

## Cleanup Agreement and Investigation Report Available for Public Comment

The Washington Department of Ecology (Ecology) invites comments on a cleanup plan and an investigation report for the Fox Avenue Building LLC (Fox Avenue Building) Site in south Seattle.

Three documents are available for public review and comment:

- A **Remedial Investigation and Feasibility study report** which describes the contamination found on the site and what cleanup methods were considered.
- **Cleanup Action Plan (CAP)** which describes the cleanup methods selected and how they will clean up contamination.
- An **Agreed Order** which is the legal document between Ecology and the property owner and the framework for how the property owner will complete the cleanup.

You are invited to:

- **Review** the documents listed above.
- **Send** your comments to Ecology for consideration. Comments will be accepted March 1-30, 2012.

See the box at the right for details about where to review documents and submit comments.

### What Happens Next?

- Ecology will review and respond to all the comments received during the comment period.
- Once the documents are finalized, Ecology will work with the liable parties to begin taking cleanup actions.

### Site Background

The Fox Avenue Building Site is located in an industrial area near the Lower Duwamish Waterway in south Seattle. Since 1918, several companies have owned and leased this property. Past site activities include operation of coke and oil fired furnaces and bulk storage of petroleum and chemicals. From 1956 to 2001, Great Western Chemical Company operated a chemical and petroleum repackaging and distribution facility at the site.

### Fox Avenue Building Site King County, WA

#### Public Comment Period on an Agreed Order for a Cleanup Plan

**Public Comment Period:**  
**March 1-30, 2012**

**Facility Site ID #: 2282**

If you need this publication in an alternative format, call reception at (425) 649-7070. Persons with hearing loss, call 711 for Washington Relay Service. Persons with speech disability call 877-833-6341.

#### Want to get more involved with efforts to clean up the Duwamish River?

Contact the Duwamish River Cleanup Coalition at  
[contact@duwamishcleanup.org](mailto:contact@duwamishcleanup.org),  
(206) 954-0218 or visit <http://www.duwamishcleanup.org/index.html>

El Periodo de Aceptar Comentario Público empieza el 1 de marzo y termina el 30 de marzo, 2012 para la Orden Acordada, el Plan de Acción para la Limpieza y el informe de la investigación para el sitio de limpieza de Fox Avenue. Para más información, favor de contactar a Richelle Perez a (360) 407-7528 o por e-mail a [richelle.perez@ecy.wa.gov](mailto:richelle.perez@ecy.wa.gov).

同意命令和有關文件大眾閱覽通告。華盛頓州生態管理署(生管署)邀請大眾對位於6900 福斯大道,西雅圖南邊,杜瓦目須河以東區域環境整治工地的同意命令整治作業計劃和環境調查報告提供建議。本工地污染來自多年石油焦和工業火爐作業還有化學和油料儲存分裝處理場作業。本工地土壤和地下水都已被污染。本同意命令要求土地所有人進行本工地環境整治工作計劃。這環境整治工作計劃詳列土地所有人將如何對本工地進行整治工作。本計劃也詳述採樣結果和如何評估選擇整治工作進行方針。這些文件閱覽和提供建議期間從2012年3月1日開始到2012年3月12日截止。參閱地點:生態署西北區辦公室,3190 160th 大道,貝爾尤,華盛頓(Washington State Department of Ecology – Northwest Regional Office, 3190 160th Ave SE., Bellevue, WA 98008); 南公園圖書館,8604 第八大道南,西雅圖,華盛頓(South Park Library, 8604 Eighth Ave. South, Seattle, WA 98108); 或可到生管署網頁: <https://fortress.wa.gov/ecy/gsp/Sitepage.aspx?csid=5082>

Thời gian thu nhận ý kiến bắt đầu từ ngày 1 tháng ba năm 2012 đến ngày 30 tháng ba năm 2012 cho Sắc lệnh đồng thuận, Kế hoạch Dọn sạch và bản tường trình liên quan đến cuộc điều tra ô nhiễm ở địa điểm Fox Avenue. Để lấy thêm tin tức, xin liên lạc đến Teddy Lê, số (360)407-6948 hoặc email [teddy.le@ecy.wa.gov](mailto:teddy.le@ecy.wa.gov).

### COMMENTS ACCEPTED

**March 1-30, 2012**

#### Submit Comments and Technical Questions to:

Sunny Becker  
Site Manager  
Washington Department of Ecology  
Toxics Cleanup Program  
Northwest Regional Office  
3190 160th Ave SE  
Bellevue, WA 98008  
Phone: (425) 649-7187  
E-mail: [Sunny.Becker@ecy.wa.gov](mailto:Sunny.Becker@ecy.wa.gov)

#### Public Involvement

Meg Bommarito  
Public Involvement Coordinator  
Phone: (425) 649-7256  
Email: [Meg.Bommarito@ecy.wa.gov](mailto:Meg.Bommarito@ecy.wa.gov)

#### Document Review Locations:

**South Park Branch  
Seattle Public Library**  
8604 Eighth Ave S.  
Seattle, WA 98108  
Phone: (206) 615-1688

#### Washington Department of Ecology Northwest Regional Office

3190 160th Ave SE  
Bellevue, WA 98008  
Call for an appointment:  
(425) 649-7190

#### Ecology Web site

<https://fortress.wa.gov/ecy/gsp/Sitepage.aspx?csid=5082>

**Facility Site ID #: 2282**



## Fox Avenue Building Site

In 2003, Fox Avenue Building LLC bought the property. Cascade Columbia Distribution now leases the property and uses it as a chemical distribution facility. For more information about the site history, visit the web link listed on page 1.

### Previous Investigations and Cleanup Work

In 1991, Great Western Chemical (GWC) began investigating contamination under an Agreed Order with Ecology. After 2000, investigations and initial cleanup work were performed by GWC and Fox Avenue Building.

Previous cleanup work included:

- Soil, groundwater, seep and soil vapor sampling.
- Installation of groundwater monitoring wells.
- Investigations to define the nature and extent of contamination.
- Operation of a soil vapor extraction system.
- Pilot testing of various remediation technologies, including injections of chemical into groundwater to help break down contamination.
- Underground and above ground storage tank removals.

### Contamination

The primary contaminants at this site are:

#### Soil:

- Perchloroethylene (PCE)
- Benzene
- Trichloroethylene (TCE)
- Pentachlorophenol
- Total petroleum hydrocarbons

#### Groundwater:

- PCE
- Benzene
- 1,1 dichloroethene (1,1-DCE)
- Pentachlorophenol
- Total petroleum hydrocarbons
- Vinyl chloride
- TCE

#### Air:

- PCE
- TCE

There are three main areas of the site that require cleanup actions (see map on next page):

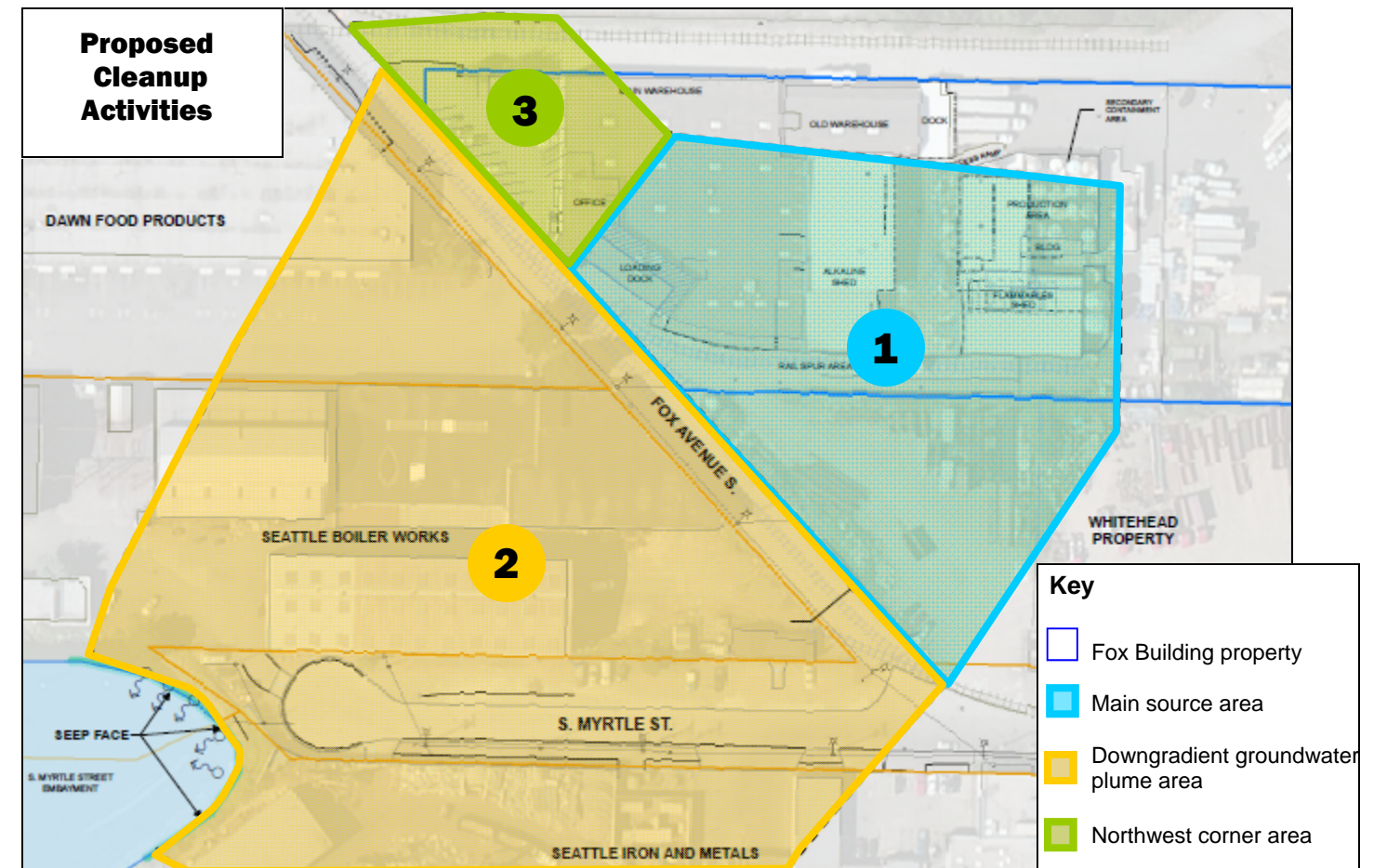
1. **Main source area:** Areas where past releases have occurred and the underlying soil is now a source of a plume (area of contamination) in groundwater.
2. **Downgradient groundwater plume area:** This is the area that has been impacted by the main source area. PCE, TCE and other chemicals have traveled into the groundwater from the soil in the main source area.
3. **Northwest corner source area:** A smaller groundwater plume of contamination is found in this area of the site.

### What will be done to clean up the site?

The contamination will be cleaned up using several methods, including those listed below. The map on page 3 shows where the different methods will be used.

- **Electrical Resistance Heating (ERH):** Soil and groundwater are heated to move the chemicals from the soil and groundwater into underground wells. Once the chemicals are moved to the wells, they are pumped out of the ground and collected and destroyed. The heat can also evaporate and destroy certain chemicals.
- **Soil Vapor Extraction (SVE):** Contaminants are removed from soil using a vacuum system. Wells are drilled into the soil. A pump system is put into place to create a vacuum to pull chemicals out of the soil and collect them at the wells.
- **Enhanced Reductive Dechlorination (ERD):** Certain contaminants, like TCE, can be broken down by microscopic organisms in the soil. Certain treatment materials can be added to the soil to feed these organisms and speed up the break down of the toxic chemicals.

## Fox Avenue Building Site



### 1 Main Source Area:

- **Groundwater:** After use of Electrical Resistance Heating (ERH), Enhanced Reductive Dechlorination (ERD) will help to break down remaining contamination.
- **Soil:** ERH

### 2 Downgradient Groundwater Plume Area:

- **Groundwater:** After use of ERH in the Source Area, ERD will help to break down remaining contamination.
- **Soil:** No soil cleanup is needed in this area. Only the groundwater is contaminated.

### 3 Northwest Corner Source Area:

- **Groundwater:** ERD will be used since ERH was already used as part of an interim (partial) cleanup action.
- **Soil:** Soil vapor extraction will remove PCE from the soil to reduce the amount of PCE moving into the groundwater.

### Lower Duwamish Waterway Cleanup

The Fox Avenue Building Site is located within the Lower Duwamish Waterway (LDW) cleanup site. The LDW site is both a state and federal cleanup covering about 5.5 miles of the Duwamish River south of Harbor Island. The LDW sediments are contaminated with several hazardous substances. Cleanup of this site will reduce source of pollution to the waterway. For more information visit Ecology's Web site: [http://www.ecy.wa.gov/programs/tcp/sites\\_brochure/lower\\_duwamish/lower\\_duwamish\\_hp.html](http://www.ecy.wa.gov/programs/tcp/sites_brochure/lower_duwamish/lower_duwamish_hp.html) or the U.S. Environmental Protection Agency Web Site: <http://yosemite.epa.gov/r10/cleanup.nsf/sites/LDuwamish>. Ecology and EPA are working together to clean up and reduce sources of pollution to the waterway.