

INDUSTRIAL PRETREATMENT PROGRAM
INDUSTRIAL USER CONTROL MECHANISM (PERMIT) GUIDANCE

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Prepared by:

Oregon Department of Environmental Quality
Water Quality Division
811 S.W. 6th Avenue
Portland, Oregon 97204-1390

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Pursuant to 40 CFR 403.8(f)(1)(iii) a Publicly Owned Treatment Works (POTW) with an approved pretreatment program must control through an Industrial User (IU) permit, order, or similar means, the contribution to the POTW by each IU to ensure compliance with applicable Pretreatment Standards and Requirements. In the case of IUs identified as Significant Industrial Users (SIUs) under 40 CFR 403.3(t), this control shall be achieved through permits or equivalent individual control mechanisms issued to each such user. Such control mechanisms must be enforceable and contain, at a minimum, the following conditions:

Statement of duration in no case more than five years);

Statement of non-transferability without, at a minimum, prior notification to the POTW and provision of a copy of the existing control mechanism to the new owner or operator;

Effluent limits based on Categorical Pretreatment Standards, Local Limits, State and local law, and applicable General Pretreatment Standards in 40 CFR Part 403, including at least a reference to the POTW's legal authority encompassing the general and specific prohibitions of 40 CFR 403.5(a) and (b):

General Prohibitions [40 CFR 403.5(a)

An IU may not introduce into any POTW any pollutant(s) which cause Pass Through or Interference;

Specific Prohibitions 40 CFR 403.5(b)

The following pollutants shall not be introduced into a POTW:

- ▶ Pollutants which create a fire or explosion hazard in the POTW, including, but not limited to, wastestreams with a closed cup flashpoint of less than 140°F (60°C) using the test methods specified in 40 CFR 261.21;
- ▶ Pollutants which will cause corrosive structural damage to the POTW, but in no case discharges with pH lower than 5.0, unless the works is specifically designed to accommodate such discharges;
- ▶ Solid or viscous pollutants in amounts which will cause obstruction to the flow in the POTW resulting in Interference;

- ▶ Any pollutant, including oxygen demanding pollutants (BOD, etc.) released in a discharge at a flow rate and/or pollutant concentration which will cause Interference with the POTW;
- ▶ Heat in amounts which will inhibit biological activity in the POTW resulting in Interference, but in no case heat in such quantities that the temperature at the POTW treatment plant exceeds 104°F (40°C) unless the Approval Authority (DEQ), upon request of the POTW, approves alternate temperature limits;
- ▶ Petroleum oil, nonbiodegradable cutting oil, or products of mineral oil origin in amounts that will cause interference or pass through;
- ▶ Pollutants which result in the presence of toxic gases, vapors, or fumes within the POTW in a quantity that may cause acute worker health and safety problems;
- ▶ Any trucked or hauled pollutants, except at discharge points designated by the POTW;

(D) The following requirements, including an identification of the pollutants to be monitored, sampling location (c.f., Attachment 1), sampling frequency, and sample type, based on the applicable General Pretreatment Standards in 40 CFR 403.12, Categorical Pretreatment Standards, Local Limits, and State and local law:

1. Self-monitoring requirements;
 - ▶ Pollutants identified (at a minimum, all regulated pollutants must be identified);
 - ▶ Sampling frequency (at a minimum, the IU must sample twice per year);
2. Sampling requirements;
 - ▶ Sampling location;
 - ▶ Sample type (Grab/Composite);
 - ▶ 40 CFR Part 136 reference;
3. Reporting requirements [contained in 40 CFR 403.12 and 40 CFR 403.6(c)(7)]
 - ▶ Baseline Monitoring Report (BMR) [40 CFR 403.12(b)] (NA in most cases);

- ▶ Reports on progress in meeting compliance schedules (this would be in an IU's permit only if a compliance schedule is in effect; NA in most cases) [40 CFR 403.12(c)];
 - ▶ Report on final compliance (90-day Compliance Report; NA in most cases) [40 CFR 403.12(d)];
 - ▶ Periodic reports on continued compliance [40 CFR 403.12(e) and (h)];
- Notice of potential problems including slug loads [40 CFR 403.12(f)];

- ▶ Notice by the IU of any violation within 24 hours of becoming aware of such violation and submission of results of repeat sampling within 30 days of said notice of violation [40 CFR 403.12(g)];
- ▶ If an IU subject to the reporting requirement in 40 CFR 403.12(e) [Periodic Compliance Reports for CIUs] monitors any pollutant more frequently than required by the Control Authority [City], using the procedures prescribed in 40 CFR 403.12(g)(4) [40 CFR Part 136], the results of this monitoring shall be included in the report [40 CFR 403.12(g)(5)];
- ▶ All IUs shall promptly notify the POTW in advance of any substantial change in the volume or character of pollutants in their discharge, including the listed or characteristic hazardous wastes for which the IU has submitted initial notification under 40 CFR 403.12(p) [40 CFR 403.12(j)];

Notification of significant production change [40 CFR 403.6(c)(7)];

- ▶ Special monitoring and/or reporting requirements for specific Categorical Pretreatment Standards (c.f., Attachment 2: Table 8-1 from EPA IU Permitting Guidance Manual, Sept., 1989) [Part 401-475];

4 Notification and Recordkeeping requirements [contained in 40 CFR 403.12(o)]:

- ▶ Any IU subject to the reporting requirements established in 40 CFR 403.12 shall maintain records of all information resulting from any monitoring activities required by 40 CFR 403.12. Such records shall include for all samples:

The date, exact place, method, and time of sampling and the names of the person or persons taking the samples;

- (ii) The dates analyses were performed;
 - (iii) Who performed the analyses;
 - (iv) The analytical techniques/methods used;
- The results of such analyses;

- ▶ Any IU shall retain for a minimum of 3 years any records of monitoring activities and results and shall make such records available for inspection and copying by the [City], the DEQ Director and the EPA Regional Administrator. This period of retention shall be extended during the course of any unresolved litigation regarding the IU or when requested by the [City], the Director or the Regional Administrator;

- (E) Statement of applicable civil and criminal penalties for violation of pretreatment standards and requirements, and any applicable compliance schedule. Such schedules may not extend the compliance date beyond applicable Federal deadlines.

In addition, the Department recommends that the POTW include a comprehensive set of standard conditions that describe all of the requirements that an IU must meet. This list can be based on provisions of the POTW's SUO, and State and Federal regulations that are incorporated in the POTW's SUO. At a minimum, however, the Department expects the following conditions to be included in all IU permits (language must be consistent with the City's SUO):

1. Duty to Comply

The permittee must comply with all conditions of this permit. Failure to comply with the requirements of this permit may be grounds for administrative action, or enforcement proceedings including civil or criminal penalties, injunctive relief, and summary abatements.

2. Permit Modification

This permit may be modified for good causes including, but not limited to, the following:

- a. To incorporate any new or revised Federal, State, or local pretreatment standards or requirements;
- b. Material or substantial alterations or additions to the discharger's operation process, or discharge

volume or character which were not considered in drafting the effective permit;

- c. A change in any condition in either the industrial user or the POTW that requires either a temporary or permanent reduction or elimination of the authorized discharge;
- d. Information indicating that the permitted discharge poses a threat to the POTW's collection and treatment systems, POTW personnel or the receiving waters;
- e. Violation of any terms or conditions of the permit;
- f. Misrepresentation or failure to disclose fully all relevant facts in the permit application or in any required reporting;
- g. Revision of or a grant of variance from applicable categorical standards pursuant to 40 CFR 403.13; or
- h. To correct typographical or other errors in the permit;
- i. To reflect transfer of the facility ownership and/or operation to a new owner/operator;
- j. Upon request of the permittee, provided such request does not create a violation of any applicable requirements, standards, laws, or rules and regulations.

The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance, does not stay any permit condition.

3. 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 submit an application for a new permit at least 90 days before the expiration date of this permit. [Alternatively, this requirement may appear on the Cover Page.]

4. Dilution

The permittee shall not increase the use of potable or process water or, in any way, attempt to dilute an effluent

as a partial or complete substitute for adequate treatment to achieve compliance with the limitations contained in this permit.

5. Representative Sampling

Samples and measurements taken as required herein shall be representative of the volume and nature of the monitored discharge. All samples shall be taken at the monitoring points specified in this permit and, unless otherwise specified, before the effluent joins or is diluted by any other wastestream, body of water or substance. All equipment used for sampling and analysis must be routinely calibrated, inspected and maintained to ensure its accuracy. Monitoring points shall not be changed without notification to and the approval of the [POTW].

6. Analytical Methods to Demonstrate Continued Compliance

All sampling and analysis required by this permit shall be performed in accordance with the techniques prescribed in 40 CFR Part 136 and amendments thereto, otherwise approved by EPA, or as specified in this permit.

7. Inspection and Entry 40 CFR 403.8 (f) 1)(v)

The permittee shall allow the [POTW], or an authorized representative, upon the presentation of credentials and other documents as may be required by 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;
- d. Sample or monitor, for the purposes of assuring permit compliance, any substances or parameters at any location; and
- e. Inspect any production, manufacturing, fabricating, or storage area where pollutants, regulated under this permit, could originate, be stored, or be discharged to the sewer system.

8. Signatory Requirements [Use whichever alternative best applies]

All applications, reports, or information submitted to the [POTW] must contain the following certification statement and be signed as required in Sections (a), (b), (c) or (d) below:

"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 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."

- a. By a responsible corporate officer, if the IU submitting the reports is a corporation. For the purpose of this paragraph, a responsible corporate officer means:

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;

the manager of one or more manufacturing, production, or operation facilities employing more than 250 persons or having gross annual sales or expenditures exceeding \$25 million (in second-quarter 1980 dollars), if authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures.

- b. By a general partner or proprietor if the IU submitting the reports is a partnership or sole proprietorship respectively.
- c. The principal for the overall operation of the discharging facility if the IU submitting the reports is a Federal, State, or local governmental entity, or their agents.
- d. By a duly authorized representative of the individual designated in paragraph (a), (b), or (c) of this section if:

the authorization is made in writing by the individual described in paragraph (a), (b), or (c);

- (ii) the authorization specifies either an individual or a position having responsibility for the overall operation of the facility from which the Industrial Discharge originates, such as the position of plant manager, operator of a well, or a well field superintendent, or a position of equivalent responsibility, or having overall responsibility for environmental matters for the company; and
 - (iii) the written authorization is submitted to the [POTW].
- e. If an authorization under paragraph (d) of this section is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, or overall responsibility for the environmental matters for the company, a new authorization satisfying the requirements of paragraph (d) of this section must be submitted to the [POTW] prior to or together with any reports to be signed by an authorized representative.

As indicated above, language in control mechanisms (permits) issued by a POTW must be consistent with that POTW's SUO language. DEQ will not routinely compare the language of a POTW's permits with its SUO language. This should be brought to the POTW's attention. It should also be pointed out to the POTW that it is the responsibility of the POTW to insure consistency of language in its permits with language in its SUO.

An example of a comprehensive set of standard conditions is given in EPA's Industrial User Permitting Guidance Manual, September, 1989.

Attachment 1

EXAMPLES OF SPECIFYING SAMPLING LOCATIONS IN PERMITS

EXAMPLES OF SPECIFYING SAMPLING LOCATIONS IN PERMITS

EXAMPLE OF SPECIFYING SAMPLING LOCATION BY NARRATIVE DESCRIPTION

Pipe 01A is defined as the sampling site from the industry's process wastewater discharge downstream from the existing pretreatment clarifier. Note that after the upgraded pretreatment system becomes operational, the sampling site will be the first manhole downstream from the sand filters.

EXAMPLE OF MULTIPLE SAMPLING LOCATIONS SPECIFIED BY NUMBER DESIGNATION

IV. SELF-MONITORING REQUIREMENTS

A. Sample Locations

1. Discharge from the Chemistry-Fine Arts Building shall be sampled at the Manhole No. 50
2. Discharge from the Duane Physics Building shall be sampled at the Manhole No. 22
3. Discharge from the Research Lab No. 1 shall be sampled at the Manhole A.

EXAMPLE OF SAMPLING LOCATION SPECIFIED BY DIAGRAM

Part I

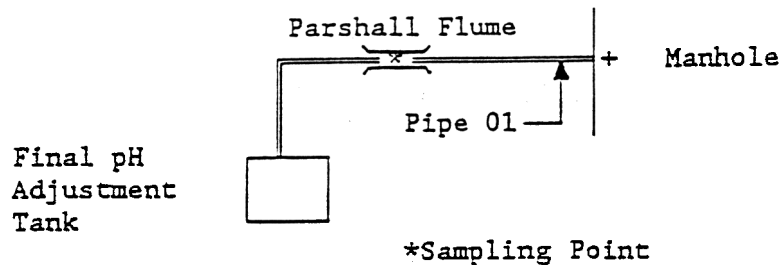
Permit No. 001

Part I. Effluent Limitations and Monitoring Requirements

A. Description of Discharges

Pipe Description

- 01 Discharge Pipe - Discharge of wastewater generated by all regulated metal finishing processes at the facility. Samples shall be collected at the point indicated on the attached diagram.



Attachment 2

**SPECIAL MONITORING AND/OR REPORTING REQUIREMENTS
FOR SPECIFIC CATEGORICAL PRETREATMENT STANDARDS**

SPECIAL MONITORING AND/OR REPORTING REQUIREMENTS FOR
SPECIFIC CATEGORICAL PRETREATMENT STANDARDS

Aluminum Forming [40 CFR Part 467];

Copper Forming [40 CFR Part 468]; and

Metal Molding and Casting [40 CFR Part 464]

- May as an alternative to monitoring for TTO meet the alternative oil and grease standard and must monitor for oil and grease.

Coil Coating [40 CFR Part 465]

- May be exempted from cyanide monitoring if

The first cyanide sample collected during the calendar year is less than 0.07 mg/l of cyanide; and,

The owner or operator certifies in writing that no cyanide is used

- For subcategory D (canmaking), may as an alternative to monitoring for TTO meet the alternative oil and grease standard and must monitor for oil and grease using analytical method outlined in 40 CFR 465.03(c).

Electrical and Electronic Components [40 CFR Part 469]; and

Electroplating [40 CFR Part 413]

- May in lieu of routine monitoring for TTO certify that toxic organics are not used in the facility or are controlled through a Toxic Organics Management Plan (TOMP). The TOMP must be submitted to the Control Authority and a certification statement must be submitted at least twice per year.

Leather Tanning [40 CFR Part 425]

- Must use the special analytical method specified for sulfide in 40 CFR 425.03 for determination of sulfide in alkaline wastewaters.
- May be exempt from sulfide standard if Control Authority submits a written certification to EPA that the sulfide does not interfere with the treatment works.

SPECIAL MONITORING AND/OR REPORTING REQUIREMENTS FOR
SPECIFIC CATEGORICAL PRETREATMENT STANDARDS
(Continued)

Metal Finishing [40 CFR Part 433]

- Must monitor for compliance with the cyanide limit after cyanide treatment and before dilution with other wastestreams. If monitoring the segregated cyanide wastestream cannot be done, the samples of the facility's final effluent may be taken, if the applicable cyanide limitations are adjusted based on the dilution ratio of the cyanide wastestream flow to the facility's effluent flow.
- May in lieu of routine monitoring for TTO certify that toxic organic are not used in the facility or are controlled through a Toxic Organics Management Plan (TOMP). The TOMP must be submitted to the Control Authority and a certification statement must be submitted at least twice per year.

Nonferrous Metals Manufacturing [40 CFR Part 421]

For Subpart C (Secondary Aluminum Smelting), must monitor for compliance with the total phenolics limit for Delacquering Wet Air Pollution control wastewater at the source of the phenolic wastestream. At the source is defined as at or before the mixing of the phenolic wastestream with other process or nonprocess wastewaters. If monitoring of the segregated phenolic wastestream cannot be done, the samples of the facility's final effluent may be taken if the total phenolics limit is adjusted based on the dilution ratio of the phenolic wastestream flow to the facility's effluent flow.

- For Subpart C (Secondary Aluminum Smelting), must use 4-AAP analytical method for total phenolics.

Petroleum Refining [40 CFR Part 419]

- The petroleum refining categorical pretreatment standards "apply to the total refinery flow contribution to the POTW." Therefore, when monitoring for compliance with these standards, dilution wastestreams do not have to be accounted for if end-of-pipe samples are taken at a petroleum refining facility.

SPECIAL MONITORING AND/OR REPORTING REQUIREMENTS FOR
SPECIFIC CATEGORICAL PRETREATMENT STANDARDS
(Continued)

Pharmaceutical Manufacturing [40 CFR Part 439]

- If all cyanide-containing wastestreams are passed through a cyanide destruction unit, must monitor for compliance with total cyanide limit after cyanide treatment and before dilution with other wastestreams. If facility's final effluent discharge is monitored, the total cyanide standard must be adjusted to account for the presence of the other dilution wastestreams. If the facility does not treat the cyanide-containing wastewaters, monitor for compliance at the facility's final effluent discharge point and adjust the total cyanide standard based on the dilution ratio of the cyanide-contaminated wastestream flow to the total process wastewater flow. If a facility does not use or generate cyanide, then no monitoring for compliance with total cyanide is required provided that the Control Authority obtains a certification from the facility that it is not using or generating cyanide.

Porcelain Enameling [40 CFR Part 466]

May be exempted from chromium monitoring if:

The first sample collected during the calendar year is less than 0.08 mg/of chromium; and,

The owner or operator certifies in writing that chromium is not used.

Pulp, Paper, Paperboard and Builders' Paper and Board Mills [40 CFR Parts 430 and 431]

- May be exempt from pentachlorophenol and trichlorophenol limits if the facilities certify that they do not use chlorophenolic biocides.
- For Subpart M (Groundwood-Thermo-Mechanical), may be exempt from zinc limits if the facilities certify that they do not use zinc hydrosulfite.

PERMIT CHECKLIST (All 403 cites refer to 40 CFR)

Name of POTW: _____

Date of Review: _____

	<u>No</u> <u>Revision</u>	<u>Revision</u> <u>Recommended</u>	<u>Revision</u> <u>Required</u>	<u>Section of</u> <u>Permit</u>
Required Conditions [403.8(f)(1)(iii)]				
(A) Statement of Duration (not more than 5 years)				_____
(B) Statement of Non-transferability				_____
(C) Effluent Limits				
General Prohibitions [403.5(a)]				_____
Specific Prohibitions [403.5(b)]				_____
Categorical Standards [Part 405-471] ..				_____
Local Limits				_____
(D) Requirements				
Self-monitoring Requirements				
Pollutants Identified (@ min: all regulated pollutants)				
Sampling Frequency (@ min: twice/year) .				
2. Sampling Requirements				
Sampling Location				
* Sample Type (Grab/Comp)				
* 40 CFR Part 136 Ref.....				
3. Reporting Requirements [403.12 and 403.6(c)(7)]				
BMR (NA in most cases) [403.12(b)]				
Compliance Schedule Progress Report (only if a compliance schedule is in effect; NA in most cases) [403.12(c)]				
90-Day Compliance Report (NA in most cases) [403.12(d)] .				
Periodic Compliance Report [403.12(e) and (h)]				

PERMIT CHECKLIST (All 403 cites refer to 40 CFR)

Name of POTW: _____

 Date of Review: _____

	No <u>Revision</u>	Revision <u>Recommended</u>	Revision <u>Required</u>	Section of <u>Permit</u>
Notice of Potential Problems Including Slug Loads [403.12(f)]				
Notice of Violation/Resampling [403.12(g)]				
Reporting of Additional Monitoring [403.12(g)(5)] ..				
Notice of Changed Discharge [403.12(j)]				
Notice of Sig. Production Change [403.6(c)(7)]				
Special Monitoring/Reporting for CIU [401-475]				

4. Notification and Recordkeeping Requirements [40 CFR 403.12(o)]

Maintain Monitoring Records/Monitoring Records Information:

(i) - Sampling Date	_____	_____	_____	_____
- Exact Sampling Place	_____	_____	_____	_____
- Sampling Method	_____	_____	_____	_____
- Sampling Time	_____	_____	_____	_____
- Name of Sampler	_____	_____	_____	_____
(ii) Date of Sample Analysis	_____	_____	_____	_____
(iii) Name of Analyzer	_____	_____	_____	_____
(iv) Analytical Methods	_____	_____	_____	_____
(v) Results of Analysis	_____	_____	_____	_____

IU Monitoring - Record Keeping (3 Yrs or Longer)

(E) Applicable Civil/Criminal Penalties ...
 40 CFR 403.8(s)(1)(vi)(A)

STANDARD CONDITIONS

1. Duty to Comply	_____	_____	_____	_____
2. Permit Modification	_____	_____	_____	_____
3. Duty to Reapply	_____	_____	_____	_____
4. Dilution	_____	_____	_____	_____
5. Representative Sampling	_____	_____	_____	_____
6. Analytical Methods to Demonstrate Comp.	_____	_____	_____	_____
7. Inspection and Entry	_____	_____	_____	_____
8. Signatory Requirements	_____	_____	_____	_____