PUGET SOUND ENERGY

SUBMITTED VIA ELECTRONIC MAIL TO records@wutc.wa.gov ON 8/26/04

August 26, 2004

Carole J. Washburn, Secretary
Washington Utilities and Transportation Commission
P.O. Box 47250
Olympia, WA 98504-7250

Subject: Docket UG-011073

Dear Secretary Washburn:

Thank you for the opportunity to submit written comments on proposed rules for Chapter 480-93 WAC. Please find enclosed Puget Sound Energy's (PSE) comments in response to the WUTC notice.

PSE also requests that the commission give due consideration to the effective date of the rules and the impact of this date on each operator's ability to incorporate changes into their written operations, maintenance and emergency response procedures.

PSE complies with the requirements of CFR 192.605 by reviewing, developing, revising, editing, distributing, and training on our Gas Operating Standards and Gas Field Procedures on an annual basis. The effective date for our 2005 manuals is March 2005. PSE would therefore encounter significant difficulty trying to complete the publication cycle to accommodate an effective date of WAC chapter 480-93 rules earlier than the end of the first quarter 2005.

Sincerely,

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Enclosure

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PSE submits comments on the following sections:

1. WAC 480-93-005(3) "Business district"
2. WAC 480-93-005(9) "Gas associated substructures"
3. WAC 480-93-005(15) "Operator"
4. WAC 480-93-05(17) "Prompt action"
5. WAC 480-93-015 Odorization of gas.
6. WAC 480-93-018 Maps, drawings, and records of gas facilities.
7. WAC 480-93-020 Proximity considerations.
8. WAC 480-93-040 Location of gas compressor stations on gas pipelines.
9. WAC 480-93-080 Welder and plastic joiner identification and qualification.
10. WAC 480-93-100 Valves.
11. WAC 480-93-110 Corrosion control.
12. WAC 480-93-124 Pipeline markers.
13. WAC 480-93-130 Multistage pressure regulation.
14. WAC 480-93-155 Increasing maximum allowable operating pressure.
15. WAC 480-93-170 Tests and reports for pipelines.
16. WAC 480-93-175 Moving and lowering metallic gas pipelines.
17. WAC 480-93-178 Protection of plastic pipe.
18. WAC 480-93-180 Plan of operations and maintenance procedures; emergency policy; reporting requirements
19. WAC 480-93-185 Gas leak investigation.
20. WAC 480-93-186 Leakage classification and action criteria.
    WAC 480-93-18601 Leak classification and action criteria –Grade—Definition—Priority of leak repair
21. WAC 480-93-187 Gas leak records.
22. WAC 480-93-188 Gas leak surveys.
23. WAC 480-93-200 Reports associated with operator facilities and operations.
24. WAC 480-93-223 Civil penalty for violation of RCW 80-28.210 or regulations issued thereunder—Maximum amount.
25. WAC 480-93-999 Adoption by reference.

Where suggested revisions to sections of the rule are included, added text is shown with an underline and deleted text is shown with a strikethrough. Shading highlights both additions and deletions.

1. WAC 480-93-005 (3) "Business district"

PSE would like to reiterate previous comments submitted to the docket regarding the proposed definition for business district. This definition expands the historical understanding of a business district, namely an area generally with wall to wall paving and a series of attached, high occupancy buildings.

The Gas Piping Technology Committee (GPTC) offers the following guide material for operators regarding identification of business districts for purposes of complying with the requirements set forth in CFR Part 192. In determining business districts, the following should be considered:

(a) Areas where the public regularly congregates or where the majority of the buildings on either side of the street are regularly utilized, for industrial, commercial, financial, educational, religious, health or recreational purposes.

(b) Areas where gas and other underground facilities are congested under continuous street and sidewalk paving that extends to the building walls on one or both sides of the street.

(c) Any other area that, in the judgement of the operator, should be so designated.

Similarly, in interpretations of Part 192, DOT offers definitions of a business district as, "an area containing shops and offices where persons engage in the purchase and sale of commodities or in related financial transactions", or "an area marked by the distinguishing characteristic of being used in the conducting of buying and selling commodities and service, and related transactions. A 'business district' would normally be associated with the assembly of people in shops, offices and the lie and in the conduct of such business".

The definition as proposed by Staff is overly broad and prescriptive. By specifying proximity of buildings, operators will be forced to measure the relative positions of numerous structures, therefore making compliance management difficult and burdensome, particularly in areas with significant growth and construction. PSE disagrees with the prescriptive nature of the definition and believes it is an unnecessary for purposes of complying with Part 192.

PSE recommends the following changes to the definition of business district in WAC 480-93-005(3):

(3) **"Business district"** means an area where the public congregates for economic, industrial, religious, educational, health, or recreational purposes. ~~, and where two or more buildings within one hundred yards of each other are used for these purposes.~~

2. WAC 480-93-005 (9) "Gas associated substructures"

PSE recommends the deletion of “vented” as it modifies ‘casing pipe’ in the proposed definition. Not all casing pipe is vented and PSE assumes that it is not the intent to excluded non-vented casing pipe from the definition.

PSE recommends the following changes to the definition of gas associated substructures in WAC 480-93-005(9):

(9) **"Gas associated substructures"** means those devices or facilities utilized by an operator which are not intended for storing, transporting, or distributing gas, such as valve boxes, vaults, test boxes, and ~~vented~~ casing pipe.

3. WAC 480-93-005 (15) "Operator"

PSE would like to reiterate previous comments submitted to the docket regarding the proposed definition for "operator". In 192.3 operator is simply defined as "a person who engages in the transportation of gas." PSE is concerned that the broad definition of operator as proposed in WAC 480-93-005, specifically the language in subsection (a)(iii), would have far-reaching affects on a contractor providing construction or maintenance activities for a natural gas distribution company.

Staff previously responded that they did not agree that the definition would classify a construction company as an operator if it's principal purpose is not operating a pipeline. Staff also indicated in the December 9, 2003 stakeholder workshop that they would look at how to reword the definition so a contractor would be excluded. No such change has occurred.

PSE understands that the wording of the definition is based upon statutory language contained in RCW 80.28.210, but it appears this language is not binding. Therefore, PSE recommends the following changes to the definition of operator in WAC 480-93-005(15):

(15) **"Operator":**

(a) For purposes of chapter 480-93 WAC, the term "operator" means:

(i) Every natural gas distribution company that has tariffs on file with the commission;

(ii) Every city or town that owns, controls, operates, or manages any gas plant in this state; and

(iii) Every other person or corporation transporting natural gas by pipeline, or having for one or more of its principal purposes the construction, maintenance, or operation of pipelines for transporting natural gas in this state; even though such person or corporation does not deliver, sell, or furnish any such gas to any person or corporation within this state. The terms "person" and "corporation" are defined in RCW 80.04.010. "Transporting natural gas by pipeline" means transmission or distribution of natural gas through a pipe.

(b) A single entity may qualify as an operator under one or more of the provisions of this subsection.

(c) The term "operator" includes operators of master meter systems, as that term is defined in WAC 480-93-005.

(d) Notwithstanding the foregoing, a person or corporation performing construction or maintenance activities under contract with an operator shall not be considered an operator under this subsection or for the purposes of chapter 480-93 WAC.

4. WAC 480-93-005 (17) "Prompt action"

Staff agreed at the December 9, 2003 stakeholder workshop to remove the word "consistently" from the definition of 'Prompt action.

PSE recommends the following changes to the definition of prompt action in WAC 480-93-005(17):

(17) **"Prompt action"** means to ~~consistently~~ dispatch qualified personnel without undue delay for the purpose of evaluating and, where necessary, abating an existing or probable hazard.

5. WAC 480-93-015 Odorization of gas.

It appears that this rule applies only to natural gas as opposed to the requirements in 192.625 that cover "combustible gas". PSE would like clarification on the scope of 480-93-015.

Regarding subsection (3) of this section, PSE is concerned about the use of the term "calibration". The instruments should be checked for accuracy, what PSE refers to as a calibration check in our O&M manual, and if the instrument falls outside of a specified tolerance then it gets calibrated. PSE recommends that this distinction be made clear here and in all other sections of this chapter dealing with calibration of instruments.

PSE recommends the following revisions to WAC 480-93-015:

WAC 480-93-015 Odorization of gas.

(1) All natural gas that is transported by pipeline must be odorized at a concentration in air of one-fifth of the lower explosive limit, so that the gas is readily detectable by a person with a normal sense of smell.

(2) Operators must use odorant testing instrumentation when conducting sniff tests. Sniff tests must be performed at least once monthly.

(3) Operators must check for accuracy and calibrate instruments used to conduct sniff tests in accordance with the manufacturer's recommendations. When there is no manufacturer's recommendation, operators must check ~~calibrate~~ instruments used to conduct sniff tests for accuracy at least once annually and calibrate the instrument if it is not within specified tolerances.

(4) Operators must keep all records of odorant usage, sniff tests performed, and equipment calibration for five years.

6. WAC 480-93-018 Maps, drawings, and records of gas facilities.

Under subsection (2) of this section, Staff added "reports" to the list of information an operator must make available to the commission. It is unclear why this addition was made. RCW 80.28.207 provides the commission statutory authority to "inspect any record, map, or written procedure required by federal law to be kept by a gas pipeline company concerning the reporting of gas releases, and the design, construction, testing, or operation and maintenance of gas pipelines." PSE requests that Staff delete "reports" from this section, in order to maintain consistency with the RCW.

7. WAC 480-93-020 Proximity considerations.

PSE believes the language in this rule section could be revised for clarity. For instance, "pounds per square inch gauge" is used when "psig" is a defined term under section –005 of this chapter. "Intended for human occupancy" is used to modify building when this is evident from the definition in section –005 of this chapter. Also, "building" is used unmodified in (a)(i) and (b)(i), and modified in (a)(ii) and (b)(ii). In comparison to the existing rule, it appears that Staff intends that a building within a certain distance, regardless of the number of people occupying it, shall be a restriction to the proximity of certain pipelines. Therefore, it is only outside areas that should be modified by the numbers of persons that occupy the outside area.

PSE recommends the following changes to WAC 480-93-020:

WAC 480-93-020 Proximity considerations.

(1) Each operator must submit a written request and receive commission approval prior to: ~~operating any gas pipeline facility that has the following characteristics:~~

(a) Operating or intending to operate any gas pipeline facility at greater than five hundred ~~pounds per square inch gauge (~~psig~~)~~ that is within five hundred feet of any of the following places:

(i) A building ~~intended for human occupancy~~ that is in existence or under construction prior to the date authorization for construction is filed with the commission, and that is not owned and used by the petitioning operator in its gas operations; or

(ii) ~~A building or an~~ An outside area (such as a playground, recreation area, outdoor theater, or other place of public assembly) that is occupied by twenty or more people for sixty days in any twelve-month period, which is in existence or under construction prior to the date authorization for construction is filed with the commission; or

(iii) A public highway, as defined in RCW 81.80.010(3).

(b) Operating or intending to operate any gas pipeline facility at greater than two hundred fifty psig, up to and including five hundred psig, that is operated within one hundred feet of either of the following places:

(i) A building ~~intended for human occupancy~~ that is in existence or under construction prior to the

date authorization for construction is filed with the commission, and that is not owned and used by the petitioning operator in its gas operations; or

(ii) ~~A building or an~~ An outside area (such as a playground, recreation area, outdoor theater, or other place of public assembly) that is occupied by twenty or more people for sixty days in any twelve-month period, which is in existence or under construction prior to the date authorization for construction is filed with the commission.

(2) For proposed new construction of pipelines having the characteristics listed in subsection (1)(a) or (b) of this section, operators must provide documentation proving that it is not practical to select an alternate route that will avoid such locations and further provide documents that demonstrate that the operator has considered the possibility of the future development of the area and has designed their pipeline facilities accordingly.

(3) During the review process, operators must provide maps and records to the commission showing the exact location of the pipeline and the shortest direct distance to the places described in subsection (1)(a) and (b) of this section. Upon request of the commission, the operator must provide the maintenance, construction, and operational history of the pipeline system and an aerial photograph showing the exact location of the pipeline in reference to places listed in subsection (1)(a) and (b) of this section.

8. WAC 480-93-040 Location of gas compressor stations on gas pipelines.

PSE recommends the following revisions to 480-93-040 for consistency:

WAC 480-93-040 Location of gas compressor stations on gas pipelines.

(1) Gas compressor stations that are designed to operate at pressures in excess of two hundred fifty psig, and having an installed capacity equal to or greater than one thousand horsepower, must be located at least five hundred feet away from any existing buildings that are not under the control of the operator.

(2) Gas compressor stations that are designed to operate at pressures in excess of two hundred fifty psig, and having an installed capacity of less than one thousand horsepower must be located at least two hundred fifty feet away from any existing buildings that are not under the control of the operator.

9. WAC 480-93-080 Welder and plastic joiner identification and qualification.

PSE recommends deleting subsections (1)(b) and (1)(c) of this section. These subsections are not necessary by virtue of the requirements under subsection (1). These are not more stringent than federal rules or the cited standards, rather they are duplicative and affect the clarity of this section.

PSE also finds the language in subsection (2) and (2)(b) confusing. What is the distinction between "requalification" used in subsection (2) and "requalification" used in (2)(b)? PSE's O&M plan distinguishes between an annual test and a requalification test. The former requires fewer test joints than the latter, which has the same requirements as an initial qualification. PSE requests that Staff clarify their intent.

Assuming Staff intends for there to be a distinction between subsection (2) and (2)(b), with subsection (2) pertaining to a less stringent annual test for personnel who have made joints in the course of their work in the past 12 months, PSE believes that the proposed documentation required under subsection (2)(c) would apply only when a plastic joiner wants to perform the less stringent annual test. If an operator chooses to always requalify plastic joiners under the more stringent requirements of the initial qualification then tracking of production fuses would not be required.

PSE recommends the following revisions to WAC 480-93-080:

WAC 480-93-080 Welder and plastic joiner identification and qualification.

(1) All welding procedures and welders, except welders listed in (a) of this subsection, must be qualified to API Standard 1104 or section IX of the ASME Boiler and Pressure Vessel Code.

(a) Oxyacetylene welders may qualify under 49 CFR § 192 Appendix C, but may only weld the following size pipe:

(i) Nominal two-inch or smaller branch connections to nominal six-inch or smaller main or service pipe.

(ii) Nominal two-inch or smaller below ground butt welds.

(iii) Nominal four-inch or smaller above ground manifold and meter piping.

(~~iv~~) (b) Appendix C welders must be requalified at least twice annually, but not to exceed seven and one-half months between qualification tests.

~~(b) When testing welders or qualifying procedures, operators must use the necessary testing equipment to measure the amperage, voltage, and speed of travel. All essential variables, as defined by the applicable procedure, must be recorded and documented as performed during the welder and procedure testing.~~

~~(c) For the purposes of (b) of this subsection, "essential variable" is defined as any variable in the welding procedure, which, according to the procedure being used, would require the requalification of the procedure if changed from or performed outside a specified range. "Speed of travel" is defined as the actual per pass welding time in minutes divided by the length of the weld in inches.~~

~~(d)~~ (c)Qualified written welding procedures must be located on-site where welding is being performed.

(2) Personnel qualified to join plastic pipe must be tested ~~requalified at least once~~ annually, but not to exceed fifteen months, ~~between~~ to maintain their qualifications under a certain procedure.

~~(a)~~(c) Qualified written plastic joining procedures must be located on-site where plastic joining is being performed.

~~(b)~~ (a) Plastic joiners must be requalified under the initial qualification requirements of an applicable procedure, if during any twelve-month period that person has not made any joints under that procedure.

~~(c)~~ (b) In order to ensure compliance with ~~(b) of this~~ subsection (2) of this section, each operator must have a method of tracking production fuses. This method must be outlined in the operator's procedures manual.

(3) Welders and plastic joiners must carry appropriate identification and qualification cards showing the name of the welder or joiner, their qualifications, the date of qualification and the operator whose procedures were followed for the qualification. Welders and plastic joiners qualification cards will be subject to commission inspection at all times when qualified personnel are working on facilities subject to commission jurisdiction.

10. WAC 480-93-100 Valves.

PSE would like to reiterate comments previously submitted under this docket pertaining to the requirements proposed under section 480-93-100. PSE believes the prescriptive nature of this section pertaining to service line valve maintenance imposes an unjustifiable burden on operators. Staff recognizes the extraordinary administrative and economic burden of this proposed section by offering to extend the effective date of this rule for three years. Subsection (1) of this section requires operators to have a written program and subsection (2) gives guidance on selection of valves to include under the program. Given this, subsection (3) is unnecessary. Operators should use the selection criteria under subsection (2) to identify appropriate service valves to include under their written program rather than have these valves dictated through regulation.

In the Small Business Economic Statement (SBEIS), Staff cites excessive duration of blowing gas during an emergency as justification for the rule, although the number of cases in which this occurred, whether on services or mains, is not specified. It is customary for operators to give priority to the safety of the persons and then property over shut down of the gas. The burden of maintaining additional service valves is unlikely to address Staff's concern.

Under subsection (1), PSE finds the circular cross-reference to the section confusing and recommends deletion. PSE requests clarification on what/whose construction projects are referred to under this subsection.

Under subsection (2)(i) the undefined term "high occupancy structures" is used. PSE recommends deletion of this.

PSE recommends the following revisions to WAC 480-93-100:

WAC 480-93-100 Valves.

(1) Each operator must have a written valve maintenance program detailing the valve ~~selection process,~~ inspection, maintenance, and operating procedures. The written program must detail which valves will be maintained under 49 CFR § 192.745~~,~~ and 49 CFR § 192.747~~, and WAC 480-93-100~~. The written program will also outline how the operator will monitor and maintain valves during construction projects to ensure accessibility.

(2) The following criteria ~~and locations~~ must be considered when selecting which valves require annual inspections and maintenance under 49 CFR § 192.745 and 49 CFR § 192.747:

(a) ~~Each~~ ~~p~~Pressure regulating stations.

(b) Principal feeds into business districts.

(c) Geographical size of the area to be isolated.

(d) ~~Number of potential customers affected.~~ Total number of customers, and customers such as hospitals, schools and commercial and industrial users that would be affected.

(e) Pipeline size and operating pressures.

(f) Class locations.

(g) Potential threats including, but not limited to, earthquakes, floods, and landslides.

(h) Emergency response time.

~~(i) High occupancy structures or areas.~~

~~(3) The following service line installations, over twenty feet in length, must have a shut off valve installed far enough away from the building to be accessible in an emergency.~~

~~(a) Services to churches, schools, hospitals.~~

~~(b) Services to commercial buildings within business districts.~~

~~(4)~~ (3) Service ~~V~~valves ~~installed on services~~ identified in subsection ~~(3)~~ (2)of this section must be operated and maintained at least once annually, but not to exceed fifteen months between operation and maintenance.

~~(5) This rule is effective on January 1, 2008.~~

11. WAC 480-93-110 Corrosion control.

Regarding subsection (1) of this section, it is unclear whether the requirements apply to new construction only or also to existing pipelines installed before August 1, 1971 as allowed under 192.457.

Regarding subsection (2) of this section, this duplicates 192.491 and for clarity to operators it should removed from this section.

Regarding subsection (4) of this section, the reference to calibration of instruments should distinguish between checking an instrument for accuracy and calibrating the instrument as noted under comment #5 above.

Regarding subsection (7) of this section, PSE disagrees with the requirements to increase the inspection interval to an annual cycle from a 10-year cycle. The unprotected bare steel pipelines affected by this section are subject to leak surveys twice per year. PSE requests technical justification for the 10-fold increase in inspections at these locations.

Regarding subsection 9 of this section, PSE disagrees with imposing regulations for monitoring of internal corrosion on distribution companies when internal corrosion is not a threat to the pipeline integrity of our facilities. In the SBEIS, Staff cites the New Mexico incident as a basis for this new requirement. The pipeline in said incident was a transmission line operating at high pressure, under high stress and with known electrolytes in the gas stream. PSE disagrees with the correlation between that pipeline and the pipelines under the jurisdiction of the WUTC. PSE believes that requirements beyond those specified in 192.475 are unreasonable and recommends that this subsection be deleted from this section.

PSE recommends the following revisions to 480-93-110:

WAC 480-93-110 Corrosion control.

(1) Each operator must ensure that all of their buried metallic gas pipelines, except cast iron and ductile iron, are protected by a recognized method or combination of methods of cathodic protection.

~~(2) Operators must record and retain a record of each cathodic protection test, survey, or inspection required by 49 CFR Subpart I, and chapter 480-93 WAC. Records of each test, survey, or inspection must be kept for a minimum of five years except those specified in 49 CFR § 192.491(c) requiring retention for the life of the facility.~~

(3) Each operator must complete remedial action within ninety days to correct any cathodic protection deficiencies known and indicated by any test, survey, or inspection. An additional thirty days may be

allowed for remedial action if, due to circumstances beyond the operator's control, ~~if~~ it is not possible to complete remedial action within ninety days. Each operator must be able to provide documentation to the commission indicating that remedial action was started in a timely manner and that all efforts were made to complete remedial action within ninety days. (Examples of circumstances allowing operators to exceed the ninety-day time frame include right of way permitting issues, availability of repair materials, or unusually long investigation or repair requirements.)

(4) Operators must have written procedures for the proper use~~,~~ and maintenance~~, and where feasible the calibration~~ of cathodic protection equipment and instrumentation. At a minimum, each operator must follow the manufacturer's recommended practices for equipment and instrumentation maintenance and calibration. Equipment or instruments ~~that are incapable of being calibrated~~ must be checked for accuracy on a scheduled frequency and calibrated as necessary.

(5) Each operator's procedures manual must have written procedures explaining how cathodic protection related surveys, reads, and tests will be conducted. Examples of such procedures include, but are not limited to, how to determine IR drop (as defined in 49 CFR § 192 Appendix D), how to conduct electrical surveys, how to test casings for electrical isolation, how to test casings for shorted conditions, and how to measure and interpret 49 CFR § 192 Appendix D criteria.

(6) Operators must conduct inspections or tests for electrical isolation between metallic pipeline casings and metallic pipelines at least once annually, but not to exceed fifteen months between inspections or tests. The test or inspection must also determine whether the pipeline has adequate levels of cathodic protection at the casing to pipeline interface. These requirements do not apply to unprotected copper inserted in ferrous pipe.

(a) For each casing installed prior to September 5, 1992, that does not have test leads, the operator must be able to demonstrate that other test or inspection methods are acceptable and that test lead wires are not necessary to monitor for electrical isolation and adequate cathodic protection levels.

(b) Whenever electrical isolation tests or inspections indicate that a possible shorted condition exists between a casing and a pipeline, the operator must conduct a follow-up test within ninety days to determine whether an actual short exists. The operator's procedures manual must have a level or threshold that would indicate a potential shorted condition and must also detail the method of determining whether the casing is actually shorted to the pipeline.

(c) The operator must clear the shorted condition where practical.

(d) Whenever a short exists between a pipeline and casing, the operator must perform a leak survey within ninety days of discovery and at least twice annually thereafter, but not to exceed seven and one-half months between leak surveys until the shorted condition is eliminated.

~~(7) Each short segment of pipeline measuring less than one hundred feet in length, that has experienced leakage due to corrosion, and that has subsequently been cathodically protected must be tested annually not to exceed fifteen months to determine whether the facility has adequate levels of cathodic protection.~~

(8) Operators must record the condition of all underground metallic facilities each time the facilities are exposed.

~~(9) Operators must have a written program to monitor for indications of internal corrosion. The program must also have remedial action requirements for areas where internal corrosion is detected.~~

(10) On all cathodically protected pipelines, the operator must take a cathodic protection test reading each time an employee or representative of the operator exposes the facility and the protective coating is removed.

(11) Each operator must have a written atmospheric corrosion control monitoring program. The program must have time frames for completing remedial action.

12. WAC 480-93-124 Pipeline markers.

PSE recommends revising the language in this section for clarity and ease of understanding by operators. The requirement to place markers approximately five hundred yards apart does not make sense for crossing locations or single point locations such as exposed pipe. The current language in WAC 480-93-124 specifically states that markers required by 192.707(a) shall be placed 500 yards apart. It appears that this requirement would only apply to long sections of a pipeline where damage or interference could possible occur [192.707(a)(2)]. PSE suggest revising the proposed rule to make the intent clear.

PSE recommends the following changes to 480-93-124:

WAC 480-93-124 Pipeline markers.

(1) Operators must place pipeline markers at all railroad, road, irrigation, and drainage ditch crossings, and at all fence lines where a pipeline crosses private property, or where a pipeline or pipeline facility is exposed. ~~Operators must place pipeline markers approximately five hundred yards apart, if practical, and at points of horizontal deflection of the pipeline.~~ Exceptions to this rule must conform with 49 CFR § 192.707(b).

(a) Where markers are installed under subsection (2)(b) and (c) of this section, operators must place the pipeline markers on both sides of the crossing.

(b) Pipeline markers installed in accordance with 192.707(a)(2) shall be placed approximately five hundred yards apart, if practical, and at points of horizontal deflection of the pipeline.

(2) The following pipelines are not exempted by 49 CFR § 192.707(b) and must have pipeline markers installed:

(a) ~~Where practical, on a~~All mains operating above two hundred fifty psig;

(b) ~~On both sides of c~~Crossings of navigable waterways;

(c) ~~On both sides of r~~River, creek, or irrigation canal crossings where hydraulic scouring, dredging, or other activity could pose a risk to the pipeline; and

(d) ~~On all r~~Railroad crossings.

(3)Where gas pipelines are attached to bridges or otherwise span an area, operators must place pipeline markers at both ends of the suspended pipeline. Each operator must conduct inspections at least annually, but not to exceed fifteen months between inspections,

and maintain the markers to ensure that they are visible and legible.

(4) Operators must replace markers that are reported damaged and missing within forty-five days.

(5) Surveys of pipeline markers not associated with subsection (3) of this section must be conducted as frequently as necessary, to maintain the markers to ensure that they are visible and legible, but at intervals not to exceed five years. The survey records must be kept for a minimum of ten years.

(6) Operators must have maps, drawings or other sufficient records indicating class locations and other areas where pipeline markers are required.

13. WAC 480-93-130 Multistage pressure regulation.

Staff indicated they would remove "maximum" from the text of this section. In addition, the term "where feasible" was added to this section in replacement of "when practical to do so." PSE is concerned that it is not always practical for above ground installations to meet the separation requirement although it might technically be feasible. PSE requests that the term feasible be removed and replace with existing wording in the rule. PSE also believes this section should include exceptions for meter set assemblies and for other above ground facilities that are controlled by the operator, such as enclosed regulator stations.

PSE recommends the following revisions to WAC 480-93-130:

WAC 480-93-130 Multistage pressure regulation.
(1) Where gas pressures are reduced in two or more stages, an operator must install the necessary regulators and equipment in such a manner as to provide ~~maximum~~ protection between regulator stages. The purpose is to minimize the potential dangers from the failure of one stage of regulator equipment due to fire, explosion, or damage of any kind, from adversely affecting the operation of the other stage or stages of regulation. Operators must ensure ~~where feasible,~~ there is a minimum of fifty feet of separation between regulator stages when practical to do so.
(2) The requirements under subsection (1) of this section do not apply to customer meter set assemblies or above ground, enclosed gas facilities controlled by the operator.

14. WAC 480-93-155 Increasing maximum allowable operating pressure.

Regarding subsection (1) of this section, PSE would like clarification on the change in the rule language from "written plans and drawings" to "a written plan of procedures including all applicable specifications with drawings". Is Staff seeking documents they currently are not getting with the written plan? Subsection (j) of this section allows for addition records to be provided upon request. Rather than burden operators with providing copies of unnecessary documents, PSE recommends simplifying the language in subsection (1).

Subsection (1) and (1)(a) are unclear whether an operator is simply reviewing design, operation and maintenance records or including a list of items with the written plan. As written, "the plan must include a review of . . . (a) A list . . " PSE requests that this language be revised to match the existing rule language.

Regarding subsection (2) of this section, The CFR reference is incorrect (it should be 192.555(c)) and is redundant. Because uprating is defined as increasing the MAOP, this can be accomplished by conducting a pressure test on the pipeline. The requirement that a pressure test be conducted if there is no documented history of a test is the same as conducting a pressure test in conjunction with the uprate.

PSE recommends the following revisions to WAC 480-93-155:

WAC 480-93-155 Increasing maximum allowable operating pressure.

(1) At least forty-five days before uprating to a ~~maximum allowable operating pressure (~~MAOP~~)~~ greater than sixty ~~pounds per square inch gauge (~~psig~~)~~, each operator must submit to the commission for review a written plan ~~of procedures~~ including all applicable specifications ~~with drawings~~ and a map of the affected pipeline systems. At a minimum, the plan must include a review of the following:

(a) ~~A list of all~~ All affected gas facilities, including pipes, fittings, valves, and other affected equipment, ~~with~~ and the manufacturer's specified maximum operating pressure limits, ~~their specified minimum yield strength (SMYS) at the intended MAOP, and any other applicable specifications or limitations~~;

(b) Original design and construction standards;

(c) Original pressure test records;

(d) Previous operating pressures identifying the dates and lengths of time at that pressure;

(e) Records of all leaks, regardless of cause, and the dates and methods of repair;

(f) Where the pipeline is being uprated to an MAOP of over twenty percent of the SMYS, records of the original welding standards and welders;

(g) Maintenance records of all affected regulator~~s~~ stations and system relief valves for the past three years or three most recent inspections, whichever is longer;

(h) Where applicable, relief valve capacities compared to regulator flow capacities at the proposed MAOP ~~, with calculations~~;

(i) Cathodic protection readings of the affected pipeline and facilities, including rectifier readings, for the past three years or three most recent inspections, whichever is longer.~~; and~~

~~(j)~~ (2) Each operator shall provide, upon request, ~~A~~any additional records that commission staff may deem necessary to evaluate the pressure increase.

~~(2)~~ (3)Uprates must be based on a previous pressure test that will substantiate the intended MAOP. When there is no documented history of a pressure test or where the original pressure test would not substantiate the intended MAOP, an operator must ~~either~~ conduct a new pressure test.~~, or where allowed by 49 CFR § 192.503(c), conduct a pressure test in conjunction with the uprate~~.

15. WAC 480-93-170 Tests and reports for pipelines.

Regarding subsection (2) of this section, PSE is unclear why Staff has selected eighty-two psig as a threshold for testing in accordance with 192.619. The draft proposal originally stated a pressure of 60 psig and it appeared the intent was to capture steel mains and services that operate between 60 psig and 99 psig and apply the same design factor as steel pipelines operating at 100 psig or greater.

Regarding subsection (3) of this section, this is redundant to Part 192 and PSE recommends it be deleted for that reason.

Regarding subsection (10) of this section, PSE would like to reiterate earlier comments regarding calibration and checking for accuracy. Instruments should be checked for accuracy on a scheduled basis and calibrated if they fall outside a specified tolerance. In some cases, the instruments cannot be calibrated and are therefore disposed of. If an instrument is within tolerance, calibration is not necessary. PSE requests that this distinction be made in this section.

PSE recommends the following revisions to 480-93-170:

WAC 480-93-170 Tests and reports for pipelines.

(1) Operators must notify the commission in writing at least two business days prior to the commencement of any pressure test of a gas pipeline that will have an MAOP that produces a hoop stress in excess of twenty percent of the specified minimum yield strength of the pipe used.

(a) The pressure tests of any such gas pipeline built in Class 3 or Class 4 locations, as defined in 49 CFR Part 192.5, or within one hundred yards of a building ~~intended for human occupancy~~, must be at least eight hours in duration.

(b) When the test medium is to be a gas or compressible fluid, each operator must notify the appropriate public officials so that adequate public protection can be provided for during the test.

(c) In an emergency situation where it is necessary to maintain continuity of service, the requirements of subsection (1) of this section and subsection (1)(a) of this section may be waived by notifying the commission by telephone prior to performing the test.

(2) For each steel service line or main intended to be operated ~~at or~~ above ~~eighty-two~~ sixty psig, the minimum test pressure must be determined by multiplying the intended MAOP by a factor determined

in accordance with the table located in 49 CFR § 192.619 (a)(2)(ii).

~~(3) Operators must perform pressure tests for all new or replacement pipeline installations.~~

~~(4)~~(3)All service lines that are broken, pulled, or damaged, resulting in the interruption of gas supply to the customer, must be pressure tested from the point of damage to the service termination valve (generally the meter set) prior to being placed back into service.

~~(5)~~(4) Operators may only use pretested pipe when it is not feasible to conduct a post construction pressure test.

(6) Operators must perform soap tests at the tie-in joints at not less than the current operating pressure of the pipeline.

(7) Operators must keep records of all pressure tests performed for the life of the pipeline and must document the following information:

(a) Operator's name;

(b) Employee's name;

(c) Test medium used;

(d) Test pressure;

(e) Test duration;

(f) Pipe size and length;

(g) Dates and times; and

(h) Test results.

(8) Where feasible, operators must install and backfill plastic pipe prior to pressure testing to expose any potential damage that could have occurred during the installation and backfill process.

(9) Where multiple pressure tests are performed on a single installation, operators must maintain a record of each test. An example of a single installation with multiple tests would be any continuous on-going job or installation such as a new plat or long main installation where more than one pressure test was conducted during construction.

(10) Pressure testing equipment must be maintained~~, calibrated, or where calibration is not possible, checked for accuracy~~ according to the manufacturer's recommended schedule. Maintenance of pressure testing equipment shall include checking for accuracy and, where applicable, calibration. If no manufacturer's schedule is available, an operator must determine a schedule and include it in the operations and maintenance procedures manual. Test equipment

must be tagged with the calibration or accuracy check expiration date. The requirements of this section also apply to equipment such as pressure charts, gauges, dead weights or other devices used to test, monitor or check system pressures or set-points.

16. WAC 480-93-175 Moving and lowering metallic gas pipelines.

PSE recommends the following revisions to WAC 480-93-175 for clarity and consistency:

WAC 480-93-175 Moving and lowering metallic gas pipelines.

(1) Except those pipelines detailed in subsection (3) of this section, each operator must prepare a study prior to moving or lowering any metallic pipeline to determine whether the proposed action will cause an unsafe condition. This study must be reviewed and approved by the operator's engineering department and retained in the operator's files for the life of the pipeline. This requirement does not apply to cast iron pipelines, which may not be lowered, or to copper pipelines. The study must include, but is not limited to, the following criteria:

(a) The required deflection of the pipe;

(b) The diameter, wall thickness, and grade of pipe;

(c) The characteristics of the pipeline;

(d) The terrain and class location;

(e) The present condition of the pipeline;

(f) The anticipated stresses of the pipeline including the safe allowable stress limits; and

(g) The toughness of the steel.

(2) Pipelines with mechanical or threaded joints must not be moved or lowered.

(3) Pipelines operating at sixty ~~pounds per square inch gauge (~~psig~~)~~ or less, which have a nominal diameter of two inches or less, may be moved or lowered without the required study, if the operator can certify that no undue stresses will be placed on the pipeline and that it can be moved or lowered in a safe manner. The operator must consider factors such as the type of materials, proximity to fittings, joints, and welds, and any other factors that could place undue stress on the pipeline or create an unsafe condition.

(4) A leak survey must be conducted within thirty days from the date any pipeline has been moved or lowered under subsection (3) of this section.

17. WAC 480-93-178 Protection of plastic pipe.

Regarding, subsection (4) of this section, PSE disagrees with the minimum twelve-inch parallel separation from all utilities. This requirement is very broad and makes no distinction between direct buried and cased/conduited facilities, between power and non-power facilities, between joint-trench and non-joint trench, nor between services and mains. In 2003, the Common Ground Alliance approved Best Practice 2-12 for underground utility separation that recommends, in part, "When installing new direct buried supply facilities in a common trench, a minimum of 12 inch radial separation should be maintained between supply facilities such as steam lines, plastic gas lines, other fuel lines, and direct buried electrical supply lines." PSE recommends either deleting this subsection or revising it to limit the requirement to proximity to direct buried power.

Regarding subsection (7) of this section, PSE disagrees with the requirement that bedding material must be rock-free unless otherwise specified by the manufacturer. Operators should be given flexibility to establish appropriate backfill requirements based upon industry practice in absence of guidance from the manufacturer. Specifying rock-free material is too prescriptive and unwarranted given the physical characteristics of today's polyethylene resins.

PSE recommends the following revisions to WAC 480-93-178:

WAC 480-93-178 Protection of plastic pipe.

(1) Every operator must have detailed written procedures for the storage, handling, and installation of plastic pipelines. Except for joining procedures, and unless the operator has more stringent procedures, the storage, handling, and installation of all plastic pipe must be in accordance with the latest applicable manufacturer's recommended practices.

(2) The maximum cumulative ultraviolet light exposure limit for plastic pipe is two years, or the manufacturer's recommended limit. The acceptable time limit must be detailed in the operator's procedures manual.

(3) Plastic pipe that is pulled through the ground by mechanical means must have a weak link installed that will ensure the pipe will not be damaged by excessive tensile forces.

(4) When installing plastic pipelines parallel to ~~other underground utilities~~ direct buried power conductors, operators must ensure there is a minimum of twelve inches of separation ~~from the other utilities~~. Where a minimum twelve inches of separation is not possible, operators must take

adequate precautions to minimize any potential hazards resulting from the close proximity to the power conductor ~~other utilities~~.

(5) When installing plastic pipelines perpendicular to other underground utilities, operators must ensure there is a minimum of six inches of separation from the other utilities. Where a minimum six inches of separation is not possible, an operator must take adequate precautions to minimize any potential hazards resulting from the close proximity to the other utilities.

(6) Except for approved steel encased plastic pipe, and except where allowed by (b) of this subsection, the maximum time limit that plastic pipe may be ~~temporarily~~ installed above ground is thirty days.

(a) During temporary installations, operators must monitor and protect above ground plastic pipe from potential damage.

(b) Operators may install above ground plastic pipe for periods longer than thirty days if they have a written monitoring program and notify the commission by telephone prior to exceeding the thirty-day time limit.

(7) Plastic pipe must be bedded in a suitable material as recommended by the pipe manufacturer. Unless otherwise permitted by the manufacturer, plastic pipe must be bedded in material that is generally acceptable by industry standards and that does not contain sharp rocks.

(8) Plastic pipe may not be squeezed more than one time in the same location.

(9) Plastic pipe must not be squeezed within twelve inches or three pipe diameters, whichever is greater, from any joint or fitting.

18. WAC 480-93-180 Plan of operations and maintenance procedures; emergency policy; reporting

Regarding subsection (1) of this section, PSE notes that "construction" was added to otherwise existing rule language. PSE believes that construction plans are covered by the requirements set forth in 480-93-017 and is not necessary to included in this section. PSE is also unclear on Staff's intent with the addition of "any plans or procedures used by an operator's associated contractors" required to be in an operator's operations manual.
PSE requests clarity on this requirement because it is unclear what plans and procedures Staff is referring to.

PSE recommends the following revisions to WAC 480-93-180:

WAC 480-93-180 Plan of operations and maintenance procedures; emergency policy; reporting.
(1) Each operator must have a plan and procedure manual for operation, maintenance, ~~construction,~~ inspection, and emergency response activities. The manual must comply with the provisions and general intent of the "Pipeline Safety Improvement Act of 2002." The manual must include plans and procedures for all requirements of 49 CFR § 192 and chapter 480-93 WAC, and any plans or procedures used by an operator's associated contractors.

(2) Plans must be filed with the commission as soon as practical for review and determination as to their adequacy, when properly executed, to achieve an acceptable level of safety. The commission may, after notice and opportunity for hearing, require that a manual be revised or amended. Applicable portions of the manual related to a procedure being performed on the pipeline must be retained on-site where the activity is being performed.

19. WAC 480-93-185 Gas leak investigation.

PSE recommends the following changes to WAC 480-93-185 for clarity:

WAC 480-93-185 Gas leak investigation.

(1) The operator must promptly investigate any notification of a leak, explosion, or fire, which may involve gas pipelines or other gas facilities, received from any outside source such as a police or fire department, other utility, contractor, customer, or the general public. Where the investigation reveals a leak, the operator must grade the leak in accordance with WAC 480-93-186, and take appropriate action. The operator must retain the leak investigation record for the life of the pipeline.

(2) In the event of an explosion, fire, death, or injury, the operator must not remove any suspected gas facility until the commission or the lead investigative authority have designated the release of the gas facility. Once the situation is made safe, the operator must keep the facility intact until directed by the lead investigative authority.

(3) When leak indications~~, such as gasoline vapors, sewer or marsh gas,~~ are found to originate from a foreign source or facility such as gasoline vapors, sewer~~,~~ or marsh gas, or from customer-owned piping, the operator must take appropriate action to protect life and property. Leaks that represent an on-going, potentially hazardous situation must be reported promptly to the owner or operator of the source facility and, where appropriate, to the police department, fire department, or other appropriate governmental agency. If the property owner or an adult person occupying the premises is not available, the operator must, within twenty-four hours of the leak investigation, send by first-class mail, addressed to the person occupying the premises, a letter explaining the results of the investigation. The operator must keep a record of each letter sent for five years.

20. WAC 480-93-186 Leakage classification and action criteria
WAC 480-93-18601 Leak classification and action criteria—Grade—Definition—Priority of leak repair

PSE's comments on this section are primarily grammatical. Inconsistent use of terms such as reinspect, reevaluate, and follow-up inspection need to be aligned and some of the subsections are formatted in a manner inconsistent with the remaining sections within this chapter. This section and the following section, 480-93-18601 contain duplicate information. PSE recommends combining the information in –18601 into –186 for clarity, to eliminate redundancy of information, and for ease of use by operators.

PSE recommends the following revisions to WAC 480-93-186 and 480-93018601:

WAC 480-93-186 Leakage classification and action criteria.

(1) Based on an evaluation of the location and/or magnitude of a leak, the operator must assign one of the leak grades in subsections ~~(3)~~ (4) through (6) of this section, thereby establishing the leak repair priority. An operator may use an alphabetical grade classification, i.e., Grade A for Grade 1, Grade B for Grade 2, and Grade C for Grade 3 if it has historically used such a grading designation. Operators must apply the same criteria used for initial leak grading ~~to reinspected~~ when reevaluating leaks.

(2) ~~Gas leak classification and repair.~~ Each operator must establish a procedure for evaluating the concentration and extent of gas leakage. When evaluating any leak, the operator must determine and document the perimeter of the leak area. If the perimeter of the leak extends to a building wall, the operator must extend the investigation inside the building. Where the reading is in an unvented, confined space, the operator must consider the rate of dissipation when the space is ventilated and the rate of accumulation when the space is resealed.

(3) ~~Follow-up inspections.~~ The adequacy of leak repairs shall be checked by acceptable methods while the excavation is open. The operator must check the perimeter of the leak area with a combustible gas indicator. The operator must ~~reinspect~~ perform a follow up inspection on all leak~~s~~ repairs with residual gas remaining in the ground as soon as

practical, but not later than thirty days following the repair.

(4) ~~Leak grades.~~

~~(a)~~ A Grade 1 ~~means a~~ leak is a leak that represents an existing or probable hazard to persons or property, and requires immediate repair or continuous action until conditions are no longer hazardous.

(a)Prompt action in response to a Grade 1 leak may require one or more of the following:

(i) Implementation of the operator's emergency plan pursuant to 49 CFR § 192.615;

(ii) Evacuating the premises;

(iii)Blocking off an area;

(iv)Rerouting traffic;

(v)Eliminating sources of ignition;

(vi)Venting the area;

(vii)Stopping the flow of gas by closing valves or other means; or

(viii)(h) Notifying police and fire departments.

(b) Examples of Grade 1 leaks requiring prompt action include, but are not limited to:

(i) Any leak, which in the judgment of operating personnel at the scene, is regarded as an immediate hazard;

(ii) Escaping gas that has ignited unintentionally;

(iii) Any indication of gas that has migrated into or under a building or tunnel;

(iv) Any reading at the outside wall of a building or where the gas could potentially migrate to the outside wall of a building;

(v) Any reading of eighty percent LEL or greater in a confined space;

(vi) Any reading of eighty percent LEL, or greater in small substructures not associated with gas facilities where the gas could potentially migrate to the outside wall of a building; or

(vii) Any leak that can be seen, heard, or felt and which is in a location that may endanger the general public or property.

~~(b)~~ (5) A Grade 2 ~~means a~~ leak is a leak that is recognized as not being hazardous at the time of detection but requiring scheduled repair based on potential future hazard.

(a) Operators must repair or clear Grade 2 leaks within fifteen months from the date the leak is reported. If a Grade 2 leak occurs in a segment of pipeline that is under consideration for replacement, an additional six months may

be added to the fifteen months maximum time for repair provided above. In determining the repair priority, operators should consider the following criteria:

(i) Amount and migration of gas;

(ii) Proximity of gas to buildings and subsurface structures;

(iii) Extent of pavement; and

(iv) Soil type and conditions, such as frost cap, moisture and natural venting.

(b) Operators must reevaluate Grade 2 leaks at least once every six months until cleared. The frequency of reevaluation should be determined by the location and magnitude of the leakage condition.

(c) Grade 2 leaks vary greatly in degree of potential hazard. Some Grade 2 leaks, when evaluated by the criteria, will require prompt scheduled repair within the next five working days. Others in (a) of this subsection require repair within thirty days. The operator must bring these situations to the attention of the individual responsible for scheduling leakage repair at the end of the working day. Many Grade 2 leaks, because of their location and magnitude, can be scheduled for repair on a normal routine basis with periodic reinspection as necessary.

(d) When evaluating Grade 2 leaks, operators should consider leaks requiring action ahead of ground freezing or other adverse changes in venting conditions, and any leak that could potentially migrate to the outside of a building, under frozen or other adverse soil conditions.

(e) Examples of Grade 2 leaks requiring action within six months include, but are not limited to:

(i) Any reading of forty percent LEL or greater under a sidewalk in a wall-to-wall paved area that does not qualify as a Grade 1 leak where gas could potentially migrate to the outside wall of a building;

(ii) Any reading of one hundred percent LEL or greater under a street in a wall-to-wall paved area that does not qualify as a Grade 1 leak where gas could potentially migrate to the outside wall of a building;

(iii) Any reading less than eighty percent LEL in small substructures not associated with gas facilities where gas could potentially migrate creating a probable future hazard;

(iv) Any reading between twenty percent LEL and eighty percent LEL in a confined space;

(v) Any reading on a pipeline operating at thirty percent specified minimum yield strength or greater in

Class 3 or 4 locations that does not qualify as a Grade 1 leak; or

(vi) Any leak which in the judgment of operating personnel at the scene is of sufficient magnitude to justify scheduled repair.

~~(c)~~ (6) A Grade 3 ~~means a~~ leak is a leak that is not hazardous at the time of detection and can reasonably be expected to remain not hazardous.

(a) Operators should reevaluate Grade 3 leaks during the next scheduled survey, or within fifteen months of the reporting date, whichever occurs first, until the leak is regraded or no longer results in a reading.

(b) Examples of Grade 3 leaks requiring reevaluation at periodic intervals include, but are not limited to:

(i) Any reading of less than eighty percent LEL in small gas associated substructures, such as small meter boxes or gas valve boxes; or

(ii) Any reading under a street in areas without wall-to-wall paving where it is unlikely the gas could migrate to the outside wall of a building.

~~(d)~~ (7)Grade 1 and 2 leaks can only be downgraded once to a Grade 3 leak without a physical repair. After a leak has been downgraded once, the maximum repair time for that leak is twenty-one months.

~~(5) Leakage classification and control requirements are provided in WAC 480-93-18601.~~

~~**WAC 480-93-18601 Leak classification and action criteria--Grade--Definition--Priority of leak repair**~~

~~(1) Grade 1 leak. A "Grade 1 leak" is a leak that represents an existing or probable hazard to persons or property and requiring prompt action, immediate repair, or continuous action until the conditions are no longer hazardous.~~

~~(a)Prompt action in response to a Grade 1 leak may require one or more of the following:~~

~~(i) Implementation of the operator's emergency plan pursuant to 49 CFR § 192.615;~~

~~(ii) Evacuating the premises;~~

~~(iii)Blocking off an area;~~

~~(iv)Rerouting traffic;~~

~~(v) Eliminating sources of ignition;~~
~~(vi) Venting the area;~~
~~(vii) Stopping the flow of gas by closing valves or other means; or~~
~~(viii) Notifying police and fire departments.~~
~~(b) Examples. Examples of Grade 1 leaks requiring prompt action include, but are not limited to:~~
~~(i) Any leak, which in the judgment of operating personnel at the scene, is regarded as an immediate hazard;~~
~~(ii) Escaping gas that has ignited unintentionally;~~
~~(iii) Any indication of gas that has migrated into or under a building or tunnel;~~
~~(iv) Any reading at the outside wall of a building or where the gas could potentially migrate to the outside wall of a building;~~
~~(v) Any reading of eighty percent LEL or greater in a confined space;~~
~~(vi) Any reading of eighty percent LEL, or greater in small substructures not associated with gas facilities where the gas could potentially migrate to the outside wall of a building; or~~
~~(vii) Any leak that can be seen, heard, or felt and which is in a location that may endanger the general public or property.~~
~~(2) Grade 2 leak. A "Grade 2 leak" is a leak that is recognized as being not hazardous at the time of detection but justifies scheduled repair based on potential future hazard.~~
~~(a) Operators must repair or clear Grade 2 leaks within fifteen months from the date the leak is reported. If a Grade 2 leak occurs in a segment of pipeline that is under consideration for replacement, an additional six months may be added to the fifteen months maximum time for repair provided above. In determining the repair priority, operators should consider the following criteria:~~
~~(i) Amount and migration of gas;~~
~~(ii) Proximity of gas to buildings and subsurface structures;~~
~~(iii) Extent of pavement; and~~
~~(iv) Soil type and conditions, such as frost cap, moisture and natural venting.~~
~~(b) Operators must reevaluate Grade 2 leaks at least once every six months until cleared. The frequency of reevaluation should be determined by the location and magnitude of the leakage condition.~~
~~(c) Grade 2 leaks vary greatly in degree of potential hazard. Some Grade 2 leaks, when evaluated by the criteria, will require prompt scheduled repair within the next five working days. Others in (a) of this subsection require repair within thirty days. The operator must bring these~~

~~situations to the attention of the individual responsible for scheduling leakage repair at the end of the working day. Many Grade 2 leaks, because of their location and magnitude, can be scheduled for repair on a normal routine basis with periodic reinspection as necessary.~~

~~(d) When evaluating Grade 2 leaks, operators should consider leaks requiring action ahead of ground freezing or other adverse changes in venting conditions, and any leak that could potentially migrate to the outside of a building, under frozen or other adverse soil conditions.~~

~~(e) Examples. Grade 2 leaks requiring action within six months include, but are not limited to:~~

~~(i) Any reading of forty percent LEL or greater under a sidewalk in a wall to wall paved area that does not qualify as a Grade 1 leak where gas could potentially migrate to the outside wall of a building;~~

~~(ii) Any reading of one hundred percent LEL or greater under a street in a wall to wall paved area that does not qualify as a Grade 1 leak where gas could potentially migrate to the outside wall of a building;~~

~~(iii) Any reading less than eighty percent LEL in small substructures not associated with gas facilities where gas could potentially migrate creating a probable future hazard;~~

~~(iv) Any reading between twenty percent LEL and eighty percent LEL in a confined space;~~

~~(v) Any reading on a pipeline operating at thirty percent specified minimum yield strength or greater in Class 3 or 4 locations that does not qualify as a Grade 1 leak; or~~

~~(vi) Any leak which in the judgment of operating personnel at the scene is of sufficient magnitude to justify scheduled repair.~~

~~(3) Grade 3 leak. A "Grade 3 leak" is a leak that is not hazardous at the time of detection and can reasonably be expected to remain not hazardous.~~

~~(a) Operators should reevaluate Grade 3 leaks during the next scheduled survey, or within fifteen months of the reporting date, whichever occurs first, until the leak is regraded or no longer results in a reading.~~

~~(b) Examples. Grade 3 leaks requiring reevaluation at periodic intervals include, but are not limited to:~~

~~(i) Any reading of less than eighty percent LEL in small gas associated substructures, such as small meter boxes or gas valve boxes; or~~

~~(ii) Any reading under a street in areas without wall to wall paving where it is unlikely the gas could migrate to the outside wall of a building.~~

21. WAC 480-93-187 Gas leak records

PSE recommends the following revisions to 480-93-187 for clarity and consistency:

WAC 480-93-187 Gas leak records.

Each operator must prepare and maintain permanent gas leak repair records. The leak repair records must contain sufficient data and information to permit the commission to assess the adequacy of the operator's leakage program. Gas leak records must contain, at a minimum, the following information:

(1) Date and time the leak was detected, investigated, reported, and the name of the employee(s) conducting the investigation;

(2) Date and time the leak was reevaluated before repair, and the name of the employee(s) ~~involved~~ performing the reevaluation;

(3) Date and time of repair and the name of the employee(s) in charge of the repair;

(4) Date and time of any ~~rechecks~~ follow-up inspections performed, and the name of the employee(s) ~~involved~~performing the follow-up inspection;

(5) Location of the leak (sufficiently described to allow ready location by other qualified personnel);

(6) Leak grade;

(7) Pipeline classification (e.g., distribution, transmission, service);

(8) If reported by an outside party, list the name and address of the reporting party;

(9) Component that leaked (e.g., pipe, tee, flange, valve);

(10) Size and material that leaked (e.g., steel, plastic, cast iron);

(11) Pipe condition;

(12) Type of repair;

(13) Leak cause;

(14) Date pipe installed (if known);

(15) Magnitude and location of CGI readings left;

(16) Magnitude and location of CGI readings as found (showing spread of gas); and

(17) Unique identification numbers (such as serial numbers) of leak detection equipment.

22. WAC 480-93-188 Gas leak surveys.

Based upon PSE's comments under 480-93-005 (3) for the definition of business district, PSE recommends deleting the delayed effective date for subsection (3)(a) in this section.

Regarding subsection (2) of this section, PSE would like to reiterate earlier comments regarding the distinction between a checking an instrument for accuracy and calibration of the instrument. Instruments used for leak detection should be check for accuracy against a specified test gas and calibrated, if applicable to the instrument, if the check shows that the instrument is outside of a specified tolerance.

PSE recommends the following revisions to 480-93-188:

WAC 480-93-188 Gas leak surveys

(1) Operators must perform gas leak surveys using a gas detection instrument covering the following areas:

(a) Over all mains, services, and transmission lines including the testing of the atmosphere near other utility (gas, electric, telephone, sewer, or water) boxes or manholes, and other underground structures;

(b) Through cracks in paving, and sidewalks;

(c) Along walls of businesses and buildings of public assembly that are within one hundred feet of an active pipeline facility;

(d) On all above ground piping (may be checked with either a gas detection instrument or with a soap solution);

(e) Where a gas service line exists, at the building wall point of entrance, using a bar hole where necessary; and

(f) Within all buildings where gas leakage has been detected at the outside wall, at locations where escaping gas could potentially migrate into and accumulate inside the building.

(2) Gas detection instruments must be maintained, calibrated, and operated in accordance with the manufacturer's recommendation. If there is no manufacturer's recommendation, then instruments must be checked for accuracy ~~calibrated~~ at least once monthly, but not to exceed forty-five days between checks ~~calibrations~~, but at least twelve times per

year. Instruments falling outside of the specified tolerance shall be calibrated or removed from service.

(3) Gas leak surveys must be conducted according to the following minimum frequencies:

(a) Business districts - at least once annually, but not to exceed fifteen months between surveys;

(b) Residential areas - as frequently as necessary, but not to exceed five years between surveys;

(c) Buildings of public assembly - at least once annually, but not to exceed fifteen months between surveys;

(d) Mains operating above two hundred fifty psig - at least once annually, but not to exceed fifteen months between surveys; and

(e) Where the gas system has cast iron, wrought iron, copper, or noncathodically protected steel - at least twice annually, but not to exceed seven and one-half months between surveys.

(4) Special leak surveys must be conducted under the following circumstances:

(a) Prior to paving or resurfacing, following street alterations or repairs where gas facilities are under the area to be paved, and where there is potential that damage could have occurred to gas facilities;

(b) Following the completion of construction, but prior to paving, ~~I~~in areas where substructure construction occurs adjacent to underground gas facilities, and there is potential that damage could have occurred to the gas facilities, operators must perform a gas leak survey following the completion of construction, but prior to paving;

(c) Unstable soil areas where active gas lines could be affected;

(d) In areas and at times of unusual activity, such as earthquake, floods, and explosions; and

(e) After third-party excavation damage to services, operators must perform a gas leak survey from the point of damage to the service tie-in.

(5) Survey records must be kept for a minimum of five years. At a minimum, survey records must contain the following information:

(a) Description of the system and area surveyed (including maps and leak survey logs);

(b) Survey results;

(c) Survey method;

(d) Name of the employee who performed the survey;

(e) Survey dates; and

(f) Instrument tracking or identification number.

(6) Each operator must perform self audits of the effectiveness of its leak detection and recordkeeping programs. Operators must maintain records of the self audits for five years. Self audits must be performed as frequently as necessary, but not to exceed three years between audits. At a minimum, self audits should ensure that:

(a) Leak survey schedules meet the minimum federal and state safety requirements for gas pipelines;

(b) Consistent evaluations of leaks are being made throughout the system;

(c) Repairs are made within the time frame allowed;

(d) Repairs are effective; and

(e) Records are accurate and complete.

~~(7) Subsection (3)(a) of this section is effective on January 1, 2008.~~

23. WAC 480-93-200 Reports associated with operator facilities and operations.

PSE would like to note that the title of this section is incorrect as printed in the docket.

PSE would like to reiterate comments previously submitted under this docket pertaining to certain reporting requirements set forth in this section. PSE disagrees with the inclusion of subsection (1)(c) regarding evacuation of dwellings. Local emergency response officials frequently evacuate structures as a precautionary measure, even though the actual risk to occupants may be insignificant. A legitimate evacuation of a building due to an incident caused by the operation of the gas facilities is likely to trigger a separate requirement under this section which then reduces or eliminates the importance of reporting all evacuations.

Regarding subsection (1)(e), PSE disagrees with the reduction in the number of customers to trigger a notification. PSE would like to know the justification for this change.

Regarding subsection (1)(g), PSE disagrees with this requirement for the same reason stated above. Namely, a reportable incident that warrants news media attention and reporting to the commission is likely to trigger a separate requirement under this section. The decision by media to cover an event is often subjective and not based on any credible evaluation of the magnitude of the event. Furthermore, it is burdensome to operators with geographically large service territories to be aware of all media coverage of their systems.

Regarding subsection (2)(a), PSE maintains that this is a cause, not an effect and as such may be difficult to report on within the required time frame. In addition, as defined in 49 CFR Part 191.3, an incident is a specific event i.e. it is the effect of some abnormal operation or external factor. Therefore, where does the reporting on a cause begin and end? If a construction defect or material failure causes an incident that results in any of the other conditions described in this section then it will get reported. Additionally, this rule requires a follow-up report for such incidents that are caused by a construction defect or material failure. This subsection should be deleted from this section.

Regarding subsection (4), there is already a 24-hour notification requirement pertaining to exceedance of MAOP under subsection (2)(e). PSE recommends a revision to (2)(e) that allows for the 10% over the MAOP and a revision to subsection (4) so that it only covers the additional written report information. The 10% should also apply to an MAOP established under the requirements of 480-93-020.

Regarding subsection (5) of this section, there is a reference to reports required in subsection (1) but there are no reports required under that subsection. PSE recommends revision of subsection (5) for clarity on what telephonic reports require written follow-up.

PSE would also like to reiterate comments previously submitted to the docket regarding the requirements to send daily reports of construction and repair activities electronically to the commission as set forth in subsection (9) of this section. PSE currently, upon request of commission staff, sends daily reports for contractor crews. Staff is permitted this authority under other sections of this chapter and PSE fully complies. PSE opposes formally regulating this specific activity because it is not safety related. Rather it is a convenience afforded Staff for random field inspections of operator crews. It is very likely that these daily reports frequently go unused, yet under this subsection operators would be non-compliant and possibly subject to formal enforcement action if they either do not send a report or do not send within the required time frame. This is an unnecessary burden on operators and PSE requests that this subsection be deleted.

Finally, PSE requests that staff consider raising the property damage threshold above $5,000. This same threshold has been in place for at least 10 years and is ten times LESS than the federal reporting limit. PSE recommends a minimum threshold of $25,000 but would like staff to consider matching the $50,000 federal limit.

PSE recommends the following revisions to WAC 480-93-200:

WAC 480-93-200 Reports associated with operator facilities and operations.

(1) Every operator must give notice to the commission by telephone within two hours of discovering an incident or hazardous condition arising out of its operations that:

(a) Results in a fatality or personal injury requiring hospitalization;

(b) Results in damage to the property of the operator and others of a combined total exceeding twenty-five thousand dollars (automobile collisions and other equipment accidents not involving gas or gas handling equipment need not be reported under this rule);

~~(c) Results in the evacuation of a dwelling, building, or area of public assembly;~~

(d) Results in the unintentional ignition of gas;

(e) Results in the unscheduled interruption of service furnished by any operator to twenty-five or more distribution customers;

(f) Is significant, in the judgment of the operator, even though it does not meet the criteria of (a) through (e) of this subsection. ~~; or~~

~~(g) Results in the news media reporting the occurrence, even though it does not meet the criteria of (a) through (e) of this subsection.~~

(2) Operators must give notice to the commission by telephone within twenty-four hours of occurrence of every incident or hazardous condition arising out of its operations that:

~~(a) Results from construction defects or material failure;~~

~~(b)~~(a) Results in the uncontrolled release of gas for more than two hours;

~~(c)~~(b) Results in the taking of a high pressure supply or transmission pipeline or a major distribution supply pipeline out of service;

~~(d)~~(c) Results in a pipeline or system operating at low pressure dropping below the safe operating conditions of attached appliances and gas equipment; or

~~(e)~~(d) When a pipeline or system pressure exceeds the maximum allowable operating pressure plus ten percent.

(3) Routine or planned maintenance and operational activities of the operator that result in operator-controlled plant and equipment shut downs, reduction in system pressures except as noted in subsection ~~(1)~~ (2) of this section, flaring or venting of gas, and normal leak repairs are not reportable items under this section.

(4) When a pipeline or system pressure exceeds the maximum allowable operating pressure plus ten percent ~~or the maximum pressure allowed by proximity considerations outlined in WAC 480-93-020,~~ the operator must ~~notify the commission by telephone within two hours, to be~~ follow up the telephonic notification with a written explanation within thirty days;

(5) Operators must provide to the commission a written report ~~the reports required in subsection (1) of this section, verified in detail in writing~~ within thirty days of the initial telephonic report required under subsection (1)of this section. At a minimum, written reports must include the following:

(a) Name(s) and address(es) of any person or persons injured or killed, or whose property was damaged;

(b) The extent of such injuries and damage;

(c) A description of the incident or hazardous condition including the date, time, and place;

(d) A description of the gas facilities involved in the incident or hazardous condition, the system operating pressure at that time, and the maximum allowable operating pressure of the facilities involved;

(e) The date and time the gas facility was made safe;

(f) The date, time, and type of any temporary or permanent repair made; and

(g) The cost of the incident to the operator.

(6) Operators must provide to the commission a written report within forty-five days of receiving the failure analysis of any incident or hazardous condition that was due to construction defects or material failure.

(7) Operators must file with the commission a copy of every Research and Special Programs Administration (RSPA) F-7100.1-1 and F-7100.2-1 annual report required by U.S. Department of Transportation, Office of Pipeline Safety.

(8)~~In addition to the above required forms, o~~Operators must file with the commission the report titled, "Damage Prevention Statistics," with the corresponding RSPA fiscal year. The Damage Prevention Statistics report must include ~~in detail~~ the following information:

(a) Number of gas-related one-call locate requests completed in the field;

(b) Number of third-party damages incurred; and

(c) Cause of damage~~:~~, where cause of damage is classified as:

(i) ~~A locate is not accurate~~ Inaccurate locate;

(ii) ~~The operator failed~~ Failure to use reasonable care; or

(iii) Excavated prior to a locate being conducted.

~~(8)~~ (9) Operators must file with the commission, and with appropriate officials of all municipalities where operators have facilities, the names, addresses, and telephone numbers of the responsible officials of the operator who may be contacted in the event of an

emergency. In the event of any changes in operator personnel, the operator must notify immediately the commission and municipalities.

~~(9) Operators must send daily reports of construction and repair activities electronically to the commission. Operators may send reports either by facsimile or e-mail to the commission. The reports must be received no later than 10:00 a.m. each day of the scheduled work, and must include both operator and contractor construction and repair activities.~~

(10) Operators must file with the commission a copy of every ~~When an operator is required to file a copy of a~~ RSPA Drug Testing and Alcohol Testing Management Information System (MIS) "EZ" Data Collection Form with the U.S. Department of Transportation, Office of Pipeline Safety, the operator must simultaneously submit a copy of the form to the commission.

24. WAC 480-93-223 Civil penalty for violation of RCW 80.28.210 and commission gas safety rules.

Subsection (1) and (1)(a) refer to WAC 480-93-303. PSE is unable to find such a section number within this chapter.

Subsections (1)(a) and (b) refer to subsection (1)(e) of 480-93-200. This reference should correctly cite (1)(g) – although this will change again depending on revisions to 480-93-200.

PSE recommends the following revisions to WAC 480-93-223:

WAC 480-93-223 Civil penalty for violation of RCW 80.28.210 and commission gas safety rules.

(1) Any gas company that violates any provisions of chapter 480-93 WAC ~~or WAC 480-93-303~~ has failed to construct and/or maintain its facilities in a safe and efficient manner in violation of RCW 80.28.210, and is subject to a civil penalty under RCW 80.28.212.

(a) The maximum civil penalty under RCW 80.28.212 for violations by a gas company of any provision of chapter 480-93 WAC (other than WAC 480-93-160 and 480-93-200 (1)(~~e~~g)) ~~or WAC 480-93-303~~ is five thousand dollars for each violation for each day that the violation persists up to a maximum civil penalty of five hundred thousand dollars for a related series of violations.

(b) The maximum civil penalty under RCW 80.28.212 for violations by a gas company of WAC 480-93-160 or ~~480-93-200~~ ~~(1)(e)~~ (g)is one thousand dollars for each violation for each day that the violation persists, up to a maximum civil penalty of two hundred thousand dollars for a related series of violations.

(c) The commission may compromise any civil penalty issued under RCW 80.28.212.

(2) In addition to a civil penalty under RCW 80.28.212, any public service company that violates RCW 80.28.210 or any rule issued thereunder, may also be subject to civil penalties under RCW 80.04.405 and/or 80.04.380.

(3) Any officer, agent, or employee of any public service company who aids or abets in the violations of RCW 80.24.210 or any rule issued thereunder, is subject to a civil penalty under RCW 80.04.405.

(4) Any officer, agent, or employee of any public service company violating RCW 80.28.210 or who

procures or aids and abets such a violation, may be subject to civil penalties under RCW 80.04.385.

(5) Any corporation other than a public service company that is subject to RCW 80.28.210 and that violates any provision of chapter 480-93 WAC, has failed to construct and/or maintain its facilities in a safe and efficient manner in violation of RCW 80.28.210, and is subject to a civil penalty under RCW 80.04.387.

25. WAC 480-93-999 Adoption by reference.

Regarding subsection (1)(a) of this section, the commission adopts the October 1, 2003, version of CFR Part 192. This version is out of date as certain sections of Part 191 and 192 were amended as identified in a final rule issued in June 2004. PSE recommends updating the effective date in this subsection.

PSE notes that the commission has removed the proposed definition of "Covered task" from WAC 480-93-005 and is alternatively proposing to regulate an interpretation of covered task under subsection (1)(a) of this section. PSE would like to reiterate comments previously submitted under this docket pertaining to the operator qualification rule. PSE recommends that staff allow the revisions of OQ at the federal level to take shape rather than imposing a separate state regulation. Current OQ regulatory activities at the federal level are being coordinated with both industry groups and state regulators (via input from both NAPSR and NARUC). It would be counter-productive to national pipeline safety improvement efforts for Washington State to ignore the collaborative efforts underway to develop comprehensive and effective rules at the federal level.

Regarding subsection (3)(a) and (c) of this section, the 18th edition of AI 1102 is referenced. This section should correctly cite the 19th edition as incorporated by reference into Part 192.

PSE recommends the following revisions to WAC 480-93-999:

WAC 480-93-999 Adoption by reference.

In this chapter, the commission adopts by reference each of the regulations and/or standards identified below. For each regulation or standard the commission is adopting by reference is listed the publisher, the scope of what the commission is adopting, the effective date of the regulation or standard the commission is adopting, the place within the commission's rules the regulation or standard is referenced, and the availability of the publication in which the regulation or standard is found.

(1) Title 49 Code of Federal Regulations, cited as 49 CFR, Parts 191, 192, 193, and 199 including all appendices and amendments thereto as published by the United States Government Printing Office.

(a) The commission adopts the version of the above regulations that were in effect on ~~October 1, 2003~~ **July 14, 2004**, except the following sections are not adopted by reference: 191.1, 192.1(a), 193.2001(a), 199.1. ~~In addition, the activities~~

~~listed in section 192.801(b)(i1) (4) should be interpreted to include new construction of pipeline facilities.~~

(b) This publication is referenced in WAC 480-93-005, 480-93-080, 480-93-100, 480-93-110, 480-93-124, 480-93-155, 480-93-170, 480-93-180, and 480-93-18601.

(c) The Code of Federal Regulations is published by the federal government. Copies of Title 49 Code of Federal Regulations are available from most Government Printing Offices, including the Seattle office of the Government Printing Office, as well as from various third-party vendors and various libraries, including the branch of the state library located at the commission. It is also available for inspection at the commission.

(2) Section IX of the ASME Boiler and Pressure Vessel Code.

(a) The commission adopts the 2001 edition of Section IX of the ASME Boiler and Pressure Vessel Code.

(b) This publication is referenced in WAC 480-93-080.

(c) Copies of Section IX of the ASME Boiler and Pressure Vessel Code (2001 edition) are available from The American Society of Mechanical Engineers, Park Avenue, New York, New York, and various libraries, including the branch of the state library located at the commission. It is also available for inspection at the commission.

(3) The American Petroleum Institute (API) standard 1104.

(a) The commission adopts the ~~18~~19th edition of this standard.

(b) This standard is referenced in WAC 480-93-080.

(c) Copies of API standard 1104 (~~18~~19th edition) are available from the Office of API Publishing Services in Washington DC, and various libraries, including the branch of the state library located at the commission. It is also available for inspection at the commission.