



WASHINGTON STATE  
DEPARTMENT OF  
ECOLOGY

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Southwest Regional Office  
Toxics Cleanup Program  
PO Box 47775  
Olympia, WA 98504-7775  
360-407-6240

## TRANSMITTAL MEMO

Date: March 4, 2013

TO: Mr. James M. Kinane  
Quality Assurance Manager  
Tetra Pak Materials LP

RE: Tetra Pak  
SW0377

Subject: Explanation of Timeline

**NOTE:** The determination date is the date Ecology approved the No Further Action status for the site. Final payment, EIM Data submission, once received, the NFA letter was released.

Ecology Determination date: December 27, 2012

Email Customer Notification: December 27, 2012

Payment received date: March 4, 2013

EIM Data successfully uploaded: March 4, 2013

Ecology Determination letter mailed/sent: April 23, 2013





STATE OF WASHINGTON  
DEPARTMENT OF ECOLOGY

PO Box 47775 • Olympia, Washington 98504-7775 • (360) 407-6300

December 27, 2012

Mr. James M. Kinane  
Quality Assurance Manager  
Tetra Pak Materials LP  
1616 West 31<sup>st</sup> Street  
Vancouver, WA 98660

**Re: No Further Action at the following Site:**

- **Site Name:** Tetra Pak
- **Site Address:** 3125 Thompson Avenue, Vancouver
- **Facility/Site No.:** 34822454
- **Cleanup Site ID No.:** 2615
- **VCP Project No.:** SW0377

Dear Mr. Kinane:

The Washington State Department of Ecology (Ecology) received your request for an opinion on your independent cleanup of the Tetra Pak facility (Site). This letter provides our opinion. We are providing this opinion under the authority of the Model Toxics Control Act (MTCA), Chapter 70.105D RCW.

**Issue Presented and Opinion**

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Is further remedial action necessary to clean up contamination at the Site?

**NO.** Ecology has determined that no further remedial action is necessary to clean up contamination at the Site.

**This opinion is dependent on the continued performance and effectiveness of the post-cleanup controls and monitoring specified below.**

This opinion is based on an analysis of whether the remedial action meets the substantive requirements of MTCA, Chapter 70.105D RCW, and its implementing regulations, Chapter 173-340 WAC (collectively "substantive requirements of MTCA"). The analysis is provided below.

## **Description of the Site**

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This opinion applies only to the Site described below. The Site is defined by the nature and extent of contamination associated with the following releases:

- Pentachlorophenol (PCP) and dioxin and furan congeners into the Soil.
- PCP into the Groundwater.

**Enclosure A** includes a detailed description and diagram of the Site, as currently known to Ecology.

Please note a parcel of real property can be affected by multiple sites. Historical groundwater data indicated that tetrachloroethylene (PCE) and trichloroethylene (TCE) were present above MTCA Method A cleanup levels in on-Site monitoring wells. There are no known sources of PCE and TCE at the Site, and the data suggested that the impacts were likely from an off-Site source, namely the Cadet Manufacturing site (Facility/Site# 85381664), located about 2,000 feet southwest of Tetra Pak. Subsequent groundwater monitoring has shown a decrease of PCE and TCE to below cleanup levels in on-Site wells. As such, Ecology no longer considers the Site to be impacted by Cadet Manufacturing. Please note this opinion does not apply to any contamination associated with Cadet Manufacturing.

## **Basis for the Opinion**

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This opinion is based on the information contained in the following documents:

1. Request for No Further Action and Transmittal of the Draft Environmental Covenant for the Former Strebor Site, dated September 2, 2011 by Kennedy/Jenks Consultants.
2. Long Term Groundwater Monitoring Plan, Former Strebor Site, dated January 9, 2009 by Kennedy/Jenks Consultants.
3. Additional Investigation Report, Former Strebor Site, dated January 9, 2009 by Kennedy/Jenks Consultants.
4. Remedial Action Report, Former Strebor Site, dated March 9, 2007 by Kennedy/Jenks Consultants.
5. Remedial Investigation, Risk Assessment, and Feasibility Study Report, Former Strebor Facility, Tetra Pak Materials, dated August 2004 by Kennedy/Jenks Consultants.

Those documents are kept in the Central Files of the Southwest Regional Office of Ecology (SWRO) for review by appointment only. You can make an appointment by calling the SWRO resource contact at (360) 407-6365.

This opinion is void if any of the information contained in those documents is materially false or misleading.

### **Analysis of the Cleanup**

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Ecology has concluded that **no further remedial action** is necessary to clean up contamination at the Site. That conclusion is based on the following analysis:

#### **1. Characterization of the Site.**

Ecology has determined your characterization of the Site is sufficient to establish cleanup standards and select a cleanup action. The Site is described above and in **Enclosure A**.

The Site encompasses a single tax parcel (Clark County Parcel #50000). This parcel is one of multiple parcels that make up the Tetra Pak facility. Prior to 1974, the Site was undeveloped rural land and was owned by the former Burlington Northern Railroad, now the BNSF Railway Company. Roberts Consolidated Industries constructed a facility on the Site in 1974 to formulate wood treatment products, and subsequently closed their facility in March 1986. The Site was transferred to Beecham Home Improvement Products in 1986, and to Strebor Incorporated in late 1987. Tetra Pak purchased the Site in 1989. Tetra Pak manufactures, prints on, and stores beverage containers made from paper products (milk and juice cartons) at their main facility located adjacent to the east of the Site. The 14,000-square-foot building located on Site is currently known as the West Warehouse Building and is used by Tetra Pak for office space, maintenance activities, and certain photolithographic (label making) processes.

Until 1986, Site operations consisted primarily of receiving raw material, and mixing, packaging, and storing of wood-treating solutions, consisting of 91 % naphtha, 6.4 % water repellents and inert material, approximately 2 % pentachlorophenol (PCP), 0.2 % other chlorinated phenols, and 0.3 % bis-tri-butyltin oxide. Raw material was delivered to the Site by trucks, tanker trucks, and rail tanker cars. A former railroad spur on the east side of the building was primarily used for receiving bulk shipments of petroleum hydrocarbon-based raw materials such as naphtha and mineral spirits used as carriers for the wood preservatives.

Known and suspected releases that have occurred at the Site include the following:

- Spill of 100 to 200 gallons of wood-treating solution in 1980 to an earthen sump below one of the tanks.
- Spill of 40 to 100 gallons of wood-treating solution at an unknown location in March 1983.
- Spill of about 17 gallons of wood-treating solution containing PCP in the tank farm in February 1984.
- Spill of 40 to 45 gallons of wood-treating solution containing PCP when a tanker truck was overfilled in June 1984. The product reportedly flowed into one of the catchbasins west of the tank farm area.
- Spill of 40 gallons of wood-treating solution containing PCP in the tank farm in March 1985.
- Spill of 15 gallons of wood-treating solution containing PCP in the tank farm in October 1985.
- Spill of up to 5,000 gallons of wood-treating solution reportedly occurred sometime prior to 1987. Much of the spill reportedly flowed into the catchbasins (dry wells) in the parking lot.

Based on the known operations and locations of spills and releases, the Site consists of the following areas of concern:

- **Soil and underground storage tanks (USTs) beneath the former mixing room:** Wood-treating solution containing PCP was mixed in this area (*see attached Figure 2*). In 1986, two 10,000-gallon USTs located beneath the concrete floor of this room and used for the storage of raw materials and products were decommissioned in place. The USTs were rinsed with mineral spirits and then filled with cement grout. Soil samples collected in 1987 and 1988 from around the USTs identified concentrations of PCP above MTCA cleanup levels as deep as 16 feet below ground surface (bgs). Detected concentrations ranged from 400 to 15,200 milligrams per kilogram (mg/kg), the latter of which was detected between the USTs at 6.5 to 7 feet bgs. The MTCA Method B cleanup level for PCP in soil (based on protection of direct contact) is 2.5 mg/kg.

- **Former Tank Farm:** This area was located outside the former mixing room on the north side of the building (*see attached Figure 2*). In this area, eleven 10,000-gallon USTs were used to store product and raw materials. The USTs were removed in February 1986. This area is elevated approximately 3 feet above the adjacent railroad spur and paved driveway entrance and parking area. This area is paved and is currently used for temporary storage of pallets, miscellaneous equipment, and employee parking. Shallow (1 to 2 feet bgs) soil samples collected from the tank farm area in 1985 contained PCP ranging in concentration from 3.6 to 35.3 mg/kg.
- **Former Rail Spur:** A rail spur on the east side of the building was formerly used for receiving bulk shipments of petroleum-hydrocarbon-based raw materials such as naphtha and mineral spirits. The rail spur and associated contaminated soil was removed in September 2006. Analytical results of confirmation soil samples, as well as samples from subsequent soil borings, indicated the presence of residual dioxin ranging in concentration from 14.76 to 597.57 nanograms per kilogram (ng/kg). The MTCA Method B cleanup level for dioxin in soil (based on protection of direct contact) is 11 ng/kg.
- **Catchbasins (Dry Wells):** There are four stormwater catchbasins located on the west side of the building in a paved parking area. These catchbasins are connected to individual dry wells located adjacent to each catchbasin. Some historical spills reportedly flowed into the catchbasins. Soil samples collected in 2002 from a boring advanced next to the catchbasin closest to the tank farm detected dioxin at 64.8 and 5.5 ng/kg at 20 and 23 feet bgs, respectively.

A total of eight monitoring wells are located on Site. Groundwater data collected in 2002 and 2003 identified concentrations of PCP ranging from 1.48 to 7.58 micrograms per liter ( $\mu\text{g/L}$ ). The current MTCA Method B cleanup level for PCP in groundwater is 0.22  $\mu\text{g/L}$ . Other contaminants detected in groundwater include tetrachloroethylene (PCE) and trichloroethylene (TCE). PCE was historically detected in MW-3 (6  $\mu\text{g/L}$ ) and MW-5 (11  $\mu\text{g/L}$ ), and TCE was historically detected in MW-3 (up to 8.7  $\mu\text{g/L}$ ), MW-5 (up to 26  $\mu\text{g/L}$ ), and MW-6 (up to 9.69  $\mu\text{g/L}$ ). The MTCA Method A cleanup level for both PCE and TCE is 5  $\mu\text{g/L}$ .

There are no indications that PCE or TCE have been used at the Site and the on-Site detections were likely from an off-Site source. These compounds and concentration levels were similar to those seen in off-Site wells installed for the investigation of the nearby Cadet Manufacturing Company PCE/TCE plume. Regardless, subsequent monitoring of groundwater from these wells has seen a drop in concentration of PCE and TCE to below cleanup levels, and they are no longer considered contaminants of concern.

Concentrations of total arsenic and total chromium have also been historically detected in groundwater beneath the Site at concentrations exceeding MTCA Method A cleanup levels. However, analytical results of subsequent sampling of these wells for dissolved arsenic and chromium were non-detect suggesting the detections were related to suspended solids in the sample due to the historical sampling techniques used (bailers) rather than from on-Site sources, of which there are none.

**2. Establishment of cleanup standards.**

Ecology has determined the cleanup levels and points of compliance you established for the Site meet the substantive requirements of MTCA.

MTCA Method B cleanup levels for unrestricted land uses for PCP and dioxin in soil and groundwater were used for the Site.

Standard points of compliance were used for the Site. The point of compliance for protection of groundwater was established in the soils throughout the Site. For soil cleanup levels based on human exposure via direct contact or other exposure pathways where contact with the soil is required to complete the pathway, the point of compliance was established in the soils throughout the Site from the ground surface to 15 feet bgs. In addition, the point of compliance for the groundwater was established throughout the Site from the uppermost level of the saturated zone extending vertically to the lowest most depth that could potentially be affected by the Site.

**3. Selection of cleanup action.**

Ecology has determined the cleanup action you selected for the Site meets the substantive requirements of MTCA.

Cleanup actions conducted at the Site to date have included source removal, excavation and off-Site disposal of contaminated soil, and capping with asphalt.

**4. Cleanup.**

Ecology has determined the cleanup you performed meets the cleanup standards established for the Site. This determination is dependent on the continued performance and effectiveness of the post-cleanup controls and monitoring specified below.



In 1986, the USTs in the tank farm were removed. Some contaminated soil was reportedly also removed from the former tank farm and clean soil was used to backfill the excavation although there is no specific documentation of soil removal activities. The other two USTs beneath the building were decommissioned in place by rinsing with mineral spirits and filling with a cement grout, and remain beneath the floor of the former mixing room in the on-Site building.

In October 2002, Kennedy/Jenks contracted with West Coast Marine Cleaning to remove and properly dispose of the contaminated sediment materials from each of the four on-Site catchbasins.

In September 2006, the rail spur was removed from the Site. An estimated 104 tons of soil and debris were transported off Site to the Hillsboro Landfill in Hillsboro, Oregon for disposal. Four confirmation soil samples were collected from the excavation for analysis for dioxin. Dioxin exceeded the MTCA Method B cleanup level in all four confirmation soil samples at concentrations ranging from 14.22 to 597.57 ng/kg. No additional soil was removed.

Soil sampling in May 2008 delineated the extent of residual dioxin in soil in the former rail spur area. In February 2011, an engineered asphalt cap was placed over the former rail spur area, covering areas where dioxin-impacted soils are present and preventing exposure to the soil via direct contact (*see Attachment C of Enclosure B*). While the cap is also likely to prevent leaching to groundwater, dioxin has not been detected in groundwater beneath the Site to date, nor is it expected to impact groundwater given its low solubility.

In August 2012, an environmental covenant (*attached as Enclosure B*) was filed with Clark County for the Site documenting the use of institutional controls for the soil containing PCP below the floor of the former mixing room in the on-Site building, as well as soil containing dioxin beneath the asphalt cap in the former rail spur area. Although PCP has not been present in groundwater since 2010 (*see attached Table 2*), groundwater monitoring on an 18-month frequency is required as part of the institutional controls.

### **Post-Cleanup Controls and Monitoring**

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Post-cleanup controls and monitoring are remedial actions performed after the cleanup to maintain compliance with cleanup standards. This opinion is dependent on the continued performance and effectiveness of the following:

**1. Compliance with institutional controls.**

Institutional controls prohibit or limit activities that may interfere with the integrity of engineered controls or result in exposure to hazardous substances. The following institutional controls are necessary at the Site:

- Restrictions on activities that may alter, modify, or remove the building or asphalt cap.
- Restrictions on groundwater use.

To implement those controls, an Environmental Covenant has been recorded on the following parcel of real property in Clark County:

- 50000

Ecology approved the recorded Covenant. A copy of the Covenant is included in **Enclosure B**.

**2. Operation and maintenance of engineered controls.**

Engineered controls prevent or limit movement of, or exposure to, hazardous substances. The following engineered controls are necessary at the Site:

- West Warehouse Building.
- Asphalt cap in former rail spur area.

**3. Performance of confirmational monitoring.**

Confirmational monitoring is necessary at the Site to confirm the long-term effectiveness of the cleanup. The monitoring data will be used by Ecology during periodic reviews of post-cleanup conditions. Ecology has approved the monitoring plan you submitted. A copy of the plan is included as an exhibit to the Covenant in **Enclosure B**.

**Periodic Review of Post-Cleanup Conditions**

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Ecology will conduct periodic reviews of post-cleanup conditions at the Site to ensure that they remain protective of human health and the environment. If Ecology determines, based on a periodic review, that further remedial action is necessary at the Site, then Ecology will withdraw this opinion.

### **Listing of the Site**

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Based on this opinion, Ecology will initiate the process of removing the Site from our lists of hazardous waste sites, including:

- Hazardous Sites List.
- Confirmed and Suspected Contaminated Sites List.

That process includes public notice and opportunity to comment. Based on the comments received, Ecology will either remove the Site from the applicable lists or withdraw this opinion.

### **Limitations of the Opinion**

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**1. Opinion does not settle liability with the state.**

Liable persons are strictly liable, jointly and severally, for all remedial action costs and for all natural resource damages resulting from the release or releases of hazardous substances at the Site. This opinion **does not**:

- Resolve or alter a person's liability to the state.
- Protect liable persons from contribution claims by third parties.

To settle liability with the state and obtain protection from contribution claims, a person must enter into a consent decree with Ecology under RCW 70.105D.040(4).

**2. Opinion does not constitute a determination of substantial equivalence.**

To recover remedial action costs from other liable persons under MTCA, one must demonstrate that the action is the substantial equivalent of an Ecology-conducted or Ecology-supervised action. This opinion does not determine whether the action you performed is substantially equivalent. Courts make that determination. *See* RCW 70.105D.080 and WAC 173-340-545.

**3. State is immune from liability.**

The state, Ecology, and its officers and employees are immune from all liability, and no cause of action of any nature may arise from any act or omission in providing this opinion. *See* RCW 70.105D.030(1)(i).

Mr. James M. Kinane  
December 27, 2012  
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### Termination of Agreement

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Thank you for cleaning up the Site under the Voluntary Cleanup Program (VCP). This opinion terminates the VCP Agreement governing this project (#SW0377).

For more information about the VCP and the cleanup process, please visit our web site: [www.ecy.wa.gov/programs/tcp/vcp/vcpmain.htm](http://www.ecy.wa.gov/programs/tcp/vcp/vcpmain.htm). If you have any questions about this opinion or the termination of the Agreement, please contact me at (360) 407-6347 or via email at [sros461@ecy.wa.gov](mailto:sros461@ecy.wa.gov).

Sincerely,



Scott Rose, L.G.  
VCP Unit Supervisor  
SWRO Toxics Cleanup Program

SIR/ksc:Tetra Pak Site NFA SW0377

Enclosures (2):   A – Description and Diagrams of the Site  
                          B – Environmental Covenant for Institutional Controls

By certified mail: (7011 1150 0000 7881 5878)

cc:     Steve Misner – Kennedy/Jenks Consultants  
        Bryan DeDoncker – Clark County Health Dept.  
        Panjini Balaraju – Ecology  
        Dolores Mitchell – Ecology

## **Enclosure A**

### **Description and Diagrams of the Site**



## Site Description

The Tetra Pak site is located at 3125 Thompson Avenue in Vancouver, Clark County, Washington. The site is located on 3.7 acres in the Vancouver Lake/Columbia River lowland area about 0.25 miles north of the Port of Vancouver property and Cadet Manufacturing Company site, and about 1 mile north of the Columbia River. The site topography is flat, and the area not covered with buildings is comprised of grassy areas or parking areas paved with asphalt. There are four stormwater catchbasins located on the west side of the building in a paved parking area. These catchbasins are connected to individual dry wells located adjacent to the catchbasin.

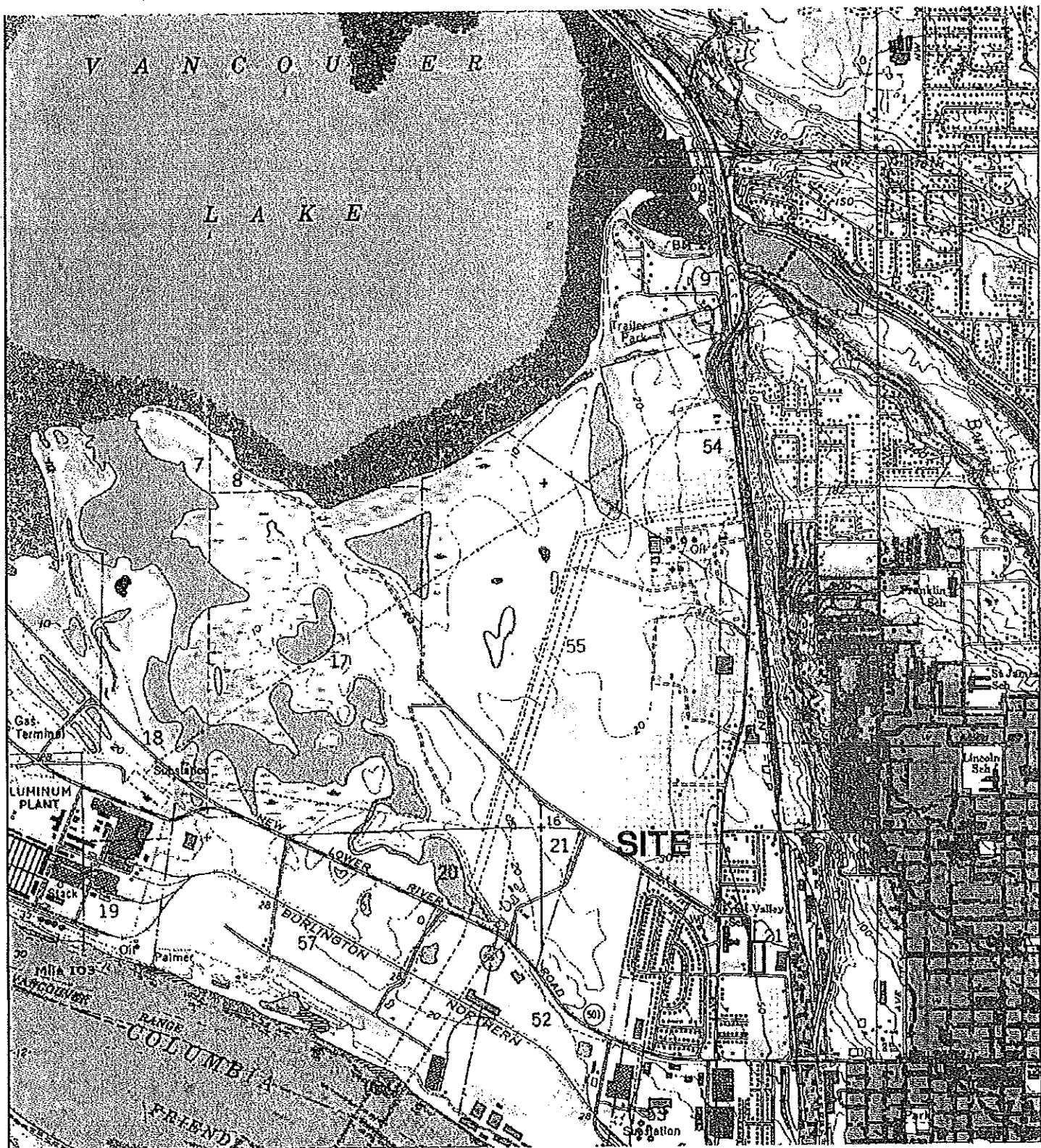
Hydrogeologic data has been collected throughout the investigative history of the site. Bay West, Inc. reported that there is a west-northwesterly flow direction with a relatively flat gradient of 0.00026 to 0.00019 feet/feet when monitoring was done in June 1988. Kennedy/Jenks Consultants reported that groundwater levels varied from 38 to 50 feet below ground surface (bgs) between February 2002 and February 2003 and that the groundwater flow direction was to the southeast/south-southeast during February, March, and April 2002; to the north-northwest during May and August 2002; and to the west-southwest during November 2002 and February 2003.

An evaluation by Ecology of the water level data generally confirms the northwesterly groundwater flow during June to November and southwesterly and south during February to April. In two of the nine groundwater level monitoring events (May 2002 and February 2003) the groundwater flow direction could not be determined from the water level data. For those two months, the groundwater flow is split at the site with flow in northwesterly and southeasterly directions.

Kennedy/Jenks indicated that a flat gradient of about 0.0002 feet/feet existed. The flat gradient is confirmed by extensive work done at the nearby Port of Vancouver, ST Services, and Cadet Manufacturing sites. Interpretation of groundwater flow direction at these sites is difficult because of the very flat gradient and cyclic changes in water levels from tidal fluctuations in the Columbia River. Water level data indicates the tidal effect becomes more dampened with increased distance from the Columbia River. Tidal influence on groundwater levels at the Tetra Pak site is suspected although data was not furnished to indicate that there is a tidal influence.







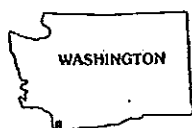
Kennedy/Jenks Consultants

TETRA PAK  
FORMER STREBOR SITE

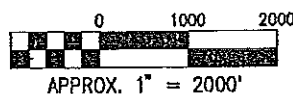
VICINITY MAP

K/J 016066.11/P01SK001

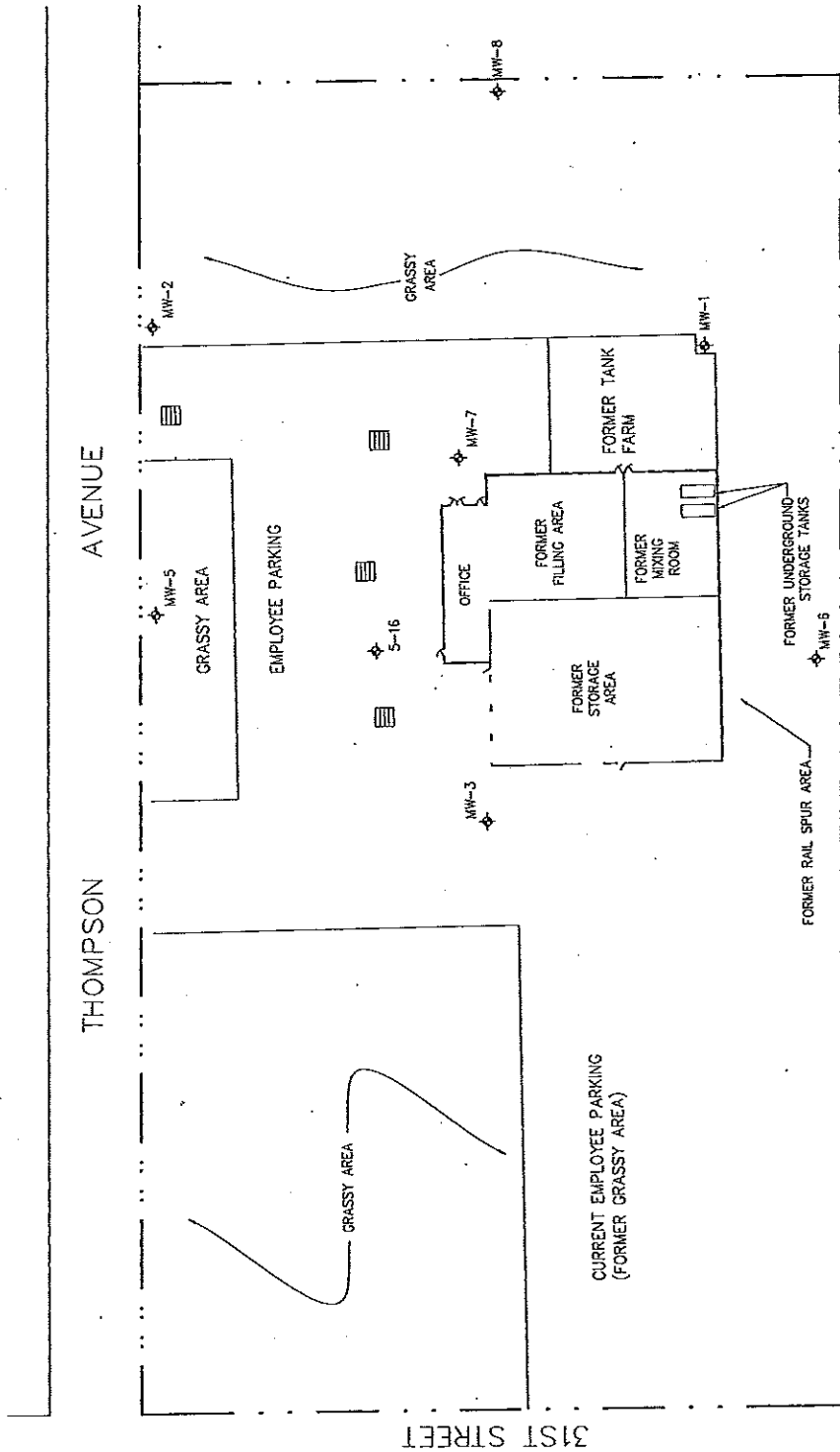
FIGURE 1



QUADRANGLE LOCATION



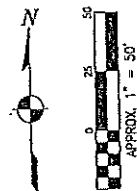




**LEGEND**

- ★ MW-1 MONITORING WELL LOCATION
- ▨ STORMWATER CATCH BASIN
- APPROXIMATE SITE BOUNDARY

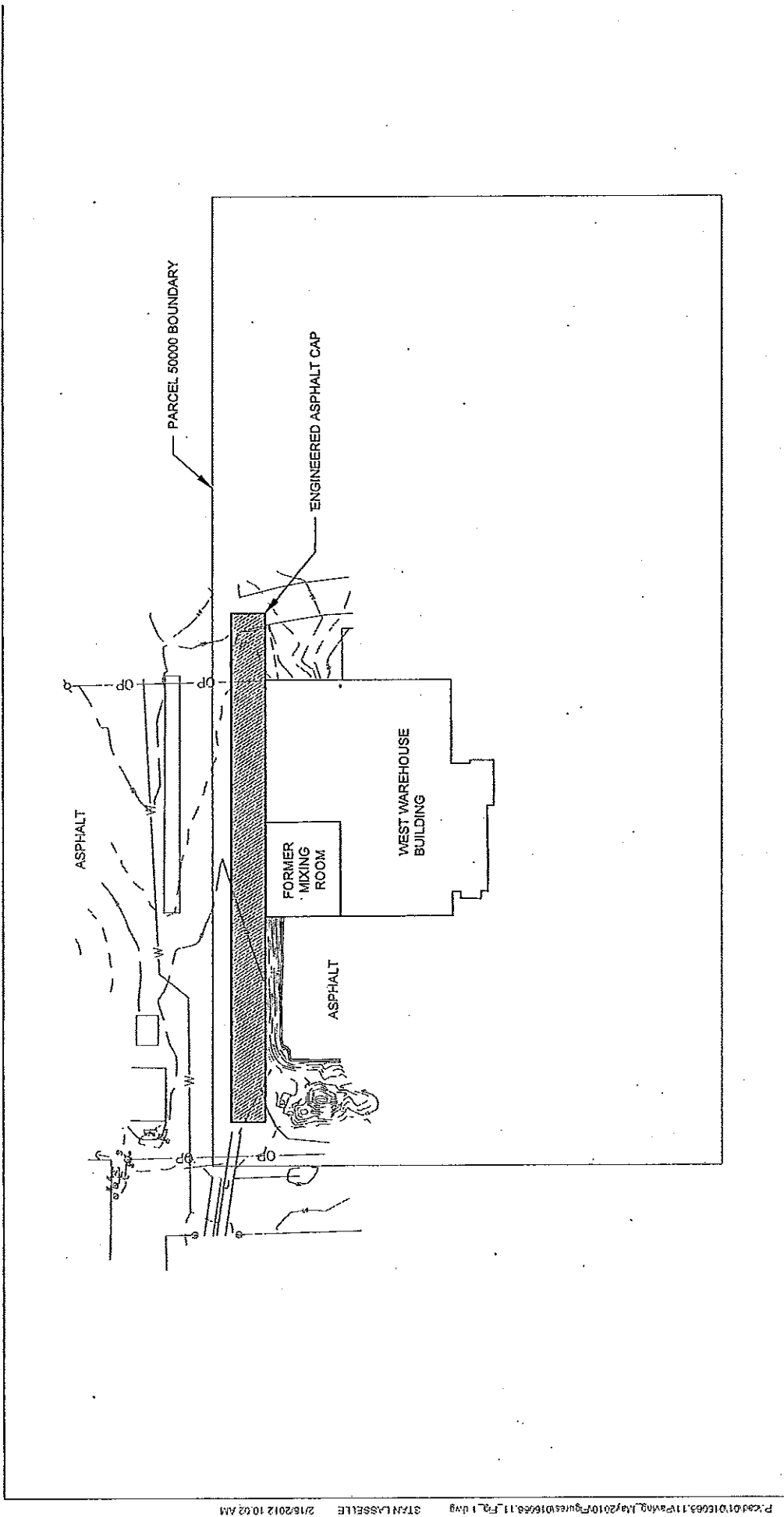
NOTE:  
ALL LOCATIONS APPROXIMATE.



REFERENCE: SITE PLAN PROVIDED BY TETRA PAK

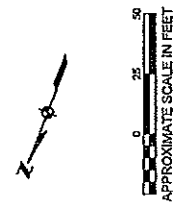
Kennedy/Jenks Consultants  
TETRA PAK  
FORMER STREBOR SITE  
MONITORING WELL LOCATIONS  
K/J 016055.11/PO2SK003  
FIGURE 2





Kennedy/Jenks Consultants  
TETRA PAK MATERIALS, L.P.  
VANCOUVER, WASHINGTON  
PROPERTY MAP SHOWING  
WEST WAREHOUSE AND CAPPED AREA

016066.1  
SEPTEMBER 2011  
FIGURE





**Table 2: Summary of SVOC Groundwater Analytical Results**

Semi-volatile Organic Compounds (mg/l) <sup>(a,b)</sup>						
Monitoring Well Number	Date Sampled	Pentachlorophenol	2,3,4,6 Tetrachlorophenol	2,3,5,6 Tetrachlorophenol	2,4,5 Trichlorophenol	2,4,6 Trichlorophenol
MW-1	04/19/02	<0.8 <sup>(c)</sup>	NA <sup>(d)</sup>	NA	NA	NA
	08/21/02	1.48	NA	NA	<0.8	<0.8
	11/19/02	1.67	NA	NA	<1.6	<1.6
	02/25/03	<0.19	NA	NA	<0.19	<0.19
	07/06/06	1.2	<0.10	0.078 J <sup>(e)</sup>	<0.051	<0.083
	12/28/06	0.68	0.033 J	0.044 J	<0.0083	<0.0097
	01/06/09	<0.33	<0.33	<0.19	<0.19	<0.29
	04/28/09	<0.36	<0.36	<0.20	<0.20	<0.30
	07/13/10	0.78 B / 1.13 B	0.046 J / 0.071 J	0.019 J / 0.034 J	<0.0094 / <0.010	<0.013 / <0.014
	03/19/12	<0.943	<0.377	<0.377	<0.472	<0.472
MW-2	04/18/02	<0.8	NA	NA	NA	NA
	08/21/02	<0.8	NA	NA	<0.8	<0.8
	11/19/02	<0.8	NA	NA	<0.8	<0.8
	02/25/03	<0.19	NA	NA	<0.19	<0.19
	07/06/06	<0.11	<0.11	<0.056	<0.055	<0.089
	12/28/06	0.15 J	<0.0089	<0.019	<0.0091	<0.011
	01/06/09	<0.33	<0.33	<0.19	<0.19	<0.29
	07/13/10	0.055 J B	<0.0083	<0.012	<0.0096	<0.014
	03/19/12	<0.935	<0.374	<0.374	<0.467	<0.467
MW-3	04/18/02	<0.8	NA	NA	NA	NA
	08/20/02	<0.8	NA	NA	<0.8	<0.8
	11/18/02	<0.8	NA	NA	<1.6	<1.6
	02/24/03	0.254	NA	NA	<0.189	<0.189
	07/06/06	<0.11	<0.11	<0.055	<0.054	<0.087
	12/28/06	0.13 J	<0.0081	<0.018	<0.0083	<0.0098
	01/06/09	<0.34	<0.34	<0.19	<0.19	<0.29
	07/13/10	<0.011	<0.0083	<0.012	<0.0096	<0.014
	03/19/12	<0.943	<0.377	<0.377	<0.472	<0.472
MW-5	04/19/02	<0.8	NA	NA	NA	NA
	08/21/02	<0.8	NA	NA	<0.8	<0.8
	11/19/02	<0.8	NA	NA	<1.6	<1.6
	02/25/03	<0.189	NA	NA	<0.189	<0.189
	07/06/06	<0.11	<0.11	<0.053	<0.052	<0.083
	12/28/06	<0.013	<0.0081	<0.018	<0.0083	<0.0098
	01/06/09	<0.33	<0.33	<0.19	<0.19	<0.29
	07/13/10	<0.011	<0.0082	<0.012	<0.0094	<0.013
	03/19/12	<0.935 / <0.935 <sup>(f)</sup>	<0.374 / <0.374	<0.374 / <0.374	<0.467 / <0.467	<0.467 / <0.467

**Table 2: Summary of SVOC Groundwater Analytical Results**

Monitoring		Semivolatile Organic Compounds (mg/l) <sup>(a,b)</sup>					
Well Number	Date Sampled	Pentachlorophenol	2,3,4,6 Tetrachlorophenol	2,3,5,6 Tetrachlorophenol	2,4,5 Trichlorophenol	2,4,6 Trichlorophenol	
MW-6	04/18/02	<0.8	NA	NA	NA	NA	
	08/20/02	<0.813	NA	NA	<0.813	<0.813	
	11/18/02	<0.8	NA	NA	<1.6	<1.6	
	02/24/03	<0.19	NA	NA	<0.19	<0.19	
	07/06/06	0.16 J	<0.12	<0.059	<0.058	<0.092	
	12/28/06	0.21 J	<0.0083	<0.018	<0.0085	<0.01	
	01/06/09	<0.33	<0.33	<0.19	<0.19	<0.29	
MW-7	07/13/10	0.074 J B	<0.0082	<0.012	<0.0094	<0.013	
	03/19/12	<0.935	<0.374	<0.374	<0.472	<0.472	
	08/07/02	0.412 J	NA	NA	<0.8	<0.8	
	08/20/02	0.347 J	NA	NA	<0.8	<0.8	
	11/19/02	7.58	NA	NA	<1.6	<1.6	
	02/25/03	<0.191	NA	NA	<0.191	<0.191	
	01/06/09	<0.34	<0.34	<0.19	<0.19	<0.29	
MW-8	02/25/03	<0.189	NA	NA	<0.189	<0.189	
	07/06/06	<0.11	<0.11	<0.055	<0.054	<0.087	
	12/28/06	0.16 J	<0.0081	<0.018	<0.0083	<0.0098	
	01/06/09	<0.34	<0.34	<0.19	<0.19	<0.29	
	07/13/10	<0.011	<0.0083	<0.012	<0.0096	<0.014	
	03/19/12	<0.935	<0.374	<0.374	<0.472	<0.472	
	MTCA Method B Cleanup Level <sup>(g)</sup>		0.73	480	NL <sup>(h)</sup>	800	4

**Notes:**

- (a) Results are reported in micrograms per liter (µg/l).
- (b) Samples were analyzed for selected semivolatile organic compounds by EPA Method 8270.
- (c) "<" denotes analyte was not detected above the indicated detection limit.
- (d) NA = not analyzed.
- (e) J denotes positively identified, but numerical value is an estimated quantity.
- (f) Second value is result from a field duplicate sample.
- (g) MTCA Method B Groundwater CLARC (dated 2 February 2009).
- (h) NL = not listed in the CLARC Information System.

Bold values indicate positive laboratory detection.  
 Highlighted values indicate detection above MTCA Method B screening value.



## **Enclosure B**

### **Environmental Covenant for Institutional Controls**



4879836 COV

RecFee - \$137.00 Pages: 26 - CHICAGO TITLE INSURANCE  
Clark County, WA 08/07/2012 10:22



**RETURN ADDRESS**

Susan T. Alterman  
Kell, Alterman & Runstein, L.L.P.  
520 SW Yamhill, Suite 600  
Portland, OR 97204

**Document Title(s)**

Environmental Covenant

W7212

**Reference Number(s) of related documents:**

None

**Grantor(s)**

Tetra Pak Materials LP

This document is recorded as an accommodation by Chicago Title Insurance and maintains no responsibility as to the effect or provisions of this document.

**Grantee(s)**

State of Washington, Department of Ecology

**Trustee**

None

**Abbreviated Legal Description:**

#69 and #70 David Armstrong DLC 3.14A

**Assessor's Property Tax Parcel/Account Number**

Tax Parcel 50000

The Auditor/Recorder will rely on the information provided on this form. The staff will not read the document to verify the accuracy or completeness of the indexing information provided herein.

I am requesting an emergency nonstandard recording for an additional fee as provided in RCW 36.18.010. I understand that the recording process may cover up or otherwise obscure some part of the text of the original document.

Susan T. Alterman, WSB No. 30623

## Environmental Covenant

After Recording Return to:  
Scott Rose  
Site Manager  
Department of Ecology -- Southwest Regional Office  
P.O. Box 47775  
Olympia, WA 98504-7775

## Environmental Covenant

**Grantor:** Tetra Pak Materials LP  
**Grantee:** State of Washington, Department of Ecology  
**Legal:** Brief legal description: #69 and #70 DAVID ARMSTRONG DLC 3.14A. A detailed legal description is provided in Attachment A.  
**Tax Parcel No.:** 50000  
**Cross Reference:** None

Grantor, Tetra Pak Materials LP, hereby binds Grantor, its successors and assigns to the land use restrictions identified herein and grants other rights as specified under this environmental covenant (hereafter "Covenant") made this 23<sup>rd</sup> day of July, 2012 in favor of the State of Washington Department of Ecology (Ecology). Ecology shall have full right of enforcement of the rights conveyed under this Covenant pursuant to the Model Toxics Control Act, RCW 70.105D.030(1)(g), and the Uniform Environmental Covenants Act, 2007 Wash. Laws ch. 104, sec. 12.

This Environmental Covenant is made pursuant to RCW 70.105D.030(1)(f) and (g) and WAC 173-340-440 by Tetra Pak Materials LP, and Ecology.

The undersigned, Tetra Pak Materials LP, is the fee owner of the real property in the County of Clark, State of Washington, that is subject to this Covenant (hereafter "Property"). A brief legal description of the Property is: #69 and #70 DAVID ARMSTRONG DLC 3.14A, Tax Parcel No. 50000. A detailed legal description of the Property is provided in Attachment A.

A remedial action (hereafter "Remedial Action") is ongoing at the Property that is the subject of this Covenant. The Remedial Action is described in the Request for a No further Action Determination and Transmittal of the Draft Environmental Covenant (Kennedy/Jenks Consultants, 2 September 2011).

Although impacted soil was removed and an engineered asphalt cap has been installed over the impacted area or is covered by the west warehouse building, this Covenant is required because residual concentrations of the contaminants of concern (COCs, pentachlorophenol [PCP] and dioxins) remain in place to a limited extent that exceed the Model Toxics Control Act Method B Cleanup Level for soil established under WAC 173-340-745. Although the land use at the Property is zoned commercial/industrial, the Property does not qualify for the use of soil cleanup levels for industrial properties under MTCA, as defined in WAC 173-340-745. In addition, long-term groundwater monitoring has been and is being implemented at the Property to ensure that the implemented Remedial Action remains protective of groundwater. Groundwater is being monitored for PCP (the COC in groundwater, which has only been detected periodically and currently only in concentrations that slightly exceed the MTCA Method B cleanup level) on a schedule consistent with the Ecology-approved Long Term Groundwater Monitoring Plan (Kennedy/Jenks, 9 January 2009), which is included as Attachment B.

Tetra Pak Materials LP makes the following declaration as to limitations, restrictions, and uses to which the Property may be put and specifies that such declarations shall constitute covenants to run with the land, as provided by law and shall be binding on all parties and all persons claiming under them, including all current and future owners of any portion of or interest in the Property (hereafter "Owner").

#### Section 1.

1. A portion of the Property contains COC-impacted soil located beneath the area labeled as "Former Mixing Room" on Figure 1 (Attachment C) in the west warehouse building and under an engineered asphalt cap. Figure 1 illustrates the locations of the west warehouse building and the engineered asphalt cap. The Owner shall not alter, modify, or remove the existing west warehouse building or engineered asphalt cap in any manner that may result in

the release or exposure to the environment of that contaminated soil or create an exposure pathway without prior written approval from Ecology.

a. Any activity in the area labeled as "Former Mixing Room" on Figure 1 in the west warehouse building or the engineered asphalt cap area that results in the release or exposure to the environment of the contaminated soil that remains on the Property, or creates an exposure pathway, is prohibited without prior written approval from Ecology. Some examples of activities that are prohibited include: drilling, digging, piercing the surface with a rod, spike or similar item, bulldozing or earthwork, or use of any equipment which compromises the integrity of these areas.

b. No groundwater may be taken from the Property for drinking water purposes.

Section 2. Any activity in the area labeled as "Former Mixing Room" on Figure 1 in the west warehouse building or the engineered asphalt cap area that interferes with the integrity of these features and continued protection of human health and the environment is prohibited.

Section 3. The Owner of the Property must give thirty (30) day advance written notice to Ecology of the Owner's intent to convey any interest in the Property. No conveyance of title, easement, lease, or other interest in the Property shall be consummated by the Owner without adequate and complete provision for continued monitoring, operation, and maintenance of the Remedial Action.

Section 4. The Owner must restrict leases to uses and activities consistent with this Covenant and notify all lessees of the restrictions on the use of the Property.

Section 5. The Owner must notify and obtain approval from Ecology prior to any use of the Property that is inconsistent with the terms of this Covenant. Ecology may approve any inconsistent use only after public notice and comment.

Section 6. The Owner shall allow authorized representatives of Ecology the right to enter the Property at reasonable times and with reasonable advance written notice (at least seven working days) for the purpose of evaluating the Remedial Action, to take samples, to inspect remedial actions conducted at the Property, to determine compliance with this Covenant, and to inspect records that are related to the Remedial Action.

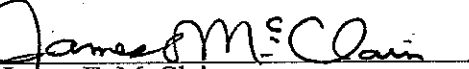
Section 7. The Owner of the Property reserves the right under WAC 173-340-440 to record an instrument that provides that this Covenant shall no longer limit use of the Property or be of

any further force or effect. However, such an instrument may be recorded only if Ecology, after public notice and opportunity for comment, concurs.

**Tetra Pak Materials LP**

By Tetra Pak Converting GP LLC, Its General Partner

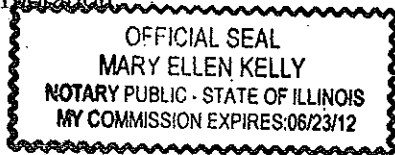
By   
Brian Kennell  
Vice President Finance & CFO


By   
James E. McClain  
Vice President & General Counsel

STATE OF ILLINOIS)

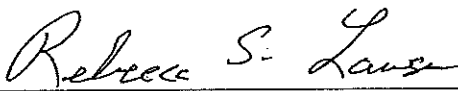
COUNTY OF LAKE }

On this 13<sup>th</sup> day of MARCH, 2012, I certify that Brian Kennell and James E. McClain personally appeared before me, acknowledged that they are the Vice President Finance & CFO and Vice President & General Counsel, respectively, of the corporation that executed the within and foregoing instrument, and signed said instrument by free and voluntary act and deed of said corporation, for the uses and purposes therein mentioned, and on oath stated that they were authorized to execute said instrument for said corporation.



  
Notary Public in and for the State of  
Illinois, residing at INVERNESS, IL  
My appointment expires 6/23/12

STATE OF WASHINGTON  
DEPARTMENT OF ECOLOGY

  
Rebecca S. Lawson, P.E., LHG  
Section Manager  
Toxics Cleanup Program  
Southwest Regional Office

Dated: 7/23/12

STATE OF WASHINGTON \_\_\_\_\_  
COUNTY OF CLARK \_\_\_\_\_

**Attachment A – Detailed Legal Description  
Tetra Pak Materials LP**

**Tax Parcel 50000 (Parcel I)**

A tract of land located in Section 21, Township 2 North, Range 1 East of the Willamette Meridian, Clark County, Washington.

COMMENCING at the Northwest corner of the Amos Short Donation Land Claim; thence North 0°59'45" East, along the centerline of Fruit Valley Road, a distance of 1837.44 feet; thence South 89°27'15" East 525.096 feet to a point on the Easterly right-of-way line of Thompson Avenue and the TRUE Point of Beginning of this description; thence South 89°27'15" East 272.85 feet; thence South 0°59'45" West 505.89 feet to a point on the North right-of-way line of 31st Street; thence North 89°27'15" West along said Northerly right-of-way line 272.85 feet to a point on the Easterly right-of-way line of Thompson Avenue; thence North 0°59'45" East along said Easterly right-of-way line 505.89 feet to the Point of Beginning.



**Attachment B**  
**Long Term Groundwater Monitoring Plan**

## **Kennedy/Jenks Consultants**

200 S.W. Market Street, Suite 500  
Portland, Oregon 97201  
503-295-4911  
FAX: 503-295-4901

### **Long Term Groundwater Monitoring Plan Former Strebor Site**

9 January 2009

Prepared for  
**Tetra Pak Materials, LP**  
1616.W. 31<sup>st</sup> Street  
Vancouver, WA 98660

KJJ Project No. 016066.11

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## **Table of Contents (cont'd)**

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## **List of Acronyms and Abbreviations**

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bgs = below ground surface  
CAS = Columbia Analytical Services, Inc.  
COC = chemicals of concern  
DCE = dichloroethene  
Ecology = Washington State Department of Ecology  
EPA = Environmental Protection Agency  
FS = Feasibility Study  
HVOCs = halogenated volatile organic compounds  
IDW = Investigation derived waste  
msl = mean sea level  
MTCA = Model Toxics Control Act  
MW = monitoring well  
PCE = tetrachloroethene  
PCP = pentachlorophenol  
QA/QC = quality assurance/quality control  
RA = Risk Assessment  
RC = Restrictive Covenant  
RI = Remedial Investigation  
TCE = trichloroethene  
ug/l = micrograms per liter  
VCP = Voluntary Cleanup Program  
VOC = volatile organic compound

## **Section 1: Introduction**

---

This document presents the Long Term Groundwater Monitoring Plan (Monitoring Plan) for the former Strebtor property (Site) located at 3125 Thompson Avenue in Vancouver, Washington. Investigation and cleanup activities have been conducted at the Site under the Voluntary Cleanup Program (VCP) (VCP No. SW0377) of the Washington State Department of Ecology (Ecology). The Monitoring Plan is required as part of the Restrictive Covenant (RC) proposed for soil and groundwater at the Site, which will be developed after the Monitoring Plan is approved by Ecology.

### **1.1 Purpose and Objectives**

The purpose of long term groundwater monitoring at the Site is to ensure that the implemented remedy (impacted soil removal) remains protective of groundwater. Ecology requires that four quarters of groundwater monitoring be conducted to show that the concentrations of chemicals of concern are below the MTCA Method A (chromium) or B (pentachlorophenol [PCP]) cleanup levels. The first long term groundwater monitoring event will coincide with the third quarter 2008 groundwater monitoring event. Subsequent long term monitoring events will be conducted once every 18 months.

## **Section 2: Background**

---

The Site is located on approximately 3.7 acres in the lowland valley of the Columbia River at an elevation of approximately 50 feet above mean sea level (msl). A vicinity map is included as Figure 1 and the general Site layout is shown on Figure 2. The Site is located in the SW ¼, of the NE ¼ of Section 21, Township 2 North, Range 1 East in Vancouver. There is one structure on the property, a 14,000-square foot (approximate) building constructed in 1974. Land use in the vicinity of the Site is commercial, industrial, and residential.

Prior to 1974, the Site was undeveloped rural land. The Site facility was developed in 1974 to formulate and store wood treatment products. The wood treatment formulating facility was closed in 1986 and the property was transferred between 1987 and 1989, when Tetra Pak purchased the property.

The Site is zoned commercial/industrial. Tetra Pak uses the existing building for office space, maintenance activities, storage of parts and equipment, and certain photolithographic (label making) processes. A former tank farm area, located on the north side of the existing building, is paved and used as a temporary storage area for pallets and miscellaneous equipment and employee parking.

### **2.1 Investigation, Remediation, and Monitoring History**

Kennedy/Jenks Consultants performed a Remedial Investigation, Risk Assessment, and Feasibility Study (RI/RA/FS) from 2002 to 2004. These investigations identified (PCP) and dioxin and furan congeners (dioxin) as chemicals of concern (COC) in soil at certain locations at the Site, and PCP as a COC in groundwater at the Site (Kennedy/Jenks 2004).

In September 2006, Tetra Pak undertook a Remedial Action to remove surface and subsurface soils identified during the RI process to contain elevated concentrations of PCP and dioxin (Kennedy/Jenks 2007). Approximately 320 lineal feet of rail spur was removed to accommodate soil removal activities. In the area beneath and around the rail spur, excavations continued below ground surface (bgs) to depths ranging from approximately 2 to 6 bgs. Excavation depths were established based on results of Geoprobe® soil samples collected in April 2002. A total of 104 tons of PCP and dioxin-impacted soil was removed from the Site during the Remedial Action. The results of the remedial action described above are summarized in the *Remedial Action Report, Former Strebor Site* (Kennedy/Jenks, 2007).

Ecology requested that further information be gathered to more completely characterize dioxin in the soil and pentachlorophenol (PCP) and halogenated volatile organic compounds (HVOCs) in the groundwater. In May 2008, six soil borings were advanced, using direct-push drilling equipment for collection of soil samples to further characterize the horizontal and lateral extent of dioxin in soil. This plan addresses the groundwater monitoring component to Ecology's request. The results of the supplemental subsurface investigation are summarized in the *Additional Investigation Report, Former Strebor Site* (Kennedy/Jenks, 2008).

Kennedy/Jenks has conducted groundwater monitoring and sampling at the Site in 2002, 2003, and 2006. The results of the 2002/2003 monitoring and sampling are summarized in the RI/FS/RA (Kennedy/Jenks, 2004). The results of the groundwater monitoring and sampling conducted in 2006 are summarized in the *Remedial Action Report* (Kennedy/Jenks, 2007).

## **Section 3: Constituents of Concern and Compliance**

---

This section presents a summary of the constituents of concern (COC) in groundwater, cleanup levels, and conditional points of compliance.

### **3.1 Constituents of Concern**

Pentachlorophenol (PCP) is identified as the COC at the site. Low levels (near the laboratory detection limit) of volatile organic compounds (VOCs), including tetrachloroethene (PCE), trichloroethene (TCE), and 1,2-dichloroethene (1,2-DCE) were detected in groundwater samples collected at the Site. These compounds are part of a regional groundwater contamination plume and are not Site COCs.

### **3.2 Groundwater Cleanup Levels**

MTCA Method B cleanup levels for groundwater are appropriate comparison standards for the Site and will be used as the compliance concentrations for the long term groundwater monitoring. The MTCA Method B groundwater cleanup level for PCP is 0.73 micrograms per liter (ug/L) (Ecology 2007). A MTCA Method A cleanup value is established for chromium (50 ug/l) and will be used for comparison for the quarterly monitoring events.

PCP has been occasionally detected in three monitoring wells (MW-1, MW-3, and MW-7) above laboratory detection levels. On three occasions, the PCP concentration was detected in groundwater samples collected from these wells above the cleanup level. Active remediation of PCP in groundwater is impractical since PCP has not been consistently detected and active remedial technologies cannot be effectively employed to remove PCP at sporadic trace concentrations. Therefore, since it is impractical to actively treat groundwater, a combination groundwater use restrictions and monitoring will be employed to address PCP in groundwater. These measures will be described in the restrictive covenant on the Site.

This approach is consistent with MTCA in that the point of compliance with cleanup levels can be established at the site boundary when groundwater remediation is impractical. Since consistent detections of PCP have not been found to date, it is not expected that PCP would migrate beyond the site boundary at detectable concentrations, especially following source control. Ongoing monitoring at the site boundary will provide a mechanism to evaluate whether PCP might migrate offsite above cleanup levels.

### **3.3 Conditional Points of Compliance**

The conditional point of compliance is the point where cleanup levels established for the site are to be achieved. The conditional point of compliance for this Site is the site boundary. The groundwater monitoring wells that are nearest the Site boundary will be used as the conditional points of compliance and include MW-1, MW-2, MW-3, MW-5, MW-6, and MW-8.

### **3.4 Contingency**

Upon receipt of analytical data for each long term groundwater monitoring event, the data will be evaluated against the cleanup level. If the PCP concentration exceeds the cleanup level, the monitoring well from which that sample was collected will be re-sampled for analysis of PCP. If the result of the sample collected during the re-sample event indicate that the PCP concentration exceeds the cleanup level, an evaluation of further action will be conducted. Further action may include collection of reconnaissance level groundwater samples in the downgradient direction from the compliance point. Prior to initiating any additional action, Ecology will be contacted to ensure that the additional action is in compliance with MTCA requirements.



## **Section 4: Groundwater Monitoring Activities**

---

Groundwater samples will be collected as part of the quarterly and long term groundwater monitoring program described in this section. The groundwater monitoring sampling requirements are included as Table 1 of this Work Plan.

### **4.1 Field Methods**

This section presents the methods for obtaining depth-to-water measurements and for obtaining groundwater samples for laboratory analysis.

#### **4.1.1 Water Level Measurement**

Prior to groundwater sample collection activities, the depth to water will be measured in each of the groundwater monitoring wells to evaluate the groundwater flow direction and gradient.

#### **4.1.2 Groundwater Sample Collection Methods**

Groundwater samples will be collected using a peristaltic pump applying low-flow sampling techniques to reduce the turbidity in the groundwater samples as much as possible. Groundwater field parameters of pH, electrical conductivity, temperature, dissolved oxygen, and redox potential will be measured with a flow-through cell and documented in Kennedy/Jenks field notes. The groundwater sample from each well will be collected after these field parameters have stabilized. Non-dedicated field equipment will be decontaminated prior to sampling each monitoring well. Upon collection, the groundwater samples will be labeled and placed in an insulated cooler chilled with ice for transport to an EPA accredited laboratory under proper chain-of-custody procedures for analysis.

### **4.2 Groundwater Laboratory Analytical**

As requested by Ecology, Table 1 presents a groundwater sampling and analytical method schedule for the short term (quarterly) and long term (18 Month) monitoring. Short term quarterly groundwater sample analysis will include PCP and associated compounds (monitoring well MW-1), total chromium (monitoring well MW-1), halogenated volatile organic compounds (HVOCs), monitoring wells MW-3, MW-5, and MW-6). Analysis for PCP will be conducted using Environmental Protection Agency (EPA) Method 8270C. Total chromium will be analyzed using EPA Method 6020. HVOC analysis will be conducted using EPA Method 8260D.

Analysis conducted on groundwater samples collected in long term sampling events will include PCP. In addition, a groundwater sample will be collected from monitoring well MW-7 for analysis of PCP and dioxins during the initial long term groundwater monitoring event and again in five years. Analysis for dioxins will be conducted using EPA Method 8290.

For quality assurance/quality control (QA/QC) purposes, a field duplicate sample will be collected during each long term groundwater monitoring event. The duplicate will be submitted to the analytical laboratory for analysis of PCP and associated compounds.

### **4.3 Investigation-Derived Waste**

Purge water and decontamination fluids from each monitoring event will be temporarily placed in 55-gallon drums pending analytical results. Each drum will be labeled with the project name, contents, date, and sampling location and stored at a secured area at the Site. The groundwater sample analyses from the monitoring wells will be used to characterize the drummed wastes. The Investigation Derived Waste (IDW) will be disposed of at a licensed treatment/disposal facility.

## **Section 5: Reporting**

---

Following completion of the fieldwork and receipt of laboratory analytical data for each monitoring event, Kennedy/Jenks will prepare a groundwater monitoring report for submittal to Ecology. The report will include a summary of field activities, tabulated results, and a Site map showing the locations of each monitoring well. Each report will be submitted to Tetra Pak in draft format for review. The final reports will be submitted to Ecology with incorporated comments from Tetra Pak.

## References

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- Kennedy/Jenks Consultants (Kennedy/Jenks). 2004. Remedial Investigation, Risk Assessment, and Feasibility Study Report, Former Strebor Facility, Tetra Pak Materials. August 2004.
- Kennedy/Jenks. 2006. Additional Investigation Work Plan, Former Strebor Site. 1 February 2006.
- Kennedy/Jenks. 2007. Remedial Action Report, Former Strebor Site. 9 March 2007.
- Kennedy/Jenks. 2008. Additional Investigation Report, Former Strebor Site. December 2008
- Van den Berg et al. 2006. The 2005 World Health Organization Re-evaluation of Human and Mammalian Toxic Equivalency Factors for Dioxins and Dioxin-like Compounds. *Toxicological Sciences* 93(2), 223-241, 20 May 2006.
- Washington Department of Ecology (Ecology). 2007a. Model Toxics Control Act Statute and Regulation, Publication No. 94-06. Revised November 2007.
- Ecology. 2007b. Opinion Pursuant to WAC 173-340-515(5) on Proposed Remedial Action. 27 March 2007.
- Ecology. 2007c. Opinion under WAC 173-340-515(5) on Remedial Action. 5 April 2007.

## Table

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Table 1. Groundwater Sample Schedule and Analytical Parameters

Laboratory Analysis							
Monitoring Event	Pentachlorophenol <sup>(a)</sup>	Tetrachlorophenol (2,3,4,6 and 2,3,5,6) <sup>(a)</sup>	Trichlorophenol (2,4,5 and 2,4,6) <sup>(a)</sup>	Dioxins/Furans <sup>(b)</sup>	Total Chromium <sup>(c)</sup>	Tetrachloroethene <sup>(d)</sup>	Trichloroethene <sup>(d)</sup>
<b>Third Quarter 2008 and 1st Long Term Monitoring</b>							
MW-1	X <sup>(e)</sup>	X	X		X		
MW-2	X	X	X				
MW-3	X	X	X				
MW-5	X	X	X				
MW-6	X	X	X				
MW-7	X	X	X	X			
MW-8	X	X	X				
<b>4th Quarter 2008</b>							
MW-1	X	X	X		X		
MW-2							
MW-3							
MW-5							
MW-6							
MW-7							
MW-8							
<b>1st Quarter 2009</b>							
MW-1	X	X	X		X		
MW-2							
MW-3						X	X
MW-5						X	X
MW-6						X	X
MW-7							
MW-8							
<b>2nd Quarter 2009</b>							
MW-1					X		
MW-2							
MW-3							
MW-5							
MW-6							
MW-7							
MW-8							

Table 1. Groundwater Sample Schedule and Analytical Parameters

Monitoring Event	Laboratory Analysis					
	Pentachlorophenol <sup>(a)</sup>	Tetrachlorophenol (2,3,4,6 and 2,3,5,6) <sup>(a)</sup>	Trichlorophenol (2,4,5 and 2,4,6) <sup>(a)</sup>	Dioxins/Furans <sup>(b)</sup>	Total Chromium <sup>(c)</sup>	Tetrachloroethene <sup>(d)</sup> Trichloroethene <sup>(d)</sup>
<b>Subsequent Long-Term Monitoring Events</b>						
MW-1	X	X	X			
MW-2	X	X	X			
MW-3	X	X	X			
MW-5	X	X	X			
MW-6	X	X	X			
MW-7 <sup>(f)</sup>						
MW-8	X	X	X			

(a) Pentachlorophenol, Trichlorophenol, and tetrachlorophenol will be analyzed using Environmental Protection Agency (EPA) Method 8270C.

(b) Dioxins/Furans will be analyzed using EPA Method 8290.

(c) Total chromium will be analyzed using EPA Method 6020.

(d) Tetrachloroethene and trichloroethene will be analyzed using EPA Method 8260D.

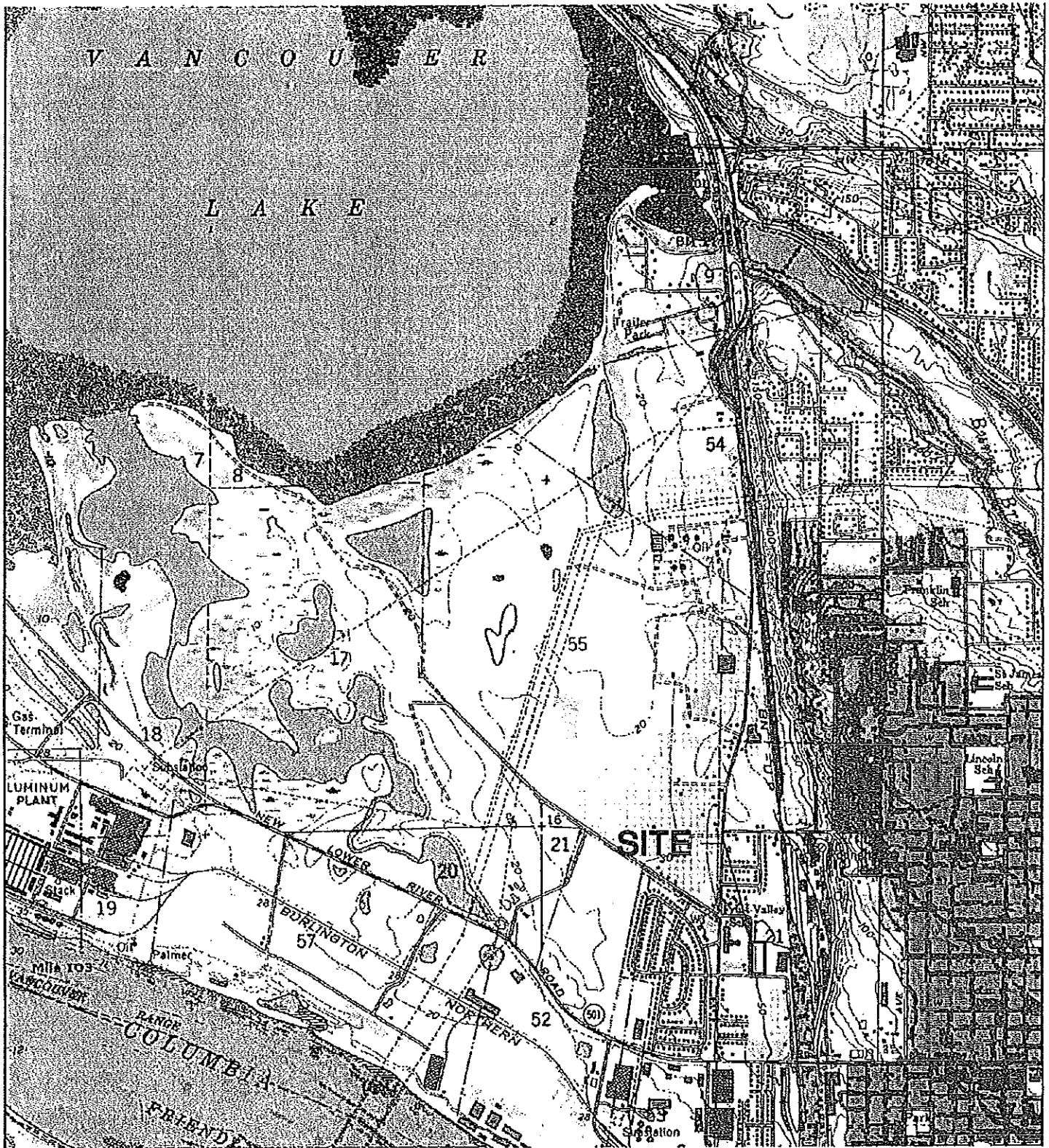
(e) "X" = Collected sample will be analyzed for the indicated constituent.

(f) Groundwater samples will be collected from monitoring well MW-7 for analysis for PCP and dioxins/furans once every five years.

## Figures

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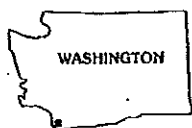
Kennedy/Jenks Consultants

TETRA PAK  
FORMER STREBOR SITE

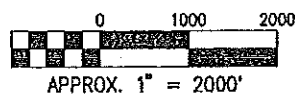
VICINITY MAP

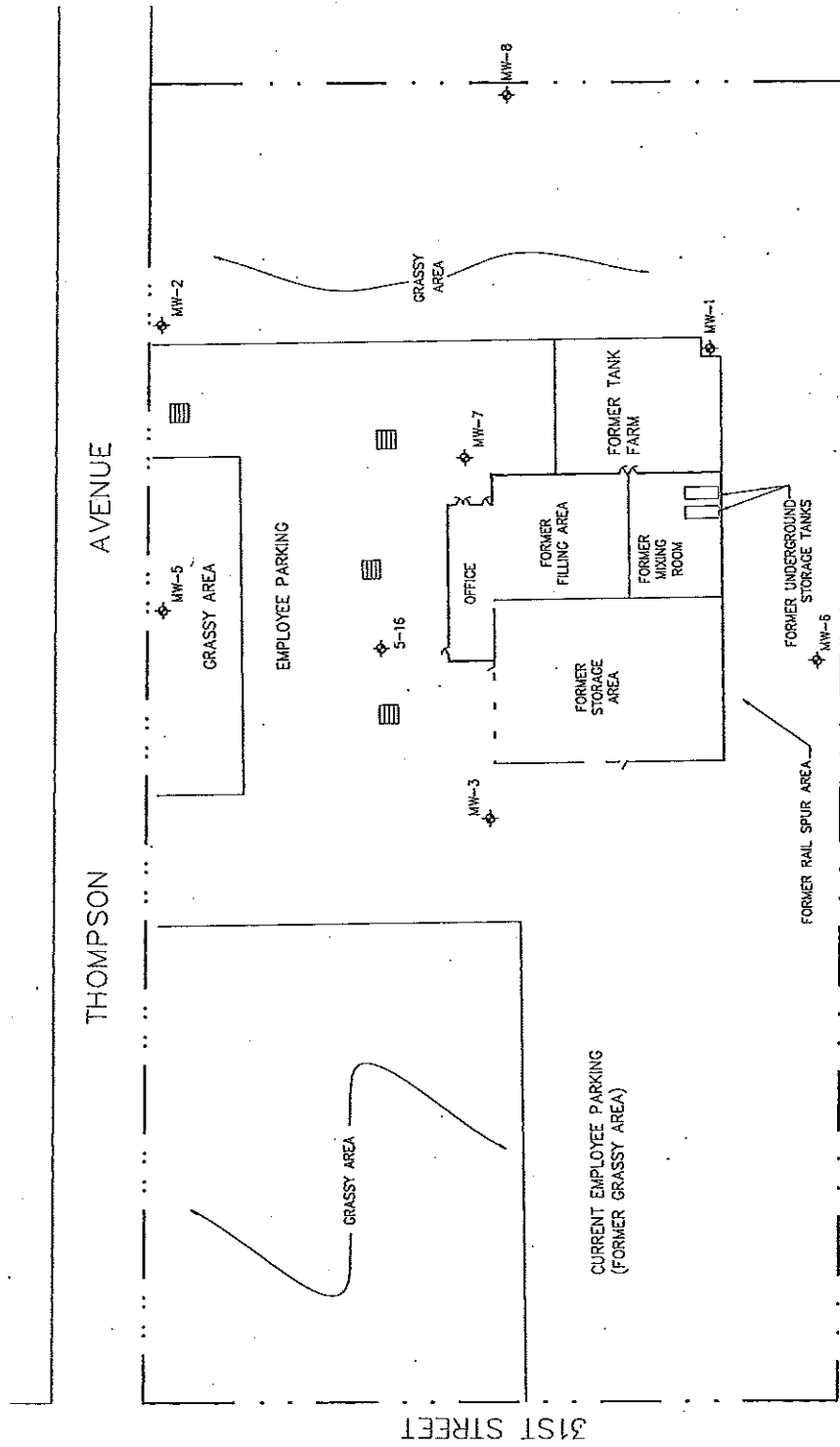
K/J 016066.11/P01SK001

FIGURE 1



QUADRANGLE LOCATION

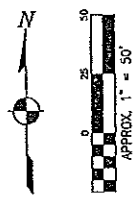




**LEGEND**

- MW-1 MONITORING WELL LOCATION
- STORMWATER CATCH BASIN
- APPROXIMATE SITE BOUNDARY

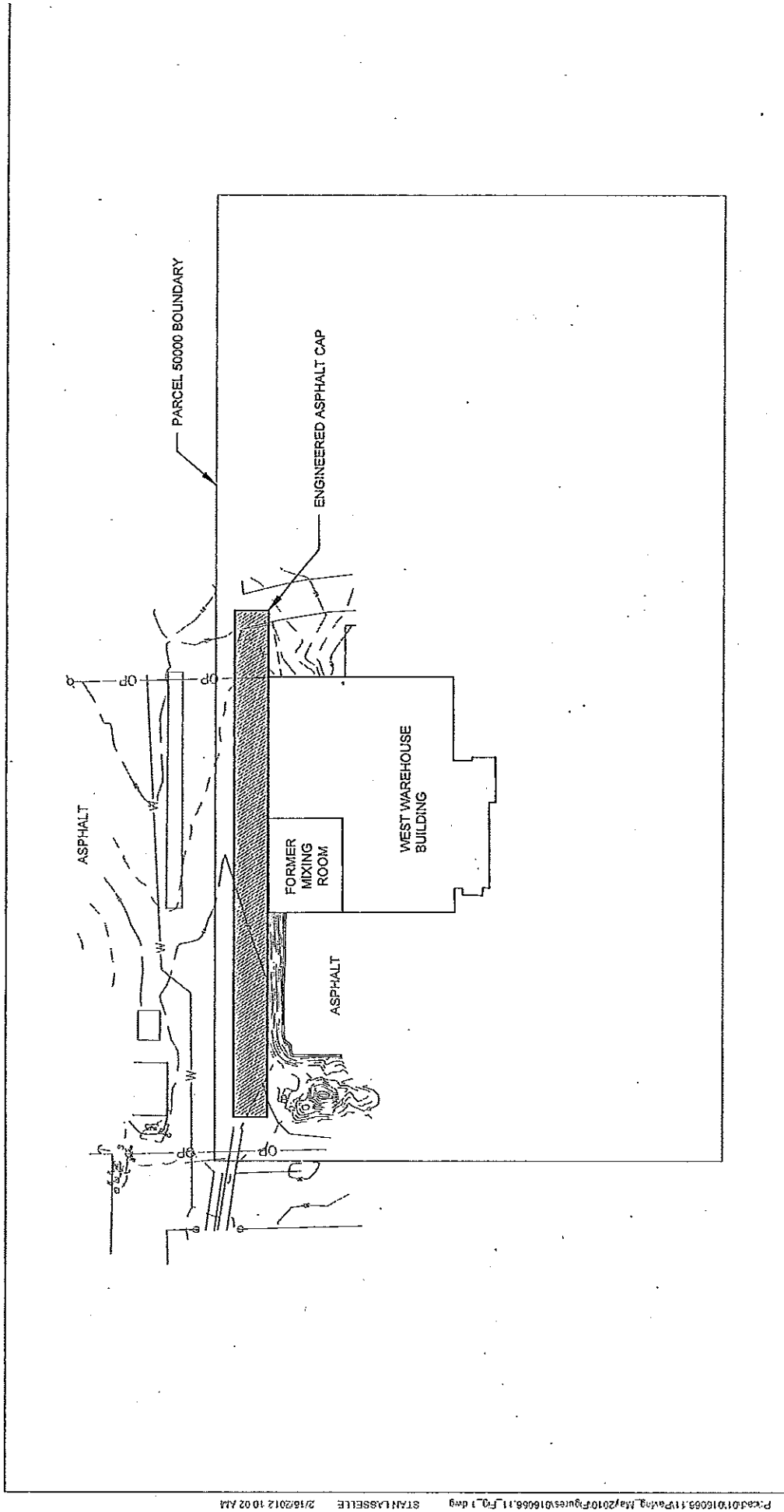
NOTE:  
ALL LOCATIONS APPROXIMATE.



REFERENCE: SITE PLAN PROVIDED BY TETRA PAK

Kennedy/Jenks Consultants  
TETRA PAK  
FORMER STREBOR SITE  
MONITORING WELL LOCATIONS  
K/J 015065.11/P02SK003  
FIGURE 2

Attachment C  
Figure 1



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Kennedy/Jenks Consultants  
 TETRA PAK MATERIALS LT  
 VANCOUVER, WASHINGTON  
 PROPERTY MAP SHOWING  
 WEST WAREHOUSE AND CAPPED AREA  
 016068.1  
 SEPTEMBER 2011  
 FIGURE

