# BEFORE THE WASHINGTON STATE UTILITIES AND TRANSPORTATION COMMISSION

In the Matter of the Petition of	) DOCKET PG-061768
PUGET SOUND ENERGY,	) ORDER 01
Petitioner,	) ) )
Seeking Authorization to Operate a Pressure Regulator Station with a Maximum Allowable Operating Pressure Greater Than Five Hundred Pounds Per Square Inch Gauge Pursuant to WAC 480-93-020	) ORDER GRANTING REQUEST TO OPERATE REGULATOR STATION AT PRESSURES EXCEEDING 500 POUNDS PER SQUARE INCH GAUGE
	)

#### **BACKGROUND**

- On November 20, 2006, Puget Sound Energy (PSE) filed with the Washington Utilities and Transportation Commission (Commission) a petition requesting approval to operate a rebuilt South Tacoma Town Border Station at a pressure exceeding 500 pounds per square inch gauge (psig) in accordance with WAC 480-93-020.
- 2 WAC 480-93-020 requires gas companies to petition the Commission for a waiver of the rule before operating a pipeline above five hundred psig.
- WAC 480-93-020 prohibits operating a facility without Commission approval above five hundred psig within five hundred feet of: a building that is in existence or under construction prior to the date the company seeks authorization for construction with the Commission; a high occupancy structure or area, as defined in WAC 480-93-005(12), that is in existence or under construction prior to the date the Company seek authorization for construction; and a public highway, as defined in RCW 81.80.010(3).
- PSE proposes to rebuild the existing South Tacoma Town Border Regulator Station (Station) located at 13311 Chesney Road, Puyallup, to operate at an increased pressure above 500 psig. PSE identified eighteen residential structures located within 500 feet of the Station. The company distributed notices to each of the identified property owners, communicating project details and alerting them to the scheduled open meeting. Pipeline safety staff canvassed the area to ensure that residences were properly notified. Natural gas is supplied to the station from Williams NW Pipeline's (Williams) eight inch

diameter lateral pipeline approximately 8.5 miles from the interstate pipeline tap.<sup>1</sup> The lateral is owned and operated by Williams. For capacity reasons, PSE has requested Williams to increase the operating pressure in the lateral by approximately 22.7%, from 458 psig to 562 psig. The South Tacoma Town Border Station will be rebuilt on PSE property and located within a secure fence enclosure. The Commission considered the petition at its regular open meeting on February 7, 2007.

- The Commission has adopted the Code of Federal Regulation, Title 49, Part 192 and 480-93 of the Washington Administrative Code as minimum standards for natural gas pipeline construction. The most restrictive natural gas pipeline safety rules specify that pipelines in a highly populated area be operated at pressures producing a hoop stress of no greater than 50 percent of the specified minimum yield strength (SMYS) of the pipe. PSE will construct the proposed stations to operate (562 psig) at a hoop stress at less than 10% of the pipeline's SMYS and designed with a maximum allowable operating pressure (960 psig) at a hoop stress less than 20% of the pipeline's SMYS. This section of pipe is located in a Class 3 location that would typically limit the hoop stress to no more than 60 percent of the SMYS. In addition, PSE has agreed to radiograph 100 percent (90 percent if impractical) of all girth welds associated with this project. Other safety measures that exceed regulatory requirements include operating at low pipe stress level, providing odorization to Williams lateral, and remote 24-hour pressure monitoring by PSE's control room personnel.
- 6 Commission Staff reviewed the request and recommends authorization be granted subject to the following condition(s):

## (a) Filings and Notices:

PSE must notify the Commission 48 hours prior to beginning any construction.

## (b) **Design and Construction:**

1. The South Tacoma Town Border Station will be built to maintain the pipe stress level below 20 percent of the Specified Minimum Yield Strength.

<sup>&</sup>lt;sup>1</sup> The South Tacoma gate Station, where the tap is located, is in the 6100 block of 176<sup>th</sup>. Street E, Puyallup and is not part of this request. The Gate Station supplies gas to a local distribution system and Odorization for Williams' lateral.

- 2. PSE will provide a 24-hour Supervisory Control and Data Acquisition system to monitor the system operating pressures.
- 3. PSE will radiographically examine 100 percent of all girth welds or at a minimum 90 percent for the supply, discharge and above ground piping at the Town Border Stations except welds that cannot be radiographed. PSE will provide upon request, written documentation where radiographs are impractical including the certified radiographer's statement. All welds will be inspected and defects will be replaced or repaired in accordance with company standards. All repaired welds will be radiographed to ensure pipeline integrity and compliance with standards.
- 4. PSE will have cathodic protection test locations at intervals sufficient to determine the adequate protection of the pipeline during surveys.
- 5. PSE will use shading and backfill materials around the pipe to protect the pipe and coating in accordance with PSE Gas Operating Standard 2525.1800. The material around the pipe will be free of sharp rocks with a maximum particle size of one half inch and containing a large percentage of fines. Rock shield is allowed in places where sand is not available and the backfill material shall be free from sharp objects and large clods that could damage the pipe and coating.

## (c) **Operations and Maintenance:**

- 1. Leak surveys will be conducted in accordance with PSE Operating Standard 2625.1100 and PSE Gas Field Procedure 4700.1600. The survey is to be conducted annually.
- 2. Install cathodic protection within 90 days after the pipeline is installed.

The Commission finds PSE's proposed additional safety and design measures for the construction of South Tacoma Town Border Stations in a Class 3 location will provide added safety to the public.

## FINDINGS AND CONCLUSIONS

- The Washington Utilities and Transportation Commission is an agency of the State of Washington vested by statute with the authority to regulate public service companies, including every 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. *RCW* 80.28.210.
- 8 (2) PSE is a public service company subject to the jurisdiction of the Commission under the provisions of RCW 80.28.210 and WAC 480-93.
- 9 (3) This matter was brought before the Commission at its regularly scheduled meeting on February 7, 2007.
- 10 (4) After examination of the petition and giving consideration to all relevant matters and for good cause shown, the Commission finds it is consistent with the public interest to grant PSE's request to operate above 500 psig, subject to conditions in Paragraph 6 of this order.

### ORDER

## THE COMMISSION ORDERS:

- 11 1) After the effective date of this Order, the petition of Puget Sound Energy for authorization to operate above 500 psig is granted, in accordance with WAC 480-93-020, subject to the conditions listed in paragraph 6 of this order.
- The Commission retains jurisdiction over the subject matter and Puget Sound Energy to effectuate the provisions of this Order.

DATED at Olympia, Washington, and effective February 7, 2007.

## WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION

MARK H. SIDRAN, Chairman

PATRICK J. OSHIE, Commissioner

PHILIP B. JONES, Commissioner