# BASELINE

#### ENVIRONMENTAL CONSULTING

6 October 2009 Y0323-03.01342

Mr. Jerry Wickham Alameda County Health Care Services Agency Environmental Health Services 1131 Harbor Bay Parkway, Suite 250 Alameda, CA 94502-6577

#### RECEIVED

1:47 pm, Oct 07, 2009

Alameda County Environmental Health

Subject: Addendum I to Work Plan for Additional Soil and Groundwater Investigation,

751-785 Seventh Street, Oakland – SLIC Case RO0002586 and Geotracker

**Global ID SL0600130797** 

Dear Mr. Wickham:

This letter provides responses to your letter dated 6 August 2009 which transmitted comments on *Work Plan for Additional Soil and Groundwater Investigation* for 751-785 Seventh Street, dated 19 June 2009 (June 2009 Work Plan), prepared by BASELINE Environmental Consulting on behalf of the Brush Street Group, LLC. Please consider the 19 June 2009 work plan as modified Addendum I (i.e., this letter) as the Revised Work Plan requested in your letter. Each of your comments are addressed below.

#### Comment 1. Frog Pond Backfill and Removal of Concrete Column

The Brush Street Group has sealed the ground surface above the former Frog Pond with 3.5-inch thick concrete pavement in July 2009. Surface water can no longer infiltrate into the subsurface in the former Frog Pond area.

#### Comments 2 & 3. Monitoring Wells and Vertical Delineation

The boreholes for the proposed wells would be drilled using hollow-stem augers, and soil samples would be collected using split-spoon samplers fitted with stainless steel liners. The sampler would be decontaminated between samples by washing in an Alconox solution and rinsing with potable water.

In well MW-FP3, a soil sample would be collected from about five feet below the ground surface (bgs). In wells MW-FP4A and MW-FP5, soil samples would be collected from 5, 10, 15, and 20 feet bgs. The soil samples would be analyzed for Title 22 metals and hexavalent chromium. No soil sample would be collected from the boreholes for the off-site wells.

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The three shallow on-site monitoring wells would be constructed similarly to the two existing wells. The total depth would be 25 feet bgs, the screen interval would be between approximately 12 to 25 feet bgs, and the filter pack interval would be between approximately 11 to 25 feet bgs. The shallowest groundwater level previously observed at the site was about 12.5 feet bgs. However, since the chemicals of concern for this site are metals, and not petroleum hydrocarbons, having the top of the screen slightly below the groundwater table at times should not present a problem.

#### **Comment 4. Off-site Extent of Contamination**

The adjacent Shell-branded Service Station has several wells screened in the shallow groundwater along 6<sup>th</sup> Street. If permission can be obtained from Shell with the assistance of Alameda County Environmental Health, we propose to collect one-time groundwater samples from Shell wells MW-3 and MW-9 (Figure 1); these wells are located in the presumed downgradient direction from the former Frog Pond. In addition, we would install one new well screened across the shallow groundwater and one well screened in deeper groundwater at the approximate locations shown on the attached Figure 1 (MW-FP6A and MW-FP6B). The shallow well would be screened between approximately 12 and 25 feet bgs, and the deeper well screened between approximately 35 to 45 feet bgs. Drilling and well construction details would be the same as for the on-site wells. All off-site groundwater samples would be collected using a low-flow sampling method and analyzed for dissolved Title 22 metals and hexavalent chromium. No soil samples would be collected from the off-site wells. Grab groundwater sampling along 6<sup>th</sup> Street, originally proposed in the June 2009 Work Plan, would not be conducted.

#### Comment 5. Drainage Ditch in Rear Yard

The Brush Street Group's involvement with the site began long after the site had been abandoned and cleaned up by the U.S. Environmental Protection Agency and has no knowledge regarding the intended purpose of the drainage ditch in the rear yard. The ditch has been sealed by the Brush Street Group and no longer exist. Since historical plating operations appeared to have been located across the rear yard, the drainage ditch likely captured rain runoff and possibly spilled liquids. It appeared that the ditch once drained into the depressed vault inside the former plating building. Historical documents available to the Brush Street Group indicate that liquids from the vault was once discharged to the sanitary sewer.

Soil samples collected at 0.5-1.0 and 3.5-4.0 feet bgs from boring B-FP11 in 2005 contained elevated metal concentrations. We propose to install two borings in the vicinity of B-FP11 to a depth of approximately eight feet bgs. One boring would be located about ten feet west of boring B-FP11 (away from the drainage ditch) (B-FP32), and the second boring would be located about ten feet south of B-FP11 (adjacent to the former drainage ditch) (B-FP33) as shown on Figure 2. Soil samples would be collected from approximately 0.5-1.0, 4.0-4.5 and

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7.5-8.0 feet bgs from each boring, and analyzed for Title 22 metals and hexavalent chromium.

#### **Comment 6. Source Materials**

No response is needed.

#### Comment 7. Potential Vapor Intrusion

No response is needed.

#### Comment 8. Elevated Concentrations of Potential Vapor Intrusion

Polycyclic aromatic hydrocarbons (PAHs) were identified in a soil sample collected from 2.5 to 3.0 feet bgs in boring B-FP7 in 2003. No PAHs were detected in the 5.0-5.5 feet bgs sample from the same boring. In addition, three additional borings B-FP7A, B-FP7B, and B-FP7C were drilled in 2005 to define the horizontal extent of PAH impacts near B-FP7. Trace concentrations of PAHs were found in soil samples collected from one of the borings. Also, one grab groundwater sample was collected from boring B-FP7A in 2005, which did not contain any PAHs above the laboratory reporting limit of 0.1 microgram/liter. These results have adequately defined the extent of PAH impacted in this area.

Total cyanide was identified in the 5.0-5.5 feet bgs soil sample collected from boring B-FP7 in 2003. Cyanide was not present above the laboratory reporting limit in the 2.5-3.0 feet bgs soil sample from the same boring, or in the other 14 soil samples collected in 2003 from across the site. This suggests that the cyanide detection in the 5.0-5.5 feet bgs sample in boring B-FP7 may be anomalous and isolated.

It does not appear that the limited presence of PAHs and cyanide in the boring B-FP7 area represents a significant vapor intrusion threat. Therefore, no additional investigation of the B-FP7 area is proposed at this time.

Please contact us at your convenience if you have any questions regarding this letter.

Sincerely,

Lydia/Huang

P.E. No. 43995

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YEARING

cc: Mr. Tom McCoy, Brush Street Group, LLC

# **OFF-SITE GROUNDWATER SAMPLE LOCATION**

Figure 1

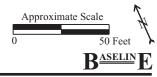


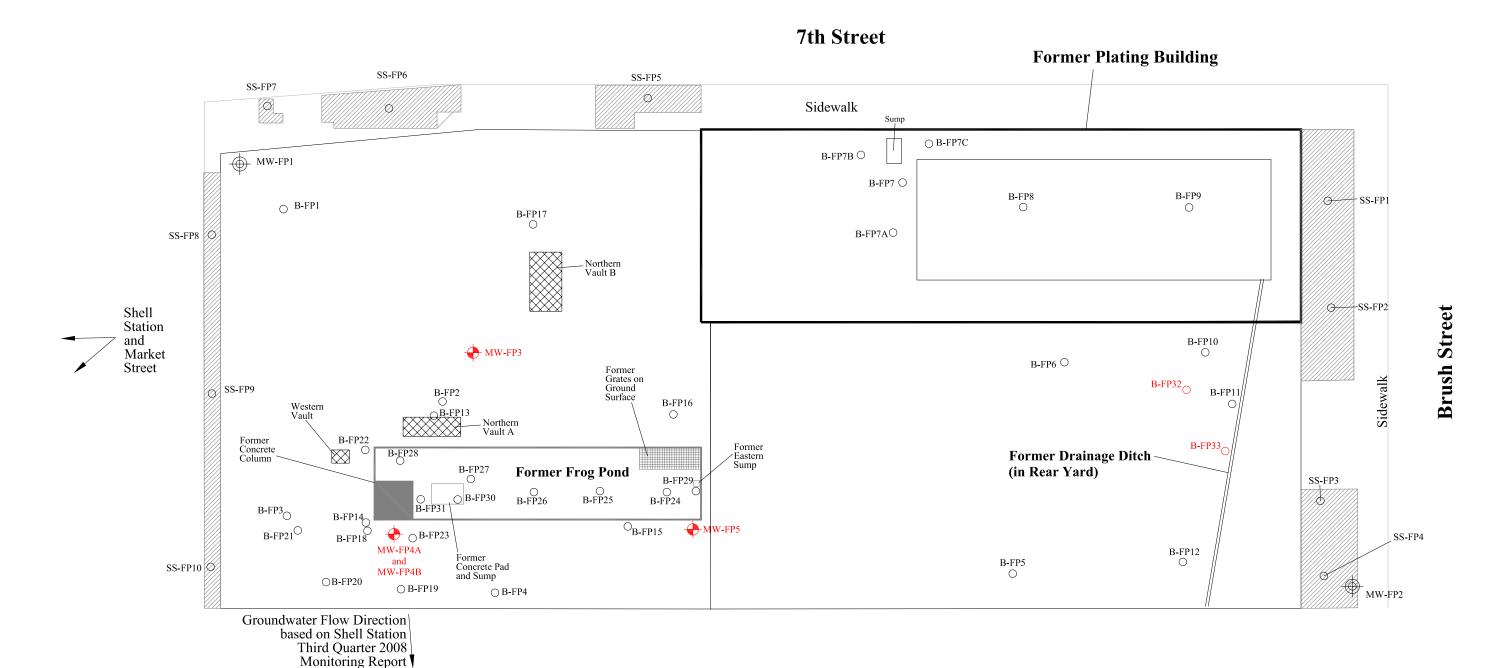
751 - 785 Seventh Street Oakland, California

— Site Boundary

Existing Shell Station Well

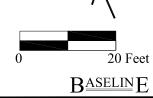
 Proposed New Groundwater Monitoring Wells





# Legend

- Exposed soil
- Previous boring location
- Existing groundwater monitoring well
- Proposed groundwater monitoring well
- Proposed soil boring



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