United States Environmental Protection Agency Region 10 1200 Sixth Avenue Seattle, Washington 98101

Authorization to Discharge Under The National Pollution Discharge Elimination System

In compliance with the provisions of the Clean Water Act, 33 U.S.C. §1251 <u>et seq.</u>, as amended by the Water Quality Act of 1987, P.L. 100-4, the "Act", the

City of Palmer Wastewater Treatment Plant

is authorized to discharge from a facility located in Palmer, Alaska, at the following location:

Outfall	Receiving Water	Latitude	Longitude
001	Matanuska River	61° 33' 30"N	149° 06' 20"W

in accordance with the discharge point, effluent limitations, monitoring requirements and other conditions set forth herein.

This permit shall become effective January 1, 2007

This permit and the authorization to discharge shall expire at midnight, December 31, 2011

The permittee shall reapply for a permit reissuance on or before May 4, 2011, 180 days before the expiration of this permit if the permittee intends to continue operations and discharges at the facility beyond the term of this permit.

Signed this 5th day of December, 2006,

/s/ Michael F. Gearheard
Michael F. Gearheard, Director
Office of Water and Watersheds

TABLE OF CONTENTS

	r Sheet: Issuance and Expiration Dates dule of Submittals	4
I. I	Limitations and Monitoring Requirements	4
A.	Discharge Authorization	5
B.	Effluent Limitations and Monitoring	5
C.	Schedule of Compliance	8
D.	Whole Effluent Toxicity Testing Requirements	8
E.	Surface Water Monitoring	9
II.	Special Conditions	11
A.	Operation and Maintenance	11
B.	Quality Assurance Plan (QAP)	12
D.	Pretreatment Requirements	13
E.	Sludge Management Requirements	14
F.	Signage	14
III.	General Monitoring, Recording and Reporting Requirements	15
A.	Representative Sampling (Routine and Non-Routine Discharges)	15
B.	Reporting of Monitoring Results	15
C.	Monitoring Procedures	16
D.	Additional Monitoring by Permittee	16
E.	Records Contents	16
F.	Retention of Records	17
G.	Twenty-four Hour Notice of Noncompliance Reporting	17
H.	Other Noncompliance Reporting	18
I.	Notice of New Introduction of Toxic Pollutants	18
J.	Schedule of Compliance	19

City of Palmer NPDES Permit

IV.	Compliance Responsibilities	19
A.	Duty to Comply	19
B.	Penalties for Violations of Permit Conditions	19
C.	Need to Halt or Reduce Activity not a Defense	21
D.	Duty to Mitigate	21
E.	Proper Operation and Maintenance	21
F.	Bypass of Treatment Facilities	22
G.	Upset Conditions	23
H.	Toxic Pollutants	23
I.	Removed Substances	23
J.	Planned Changes	24
K.	Anticipated Noncompliance	24
v. (General Provisions	24
A.	Permit Actions	24
B.	Duty to Reapply	24
C.	Duty to Provide Information	25
D.	Other Information	25
E.	Signatory Requirements	25
F.	Availability of Reports	26
G.	Inspection and Entry	26
H.	Property Rights	27
I.	Transfers	27
J.	State Laws	27

The following table summarizes some of the action items the permittee must complete and/or submit to EPA/ADEC during the term of the permit:

Action Item	<u>Due Date</u>
1. Discharge Monitoring Reports (DMRs)	DMRs are due monthly and must be postmarked by the 15 th day of the month following the monitoring month (see Part III.B.).
2. Operation and Maintenance (O&M) Plan	The Plan must be developed and implemented by March 30, 2007 (see Part II.A.). The Plan must be kept on site.
3. Quality Assurance Plan (QAP)	The Plan must be developed and implemented by March 30, 2007(see Part II.B.). The Plan must be kept on site.
4. Report of Progress	The Reports must be submitted by January 1, 2008, 2009, 2010 and 2011 (see Part I.C.).
5. Ammonia Effluent Limits	Compliance with ammonia effluent limits must be achieved by November 31, 2011 (see Part I.C.).
6. NPDES Application Renewal	The application must be submitted no later than May 4, 2011, or at least 180 days before expiration (see Part V.B.).
7. Expanded Effluent Testing, Whole Effluent Toxicity (WET) Testing & Surface Water Monitoring Report	Reports must be submitted with the NPDES renewal application by July 4, 2011 (see Part I.B., C. & E).
8. Update Industrial Waste Survey	Complete by July 3, 2007 (see Part II.C.)

I. Limitations and Monitoring Requirements

A. Discharge Authorization

During the effective period of this permit, the permittee is authorized to discharge from outfall 001 to the Matanuska River, within the limits and subject to the conditions set forth herein. This permit authorizes the discharge of only those pollutants resulting from facility processes, waste streams, and operations that have been clearly identified in the permit application process.

B. Effluent Limitations and Monitoring

- 1. The permittee must limit and monitor discharges from outfall 001 as specified in Table 1 below. All figures represent maximum effluent limits unless otherwise indicated. The permittee must comply with the effluent limits at all times unless otherwise indicated, regardless of the frequency of monitoring or reporting required by other provisions of this permit.
- 2. The permittee must not discharge any floating solids, visible foam in other than trace amounts, oily wastes or petroleum hydrocarbons that produce a sheen, film or discoloration on the surface of the receiving water or adjoining shorelines.
- 3. Removal Requirements for BOD₅ and TSS: The monthly average effluent concentration for BOD₅ and TSS must not exceed 15 percent of the monthly average influent concentration. Percent removal of BOD₅ and TSS must be reported on the Discharge Monitoring Reports (DMRs). For each parameter, the monthly average percent removal must be calculated from the arithmetic mean of the influent concentration values and the arithmetic mean of the effluent concentration values measured during that month.
- 4. The permittee must collect influent samples from the influent stream prior to any treatment system and influent monitoring is required to be performed within same 24-hour period as effluent monitoring.
- 5. The permittee must collect effluent samples from the effluent stream after the last treatment unit prior to discharge into the receiving water.
- 6. Minimum Levels. For all effluent monitoring, the permittee must use methods that can achieve a minimum level (ML) less than the effluent limitation, to the extent practicable.
- 7. The permittee must report on the monthly DMR whether chlorine was added to the effluent for total or partial disinfection during the calendar month. If chlorine is added, the permittee must comply with the applicable conditional

- residual chlorine effluent limits and monitoring requirements in Table 1.
- 8. The permittee must perform the expanded effluent testing required by Part D of NPDES application Form 2A (EPA Form 3510-2A, revised 1/99). The permittee must submit the results of this testing with its application for renewal of this NPDES permit. To the extent that effluent monitoring required by other conditions of this permit satisfies this requirement, these samples may be used to satisfy the requirements of this paragraph.

Table 1. Effluent and Influent Limits and Monitoring Requirements

		Effluent and Influent Limits			Monitoring Requirements		
Parameter	Units	Average Monthly Limit	Average Weekly Limit	Maximum Daily Limit	Monitoring Location	Monitoring Frequency	Sample Type
Ammonia (as N) ¹	mg/L	8.7		18.5	effluent	1/week	grab
Ammonia (as N)	lbs/day	68.9		146.6	erruent	17 WEEK	grab
Ammonia (as N) ¹	mg/L	1.7		3.6	effluent	1/week	anah.
(July & August)	lbs/day	13.5		28.5	emuem	1/week	grab
	mg/L	30	45	60			
BOD ₅	lbs/day	258	357	475	effluent and influent	1/week	24-hour timed composite
	% Removal		See I.B.3.		minuent		composite
DO	mg/L		≥2 at all time	es	effluent	1/month	grab
Fecal Coliform Bacteria ¹	FC/100 mL	100 ²		200	effluent	1/week	grab
Fecal Coliform Bacteria ¹ (July & August)	FC/100 mL	20^{2}		40	effluent	1/week	grab
Flow	mgd			0.95	effluent or influent	continuous	recording
pН	s.u.	6	.5-8.5 at all ti	mes	effluent	5/week	grab
	mg/L	30	45	60	co. 1	1/week	24-hour timed composite
TSS	lbs/day	258	357	475	effluent and influent		
	% Removal		See Part I.B.	3.	mnuciit		composite
Residue 5			See Part I.B.	2.	effluent	1/week	visual
Petroleum Hydrocarbons ⁵		See Part I.B.2.		effluent	1/week	visual	
Total Residual	μg/L	1.7		3.4	effluent	2/week	grab
Chlorine 1,3	lbs/day	0.013		0.027			
Temperature	C°				effluent	5/week	grab
Whole Effluent Toxicity	TU_C				effluent	3x/5 years 4	grab

Table 1.	Effluent and	Influent	Limits :	and Mor	nitoring	Requirements

		Effluent and Influent Limits			Monitoring Requirements		
Parameter	Units	Average Monthly Limit	Average Weekly Limit	Maximum Daily Limit	Monitoring Location	Monitoring Frequency	Sample Type
Expanded Effluent Testing					effluent	3x/5 years 4	grab

Footnotes:

- 1. Reporting is required within 24-hours if the maximum daily limit is violated.
- 2. Based on the geometric mean of all samples taken in that month.
- 3. The effluent limits for chlorine is not quantifiable using EPA approved analytical methods. The permittee will be in compliance with the effluent limits provided the total chlorine residual is at or below the compliance evaluation or minimum level of 0.100 mg/L ($100\mu\text{g/L}$). Limit and monitoring requirements only apply when chlorine disinfection is being used.
- 4. To be performed in August 2007, May 2008 and January 2009. Expanded effluent testing and WET testing must occur on the same day, and results reported with the application for renewal.
- 5. Residue and petroleum hydrocarbon monitoring (see Part I.B.2.) must occur at Outfall 001.

C. Schedule of Compliance

1. The permittee must achieve compliance with ammonia limitations (September through June) of Part 1.B. (Table 1) by November 31, 2011. In the interim, the following ammonia effluent limitations must be met:

Average Monthly Limit: 34 mg/L (269 lbs/day) Maximum Daily Limit: 71 mg/L (562 lbs/day)

- 2. Until compliance with the ammonia effluent limits are achieved, the permittee must submit annual Report of Progress which outlines the progress made towards reaching the compliance dates. A 1-year, 2-year, 3-year, and 4-year Report of Progress must be submitted by January 1, 2008, 2009, 2010 and 2011. At a minimum, the Reports of Progress must include:
 - a) An assessment of the previous 1 year of ammonia data, and a comparison to effluent limitations.
 - b) A discussion of progress made towards meeting the effluent limitations.
 - c) Further actions and milestones targeted for the upcoming year.

D. Whole Effluent Toxicity Testing Requirements

The permittee must conduct chronic toxicity tests on effluent samples from outfall 001. Testing must be conducted in accordance with subsections 1 through 4, below.

- 1. Toxicity testing must be conducted as grab sampling, and must be performed on the same day as expanded effluent testing.
- 2. Chronic Test Species and Methods
 - a) A total of three chronic tests must be conducted: in January 2008, May 2009 and August 2010.
 - b) The permittee must conduct short-term tests with the water flea, *Ceriodaphnia dubia* (survival and reproduction test), and the fathead minnow, *Pimephales promelas* (larval survival and growth test).
 - c) The presence of chronic toxicity must be determined as specified in *Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms*, Fourth Edition, EPA/821-R-02-013, October 2002.
 - d) The permittee shall identify and report the following endpoints:
 - a. The no observable effect concentration (NOEC)
 - b. Chronic toxicity units (TU_C)
 - c. The IC₂₅
 - d. The LC₅₀

3. Quality Assurance

- a) The toxicity testing on each organism must include a series of five test dilutions and a control. Dilution series must be selected in accordance with *Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms*, Fourth Edition, EPA/821-R-02-013, October 2002.
- b) All quality assurance criteria and statistical analyses used for chronic tests and reference toxicant tests must be in accordance with *Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms*, Fourth Edition, EPA/821-R-02-013, October 2002, and individual test protocols.
- c) In addition to those quality assurance measures specified in the

methodology, the following quality assurance procedures must be followed:

- (i) If organisms are not cultured in-house, concurrent testing with reference toxicants must be conducted. If organisms are cultured in-house, monthly reference toxicant testing is sufficient. Reference toxicant tests must be conducted using the same test conditions as the effluent toxicity tests.
- (ii) If either of the reference toxicant tests or the effluent tests do not meet all test acceptability criteria as specified in the test methods manual, the permittee must re-sample and re-test within 14 days of receipt of the test results.
- (iii)Control and dilution water must be receiving water or lab water, as appropriate, as described in the manual. If the dilution water used is different from the culture water, a second control, using culture water must also be used. Receiving water may be used as control and dilution water upon notification of EPA and ADEC. In no case shall water that has not met test acceptability criteria be used for either dilution or control.

4. Reporting

- a) The permittee must submit the results of the toxicity tests with the application for permit renewal, no later than July 4, 2011
- b) The report of toxicity test results must include all relevant information outlined in Section 10, Report Preparation, of *Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms*, Fourth Edition, EPA/821-R-02-013, October 2002. In addition to toxicity test results, the permittee must report: dates of sample collection and initiation of each test, flow rate at the time of sample collection, and the results of expanded effluent testing as required in Part I. B.

E. Surface Water Monitoring

The permittee must conduct surface water monitoring in accordance with the following requirements. Surface water monitoring must begin within 30 days after the effect date of the permit and continue until the next permit issuance becomes effective. The program must meet the following requirements:

1. Monitoring stations must be established in the Matanuska River at the following locations:

- a) one location upstream of Outfall 001 in the actual discharge channel.
- b) two locations downstream of the discharge at the edge of the mixing zone (or as close to the edge of the mixing zone as is practical due to site and access limitations).
- 2. Monitoring stations must be approved in writing by ADEC.
- 3. To the extent practicable, surface water sample collection must occur on the same day as effluent sample collection.
- 4. The flow rate must be measured as near as practicable to the time that other ambient parameters are sampled.
- 5. Samples must be analyzed for the parameters listed in Table 2, and must achieve MLs that are equivalent to or less than those listed in Table 2. The permittee may request different MLs. The request must be in writing and must be approved by EPA. Once approved, these MLs supersede the maximum MLs in Table 2.
- 6. Quality assurance/quality control plans for all the monitoring must be documented in the Quality Assurance Plan required under Part II. B., "Quality Assurance Plan".
- 7. All surface water monitoring results must be submitted to EPA and ADEC with the application for permit renewal no later than July 4, 2011. This data shall be submitted in both hard copy and electronic (i.e., spreadsheet) format. At a minimum, the report must include the following:
 - a) Date of sample collection and analyses.
 - b) Results of sample analysis.
 - c) Relevant quality assurance/quality control (QA/QC) information.

Table 2. Receiving Water Monitoring Requirements

Parameter	Units	Sample Frequency	Sample Location	Sample Type	Maximum ML
Ammonia, total (as N)	mg/L	3/year ¹	downstream ⁴	grab	0.05
Ammonia, total (as N)	mg/L	1/month for 2 years 1/3 month thereafter	upstream	grab	0.05
DO	mg/L	3/year	downstream ⁴	grab	
Fecal Coliform Bacteria (May 1 - September 31)	FC/100 mL	1/month ^{6, 7}	upstream & downstream ⁴	grab	1.0
Fecal Coliform Bacteria (October 1 - April 30)	FC/100 mL	3/6 months ^{2,7}	upstream & downstream ⁴	grab	1.0

Table 2. Receiving Water Monitoring Requirements

Parameter	Units	Sample Frequency	Sample Location	Sample Type	Maximum ML
Flow	mgd or cfs and ft/sec.	1/month	upstream	grab	
Hardness (as CaCO ₃)	mg/L	3/week ⁵	downstream	grab	10
рH	s.u.	3/year ³	upstream & downstream ⁴	grab	
Residue		1/quarter ⁸	downstream ⁴	visual	
Temperature	°C	3/year ³	upstream & downstream ⁴	grab	

Footnote:

- 1 This monitoring shall occur during the months of February, May, and August.
- 2 During the 6-month period from October 1 April 30, a total of 3 samples shall be collected. Each sampling event shall be approximately every other month.
- 3 This monitoring must occur on the same day as ammonia ambient monitoring.
- 4 See Part I.E.1.b. and I.E.2.
- 5 Sampling shall be conducted for one week during the months of February 2007 and August 2007.
- 6 During the 6-month period from May 1 September 31, a total of 3 samples shall be collected, one in each of the following months: May, June, and September.
- 7 Sampling may be discontinued after two years if the results indicate that Alaska Water Quality Standards have not been exceeded. Sampling must resume if the method of disinfection is changed, and may also be discontinued after two years if water quality standards have not been exceeded on the outside edge of the mixing zone.
- 8 Quarterly sampling shall occur during the months of February, May, August, and November.

II. Special Conditions

A. Operation and Maintenance

- 1. In addition to the requirements specified in Section III.E. of this permit (Proper Operation and Maintenance), by March 30, 2007, the permittee shall review its operation and maintenance (O&M) plan and ensure that it includes appropriate best management practices (BMPs); the plan must be reviewed annually thereafter. BMPs include measures which prevent or minimize the potential for the release of pollutants to the Matanuska River. The O&M Plan shall be retained on site and made available to EPA and ADEC upon request.
- 2. The permittee shall develop or update a description of pollution prevention measures and controls appropriate for the facility, and implement such controls. The appropriateness and priorities of controls in the O&M Plan shall reflect identified potential sources of pollutants at the facility. The description of BMPs shall address, to the extent practicable, the following minimum

components:

- a) Spill prevention and control;
- b) Optimization of chemical usage;
- c) Preventive maintenance program;
- d) Minimization of pollutant inputs from industrial users;
- e) Research, develop and implement a public information and education program to control the introduction of household hazardous materials to the sewer system; and
- f) Water conservation.

B. Quality Assurance Plan (QAP)

The permittee must develop a Quality Assurance Plan (QAP) for all monitoring required by this permit by March 30, 2007. Any existing QAP may be modified for use under this section. The QAP may be incorporated as part of the facilities O&M manual.

- 1. The QAP must be designed to assist in planning for the collection and analysis of effluent and receiving water samples in support of this permit and in explaining data anomalies when they occur.
- 2. Throughout all sample collection and data analysis activities, the permittee must use the EPA-approved QA/QC and chain-of-custody procedures described in *Requirements for Quality Assurance Project Plans* (EPA/QA/R-5) and *Guidance for Quality Assurance Project Plans* (EPA/QA/G-5). The QAP must be prepared in the format that is specified in these documents.
- 3. At a minimum, the QAP must include the following:
 - a) Details on the number of samples, type of sample containers, preservation of samples, holding times, analytical methods, analytical detection and quantitation limits for each target compound, type and number of quality assurance field samples, precision and accuracy requirements, sample preparation requirements, sample shipping methods, and laboratory data delivery requirements.
 - b) Map(s) indicating the location of each sampling point.
 - c) Qualification and training of personnel.
 - d) Names(s), address(es) and telephone number(s) of the laboratories used by or proposed to be used by the permittee.
- 4. The permittee is responsible for reviewing and updating the QAP to ensure all

- material is still current and applicable.
- 5. The permittee must amend the QAP whenever there is a modification in sample collection, sample analysis, or other procedure addressed by the QAP.
- 6. Copies of the QAP shall be kept on site and shall be made available to EPA and/or ADEC upon request.

C. Pretreatment Requirements

- 1. The permittee must update the Sewer Use Ordinance to comply with current federal pretreatment regulations and guidance. A copy of the revised ordinance shall be kept on site and made available to EPA and/or ADEC upon request.
- 2. The permittee shall update the Industrial Waste Survey to ensure proper identification of non-domestic users subject to pretreatment standards. Such a survey shall be completed by July 3, 2007.
- 3. The permittee shall perform annual inspections, surveillance, and monitoring of non-domestic users to determine compliance with applicable pretreatment standards and requirements.
- 4. Under no circumstances shall the permittee allow introduction of the following wastes into the waste treatment system:
 - a) Wastes which will create a fire or explosion hazard in the treatment works;
 - b) Wastes which will cause corrosive structural damage to the treatment works, but in no case, wastes with a pH lower than 5.0, unless the works is designed to accommodate such wastes;
 - Solid or viscous substances in amounts which cause obstructions to the flow in sewers, or interference with the proper operation of the treatment works;
 - d) Wastewaters at a flow rate and/or pollutant discharge rate which is excessive over relatively short time periods so that there is a treatment process upset and subsequent loss of treatment efficiency;
 - e) Any pollutant, including oxygen demanding pollutants (e.g., BOD₅) released in a discharge of such volume or strength as to cause interference in the treatment works:

- f) Heat in amounts which inhibit biological activity in the treatment works resulting in interference, but in no case heat in such quantities that the temperature at the POTW exceeds 40 °C (104 °F) unless EPA Region 10, upon request of the POTW, approves alternate temperature limits;
- g) Petroleum oil, nonbiodegradable cutting oil, or products of mineral oil origin in amounts that will cause interference or pass through;
- h) Wastes which result in the presences of toxic gases, vapors, or fumes within the treatment works in quantities that may cause acute worker health and safety problems; and
- i) Any trucked or hauled pollutants, except at discharge points designated by the treatment works.
- 5. The permittee must require any industrial user of its treatment works to comply with any applicable requirements of Sections 204(b), 307, and 308 of the CWA, including any requirements established under 40 CFR § 403.
- 6. The permittee must require any industrial user of its treatment works to comply with applicable requirements in 40 CFR § 405 through 471.

D. Sludge Management Requirements

The permittee shall ensure that an updated biosolids permit application (Form 2S) is on file with the EPA.

E. Signage

- 1. Outfall Location Signs. The permittee must maintain a sign, or signs on the shoreline near the mixing zone and outfall line. The sign, or signs, shall:
 - a) state that treated domestic wastewater is being discharged, the name and owner of the facility, and the approximate location and size of the mixing zone;
 - b) inform the public that certain activities, such as the harvesting of shellfish for raw consumption and contact recreation should not take place in the mixing zone; and
 - c) give a contact telephone number for additional information.

III. Monitoring, Recording and Reporting Requirements

A. Representative Sampling (Routine and Non-Routine Discharges)

Samples and measurements must be representative of the volume and nature of the monitored discharge.

In order to ensure that the effluent limits set forth in this permit are not violated at times other than when routine samples are taken, the permittee must collect additional samples at the appropriate outfall whenever any discharge occurs that may reasonably be expected to cause or contribute to a violation that is unlikely to be detected by a routine sample. The permittee must analyze the additional samples for those parameters limited in Part I.B. of this permit that are likely to be affected by the discharge.

The permittee must collect such additional samples as soon as the spill, discharge, or bypassed effluent reaches the outfall. The samples must be analyzed in accordance with paragraph III.C. ("Monitoring Procedures"). The permittee must report all additional monitoring in accordance with paragraph III.D. ("Additional Monitoring by Permittee").

B. Reporting of Monitoring Results

1. Effluent Monitoring Results: The permittee must summarize effluent monitoring results from Part I.B (Table 1) each month on the Discharge Monitoring Report (DMR) from (EPA No. 3320-1) or equivalent. Monitoring results greater than the minimum detection level (MDL) shall be reported as the actual value measured and monitoring results less than the MDL shall be reported as "[MDL value]". The permittee must submit reports monthly, postmarked by the 15th day of the following month. The permittee must sign and certify all DMRs, and all other reports, in accordance with the requirements of Part V.E. of this permit ("Signatory Requirements). The permittee must submit the legible originals of these documents to the Director, Office of Compliance and Enforcement, with copies to ADEC at the following addresses:

U.S. EPA Region 10 Attn: PCS Data Entry Team 1200 Sixth Avenue, OCE-133 Seattle, Washington 98101 Alaska Department of Environmental Conservation Division of Air and Water Quality 555 Cordova Street Anchorage, Alaska 99503

a) Surface Water Monitoring Results: The permittee must summarize the results of all surface water monitoring as outlined in Part I.E. (Table 2) in a report to be submitted along with the application for permit renewal no later than May 4, 2011. This information shall be provide in both hard copy and electronic spreadsheet form, and submitted to EPA at the following address:

U.S. EPA Region 10 Attn: NPDES Permits Unit Manager 1200 Sixth Avenue, OWW-133 Seattle, Washington 98101

A copy of the surface water monitoring results must also be provided to ADEC.

C. Monitoring Procedures

Monitoring must be conducted according to test procedures approved under 40 CFR 136, unless other test procedures have been specified in this permit or approved by EPA as an alternate test procedure under 40 CFR 136.5.

D. Additional Monitoring by Permittee

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

Upon request by EPA, the permittee must submit results of any other sampling, regardless of the test method used.

E. Records Contents

Records of monitoring information shall include:

- 1. The date, exact place, and time of sampling or measurements;
- 2. The individual(s) who performed the sampling or measurements;
- 3. The date(s) analyses were performed;

- 4. The individual(s) who performed the analyses;
- 5. The analytical techniques or methods used; and
- 6. The results of such analyses.

F. Retention of Records

- 1. 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 five years from the date of the sample, measurement, report, or application. This period may be extended by request of the Director at any time. Data collected on-site, copies of DMRs, and a copy of this NPDES permit must be maintained on-site during the duration of activity at the permitted location.
- 2. The permittee is required under 40 CFR §503 to retain sludge records for a period of five years.

G. Twenty-four Hour Notice of Noncompliance Reporting

- 1. The permittee must report the following occurrences of noncompliance by telephone within 24 hours from the time the permittee becomes aware of the circumstances:
 - a) any noncompliance that may endanger health or the environment;
 - b) any unanticipated bypass that exceeds any effluent limitation in the permit (See Part IV.F., "Bypass of Treatment Facilities");
 - c) any upset that exceeds any effluent limitation in the permit (See Part IV.G., "Upset Conditions"); or
 - d) any violation of a maximum daily discharge limitation for those toxic or hazardous pollutants identified within Table 1 of Part I.B.
 - e) any overflow prior to the treatment works, whether or not such overflow endangers health or the environment or exceeds any effluent limitation in the permit.
- 2. The permittee must also provide a written submission within five days of the time that the permittee becomes aware of any event required to be reported

under subpart 1 above. The written submission must contain:

- a) a description of the noncompliance and its cause;
- b) the period of noncompliance, including exact dates and times;
- c) the estimated time noncompliance is expected to continue if it has not been corrected; and
- d) steps taken or planned to reduce, eliminate, and prevent re-occurrence of the noncompliance.
- 3. The Director of the Office of Compliance and Enforcement may waive the written report on a case-by-case basis if the oral report has been received within 24 hours by the NPDES Compliance Unit in Seattle, Washington, by phone, (206) 553-1846.
- 4. Reports shall be submitted to the addresses in Part III.B ("Reporting of Monitoring Results").

H. Other Noncompliance Reporting

The permittee must report all instances of noncompliance, not required to be reported within 24 hours, at the time that monitoring reports for Part III.B ("Reporting of Monitoring Results") are submitted. The reports shall contain the information listed in Part III.G.2 of this permit ("Twenty-four Hour Notice of Noncompliance Reporting").

I. Notice of New Introduction of Toxic Pollutants

The permittee must notify the Director of the Office of Water and Watersheds and ADEC of:

- 1. Any new introduction of pollutants into the POTW from an indirect discharger which would be subject to Sections 301 or 306 of the Act if it were directly discharging those pollutants; and
- 2. Any substantial change in the volume or character of pollutants being introduced into the POTW by a source introducing pollutants into the POTW at the time of issuance of the permit.
- 3. For the purposes of this section, adequate notice must include information on:

- a) the quality and quantity of effluent to be introduced into the POTW, and
- b) any anticipated impact of the change on the quantity or quality of effluent to be discharged from the POTW.
- 4. The permittee must notify the Director of the Office of Water and Watersheds at the following address:

U.S. EPA Region 10 Attn: NPDES Permits Unit Manager 1200 6th Avenue, OWW-130 Seattle, WA 98101

J. Compliance Schedule

Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule of this permit must be submitted no later than 14 days following each schedule date.

IV. Compliance Responsibilities

A. 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

B. Penalties for Violations of Permit Conditions

- 1. Civil and Administrative Penalties. Pursuant to 40 CFR Part 19 and the Act, any person who violates section 301, 302, 306, 307, 308, 318 or 405 of the Act, or any permit condition or limitation implementing any such sections in a permit issued under section 402, or any requirement imposed in a pretreatment program approved under sections 402(a)(3) or 402(b)(8) of the Act, is subject to a civil penalty not to exceed the maximum amounts authorized by Section 309(d) of the Act and the Federal Civil Penalties Inflation Adjustment Act (28 U.S.C. § 2461 note) as amended by the Debt Collection Improvement Act (31 U.S.C. § 3701 note) (currently \$32,500 per day for each violation).
- 2. Administrative Penalties. Any person may be assessed an administrative penalty by the Administrator for violating section 301, 302, 306, 307, 308, 318 or 405 of this Act, or any permit condition or limitation implementing any

of such sections in a permit issued under section 402 of this Act. Pursuant to 40 CFR 19 and the Act, administrative penalties for Class I violations are not to exceed the maximum amounts authorized by Section 309(g)(2)(A) of the Act and the Federal Civil Penalties Inflation Adjustment Act (28 U.S.C. § 2461 note) as amended by the Debt Collection Improvement Act (31 U.S.C. § 3701 note) (currently \$11,000 per violation, with the maximum amount of any Class I penalty assessed not to exceed \$32,500). Pursuant to 40 CFR 19 and the Act, penalties for Class II violations are not to exceed the maximum amounts authorized by Section 309(g)(2)(B) of the Act and the Federal Civil Penalties Inflation Adjustment Act (28 U.S.C. § 2461 note) as amended by the Debt Collection Improvement Act (31 U.S.C. § 3701 note) (currently \$11,000 per day for each day during which the violation continues, with the maximum amount of any Class II penalty not to exceed \$157,500).

3. Criminal Penalties.

- (a) Negligent Violations. The Act provides that any person who negligently violates sections 301, 302, 306, 307, 308, 318, or 405 of the Act, or any condition or limitation implementing any of such sections in a permit issued under section 402 of the Act, or any requirement imposed in a pretreatment program approved under section 402(a)(3) or 402(b)(8) of the Act, is subject to criminal penalties of \$2,500 to \$25,000 per day of violation, or imprisonment of not more than 1 year, or both. In the case of a second or subsequent conviction for a negligent violation, a person shall be subject to criminal penalties of not more than \$50,000 per day of violation, or by imprisonment of not more than 2 years, or both.
- (b) Knowing Violations. Any person who knowingly violates such sections, or such conditions or limitations is subject to criminal penalties of \$5,000 to \$50,000 per day of violation, or imprisonment for not more than 3 years, or both. In the case of a second or subsequent conviction for a knowing violation, a person shall be subject to criminal penalties of not more than \$100,000 per day of violation, or imprisonment of not more than 6 years, or both.
- (c) Knowing Endangerment. Any person who knowingly violates section 301, 302, 303, 306, 307, 308, 318 or 405 of the Act, or any permit condition or limitation implementing any of such sections in a permit issued under section 402 of the Act, and who knows at that time that he thereby places another person in imminent danger of death or serious bodily injury, shall, upon conviction, be subject to a fine of not more than \$250,000 or imprisonment of not more than 15 years, or both. In the case

of a second or subsequent conviction for a knowing endangerment violation, a person shall be subject to a fine of not more than \$500,000 or by imprisonment of not more than 30 years, or both. An organization, as defined in section 309(c)(3)(B)(iii) of the Act, shall, upon conviction of violating the imminent danger provision, be subject to a fine of not more than \$1,000,000 and can be fined up to \$2,000,000 for second or subsequent convictions.

(d) False Statements. The Act provides that any person who falsifies, tampers with, or knowingly renders inaccurate any monitoring device or method required to be maintained under this permit shall, upon conviction, be punished by a fine of not more than \$10,000, or by imprisonment for not more than 2 years, or both. If a conviction of a person is for a violation committed after a first conviction of such person under this paragraph, punishment is a fine of not more than \$20,000 per day of violation, or by imprisonment of not more than 4 years, or both. The Act further provides that any person who knowingly makes any false statement, representation, or certification in any record or other document submitted or required to be maintained under this permit, including monitoring reports or reports of compliance or non-compliance shall, upon conviction, be punished by a fine of not more than \$10,000 per violation, or by imprisonment for not more than 6 months per violation, or by both.

C. Need to Halt or Reduce Activity 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 this permit.

D. Duty to Mitigate

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

E. Proper Operation and Maintenance

The permittee must at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed, or used, by the permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance also includes adequate laboratory controls and quality assurance procedures. This provision requires the operation of back-up 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 the permit.

F. Bypass of Treatment Facilities

1. 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 paragraphs 2 and 3 of this Part.

2. Notice.

- a) Anticipated Bypass. If the permittee knows in advance of the need for a bypass, it shall submit prior notice to the Director, if possible, at least 10 days before the date of the bypass.
- b) Unanticipated Bypass. The permittee shall submit notice of an unanticipated bypass as required under Part III.G ("Twenty-four Hour Notice of Noncompliance Reporting").

3. Prohibition of bypass.

- a) Bypass is prohibited and the Director of the Office of Compliance and Enforcement may take enforcement action against a permittee for a bypass, unless:
 - (i) The bypass was unavoidable to prevent loss of life, personal injury, or severe property damage;
 - (ii) 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
 - (iii)The permittee submitted notices as required under paragraph 2 of this Part.
- b) The Director of the Office of Compliance and Enforcement may approve an anticipated bypass, after considering its adverse effects, if the Director determined that it will meet the three conditions listed

above in paragraph 3.a. of this Part.

G. Upset Conditions

- 1. 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 paragraph 2 of this Part 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.
- 2. Necessary upset demonstration conditions. A permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs, or other relevant evidence that:
 - a) An upset occurred and that the permittee can identify the cause(s) of the upset;
 - b) The permitted facility was at the time being properly operated;
 - c) The permittee submitted notice of the upset as required under Part III.G, "Twenty-four Hour Notice of Noncompliance Report;" and
 - d) The permittee complied with any remedial measures required under Part IV.D, "Duty to Mitigate."
- 3. Burden of proof. In any enforcement proceeding, the permittee seeking to establish the occurrence of an upset has the burden of proof.

H. Toxic Pollutants

The permittee must 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 establish those standards or prohibitions, even if the permit has not yet been modified to incorporate the requirement.

I. Removed Substances

Collected screenings, grit, solids, sludges, filter backwash, or other pollutants removed in the course of treatment or control of waste waters shall be disposed of in a manner such as to prevent any pollutant from such materials from entering navigable waters.

J. Planned Changes

The permittee must give notice to the Director of the Office of Water and Watersheds as specified in part III.I.3. and ADEC as soon as possible of any planned physical alterations or additions to the permitted facility whenever:

- 1. The alteration or addition to a permitted facility may meet one of the criteria for determining whether a facility is a new source as determined in 40 CFR 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 that are not subject to effluent limitations in this permit.
- 3. The alteration or addition results in a significant change in the permittee's sludge use or disposal practices, and such alteration, addition, or change ma justify the application of permit conditions that are different from or absent in the existing permit, including notification of additional use or disposal sites not reported during the permit application process or not reported pursuant to an approved land application site.

K. Anticipated Noncompliance

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

V. General Provisions

A. Permit Actions

This permit may be modified, revoked and reissued, or terminated for cause as specified in 40 CFR 122.62, 122.64, or 124.5. The filing of a request by the permittee for a permit modification, revocation and reissuance, termination, or a notification of planned changes or anticipated noncompliance does not stay any permit condition.

B. Duty to Reapply

If the permittee intends 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. In accordance with 40 CFR 122.21(d), and unless permission for the application to be submitted at a later date has been granted by the Regional Administrator, the permittee must submit a new application at least 180 days before the expiration date of this permit.

C. Duty to Provide Information

The permittee must furnish to EPA and ADEC, within the time specified in the request, any information that EPA or ADEC 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 must also furnish to EPA or ADEC, upon request, copies of records required to be kept by this permit.

D. Other Information

When the permittee becomes aware that it failed to submit any relevant facts in a permit application, or that it submitted incorrect information in a permit application or any report to EPA or ADEC, it must promptly submit the omitted facts or corrected information.

E. Signatory Requirements

All applications, reports, or information submitted to EPA and ADEC must be signed and certified as follows.

- 1. All permit applications must be signed as follows:
 - c) For a corporation: by a responsible corporate officer.
 - d) For a partnership or sole proprietorship: by a general partner or the proprietor, respectively.
 - e) For a municipality, state, federal, Indian tribe, or other public agency: by either a principal executive officer or ranking elected official.
- 2. All reports required by the permit and other information requested by EPA or ADEC must 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:
 - a) The authorization is made in writing by a person described above;
 - b) 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, position of equivalent responsibility, or an individual or

position having overall responsibility for environmental matters for the company; and,

- c) The written authorization is submitted to the Director of the Office of Compliance and Enforcement and ADEC.
- 2. Changes to authorization. If an authorization under Part V.E.2 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 Part V.E.2. must be submitted to the Director of the Office of Compliance and Enforcement and ADEC prior to or together with any reports, information, or applications to be signed by an authorized representative.
- 3. Certification. Any person signing a document under this Part must 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 gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the 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".

F. Availability of Reports

In accordance with 40 CFR 2, information submitted to EPA pursuant to this permit may be claimed as confidential by the permittee. In accordance with the Act, permit applications, permits and effluent data are not considered confidential. Any confidentiality claim must be asserted at the time of submission by stamping the words "confidential business information" on each page containing such information. If no claim is made at the time of submission, EPA may take the information available to the public without further notice to the permittee. If a claim is asserted, the information will be treated in accordance with the procedures in 40 CFR 2, Subpart B (Public Information) and 41 Fed. Reg. 36902 through 36924 (September 1, 1976), as amended.

G. Inspection and Entry

The permittee must allow the Director of the Office of Compliance and Enforcement, EPA Region 10; ADEC; or an authorized representative (including

an authorized contractor acting as a representative of the Administrator), upon the presentation of credentials and other documents as may be required by law, to:

- 1. 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;
- 2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
- 3. Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this permit; and
- 4. 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.

H. Property Rights

The issuance of this permit does not convey any property rights of any sort, or any exclusive privileges, nor does it authorize any injury to persons or property or invasion of other private rights, nor any infringement of federal, tribal, state or local laws or regulations.

I. Transfers

This permit is not transferable to any person except after notice to the Director of the Office of Water and Watersheds as specified in part III.I.3. 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. (See 40 CFR 122.61; in some cases, modification or revocation and reissuance is mandatory).

J. 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.

VI. Definitions

- 1 "Act" means the Clean Water Act or the Federal Water Pollution Control Act, as Amended (33 U.S.C. 466 et seq.).
- 2. "ADEC" means the Alaska Department of Environmental Conservation.
- 3. "Average monthly discharge limitation" means the highest allowable average of "daily discharges" over a calendar month, calculated as the sum of all "daily discharges" measured during a calendar month divided by the number of "daily discharges" measured during that month.
- 4. "Average weekly discharge limitation" means the highest allowable average of "daily discharges" over a calendar week, calculated as the sum of all "daily discharges" measured during a calendar week divided by the number of "daily discharges" measured during that week.
- 5. "Best Management Practices" (BMPs) means schedules of activities, prohibitions of practices, maintenance procedures, and other management practices to prevent or reduce the pollution of wasters of the United States. BMPs also include treatment requirements, operating procedures, and practices to control plant site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage areas.
- 6. "Bypass" means the intentional diversion of waste streams from any portion of a treatment facility.
- 7. "Chronic toxic unit" ("TUc") is a measure of chronic toxicity. TUc is the reciprocal of the effluent concentration that causes no observable effect on the test organisms by the end of the chronic exposure period (i.e., 100/"NOEC" or 100/"IC₂₅").
- 8. "Categorical Industrial User (CIU)" is a discharger to a POTW which carries out specific categories of industrial activity identified in 40 CFR 403.6 and 40 CFR Chapter I, Subchapter N.
- 9. "Daily discharge" means the discharge of a pollutant measured during a calendar day or any 24-hour period that reasonably represents the calendar day for purposes of sampling. For pollutants with limitations expressed in units of mass, the "daily discharge" is calculated as the total mass of the pollutant discharged over the day. For pollutants with limitations expressed in

- other units of measurement, the "daily discharge" is calculated as the average measurement of the pollutant over the day.
- 10. "Director of the Office of Compliance and Enforcement" means the Director of the Office of Compliance and Enforcement, EPA Region 10, or an authorized representative.
- 11. "Director of the Office of Water and Watersheds" means the Director of the Office of Water and Watersheds, EPA Region 10, or an authorized representative.
- 12. "DMR" means discharge monitoring report
- 13. "Geometric mean" means the "n" root of the product of "n" samples collected during the month, where n refers to the number of samples collected in the month.
- 14. "Grab" is a single sample or measurement taken at a specific time or over as short a period of time as is feasible.
- 15. "Inhibition concentration" (IC_p) is a point estimate of the toxicant concentration that causes a given percent reduction (p) in a non-quantal biological measurement (e.g., reproduction or growth) calculated from a continuous model (e.g., Interpolation Method).
- 16. "Maximum daily discharge limitation" means the highest allowable "daily discharge".
- 17. "Method detection limit (MDL)" is the minimum concentration of an analyte that can be measured and reported with 99 percent confidence that the analyte concentration is greater than zero as determined by a specific laboratory method (40 CFR 136).
- 18. "Minimum level (ML)" is the concentration at which the entire analytical system must give a recognizable signal and acceptable calibration point. The ML is the concentration in a sample that is equivalent to the concentration of the lowest calibration standard analyzed by a specific analytical procedure, assuming that all the method specified sample weights, volumes and processing steps have been followed.
- 19. "NOEC means no observed effect concentration. The NOEC is the highest concentration of toxicant (e.g., effluent) to which organisms are exposed in a

- chronic toxicity test [full life-cycle or partial life-cycle (short term) test], that causes no observable adverse effects on the test organisms (i.e., the highest concentration of effluent in which the values for the observed responses are not statistically significantly different from the controls).
- 20. "NPDES" means National Pollutant Discharge Elimination System, the national program for issuing, modifying, revoking and reissuing, terminating, monitoring and enforcing permits . . . under sections 307, 402, 318, and 405 of the CWA.
- 21. "Pollutant", for the purposes of this permit, is an organic substance, an inorganic substance, a combination of organic and inorganic substances, or pathogenic organisms that, after discharge and upon exposure, ingestion, inhalation, or assimilation into an organism either directly from the environment or indirectly by ingestion through the food-chain, could, on the basis of information available to the Administrator of EPA, cause death, disease, behavioral abnormalities, cancer, genetic mutations, physiological malfunctions (including malfunction in reproduction), or physical deformations in either organisms or offspring of the organisms.
- 22. "POTW means Publicly Owned Treatment Works, as defined at 40 CFR 403.3(o).
- 23. "Sewage sludge" means solid, semi-solid, or liquid residue generated during the treatment of domestic sewage and/or a combination of domestic sewage and industrial waste of a liquid nature in a Treatment works. Sewage sludge includes, but is not limited to, domestic septage; scum or solids removed in primary, secondary, or advanced wastewater treatment processes; and a material derived from sewage sludge. Sewage sludge does not include ash generated during the incineration of sewage sludge or grit and screenings generated during preliminary treatment of domestic sewage in a Treatment Works. These must be disposed of in accordance with 40 CFR 258.
- 24. A "Significant Industrial User (SIU)" means a categorical industrial user that discharges an average of 25,000 gallons per day or more of process wastewater to the POTW (excluding sanitary, noncontact cooling and boiler blowdown wastewater), contributes a process wastestream that make up 5 percent or more of the average dry weather hydraulic or organic capacity of the POTW, or is designated as such by the Control Authority (the City of Palmer) as defined in 40 CFR 403.12(a) on the basis that the industrial user has a reasonable potential for adversely affecting the POTW's operation or for violating any pretreatment standard or requirement. The Control Authority

has the option to determine an industrial user meeting the above criteria as a non-significant industrial user if the industrial user's discharge does not have reasonable potential to adversely affect the POTW's operation or violate any pretreatment standard or requirement.

- 25. A "24-hour composite" sample shall mean a flow-proportioned mixture of not less than eight discrete aliquots. Each aliquot shall be a grab sample of not less than 100 mL and shall be collected and stored in accordance with procedures prescribed in the most recent edition of *Standard Methods for the Examination of Water and Wastewater*.
- 26. "Upset" means an exceptional incident in which there is unintentional and temporary noncompliance with technology-based permit effluent limitations because of factors beyond the reasonable control of the permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation.