedures. This provision requires the operation of backup or auxiliary facilities or similar systems which are installed by a permittee only when the operation is necessary to achieve compliance with the conditions of this permit.
- b. The permittee shall provide an adequate operating staff which is duly qualified to carry out operation, maintenance and testing functions required to insure compliance with the conditions of this permit.

##### 4. BYPASS OF TREATMENT FACILITIES

###### a. BYPASS NOT EXCEEDING LIMITATIONS

The permittee may allow any bypass to occur which does not cause effluent limitations to be exceeded, but only if it also is for essential maintenance to assure efficient operation. These bypasses are not subject to the provisions of Parts III.B.4.b. and 4.c.

###### b. NOTICE

###### (1) ANTICIPATED BYPASS

If the permittee knows in advance of the need for a bypass, it shall submit prior notice, if possible at least ten days before the date of the bypass.

###### (2) UNANTICIPATED BYPASS

The permittee shall, within 24 hours, submit notice of an unanticipated bypass as required in Part III.D.7.

###### c. PROHIBITION OF BYPASS

(1) Bypass is prohibited, and the Director may take enforcement action against a permittee for bypass, unless:

(a) Bypass was unavoidable to prevent loss of life, personal injury, or severe property damage;

(b) There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass which occurred during normal periods of equipment downtime or preventive maintenance; and,

(c) The permittee submitted notices as required by Part III.B.4.b.

(2) The Director may allow an anticipated bypass after considering its adverse effects, if the Director determines that it will meet the three conditions listed at Part III.B.4.c(1).

5. UPSET CONDITIONS

a. EFFECT OF AN UPSET

An upset constitutes an affirmative defense to an action brought for noncompliance with such technology-based permit effluent limitations if the requirements of Part III.B.5.b. are met. No determination made during administrative review of claims that noncompliance was caused by upset, and before an action for noncompliance, is final administrative action subject to judicial review.

b. CONDITIONS NECESSARY FOR A DEMONSTRATION OF UPSET

A permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs, or other relevant evidence that:

- (1) An upset occurred and that the permittee can identify the cause(s) of the upset;
- (2) The permitted facility was at the time being properly operated;
- (3) The permittee submitted notice of the upset as required by Part III.D.7; and,
- (4) The permittee complied with any remedial measures required by Part III.B.2.

c. BURDEN OF PROOF

In any enforcement proceeding, the permittee seeking to establish the occurrence of an upset has the burden of proof.

6. REMOVED SUBSTANCES

Unless otherwise authorized, solids, sewage sludges, filter backwash, or other pollutants removed in the course of treatment or wastewater control shall be disposed of in a manner such as to prevent any pollutant from such materials from entering navigable waters.

7. PERCENT REMOVAL (PUBLICLY OWNED TREATMENT WORKS)

For publicly owned treatment works, the 30-day average (or Monthly Average) percent removal for Biochemical Oxygen Demand and Total Suspended Solids shall not be less than 85 percent unless otherwise authorized by the permitting authority in accordance with 40 CFR 133.103.

C. MONITORING AND RECORDS

1. INSPECTION AND ENTRY

The permittee shall allow the Director, or an authorized representative, upon the presentation of credentials and other documents as may be required by the law to:

- a. Enter upon the permittee's premises where a regulated facility or activity is located or conducted, or where records must be kept under the conditions of this permit;
- b. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
- c. Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices or operations regulated or required under this permit; and
- d. Sample or monitor at reasonable times, for the purpose of assuring permit compliance or as otherwise authorized by the Act, any substances or parameters at any location.

2. REPRESENTATIVE SAMPLING

Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity.

3. RETENTION OF RECORDS

The permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart 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, for a period of at least 3 years from the date of the sample, measurement, report, or application. This period may be extended by request of the Director at any time.

4. RECORD CONTENTS

Records of monitoring information shall include:

- a. The date, exact place, and time of sampling or measurements;

- b. The individual(s) who performed the sampling or measurements;
- c. The date(s) and time(s) analyses were performed;
- d. The individual(s) who performed the analyses;
- e. The analytical techniques or methods used; and
- f. The results of such analyses.

5. MONITORING PROCEDURES

- a. Monitoring must be conducted according to test procedures approved under 40 CFR Part 136, unless other test procedures have been specified in this permit or approved by the Regional Administrator.
- b. The permittee shall calibrate and perform maintenance procedures on all monitoring and analytical instruments at intervals frequent enough to insure accuracy of measurements and shall maintain appropriate records of such activities.
- c. An adequate analytical quality control program, including the analyses of sufficient standards, spikes, and duplicate samples to insure the accuracy of all required analytical results shall be maintained by the permittee or designated commercial laboratory.

6. FLOW MEASUREMENTS

Appropriate flow measurement devices and methods consistent with accepted scientific practices shall be selected and used to ensure the accuracy and reliability of measurements of the volume of monitored discharges. The devices shall be installed, calibrated, and maintained to insure that the accuracy of the measurements is consistent with the accepted capability of that type of device. Devices selected shall be capable of measuring flows with a maximum deviation of less than 10% from true discharge rates throughout the range of expected discharge volumes.

D. REPORTING REQUIREMENTS

1. PLANNED CHANGES

a. INDUSTRIAL PERMITS

The permittee shall give notice to the Director as soon as possible of any planned physical alterations or additions to the permitted facility. Notice is required only when:

- (1) The alteration or addition to a permitted facility may meet one of the criteria for determining whether a facility is a new source in 40 CFR Part 122.29(b); or,
- (2) The alteration or addition could significantly change the nature or increase the quantity of pollutants discharged. This notification applies to pollutants which are subject neither to effluent limitations in the permit, nor to notification requirements listed at Part III.D.10.a.

b. MUNICIPAL PERMITS

Any change in the facility discharge (including the introduction of any new source or significant discharge or significant changes in the quantity or quality of existing discharges of pollutants) must be reported to the permitting authority. In no case are any new connections, increased flows, or significant changes in influent quality permitted that will cause violation of the effluent limitations specified herein.

2. ANTICIPATED NONCOMPLIANCE

The permittee shall give advance notice to the Director of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements.

3. TRANSFERS

This permit is not transferable to any person except after notice to the Director. The Director may require modification or revocation and reissuance of the permit to change the name of the permittee and incorporate such other requirements as may be necessary under the Act.

4. DISCHARGE MONITORING REPORTS AND OTHER REPORTS

Monitoring results must be reported on Discharge Monitoring Report (DMR) Form EPA No. 3320-1 in accordance with the "General Instructions" provided on the form. The permittee shall submit the original DMR signed and certified as required by

Part III.D.11 and all other reports required by Part III.D. to the EPA at the address below. Duplicate copies of DMR's and all other reports shall be submitted to the appropriate State agency (ies) at the following address (es):

EPA:  
Compliance Assurance and Enforcement Division  
Water Enforcement Branch (6EN-W)  
U.S. Environmental Protection Agency, Region 6  
1445 Ross Avenue  
Dallas, TX 75202-2733

New Mexico:  
Program Manager  
Surface Water Quality Bureau  
New Mexico Environment Department  
P.O. Box 5469  
1190 Saint Francis Drive  
Santa Fe, NM 87502

5. ADDITIONAL MONITORING BY THE PERMITTEE

If the permittee monitors any pollutant more frequently than required by this permit, using test procedures approved under 40 CFR Part 136 or as specified in this permit, the results of this monitoring shall be included in the calculation and reporting of the data submitted in the Discharge Monitoring Report (DMR). Such increased monitoring frequency shall also be indicated on the DMR.

6. AVERAGING OF MEASUREMENTS

Calculations for all limitations which require averaging of measurements shall utilize an arithmetic mean unless otherwise specified by the Director in the permit.

7. TWENTY-FOUR HOUR REPORTING

a. The permittee shall report any noncompliance which may endanger health or the environment. Any information shall be provided orally within 24 hours from the time the permittee becomes aware of the circumstances. A written submission shall be provided within 5 days of the time the permittee becomes aware of the circumstances. The report shall contain the following information:

- (1) A description of the noncompliance and its cause;
- (2) The period of noncompliance including exact dates and times, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and,
- (3) Steps being taken to reduce, eliminate, and prevent recurrence of the noncomplying discharge.

b. The following shall be included as information which must be reported within 24 hours:

- (1) Any unanticipated bypass which exceeds any effluent limitation in the permit;
- (2) Any upset which exceeds any effluent limitation in the permit; and,
- (3) Violation of a maximum daily discharge limitation for any of the pollutants listed by the Director in Part II (industrial permits only) of the permit to be reported within 24 hours.

c. The Director may waive the written report on a case-by-case basis if the oral report has been received within 24 hours.

8. OTHER NONCOMPLIANCE

The permittee shall report all instances of noncompliance not reported under Parts III.D.4 and D.7 and Part I.B (for industrial permits only) at the time monitoring reports are submitted. The reports shall contain the information listed at Part III.D.7.

9. OTHER INFORMATION

Where the permittee becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or in any report to the Director, it shall promptly submit such facts or information.

10. CHANGES IN DISCHARGES OF TOXIC SUBSTANCES

All existing manufacturing, commercial, mining, and silvacultural permittees shall notify the Director as soon as it knows or has reason to believe:

a. That any activity has occurred or will occur which would result in the discharge, on a routine or frequent basis, of any toxic pollutant listed at 40 CFR Part 122, Appendix D, Tables II and III (excluding Total Phenols) which is not limited in the permit, if that discharge will exceed the highest of the following "notification levels":

- (1) One hundred micrograms per liter (100 µg/L);

- (2) Two hundred micrograms per liter (200 µg/L) for acrolein and acrylonitrile; five hundred micrograms per liter (500 µg/L) for 2, 4-dinitro-phenol and for 2-methyl-4, 6-dinitrophenol; and one milligram per liter (1 mg/L) for antimony;
  - (3) Five (5) times the maximum concentration value reported for that pollutant in the permit application; or
  - (4) The level established by the Director.
- b. That any activity has occurred or will occur which would result in any discharge, on a nonroutine or infrequent basis, of a toxic pollutant which is not limited in the permit, if that discharge will exceed the highest of the following "notification levels":
- (1) Five hundred micrograms per liter (500 µg/L);
  - (2) One milligram per liter (1 mg/L) for antimony;
  - (3) Ten (10) times the maximum concentration value reported for that pollutant in the permit application; or
  - (4) The level established by the Director.

#### 11. SIGNATORY REQUIREMENTS

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

- a. ALL PERMIT APPLICATIONS shall be signed as follows:

- (1) FOR A CORPORATION - by a responsible corporate officer. For the purpose of this section, a responsible corporate officer means:

(a) A president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision making functions for the corporation; or,

(b) The manager of one or more manufacturing, production, or operating facilities, provided, the manager is authorized to make management decisions which govern the operation of the regulated facility including having the explicit or implicit duty of making major capital investment recommendations, and initiating and directing other comprehensive measures to assure long term environmental compliance with environmental laws and regulations; the manager can ensure that the necessary systems are established or actions taken to gather complete and accurate information for permit application requirements; and where authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures.

- (2) FOR A PARTNERSHIP OR SOLE PROPRIETORSHIP - by a general partner or the proprietor, respectively.

- (3) FOR A MUNICIPALITY, STATE, FEDERAL, OR OTHER PUBLIC AGENCY - by either a principal executive officer or ranking elected official. For purposes of this section, a principal executive officer of a Federal agency includes:

(a) The chief executive officer of the agency, or

(b) A senior executive officer having responsibility for the overall operations of a principal geographic unit of the agency.

- b. ALL REPORTS required by the permit and other information requested by the Director 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;
- (2) The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity, such as the position of plant manager, operator of a well or a well field, superintendent, or position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters for the company. A duly authorized representative may thus be either a named individual or an individual occupying a named position; and,
- (3) The written authorization is submitted to the Director.