

## APPENDIX H

### Olympic View Sanitary Landfill Soil Disposal Weight Tickets

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67326  
DATE: 12/20/2000  
TIME: 10:46 - 10:47

CUSTOMER: 347 / Cokassar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: WMS  
ROUTE: NA / Non App  
COMMENT: hand ticket 9017 12-7-00

P.O.:  
GROSS: 95000 LBS Manual  
TARE: 40200 LBS Manual  
NET: 54800 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	27.40

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER:

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67035  
DATE: 12/28/2000  
TIME: 11:03 - 11:03

CUSTOMER: 347 / Cokassar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: WMS  
ROUTE: NA / Non App  
COMMENT: hand ticket 9011 12-7-00

P.O.:  
GROSS: 97500 LBS Manual  
TARE: 40200 LBS Manual  
NET: 57300 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	29.65

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER:



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67822  
DATE: 12/28/2000  
TIME: 10:44 - 10:44

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: GLOBAL9 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9023 12-7-00

P.O.:  
GROSS: 96580 LBS Manual  
TARE: 39420 LBS  
NET: 57160 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	28.58

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67828  
DATE: 12/28/2000  
TIME: 10:49 - 10:49

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: GLOBAL9 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9016 12-7-00

P.O.:  
GROSS: 95720 LBS Manual  
TARE: 39420 LBS  
NET: 56300 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	28.15

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67837  
DATE: 12/28/2000  
TIME: 11:03 - 11:03

CUSTOMER: 347 / Cokamar Trucking

P.O.:

GENERATOR: WMDICK / Wm Dickson CompPROFILE #: 2000-1816GROSS: 98000 LBS Manual

COUNTY: PIE / Pierce

TARE: 39420 LBS

TRUCK: GLOBAL9 LICENSE:

NET: 58580 LBS

ROUTE: NA / Non App

COMMENT: hand ticket 9009 12-7-00

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	29.29

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER:

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67848  
DATE: 12/28/2000  
TIME: 11:19 - 11:19

CUSTOMER: 347 / Cokamar Trucking

P.O.:

GENERATOR: WMDICK / Wm Dickson CompPROFILE #: 2000-1816GROSS: 99540 LBS Manual

COUNTY: PIE / Pierce

TARE: 40620 LBS

TRUCK: COKE1 LICENSE:

NET: 58920 LBS

ROUTE: NA / Non App

COMMENT: hand ticket 9001 12-7-00

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	29.46

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER:



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67839  
DATE: 12/28/2000  
TIME: 11:04 - 11:04

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: COKE1  
ROUTE: NA / Non App  
COMMENT: hand ticket 9007 12-700

P.O.:  
GROSS: 109040 LBS Manual  
TARE: 40620 LBS  
NET: 68420 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	34.21

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67824  
DATE: 12/28/2000  
TIME: 10:45 - 10:45

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: COKE1  
ROUTE: NA / Non App  
COMMENT: hand ticket 9020 12-7-00

P.O.:  
GROSS: 101820 LBS Manual  
TARE: 40620 LBS  
NET: 61200 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	30.60

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67834  
DATE: 12/28/2000  
TIME: 11:02 - 11:02

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: COKE1 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9014 12-7-00

P.O.:  
GROSS: 105660 LBS Manual  
TARE: 40620 LBS  
NET: 65040 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	32.52

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67825  
DATE: 12/28/2000  
TIME: 10:46 - 10:46

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: CJB LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9019 12-7-00

P.O.:  
GROSS: 106200 LBS Manual  
TARE: 40940 LBS Manual  
NET: 65260 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	32.63

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67835  
DATE: 12/28/2000  
TIME: 11:02 - 11:02

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: CJB LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9012 12-7-00

P.O.:  
GROSS: 105060 LBS Manual  
TARE: 40940 LBS Manual  
NET: 64120 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	32.06

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67846  
DATE: 12/28/2000  
TIME: 11:18 - 11:18

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: CJB LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9005 12-7-00

P.O.:  
GROSS: 105760 LBS Manual  
TARE: 40940 LBS Manual  
NET: 64820 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	32.41

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67821  
DATE: 12/28/2000  
TIME: 10:43 - 10:43

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: CJB LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9024 12-7-00

P.O.:  
GROSS: 104300 LBS Manual  
TARE: 40940 LBS Manual  
NET: 63360 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	31.68

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67838 \*  
DATE: 12/28/2000  
TIME: 11:04 - 11:04

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: LLOYD67 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9002 12-7-00

P.O.:  
GROSS: 88800 LBS Manual  
TARE: 37980 LBS  
NET: 50820 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	25.41

*30 TON min*

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67840  
DATE: 12/28/2000  
TIME: 11:05 - 11:05

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: LLOYD67 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9008 12-7-00

P.O.:  
GROSS: 95420 LBS Manual  
TARE: 37980 LBS  
NET: 57440 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	28.72

30 TON  
min

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67847  
DATE: 12/28/2000  
TIME: 11:18 - 11:18

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: GLOBAL9 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9003 12-7-00

P.O.:  
GROSS: 90040 LBS Manual  
TARE: 39420 LBS  
NET: 50620 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	25.31

30 TON  
min

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67823  
DATE: 12/28/2000  
TIME: 10:45 - 10:45

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: LLOYD67  
ROUTE: NA / Non App  
COMMENT: hand ticket 9022 12-7-00

P.O.:  
GROSS: 98600 LBS Manual  
TARE: 37980 LBS  
NET: 60620 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	30.31

30.70  
Mm

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67833  
DATE: 12/28/2000  
TIME: 11:01 - 11:01

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: LLOYD67  
ROUTE: NA / Non App  
COMMENT: hand ticket 9015 12-7-00

P.O.:  
GROSS: 99260 LBS Manual  
TARE: 37980 LBS  
NET: 61280 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	30.64

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67811  
DATE: 12/28/2000  
TIME: 10:36 - 10:36

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: COKE1  
ROUTE: NA / Non App  
COMMENT: hand ticket 9036 12-8-00

P.O.:  
PROFILE #: 2000-1816  
GROSS: 105760 LBS Manual  
TARE: 40620 LBS  
NET: 65140 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	32.57

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67814  
DATE: 12/28/2000  
TIME: 10:39 - 10:39

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: FORLER25  
ROUTE: NA / Non App  
COMMENT: hand ticket 9034 12-8-00

P.O.:  
PROFILE #: 2000-1816  
GROSS: 111900 LBS Manual  
TARE: 38800 LBS  
NET: 73100 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	36.55

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67810  
DATE: 12/28/2000  
TIME: 10:36 - 10:36

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: FORLER25 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9037 12-8-00

P.O.:  
GROSS: 99840 LBS Manual  
TARE: 38800 LBS  
NET: 61040 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	30.52

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67819  
DATE: 12/28/2000  
TIME: 10:42 - 10:42

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: FORLER25 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9026 12-8-00

P.O.:  
GROSS: 100940 LBS Manual  
TARE: 38800 LBS  
NET: 62140 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	31.07

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67820  
DATE: 12/28/2000  
TIME: 10:43 - 10:43

CUSTOMER: 347 / Cokamar Trucking

P.O.:

GENERATOR: WMDICK / Wm Dickson Comp PROFILE #: 2000-181

GROSS: 106300 LBS Manual

COUNTY: PIE / Pierce

TARE: 40620 LBS

TRUCK: COKE1

LICENSE:

NET: 65680 LBS

ROUTE: NA / Non App

COMMENT: hand ticket 9025 12-8-00

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	32.84

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67816  
DATE: 12/28/2000  
TIME: 10:40 - 10:40

CUSTOMER: 347 / Cokamar Trucking

P.O.:

GENERATOR: WMDICK / Wm Dickson Comp PROFILE #: 2000-181

GROSS: 104280 LBS Manual

COUNTY: PIE / Pierce

TARE: 40620 LBS

TRUCK: COKE1

LICENSE:

NET: 63660 LBS

ROUTE: NA / Non App

COMMENT: hand ticket 9029 12-8-00

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	31.83

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67815  
DATE: 12/28/2000  
TIME: 10:40 - 10:40

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: POPE18  
ROUTE: NA / Non App  
COMMENT: hand ticket 9033 12-8-00

P.O.:  
PROFILE #: 2000-181  
GROSS: 83700 LBS Manual  
TARE: 38120 LBS Manual  
NET: 45580 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	22.79

*30 ton min*

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67851  
DATE: 12/28/2000  
TIME: 11:23 - 11:23

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: PAPE18  
ROUTE: NA / Non App  
COMMENT: hand ticket 9039 12-8-00

P.O.:  
PROFILE #: 2000-181  
GROSS: 84420 LBS Manual  
TARE: 38120 LBS Manual  
NET: 46300 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	23.15

*30 ton min*

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67817  
DATE: 12/28/2000  
TIME: 10:41 - 10:41

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: PAPE18 LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9027 12-8-00

P.O.:  
GROSS: 86100 LBS Manual  
TARE: 38120 LBS Manual  
NET: 47980 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	23.99

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67818  
DATE: 12/28/2000  
TIME: 10:41 - 10:41

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: CJB LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9028 12-8-00

P.O.:  
GROSS: 102900 LBS Manual  
TARE: 40940 LBS Manual  
NET: 61960 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	30.98

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67849  
DATE: 12/28/2000  
TIME: 11:21 - 11:21

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: CJB LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9038 12-8-00

P.O.:  
GROSS: 102360 LBS Manual  
TARE: 40940 LBS Manual  
NET: 61420 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	30.71

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_

Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67813  
DATE: 12/28/2000  
TIME: 10:38 - 10:38

CUSTOMER: 347 / Cokamar Trucking  
GENERATOR: WMDICK / Wm Dickson Comp  
COUNTY: PIE / Pierce  
TRUCK: CMB LICENSE:  
ROUTE: NA / Non App  
COMMENT: hand ticket 9035 12-8-00

P.O.:  
GROSS: 100200 LBS Manual  
TARE: 40940 LBS Manual  
NET: 59260 LBS

COMMODITY	UNIT	QNTY
CNTSL / Contaminated Soil	T	29.63

IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



Olympic View Sanitary Landfill  
10015 SE Barney White Road  
Port Orchard, WA 98367  
Phone (360) 674-2452

TICKET: 67850  
DATE: 12/28/2000  
TIME: 11:22 - 11:22

CUSTOMER: 347 / Cokamar Trucking

GENERATOR: WMDICK / Wm Dickson Comp PROFILE #: 2000-181 GROSS: 102780 LBS Manual

COUNTY: PIE / Pierce

TRUCK: CM1 LICENSE:

ROUTE: NA / Non App

COMMENT: hand ticket 9042 12-8-00

TARE: 40940 LBS

NET: 61840 LBS

COMMODITY	UNIT	QNTY
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CNTSL / Contaminated Soil	T	30.92
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IN OPERATOR: Carole S.

OUT OPERATOR: Carole S.

DRIVER: \_\_\_\_\_



APPENDIX I

Wm Dickson Import Fill Material Log Sheet



# WM. DICKSON CO.

GENERAL CONTRACTORS

Import  
Fill Material Log  
Sheet

## WALLER ROAD JOB CARD

38th & St.

Customer Dickson

Date Dec 8 & 11, 2001

Date	Ticket Truck #	Loads	A S P H	C O N C	D I R T	G L A S S	M U D	O T H E R	Yards	\$ Per Yard	Amount
										\$ 4.00	
12-8	M-1	11						X	176		
	M-7	7						X	140		
	FORLER #25	3						X	60		
	CJS #8	3						X	60		
	PAPER SOUS #18	2						X	32		
									468		
12-11	V&J #3	9						X	180		
	COKAMAR #4	1						X	20		
	#9	1						X	20		
	MS LLOYD #71	5						X	100		
	EARTHTEK E-1	7						X	168		
	V&J #10	6						X	120		
	LLOYD #102	3						X	66		
	ENTERPRISES								674		
									1142	total yards	

Invoice #



APPENDIX J

NAI Updated Letter Report to Wells Fargo (April 15, 1998)  
with Laboratory Reports and TPS Soil Recycling Certificate



April 15, 1998



Ms. Katie Blair  
Asset Manager  
Trust Real Estate & Specialty Assets  
Wells Fargo Bank  
MAC #6540-141  
P.O. Box 21927  
Seattle, WA 98111-3927

RE: R. Lyons Trust/Lyons Agency  
3733-3737 South G Street, Tacoma, WA  
Site Remediation Status & Request for Change Order

Dear Ms. Blair:

Nowicki & Associates, Inc. (NAI) and Wm Dickson Company were at the above referenced site on April 14<sup>th</sup>, 1998 to perform the site soil remediation by over-excavation.

Headspace vapor analysis field screening was used to locate the area of soil impact. Clean soil at the top approximate 3' was separated and stockpiled south of the excavated pit. Excavation of the impacted soil began at the center of the former fuel island and then expanded laterally based on field screening results. The top approximately 5' of soil have some silty clay content, which previously assumed to minimize product mobilization. However, soil below 5' below ground surface (bgs) was found to be mostly silty sand with interlayers of dense compacted silt. The presence of the more permeable silt layer has created a less resistant pathway for product migration. Also, the age of product release at the site is suspected to contribute to the greater extents of product transport.

Nine truckloads or approximately 300 tons of petroleum impacted soil were excavated from the former fuel island area and brought to TPS Technologies in Tacoma for disposal treatment. Five soil samples were collected from the excavated pit for laboratory analysis for gasoline total petroleum hydrocarbon (TPH) and BTEX (benzene, toluene, ethylbenzene, and xylenes). Laboratory results indicated weathered gasoline and intermediate petroleum distillates (IPD) in the gasoline TPH range, which resemble mineral spirits or chemical solvents typically used at old gas service stations. The sample from the base of the excavated pit at 10 bgs was found to have the highest IPD concentration of 2,100 ppm. The east and north wall samples also have IPD levels above that MTCA Method A of 100 ppm. The west and south wall samples were below the Method A clean-up level. The current excavated pit dimensions are approximately 23' x 28' x 10' (bgs).

Since the tonnage allowance for the removal of impacted soil on our original contract has been reached, a change order is needed to complete the site remediation. At the present, the extents of soil impact on the north and the east excavation sidewalls and also vertically are to be further characterized. After the fuel dispenser island area has been excavated to MTCA A level, then we will move to the former excavated tank pit.

33516 9th Avenue South  
Building #6  
Federal Way, Washington 98003  
Phone: (253) 927-5233  
FAX: (253) 924-0323



Ms. Katie Blair  
April 15, 1998

Page 2

Since the volume of impacted soil to be removed is undetermined at this point, the work associated with the change order should be based as listed below, which are consistent with the terms in the original contract:

For Wm Dickson Company:

Unit price for excavation, disposal, backfill, & compaction	\$63.30/ton
---	-------------

For Nowicki & Associates:

On-site time	\$75/hr
Project Administration and Engineering	\$70/hr
Laboratory Analysis by NWTPHGx/BTEX	\$100/ea

As an estimate, NAI's on-site time and project engineering/administration time will be doubled from the original contract figures.

We are on stand-by and will resume the site remediation upon your authorization. Please call me at (253) 917-5233 if you have any questions.

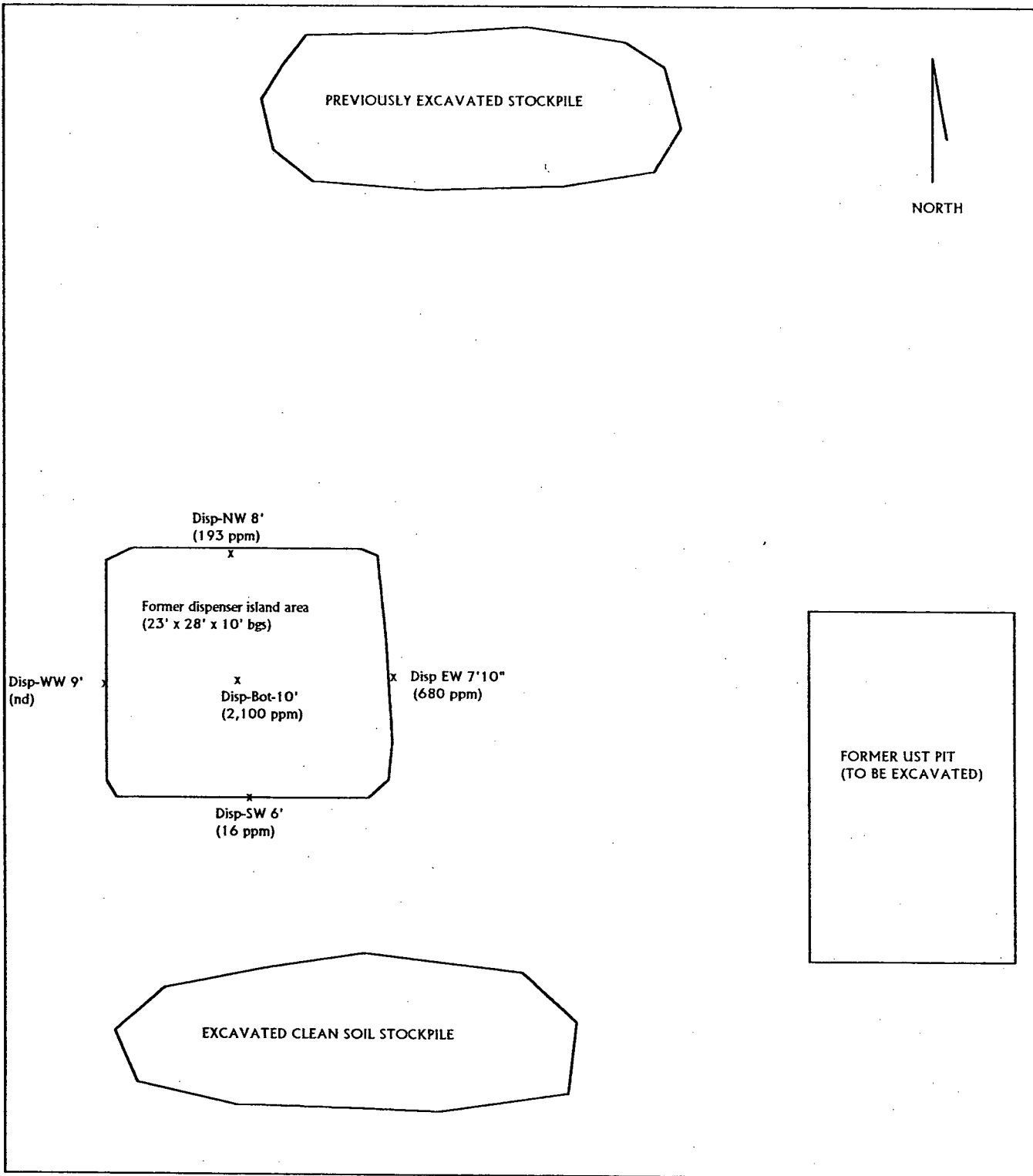
Sincerely,



Michael Lam  
Project Engineer  
Registered Site Assessor

Enclosures: TEG Faxed Copy of Lab Results  
Sample location Figure





Note:  
 bgs ... below ground surface  
 x Bot-10' ... Soil sample location with sample ID  
 ( 900 ppm) ... Gasoline range intermediate petroleum distillates

LYONS TRUST - 3733-3737 SOUTH G, TACOMA, WA	
FIGURE 1. SOIL SAMPLE LOCATIONS	1" = 15'
NOWICKI & ASSOCIATES, INC.	4-15-98



# TRANSGLOBAL ENVIRONMENTAL GEOSCIENCES NORTHWEST, INC.

7110 38th Drive SE  
Lacey, Washington 98503

Mobile Environmental Laboratories  
Environmental Sampling Services

Telephone: 360-459-4670  
Fax: 360-459-3432

April 20, 1998

Arlene Van DeWege  
Nowicki and Associates  
33516 9th Ave South  
Bldg. #6  
Federal Way, WA 98003

Dear Ms. Van DeWege:

Please find enclosed the analytical data report for the Lyons Trust Project in Tacoma, Washington. Soil samples were analyzed for Intermediate Petroleum Distillates (IPD), Gasoline by NWTPH-Gx, BTEX by EPA Method 8020 and Total Lead on April 14 and 17, 1998.

The results of these analyses are summarized in the attached tables. All soil values are reported on a dry weight basis. Applicable detection limits and QA/QC data are included. An invoice for this analytical work is also enclosed.

TEG Northwest appreciates the opportunity to have provided analytical services to Nowicki and Associates for this project. If you have any further questions about the data report, please give me a call. It was a pleasure working with you on this project, and we are looking forward to the next opportunity to work together.

Sincerely,



Michael A. Korosec  
President



## **QA/QC FOR ANALYTICAL METHODS**

### **GENERAL**

The TEG Northwest Laboratory quality assurance and quality control (QA/QC) procedures are conducted following the guidelines and objectives which meet or exceed certification/-accreditation requirements of California DOHS, Washington DOE, and Oregon DEQ. The Quality Control Program is a consistent set of procedures which assures data quality through the use of appropriate blanks, replicate analyses, surrogate spikes, and matrix spikes, and with the use of reference standards that meet or exceed EPA standards.

When analyses are taking place on-site with the mobile lab, the need for Field Blanks or Travel/Trip Blanks is eliminated. If there is going to be a delay before sample preparation for analysis, the sample is stored at 4° C.

### **ANALYTICAL METHODS**

TEG Northwest Labs use analytical methodologies which are in conformity with U. S. Environmental Protection Agency (EPA), Washington DOE, and Oregon DEQ methodologies. When necessary and appropriate due to the nature or composition of the sample, TEG may use variations of the methods which are consistent with recognized standards or variations used by the industry and government laboratories.

#### **TPH-Gasoline, TPH-Diesel**

**(Gasoline and/or Diesel, Modified EPA 8015, NWTPH-Gx and NWTPH-Dx)**

A check standard is run at the beginning of the day. 1) A close standard is run at the end of the day. 2) Both open and close standards must be within 15% of the continuing calibration curve value. All samples are prepared with a surrogate spike, and the recovery must be between 65% and 135% unless high sample concentrations interfere with the determination of the recovery percentage. A duplicate sample is run at a rate of 1 per 10 samples. At least 1 method blank is run per 20 samples analyzed.



**Purgeable Volatile Aromatics**  
**(BTEX, EPA 602/8020)**

A check standard is run at the beginning of the day. The check standard is run at the end of the day. Both open and close standards must be within 15% of the continuing calibration curve value. All samples are prepared with a surrogate spike, and the recovery must be between 65% and 135% unless high sample concentrations interfere with the determination of the recovery percentage. At least 1 method blank is run per day.



TRANSGLOBAL ENVIRONMENTAL GEOSCIENCES NORTHWEST INC.

LYONS TRUST PROJECT

Tacoma, Washington

Nowicki & Associates, Inc.

Intermediate Petroleum Distillates (IPD), Gasoline (NWTPH-Gx) & BTEX (EPA 8020) Analyses for Soils

Sample Number	Date Analyzed	Benzene mg/kg	Toluene mg/kg	Eth Benz mg/kg	Xylene mg/kg	Gasoline mg/kg	IPD mg/kg	Recovery (%)
Meth. Blank	04/14/98	nd	nd	nd	nd	nd	nd	80
Disp-Bot 10'	04/14/98	nd	nd	nd	11.7	nd	2100	94
Disp-NW 8'	04/14/98	nd	nd	nd	1.16	nd	193	85
Disp-NW 8' Dup	04/14/98	--	--	--	--	nd	162	110
Disp-SW 6'	04/14/98	nd	nd	nd	nd	nd	16	106
Disp-EW 7'10"	04/14/98	nd	nd	nd	1.14	nd	680	int
Disp-WW 9'	04/14/98	nd	nd	nd	nd	nd	nd	109
Disp-EX 1	04/14/98	nd	nd	nd	2.73	nd	450	int
Detection Limits		0.05	0.05	0.05	0.05	10	10	

"nd" Indicates not detected at the listed detection limits.

"int" Indicates that interferences prevent determination.



TRANSGLOBAL ENVIRONMENTAL GEOSCIENCES NORTHWEST INC.

LYONS TRUST PROJECT

Tacoma, Washington

Nowicki & Associates, Inc.

Heavy Metals in Soil by EPA-7000 Series

=====		
EPA-Method #		7420
Sample	Date	Pb
Number		mg/kg
=====		
Meth. Blank	04/17/98	nd
Disp-Bot-10'	04/17/98	nd
Method Detection Limit		5

-----  
"nd" Indicates not detected at the listed detection limit.

=====



CLIENT: Nowicki & Assoc  
ADDRESS: 33516 7th Ave S, #6 Fed Way WA 98003  
PHONE 253-727-5233 FAX: 253-724-0323  
CLIENT PROJECT #: \_\_\_\_\_ PROJECT MANAGER: Michael Loran

DATE: 4/14/78 PAGE 1 OF 1  
PROJECT NAME: Lyons Trust  
LOCATION: Tetonia, WA  
COLLECTOR: ML DATE OF COLLECTION 4/14/78

[illegible]

RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)	DATE/TIME
-----------------------------	-----------	-------------------------	-----------

Relinquished By (Signature)	Date/Time	Received By (Signature)	Date/Time
<i>[Signature]</i>	4-14-98 4 <sup>45</sup> PM	<i>[Signature]</i>	4-14-98 4:00 PM

RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)	DATE/TIME
-----------------------------	-----------	-------------------------	-----------

## **SAMPLE DISPOSAL INSTRUCTIONS**

☐ TEG DISPOSAL @ \$2.00 each      ☐ Return      ☐ Pickup

## SAMPLE RECEIPT

TOTAL NUMBER OF CONTAINERS

CHAIN OF CUSTODY SEALS Y/N/NA

SEALS INTACT? Y/N/NA

RECEIVED GOOD COND./COLD

NOTES:

LABORATORY NOTES:







**SPECTRA Laboratories, Inc.**

2221 Ross Way • Tacoma, WA 98421 • (253) 272-4850

April 13, 1998

Nowicki & Associates  
33516 9th Ave. S., Bldg. 6  
Federal Way, WA 98003

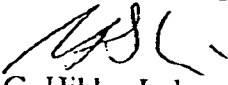
Attn: Michael Lam

Project: Lyon's Trust  
Sample Matrix: Soil  
Date Sampled: 4-13-98  
Date Received: 4-13-98  
Spectra Project: S804-072  
RUSH


<u>Spectra #</u>	<u>ID</u>	<u>Total Lead (Pb), mg/Kg</u>
1775	Disp-3'	16
Method Blank		<4.0

Total Lead testing performed by EPA Method 6010

SPECTRA LABORATORIES, INC.

  
Steven G. Hibbs, Laboratory Manager





# SPECTRA Laboratories, Inc.

2221 Ross Way • Tacoma, WA 98421 • (253) 272-4850

April 15, 1998

Nowicki & Associates  
33516 9th Ave. S., Bldg. 6  
Federal Way, WA 98003

Attn: Michael Lam

Sample ID: Disp-3'  
Project: Lyon's Trust  
Sample Matrix: Soil  
Date Sampled: 4-13-98  
Date Received: 4-13-98  
Spectra Project: S804-072  
Spectra #1775

BTEX, EPA Method 8260  
Dilution Factor: 50

Date Analyzed: 4-14-98  
Units: mg/Kg

	<u>CAS#</u>	
Benzene	71-43-2	<0.25
Toluene	108-88-3	<0.25
Ethylbenzene	100-41-4	<0.25
Total Xylenes	—	<0.25


WTPH-G, mg/Kg <20

Surrogate Percent Recoveries:

Toluene-d8	102%
4-Bromofluorobenzene	88%

CAS# = Chemical Abstract Services Registry Number

SPECTRA LABORATORIES, INC.

  
Steven G. Hibbs, Laboratory Manager

# Soil Recycling Certificate

TPS Technologies Inc. does hereby certify  
that 88.17 tons of non-hazardous -contaminated soil  
received from

R. Lyons Vacant Property  
William Dickson Company (Consultant)  
3733 - 3737 South G. St  
Tacoma, WA

Under Manifest/authorization number 03-01688  
have been properly recycled to approved regulatory standards  
by our Soil Recycling Facility in Tacoma, WA



Dated this 21st day of April, 1998

Sworn and Attested by:  
TPS Technologies Inc.

By: \_\_\_\_\_

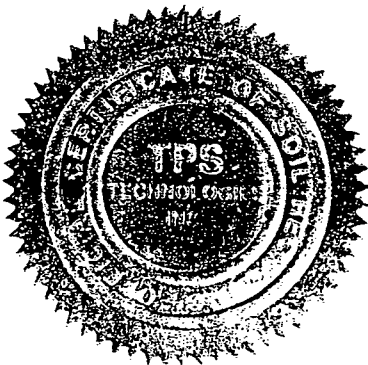


# Soil Recycling Certificate

TPS Technologies Inc. does hereby certify  
that 213.87 tons of petroleum - contaminated soil  
received from

R. Lyons Trust Vacant Property  
William Dickson Company - Consultant  
3733 - 3737 South G. Street  
Tacoma, Washington

Under Manifest/authorization number 03-01688  
have been properly recycled to approved regulatory standards  
at our Soil Recycling Facility in Tacoma, Washington



Dated this 21st day of April, 19 98

Sworn and Attested by:  
TPS Technologies Inc.

By: \_\_\_\_\_

Soil Master (c)

TPS Technologies, Inc.

## Customer Job Report

Gross &amp; Tare Weight Codes: M=Manual; S=Scale; T=Trk File

Job Number	Name	SiteAddress	SiteCity	State	ZipCode
A03 - 01688	R. LYONS TRUST VACANT	3733 - 3737 SOUTH "G" STREET	TACOMA	WA	00000

Load #	Date & Time Out	Transporter #	Truck & Trailer Number	Gross (lb)	Tare (lb)	Net (lb)	Net Wt (tons)
1	04/14/98 13:52	1001402	GEORGE	110,620M	37,760M	72,860	36.43
3	04/14/98 13:53	1001402	GEORGE	106,620M	37,760M	68,860	34.43
5	04/14/98 13:53	1001402	GEORGE	109,780M	37,760M	72,020	36.01
6	04/14/98 13:54	1001402	GEORGE	108,660M	37,760M	70,900	35.45
8	04/14/98 13:54	1001402	GEORGE	114,680M	37,760M	76,920	38.46
10	04/14/98 13:55	1001402	GEORGE	103,940M	37,760M	66,180	33.09
7	04/14/98 13:58	1001402	RANDY	81,280M	38,740M	42,540	21.27
9	04/14/98 13:58	1001402	RANDY	83,680M	38,660M	45,020	22.51
2	04/14/98 13:59	1001402	RANDY	85,380M	41,580M	43,800	21.90
4	04/14/98 13:59	1001402	RANDY	83,380M	38,400M	44,980	22.49

Completed Loads	Manifests Received	Completed Weight	Estimated Weight	TOTAL Net Wt:
50.00%	10	100.70%	300.00(tons)	392.04 (tons)



APPENDIX K

ALS Site Assessment Report Dated August 19, 1996 with Attachments



August 19, 1996

Ms. Joe Pigg  
Wells Fargo Bank  
1201 Pacific Avenue  
Tacoma, Washington 98402

RE: Underground Storage Tank Site Assessment Activities  
Wells Fargo Bank Property, 3733 - 3737 South G Street, Tacoma, Washington  
ALS Project No. 1-96-0004

Dear Ms. Pigg:

West Pac Environmental has contracted with ALS Consulting (ALS) to conduct an Underground Storage Tank (UST) Site Assessment at the above-referenced property. The purpose of the UST Site Assessment is to determine if a release of product had occurred from the on-site UST system. However, since evidence of a release from the on-site UST system was detected, completion of an UST Site Assessment report is not required. This short letter report summarizes activities completed to date and includes recommendations based on the project findings. The enclosed Figure 1 - Site Vicinity Map shows the site location.

According to information provided by Mr. Mark McCullough, Project Engineer with West Pac Environmental, the subject site was used as a gasoline service station prior to conversion to a restaurant.

On July 16, 1996, ALS visited the site to observe the site configuration during demolition of the above ground structures. Mr. Todd Goodner, Trackhoe Operator with W.R. Rhine, indicated the locations of the western fuel island, product piping and the USTs.

On July 19, 1996, ALS obtained copies of aerial photographs dated 1961, 1965, 1970, and 1985 from the University of Washington Library. These aerial photographs were reviewed for indications of the past on-site gasoline service station configuration. The reviewed aerial photographs showed the presence of two apparent on-site fuel islands - one south and one west of the former on-site station building. A copy of the 1961 aerial photograph is included as an enclosure.

On July 25, 1996, ALS observed the removal of four on-site gasoline USTs by West Pac Environmental. The four on-site USTs included two 1,000-gallon USTs and two 2,000-gallon USTs. These four USTs were removed from one excavation located in the southeast corner of the site. Standing water was observed approximately seven feet below surface grade (bsg) in the UST pit. Soil samples were collected from each of the four side walls and from under each of the four USTs. One soil sample was collected in the vicinity of each of the two pump islands. Two additional soil samples were collected along the product piping between the fuel islands and the UST excavation. One water sample was collected from the UST pit for laboratory analysis. All of the collected soil and water samples were sent under chain-of-custody to National Environmental Testing, Inc. (NET) for Washington Total Petroleum Hydrocarbon - Gasoline range (WTPH-G) and Benzene, Toluene, Ethylbenzene, and Xylenes (BTEX).



analysis using Washington approved methods. The locations, soil sampling techniques, and laboratory methods used followed the State of Washington Department of Ecology (Ecology) *Guidance for Site Checks and Site Assessments for Underground Storage Tanks, Revised October 1992*. Ms. Cynthia Ruggiero, Environmental Health Specialist II with the Tacoma-Pierce County Health Department, also approved of the on-site sampling plan. Refer to the enclosed Figure 2 for soil sample locations and analytical results.

Analytical results indicated that WTPH-G exceeded Washington Model Toxics Control Act (MTCA) Method A Cleanup Levels for soil of 100 parts per million (ppm) in four of the twelve submitted soil samples. These four samples: WI-4', WW-7', B-2-10.5' and B-4-10.5' had reported concentrations of WTPH-G of 2,500 ppm, 640 ppm, 140 ppm, and 700 ppm, respectively. These results indicate that a release of gasoline had impacted the on-site soils in the vicinity of the western fuel island and the UST pit. A copy of the laboratory analytical reports is included as an enclosure.

The one water sample collected from the UST pit had concentrations of WTPH-G and BTEX that exceeded MTCA Method A Cleanup Levels for groundwater.

On July 29, 1996, ALS reviewed two nearby LUST files at the Ecology Southwestern Regional Office to determine the nature of potential groundwater encountered during those investigations. One of these LUST sites involved the U.S. Post Office located directly south of the site. The Post Office LUST involved a heating oil UST and limited soil impacts. Perched water was encountered in the UST pit, but no groundwater was reported entering the pit during remedial excavation. Limited soil impacts were left under the on-site building.

The other LUST file reviewed involved the Texaco Service Station located at 3740 Pacific Avenue South, located approximately one-quarter mile east of the subject site. During the Texaco investigation, water was observed approximately 13 feet bsg in the UST excavation. Six on-site soil borings were later completed down to 30 feet bsg to determine the extent of the apparent groundwater impact. However, groundwater was not encountered in any of these borings situated away from the UST pit. It was reported that Pierce County Water Resources Department stated that, based on available records, the depth to groundwater in the vicinity of the Texaco site is approximately 80 to 100 feet bsg. Therefore, based on the review of the two nearby LUST investigations it appears likely that the water observed in the subject site UST pit does not represent a perched groundwater table, but is more likely representative of water that collected in the UST pit.

On August 2, 1996, ALS returned to the site to obtain additional samples from the waste oil UST excavation. According to Mr. McCullough, a Ground Penetrating Radar (GPR) survey conducted on the site, with a six to eight foot grid pattern, indicated the presence of an UST along the eastern site boundary. However, upon excavation with a backhoe, it was discovered that what was thought to be a waste oil UST was only a large boulder. West Pac Environmental then excavated a trench to remove the remaining product piping and to expose the subsurface soils in the vicinity of the piping. Olfactory or visual evidence of petroleum impacted soils along this excavated trench was not observed except as it neared the western fuel island. Since soil sample WI-4' (collected approximately four feet bsg in the vicinity of the pump island) had elevated WTPH-G concentrations, a second sample was collected eight feet bsg in the same vicinity and submitted to the laboratory. Since the on-site soil stockpile was approximately 27 cubic yards, three discreet soil samples were collected from the stockpile. A volatile

Ms. Joe Pigg  
Wells Fargo Bank  
August 19, 1996  
Page 3

analysis on the soil sample collected from under UST#2 was also run since this UST had elevated hydrogen sulfide readings during decommissioning, and the nextdoor neighbor thought that paint thinner may have been stored in that UST.

The laboratory analytical data indicated that soil sample WI-8' (collected eight feet bsg in the vicinity of the western fuel island) had a WTPH-G concentration of 140 ppm, which was significantly less than the 2,500 ppm concentration measured at four feet bsg. Therefore, it appears likely that WTPH-G impacts above the MTCA Method A Cleanup level of 100 ppm for soil do not extend much deeper than eight feet bsg in this portion of the subject site. The analytical data also indicated concentrations of 23 ppm, <5.7 ppm, and 100 ppm of WTPH-G in the stockpiled soils. The EPA method 8240 volatile analysis conducted on sample B-2-10.5' (collected from under UST#2) did not reveal detectable volatile constituents beyond BTEX components. Therefore, evidence was not apparent indicating other volatile components beyond TPH impacted soils in the vicinity of the UST excavation.

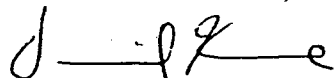
On August 7, 1996, in accordance with WAC 173-360 regulations, ALS reported to the Ecology Southwestern Regional Office that a release from the former on-site UST system was detected in the on-site soils. ALS also indicated the presence of water in the UST pit and the similar nature of water encountered at two nearby LUST sites. ALS suggested that the observed water was not likely representative of a groundwater table; Ecology agreed. Since this site has been reported to Ecology as a Leaking Underground Storage Tank (LUST) site, a Site Characterization Report or an Independent Remedial Action Report will be due to Ecology within 90 days. A copy of all reports should also be sent to the Tacoma-Pierce County Health Department.

Based on the apparent limited extent of on-site soil impacts, ALS recommends that the on-site soils above the MTCA Method A Cleanup Level of 100 ppm for WTPH-G be excavated and removed from the site. If water is encountered in the UST excavation, as is expected, the water should be pumped from the excavation and be properly disposed. If water does not return to the UST excavation within 24-hours of its removal, then groundwater will not be an issue at the site. If remediation of the site is expected to be completed within 90 days, then ALS recommends submitting the Site Characterization Report as part of the Independent Remedial Action Report.

It has been a pleasure working with you on this project. If you have any questions or could use further assistance, please do not hesitate to contact us at (206)526-9602.

Sincerely,

ALS CONSULTING, LLC



Daniel F. Krause  
Project Manager



Cynthia J. Krause, Ph.D.  
Senior Reviewer

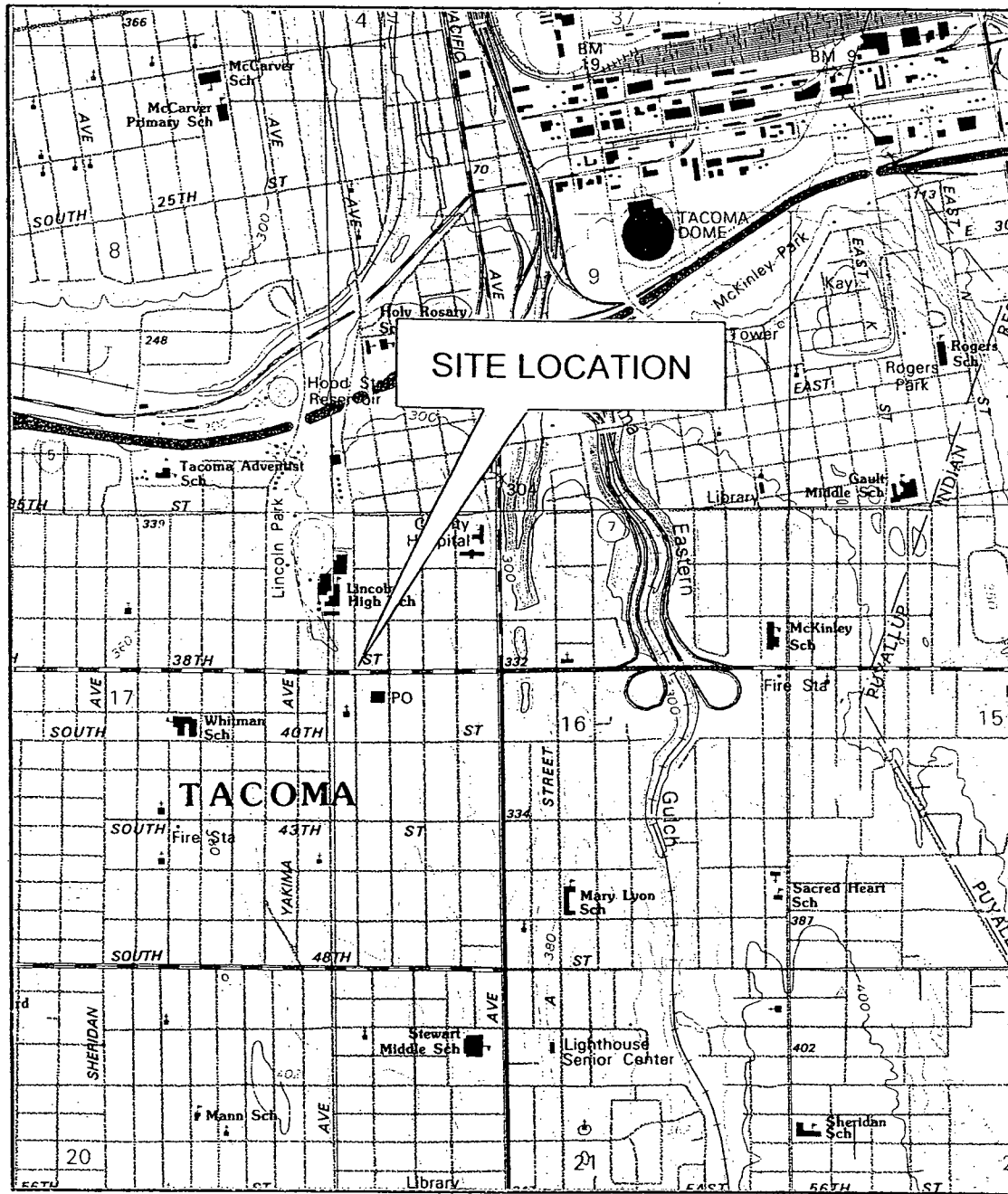
enclosures

cc: Mr. Mark McCullough, West Pac Environmental  
Mr. Michael Lam, Nowicki & Associates

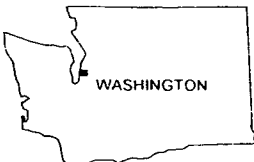


R. 3 E.

T. 20 N.



SCALE 1 : 24,000



1/2 0 1 MILE

SOURCE: USGS 7.5 MINUTE TOPOGRAPHIC SURVEY MAP OF SOUTH BEND, WASHINGTON QUADRANGLE. PHOTOREVISED 1984



PROJECT NO.: 1-96-0004

DESIGNED BY: DFK

SCALE: 1 : 24,000

DRAWN BY: DFK

CHECKED BY:

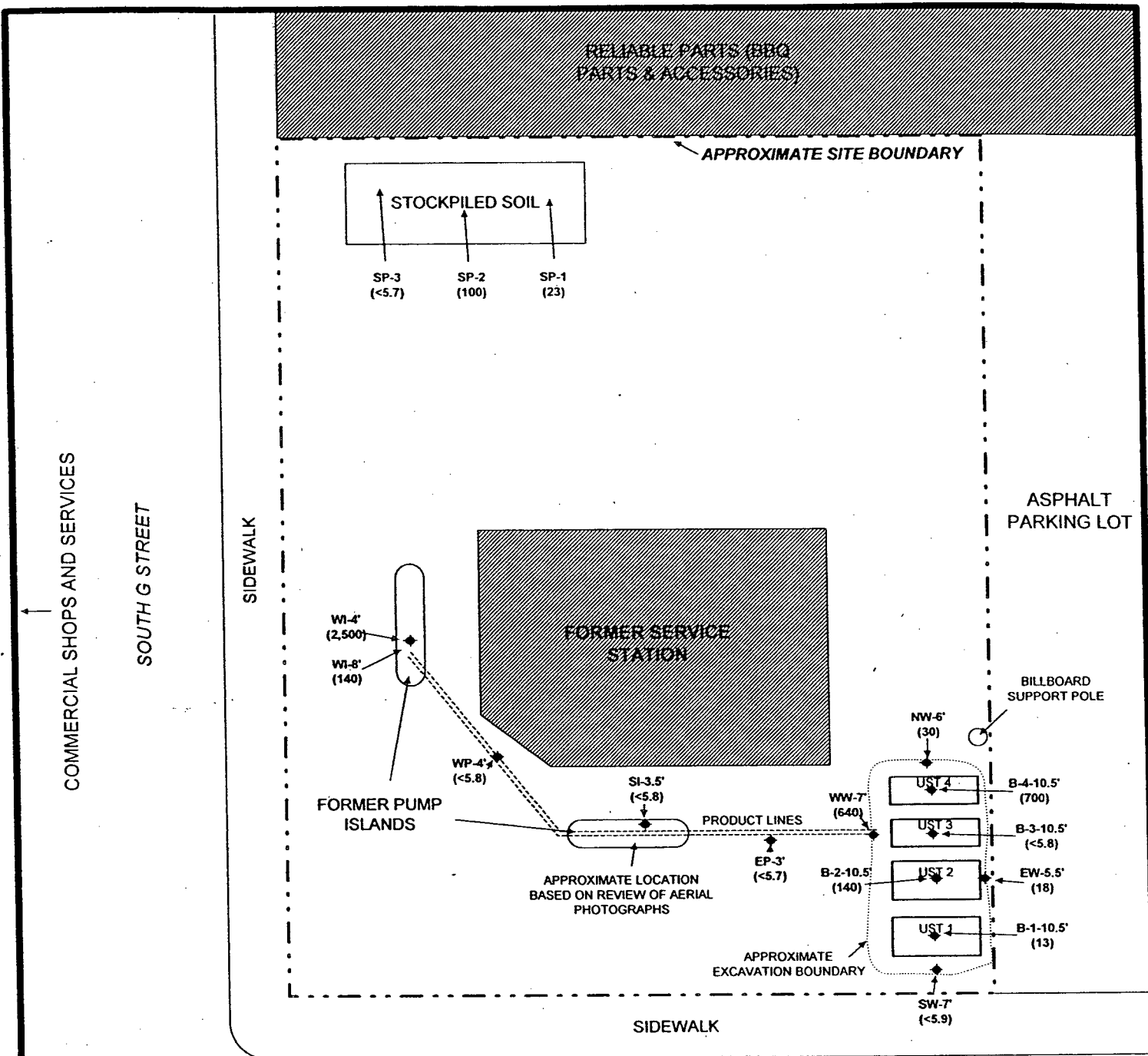
DATE: 07/22/96

FIGURE 1

A3

## SITE VICINITY MAP

UST SITE ASSESSMENT  
FIRST INTERSTATE BANK PROPERTY  
NE CORNER OF SO. 38th ST AND SO. G ST  
TACOMA, WASHINGTON 98408



**LEGEND:**

- SI-3.5' ♦ = APPROXIMATE LOCATION OF SOIL SAMPLE  
 BGW ⊕ = APPROXIMATE LOCATION OF EXCAVATION WATER SAMPLE  
 (640) = TOTAL PETROLEUM HYDROCARBONS (WTPH-G) mg/kg (~ppm)

SOUTH 38TH STREET

US POST OFFICE

FLYING BOOTS CAFE

PROJECT NO.: 1-96-0004

DESIGNED BY: DFK

SCALE: 1" ~ 15'

DRAWN BY: DFK

CHECKED BY:

DATE: 08/12/96

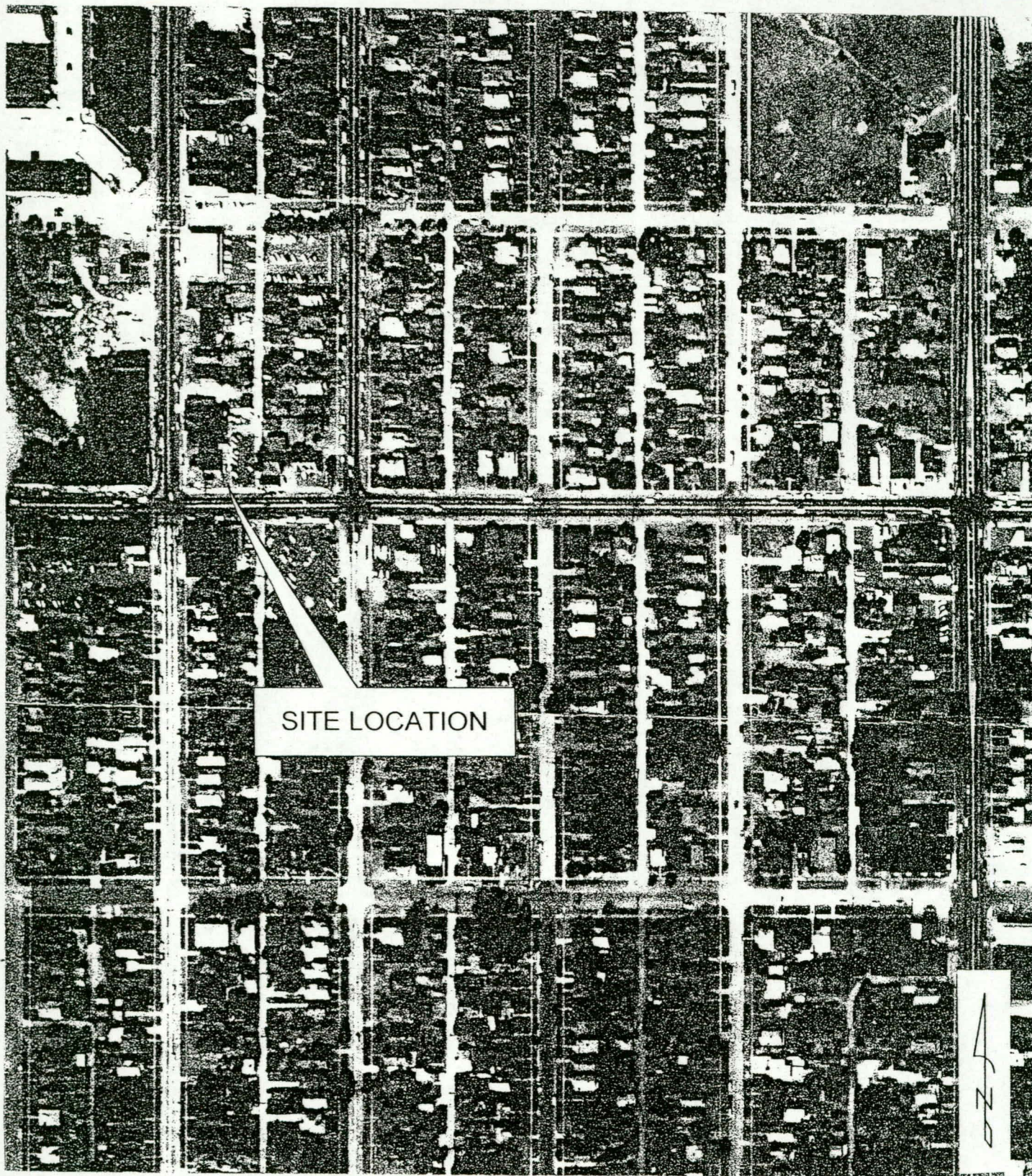
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**FIGURE 2**

**SOIL ANALYTICAL RESULTS**

UST SITE ASSESSMENT  
 WELLS FARGO BANK PROPERTY  
 3733 - 3737 SOUTH G STREET  
 TACOMA, WASHINGTON 98408





SITE LOCATION

PROJECT NO.: 1-96-0004

DESIGNED BY: DFK

SCALE:

DRAWN BY: DFK

CHECKED BY:

DATE: 08/21/96

AS  
L3

## AERIAL PHOTOGRAPH - 1961

UST SITE ASSESSMENT  
WELLS FARGO BANK PROPERTY  
3733 - 3737 SOUTH G STREET  
TACOMA, WASHINGTON 98408





NATIONAL  
ENVIRONMENTAL  
TESTING, INC.

Portland Division  
17400 SW Upper Boones Ferry Rd.  
Suite #260  
Portland, OR 97224  
Tel: (503) 624-5449  
Fax: (503) 639-6889

Mr. Dan Krause  
ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996  
NET Account No.: 390  
NET Job Number: 96.02228

Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Sample analysis in support of the project referenced above has been completed and results are presented on the following pages. Should you have questions regarding procedures or results, please feel welcome to contact Client Services.

Sample Number	Sample Description	Matrix Type	Date Taken	Date Received
67051	SW-7'	SOIL	07/25/1996	07/26/1996
67052	B-1-10.5'	SOIL	07/25/1996	07/26/1996
67053	BGW	Water	07/25/1996	07/26/1996
67054	EW-5.5'	SOIL	07/25/1996	07/26/1996
67055	B-2-10.5'	SOIL	07/25/1996	07/26/1996
67056	B-3-10.5'	SOIL	07/25/1996	07/26/1996
67057	WW-7'	SOIL	07/25/1996	07/26/1996
67058	NW-6'	SOIL	07/25/1996	07/26/1996
67059	B-4-10.5'	SOIL	07/25/1996	07/26/1996
67060	SI-3.5'	SOIL	07/25/1996	07/26/1996
67061	WI-4'	SOIL	07/25/1996	07/26/1996
67062	WP-4'	SOIL	07/25/1996	07/26/1996
67063	EP-3'	SOIL	07/25/1996	07/26/1996

Approved by:

Marty French  
NET, INC. Division Manager



# ANALYTICAL REPORT

Mr. Dan Krause  
ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

08/07/1996  
Job No.: 96.02228

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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

Sample Number 67051  
Sample Description SW-7'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	85	0.01	%	07/31/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	
Benzene	8020	ND	0.4	mg/kg d	08/01/1996	
Toluene	8020	ND	0.4	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.4	mg/kg d	08/01/1996	
Xylenes, total	8020	ND	0.4	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	ND	5.9	mg/kg d	08/01/1996	

Sample Number 67052  
Sample Description B-1-10.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	83	0.01	%	07/31/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	
Benzene	8020	ND	0.4	mg/kg d	08/01/1996	
Toluene	8020	ND	0.4	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.4	mg/kg d	08/01/1996	
Xylenes, total	8020	ND	0.4	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	13.	6.0	mg/kg d	08/01/1996	

Sample Number 67053  
Sample Description BGW

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
BTEX/WTPH-Gasoline (W)						
Dilution Factor		100			07/30/1996	
Benzene	8020	71	50	ug/L	07/30/1996	
Toluene	8020	300	50	ug/L	07/30/1996	
Ethyl Benzene	8020	580	50	ug/L	07/30/1996	
Xylenes, total	8020	1200	50	ug/L	07/30/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.

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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

Sample Number      Sample Description  
67053                      BGW

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
WTPH-Gasoline	WTPH-G	25,000	5,000	ug/L	07/30/1996	

Sample Number      Sample Description  
67054                      EW-5.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	87	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	
Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Toluene	8020	ND	0.3	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Xylenes, total	8020	ND	0.3	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	18.	5.7	mg/kg d	08/01/1996	D

Sample Number      Sample Description  
67055                      B-2-10.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	85	0.01	%	07/30/1996	
8240 VOLATILES (S)						
Acetone	8240	ND	5.	mg/kg d	08/05/1996	
Benzene	8240	ND	1.	mg/kg d	08/05/1996	
Bromodichloromethane	8240	ND	1.	mg/kg d	08/05/1996	
Bromoform	8240	ND	1.	mg/kg d	08/05/1996	
Bromomethane	8240	ND	1.	mg/kg d	08/05/1996	
2-Butanone	8240	ND	5.	mg/kg d	08/05/1996	
Carbon Disulfide	8240	ND	1.	mg/kg d	08/05/1996	
Carbon Tetrachloride	8240	ND	1.	mg/kg d	08/05/1996	
Chlorobenzene	8240	ND	1.	mg/kg d	08/05/1996	
Chloroethane	8240	ND	1.	mg/kg d	08/05/1996	
2-Chloroethylvinyl ether	8240	ND	5.	mg/kg d	08/05/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.



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Seattle, WA 98103

08/07/1996  
Job No.: 96.02228

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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

Sample Number      Sample Description  
67055                B-2-10.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Chloroform	8240	ND	1.	mg/kg d	08/05/1996	
Chloromethane	8240	ND	1.	mg/kg d	08/05/1996	
Dibromochloromethane	8240	ND	1.	mg/kg d	08/05/1996	
1,4-Dichlorobenzene	8240	ND	1.	mg/kg d	08/05/1996	
1,2-Dichlorobenzene	8240	ND	1.	mg/kg d	08/05/1996	
1,3-Dichlorobenzene	8240	ND	1.	mg/kg d	08/05/1996	
1,1-Dichloroethane	8240	ND	1.	mg/kg d	08/05/1996	
1,2-Dichloroethane	8240	ND	1.	mg/kg d	08/05/1996	
1,1-Dichloroethene	8240	ND	1.	mg/kg d	08/05/1996	
cis-1,2-Dichloroethene	8240	ND	1.	mg/kg d	08/05/1996	
trans-1,2-Dichloroethene	8240	ND	1.	mg/kg d	08/05/1996	
1,2-Dichloropropane	8240	ND	1.	mg/kg d	08/05/1996	
cis-1,3-Dichloropropene	8240	ND	1.	mg/kg d	08/05/1996	
trans-1,3-Dichloropropene	8240	ND	1.	mg/kg d	08/05/1996	
Ethylbenzene	8240	0.53	1.	mg/kg d	08/05/1996	J
2-Hexanone	8240	ND	1.	mg/kg d	08/05/1996	
Methylene Chloride	8240	ND	12.	mg/kg d	08/05/1996	
4-Methyl-2-Pentanone	8240	ND	1.	mg/kg d	08/05/1996	
Styrene	8240	ND	1.	mg/kg d	08/05/1996	
1,1,2,2-Tetrachloroethane	8240	ND	1.	mg/kg d	08/05/1996	
Tetrachloroethene	8240	ND	1.	mg/kg d	08/05/1996	
Toluene	8240	ND	1.	mg/kg d	08/05/1996	
1,1,1-Trichloroethane	8240	ND	1.	mg/kg d	08/05/1996	
1,1,2-Trichloroethane	8240	ND	1.	mg/kg d	08/05/1996	
Trichloroethene	8240	ND	1.	mg/kg d	08/05/1996	
Trichlorofluoromethane	8240	ND	1.	mg/kg d	08/05/1996	
Vinyl Acetate	8240	ND	1.	mg/kg d	08/05/1996	
Vinyl Chloride	8240	ND	2.	mg/kg d	08/05/1996	
m,p-xylene	8240	0.96	1.	mg/kg d	08/05/1996	J
o-xylene	8240	ND	1.	mg/kg d	08/05/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.

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08/07/1996  
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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

Sample Number      Sample Description  
67055                B-2-10.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Benzene	8020	ND	0.4	mg/kg d	08/01/1996	
Toluene	8020	1.3	0.4	mg/kg d	08/01/1996	
Ethyl Benzene	8020	1.	0.4	mg/kg d	08/01/1996	
Xylenes, total	8020	3.6	0.4	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	140	5.9	mg/kg d	08/01/1996	

Sample Number      Sample Description  
67056                B-3-10.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	86	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	
Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Toluene	8020	ND	0.3	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Xylenes, total	8020	ND	0.3	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	ND	5.8	mg/kg d	08/01/1996	

Sample Number      Sample Description  
67057                WW-7'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	89	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		10			08/01/1996	
Benzene	8020	ND	3.	mg/kg d	08/01/1996	
Toluene	8020	3.6	3.	mg/kg d	08/01/1996	
Ethyl Benzene	8020	3.6	3.	mg/kg d	08/01/1996	
Xylenes, total	8020	16.	3.	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	640	56.	mg/kg d	08/01/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.



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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

Sample Number 67058  
Sample Description NW-6'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	86	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	
Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Toluene	8020	ND	0.3	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Xylenes, total	8020	0.3	0.3	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	30.	5.8	mg/kg d	08/01/1996	

Sample Number 67059  
Sample Description B-4-10.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	85	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		10			08/01/1996	
Benzene	8020	ND	4.	mg/kg d	08/01/1996	
Toluene	8020	4.4	4.	mg/kg d	08/01/1996	
Ethyl Benzene	8020	8.1	4.	mg/kg d	08/01/1996	
Xylenes, total	8020	22.	4.	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	700	59.	mg/kg d	08/01/1996	

Sample Number 67060  
Sample Description SI-3.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	86	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	
Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Toluene	8020	ND	0.3	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/01/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.

## ANALYTICAL REPORT

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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

Sample Number      Sample Description  
67060                SI-3.5'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Xylenes, total	8020	ND	0.3	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	ND	5.8	mg/kg d	08/01/1996	

Sample Number      Sample Description  
67061                WI-4'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	87	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		10			08/01/1996	
Benzene	8020	ND	3.	mg/kg d	08/01/1996	
Toluene	8020	ND	3.	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	3.	mg/kg d	08/01/1996	
Xylenes, total	8020	ND	3.	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	2,500	57.	mg/kg d	08/01/1996	

Sample Number      Sample Description  
67062                WP-4'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	86	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/01/1996	
Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Toluene	8020	ND	0.3	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Xylenes, total	8020	ND	0.3	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	ND	5.8	mg/kg d	08/01/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.



## ANALYTICAL REPORT

Mr. Dan Krause  
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Seattle, WA 98103

08/07/1996  
Job No.: 96.02228

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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

Sample Number      Sample Description  
67063                EP-3'

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	87	0.01	%	07/30/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor	r	1			08/01/1996	
Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Toluene	8020	ND	0.3	mg/kg d	08/01/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/01/1996	
Xylenes, total	8020	ND	0.3	mg/kg d	08/01/1996	
WA TPH-Gas	TPH-G	ND	5.7	mg/kg d	08/01/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.

## SURROGATE REPORT

Mr. Dan Krause  
ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

08/07/1996  
Job No.: 96.02228

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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

<u>SURROGATES</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
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Sample Number	Sample Description
67051	SW-7'

aaa-TFT (BTEX Surr.)	8020	76	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	76	%	08/01/1996
BFB (Gas Surr.)	TPH-G	112	%	08/01/1996

Sample Number	Sample Description
67052	B-1-10.5'

aaa-TFT (BTEX Surr.)	8020	92	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	104	%	08/01/1996
BFB (Gas Surr.)	TPH-G	112	%	08/01/1996

Sample Number	Sample Description
67053	BGW

aaa-TFT (BTEX-Surr.)	8020	109	%	07/30/1996
aaa-TFT (Gas Surr.)	WTPH-G	115	%	07/30/1996

Sample Number	Sample Description
67054	EW-5.5'

aaa-TFT (BTEX Surr.)	8020	89	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	84	%	08/01/1996
BFB (Gas Surr.)	TPH-G	88	%	08/01/1996

Sample Number	Sample Description
67055	B-2-10.5'

1,2-Dichloroethane-d4 (Surr.)	8240	120	%	08/05/1996
Toluene-d8 (Surr.)	8240	120	%	08/05/1996
Bromofluorobenzene (Surr.)	8240	110	%	08/05/1996
aaa-TFT (BTEX Surr.)	8020	MI	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	102	%	08/01/1996

Note: Recovery limits for 8240, 8260, 8270, 624, 625 specified in method.  
Gasoline, Diesel, HCID limits 50-150%. 8010/8020 limits 70-130%.



# SURROGATE REPORT

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08/07/1996  
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Date Received: 07/26/1996

<u>SURROGATES</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
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Sample Number	Sample Description
67055	B-2-10.5'

BFB (Gas Surr.)	TPH-G	MI	%	08/01/1996
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Sample Number	Sample Description
67056	B-3-10.5'

aaa-TFT (BTEX Surr.)	8020	84	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	72	%	08/01/1996
BFB (Gas Surr.)	TPH-G	103	%	08/01/1996

Sample Number	Sample Description
67057	WW-7'

aaa-TFT (BTEX Surr.)	8020	140	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	MI	%	08/01/1996
BFB (Gas Surr.)	TPH-G	103	%	08/01/1996

Sample Number	Sample Description
67058	NW-6'

aaa-TFT (BTEX Surr.)	8020	84	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	128	%	08/01/1996
BFB (Gas Surr.)	TPH-G	128	%	08/01/1996

Sample Number	Sample Description
67059	B-4-10.5'

aaa-TFT (BTEX Surr.)	8020	MI	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	MI	%	08/01/1996
BFB (Gas Surr.)	TPH-G	MI	%	08/01/1996

Sample Number	Sample Description
67060	SI-3.5'

Note: Recovery limits for 8240, 8260, 8270, 624, 625 specified in method.  
Gasoline, Diesel, HCID limits 50-150%. 8010/8020 limits 70-130%.

## SURROGATE REPORT

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08/07/1996  
Job No.: 96.02228

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Project Name: West Pac, Tacoma, WA  
Date Received: 07/26/1996

SURROGATES                      METHODS    RESULTS                      DATE ANALYZED    FLAG

Sample Number              Sample Description  
67060                      SI-3.5'

aaa-TFT (BTEX Surr.)	8020	80	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	79	%	08/01/1996
BFB (Gas Surr.)	TPH-G	88	%	08/01/1996

Sample Number              Sample Description  
67061                      WI-4'

aaa-TFT (BTEX Surr.)	8020	88	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	MI	%	08/01/1996
BFB (Gas Surr.)	TPH-G	MI	%	08/01/1996

Sample Number              Sample Description  
67062                      WP-4'

aaa-TFT (BTEX Surr.)	8020	96	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	91	%	08/01/1996
BFB (Gas Surr.)	TPH-G	120	%	08/01/1996

Sample Number              Sample Description  
67063                      EP-3'

aaa-TFT (BTEX Surr.)	8020	96	%	08/01/1996
aaa-TFT (Gas Surr.)	TPH-G	91	%	08/01/1996
BFB (Gas Surr.)	TPH-G	120	%	08/01/1996



# QUALITY CONTROL REPORT CONTINUING CALIBRATION VERIFICATION

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA

Analyte	CCV		Percent Recovery	Date Analyzed
	True Concentration	Concentration Found		
8240 VOLATILES (S)				
1,1-Dichloroethene	50	46	92.0	07/31/1996
Benzene	50	50	100.0	07/31/1996
Chlorobenzene	50	48	96.0	07/31/1996
Toluene	50	50	100.0	07/31/1996
Trichloroethene	50	49	98.0	07/31/1996
8240 VOLATILES (S)				
1,1-Dichloroethene	50	48	96.0	08/01/1996
Benzene	50	45	90.0	08/01/1996
Chlorobenzene	50	48	96.0	08/01/1996
Toluene	50	47	94.0	08/01/1996
Trichloroethene	50	46	92.0	08/01/1996
8240 VOLATILES (S)				
1,1-Dichloroethene	50	49	98.0	08/02/1996
Benzene	50	46	92.0	08/02/1996
Chlorobenzene	50	48	96.0	08/02/1996
Toluene	50	47	94.0	08/02/1996
Trichloroethene	50	46	92.0	08/02/1996
8240 VOLATILES (S)				
1,1-Dichloroethene	50	50	100.0	08/05/1996
Benzene	50	47	94.0	08/05/1996
Chlorobenzene	50	50	100.0	08/05/1996
Toluene	50	49	98.0	08/05/1996
Trichloroethene	50	48	96.0	08/05/1996
BTEX/WTPH-Gasoline (W)				
Benzene	20.0	19.3	96.5	07/30/1996
Toluene	20.0	19.3	96.5	07/30/1996
WTPH-Gasoline	700	678	96.9	07/30/1996
BTEX / WA-TPH-GAS (S)				
Benzene	20	18.1	90.5	08/01/1996

CCV - Continuing Calibration Verification

Note: Recovery limits for 8240, 8260, 8270, 8010, 8020, 624, 625 specified in method.  
Gasoline, Diesel, 418.1, 418.1M limits 80-120%. Metals recovery limits 80-120%.

## QUALITY CONTROL REPORT CONTINUING CALIBRATION VERIFICATION

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA

Analyte	CCV	Concentration Found	Percent Recovery	Date Analyzed
	True Concentration			
Toluene	20	18.1	90.5	08/01/1996
WA TPH-Gas	700	672	96.0	08/01/1996

CCV - Continuing Calibration Verification

Note: Recovery limits for 8240, 8260, 8270, 8010, 8020, 624, 625 specified in method.  
Gasoline, Diesel, 418.1, 418.1M limits 80-120%. Metals recovery limits 80-120%.



# QUALITY CONTROL REPORT LABORATORY CONTROL STANDARD

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA

Analyte	LCS	Concentration Found	LCS % Recovery	Date Analyzed
	True Concentration			
8240 VOLATILES (S)				
1,1-Dichloroethene	50	47	94.0	07/31/1996
Benzene	50	45	90.0	07/31/1996
Chlorobenzene	50	46	92.0	07/31/1996
Toluene	50	46	92.0	07/31/1996
Trichloroethene	50	45	90.0	07/31/1996
BTEX/WTPH-Gasoline (W)				
Benzene	12.7	10.4	81.9	07/30/1996
Toluene	38.4	36.1	94.0	07/30/1996
WTPH-Gasoline	350	323	92.3	07/30/1996
BTEX / WA-TPH-GAS (S)				
Benzene	1.8	1.2	66.7	08/01/1996
Toluene	5.5	4.6	83.6	08/01/1996
WA TPH-Gas	50	50	100.0	08/01/1996

LCS - Laboratory Control Standard

Note: Recovery limits for fuels 80-120%. 8010, 8020, 8240, 8260, 8270, 624, 625 specified in method.  
Recovery limits for metals analyses 80-120%. 418.1 limits are 90-140%.

# QUALITY CONTROL REPORT MATRIX SPIKE/MATRIX SPIKE DUPLICATE

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996  
Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA

Analyte	Matrix	Sample	Spike	Units	Percent	MSD		Percent	MS/MSD
	Spike Result					MSD Result	Spike Amount		
		Result	Amount		Recovery		Units	Recovery	RPD
8240 VOLATILES (S)									
1,1-Dichloroethene	51	ND	50	ug/Kg	102.0	50	50	ug/Kg	2.0
Benzene	52	ND	50	ug/Kg	104.0	50	50	ug/Kg	3.9
Trichloroethene	52	ND	50	ug/Kg	104.0	51	50	ug/Kg	1.9
Toluene	53	ND	50	ug/Kg	106.0	51	50	ug/Kg	3.8
Chlorobenzene	51	ND	50	ug/Kg	102.0	50	50	ug/Kg	2.0
BTEX/WTPH-Gasoline (W)									
Benzene	10.7	ND	12.7	ug/L	84.3	10.5	12.7	ug/L	1.9
Toluene	37.3	ND	38.4	ug/L	97.1	36.5	38.4	ug/L	2.1
WTPH-Gasoline	368	ND	350	ug/L	105.1	355	350	ug/L	3.6

NOTE: Matrix Spike Samples may not be samples from this job.

MS = Matrix Spike

MSD = Matrix Spike Duplicate

RPD = Relative Percent Difference

dil. = Diluted Out



# **QUALITY CONTROL REPORT** **BLANKS**

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
8240 VOLATILES (S)				
1,1,1-Trichloroethane	ND	5.0	ug/Kg	07/31/1996
1,1,2,2-Tetrachloroethane	ND	5.0	ug/Kg	07/31/1996
1,1,2-Trichloroethane	ND	5.0	ug/Kg	07/31/1996
1,1-Dichloroethane	ND	5.0	ug/Kg	07/31/1996
1,1-Dichloroethene	ND	5.0	ug/Kg	07/31/1996
1,2-Dichloroethane	ND	5.0	ug/Kg	07/31/1996
1,2-Dichloropropane	ND	5.0	ug/Kg	07/31/1996
2-Butanone	ND	20	ug/Kg	07/31/1996
2-Chloroethylvinyl ether	ND	10	ug/Kg	07/31/1996
2-Hexanone	ND	20	ug/Kg	07/31/1996
4-Methyl-2-Pentanone	ND	20	ug/Kg	07/31/1996
Acetone	ND	20	ug/Kg	07/31/1996
Benzene	ND	5.0	ug/Kg	07/31/1996
Bromodichloromethane	ND	5.0	ug/Kg	07/31/1996
Bromoform	ND	5.0	ug/Kg	07/31/1996
Bromomethane	ND	5.0	ug/Kg	07/31/1996
Carbon Disulfide	ND	5.0	ug/Kg	07/31/1996
Carbon Tetrachloride	ND	5.0	ug/Kg	07/31/1996
Chlorobenzene	ND	5.0	ug/Kg	07/31/1996
Chloroethane	ND	5.0	ug/Kg	07/31/1996
Chloroform	ND	5.0	ug/Kg	07/31/1996
Chloromethane	ND	5.0	ug/Kg	07/31/1996
1,2-Dichlorobenzene	ND	5.0	ug/Kg	07/31/1996
1,3-Dichlorobenzene	ND	5.0	ug/Kg	07/31/1996
1,4-Dichlorobenzene	ND	5.0	ug/Kg	07/31/1996

## **Advisory Control Limits for Blanks:**

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.

## QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
Methylene Chloride	ND	50	ug/Kg	07/31/1996
Dibromochloromethane	ND	5.0	ug/Kg	07/31/1996
Ethylbenzene	ND	5.0	ug/Kg	07/31/1996
Styrene	ND	5.0	ug/Kg	07/31/1996
Tetrachloroethene	ND	5.0	ug/Kg	07/31/1996
Toluene	ND	5.0	ug/Kg	07/31/1996
Trichloroethene	ND	5.0	ug/Kg	07/31/1996
Trichlorofluoromethane	ND	5.0	ug/Kg	07/31/1996
Vinyl Acetate	ND	5.0	ug/Kg	07/31/1996
Vinyl Chloride	ND	5.0	ug/Kg	07/31/1996
m,p-xylene	ND	5.0	ug/Kg	07/31/1996
o-xylene	ND	5.0	ug/Kg	07/31/1996
cis-1,2-Dichloroethene	ND	5.0	ug/Kg	07/31/1996
cis-1,3-Dichloropropene	ND	5.0	ug/Kg	07/31/1996
trans-1,2-Dichloroethene	ND	5.0	ug/Kg	07/31/1996
1,2-Dichloroethane-d4 (Surr.)	98		%	07/31/1996
Toluene-d8 (Surr.)	101		%	07/31/1996
Bromofluorobenzene (Surr.)	96		%	07/31/1996
8240 VOLATILES (S)				
1,1,1-Trichloroethane	ND	5.0	ug/Kg	08/01/1996
1,1,1,2-Tetrachloroethane	ND	5.0	ug/Kg	08/01/1996
1,1,2-Trichloroethane	ND	5.0	ug/Kg	08/01/1996
1,1-Dichloroethane	ND	5.0	ug/Kg	08/01/1996
1,1-Dichloroethene	ND	5.0	ug/Kg	08/01/1996
1,2-Dichloroethane	ND	5.0	ug/Kg	08/01/1996
1,2-Dichloropropane	ND	5.0	ug/Kg	08/01/1996

### Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.

## QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
2-Butanone	ND	20	ug/Kg	08/01/1996
2-Chloroethylvinyl ether	ND	10	ug/Kg	08/01/1996
2-Hexanone	ND	20	ug/Kg	08/01/1996
4-Methyl-2-Pentanone	ND	20	ug/Kg	08/01/1996
Acetone	ND	20	ug/Kg	08/01/1996
Benzene	ND	5.0	ug/Kg	08/01/1996
Bromodichloromethane	ND	5.0	ug/Kg	08/01/1996
Bromoform	ND	5.0	ug/Kg	08/01/1996
Bromomethane	ND	5.0	ug/Kg	08/01/1996
Carbon Disulfide	ND	5.0	ug/Kg	08/01/1996
Carbon Tetrachloride	ND	5.0	ug/Kg	08/01/1996
Chlorobenzene	ND	5.0	ug/Kg	08/01/1996
Chloroethane	ND	5.0	ug/Kg	08/01/1996
Chloroform	ND	5.0	ug/Kg	08/01/1996
Chloromethane	ND	5.0	ug/Kg	08/01/1996
1,2-Dichlorobenzene	ND	5.0	ug/Kg	08/01/1996
1,3-Dichlorobenzene	ND	5.0	ug/Kg	08/01/1996
1,4-Dichlorobenzene	ND	5.0	ug/Kg	08/01/1996
Methylene Chloride	ND	50	ug/Kg	08/01/1996
Dibromochloromethane	ND	5.0	ug/Kg	08/01/1996
Ethylbenzene	ND	5.0	ug/Kg	08/01/1996
Styrene	ND	5.0	ug/Kg	08/01/1996
Tetrachloroethene	ND	5.0	ug/Kg	08/01/1996
Toluene	ND	5.0	ug/Kg	08/01/1996
Trichloroethene	ND	5.0	ug/Kg	08/01/1996
Trichlorofluoromethane	ND	5.0	ug/Kg	08/01/1996

### Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.



## QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
Vinyl Acetate	ND	5.0	ug/Kg	08/01/1996
Vinyl Chloride	ND	5.0	ug/Kg	08/01/1996
m,p-xylene	ND	5.0	ug/Kg	08/01/1996
o-xylene	ND	5.0	ug/Kg	08/01/1996
cis-1,2-Dichloroethene	ND	5.0	ug/Kg	08/01/1996
cis-1,3-Dichloropropene	ND	5.0	ug/Kg	08/01/1996
trans-1,2-Dichloroethene	ND	5.0	ug/Kg	08/01/1996
1,2-Dichloroethane-d4 (Surr.)	99		†	08/01/1996
Toluene-d8 (Surr.)	98		†	08/01/1996
Bromofluorobenzene (Surr.)	95		†	08/01/1996
8240 VOLATILES (S)				
1,1,1-Trichloroethane	ND	5.0	ug/Kg	08/02/1996
1,1,2,2-Tetrachloroethane	ND	5.0	ug/Kg	08/02/1996
1,1,2-Trichloroethane	ND	5.0	ug/Kg	08/02/1996
1,1-Dichloroethane	ND	5.0	ug/Kg	08/02/1996
1,1-Dichloroethene	ND	5.0	ug/Kg	08/02/1996
1,2-Dichloroethane	ND	5.0	ug/Kg	08/02/1996
1,2-Dichloropropane	ND	5.0	ug/Kg	08/02/1996
2-Butanone	ND	20	ug/Kg	08/02/1996
2-Chloroethylvinyl ether	ND	10	ug/Kg	08/02/1996
2-Hexanone	ND	20	ug/Kg	08/02/1996
4-Methyl-2-Pentanone	ND	20	ug/Kg	08/02/1996
Acetone	ND	20	ug/Kg	08/02/1996
Benzene	ND	5.0	ug/Kg	08/02/1996
Bromodichloromethane	ND	5.0	ug/Kg	08/02/1996
Bromoform	ND	5.0	ug/Kg	08/02/1996

### Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.

# QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
Bromomethane	ND	5.0	ug/Kg	08/02/1996
Carbon Disulfide	ND	5.0	ug/Kg	08/02/1996
Carbon Tetrachloride	ND	5.0	ug/Kg	08/02/1996
Chlorobenzene	ND	5.0	ug/Kg	08/02/1996
Chloroethane	ND	5.0	ug/Kg	08/02/1996
Chloroform	ND	5.0	ug/Kg	08/02/1996
Chloromethane	ND	5.0	ug/Kg	08/02/1996
1,2-Dichlorobenzene	ND	5.0	ug/Kg	08/02/1996
1,3-Dichlorobenzene	ND	5.0	ug/Kg	08/02/1996
1,4-Dichlorobenzene	ND	5.0	ug/Kg	08/02/1996
Methylene Chloride	ND	50	ug/Kg	08/02/1996
Dibromochloromethane	ND	5.0	ug/Kg	08/02/1996
Ethylbenzene	ND	5.0	ug/Kg	08/02/1996
Styrene	ND	5.0	ug/Kg	08/02/1996
Tetrachloroethene	ND	5.0	ug/Kg	08/02/1996
Toluene	ND	5.0	ug/Kg	08/02/1996
Trichloroethene	ND	5.0	ug/Kg	08/02/1996
Trichlorofluoromethane	ND	5.0	ug/Kg	08/02/1996
Vinyl Acetate	ND	5.0	ug/Kg	08/02/1996
Vinyl Chloride	ND	5.0	ug/Kg	08/02/1996
m,p-xylene	ND	5.0	ug/Kg	08/02/1996
o-xylene	ND	5.0	ug/Kg	08/02/1996
cis-1,2-Dichloroethene	ND	5.0	ug/Kg	08/02/1996
cis-1,3-Dichloropropene	ND	5.0	ug/Kg	08/02/1996
trans-1,2-Dichloroethene	ND	5.0	ug/Kg	08/02/1996
1,2-Dichloroethane-d4 (Surr.)	99		%	08/02/1996

## Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.

# QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
Toluene-d8 (Surr.)	96		%	08/02/1996
Bromofluorobenzene (Surr.)	94		%	08/02/1996
8240 VOLATILES (S)				
1,1,1-Trichloroethane	ND	5.0	ug/Kg	08/05/1996
1,1,2,2-Tetrachloroethane	ND	5.0	ug/Kg	08/05/1996
1,1,2-Trichloroethane	ND	5.0	ug/Kg	08/05/1996
1,1-Dichloroethane	ND	5.0	ug/Kg	08/05/1996
1,1-Dichloroethene	ND	5.0	ug/Kg	08/05/1996
1,2-Dichloroethane	ND	5.0	ug/Kg	08/05/1996
1,2-Dichloropropane	ND	5.0	ug/Kg	08/05/1996
2-Butanone	ND	20	ug/Kg	08/05/1996
2-Chloroethylvinyl ether	ND	10	ug/Kg	08/05/1996
2-Hexanone	ND	20	ug/Kg	08/05/1996
4-Methyl-2-Pentanone	ND	20	ug/Kg	08/05/1996
Acetone	ND	20	ug/Kg	08/05/1996
Benzene	ND	5.0	ug/Kg	08/05/1996
Bromodichloromethane	ND	5.0	ug/Kg	08/05/1996
Bromoform	ND	5.0	ug/Kg	08/05/1996
Bromomethane	ND	5.0	ug/Kg	08/05/1996
Carbon Disulfide	ND	5.0	ug/Kg	08/05/1996
Carbon Tetrachloride	ND	5.0	ug/Kg	08/05/1996
Chlorobenzene	ND	5.0	ug/Kg	08/05/1996
Chloroethane	ND	5.0	ug/Kg	08/05/1996
Chloroform	ND	5.0	ug/Kg	08/05/1996
Chloromethane	ND	5.0	ug/Kg	08/05/1996
1,2-Dichlorobenzene	ND	5.0	ug/Kg	08/05/1996

## Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.



# QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank		Units	Date
	Analysis	MDL		Analyzed
1,3-Dichlorobenzene	ND	5.0	ug/Kg	08/05/1996
1,4-Dichlorobenzene	ND	5.0	ug/Kg	08/05/1996
Methylene Chloride	ND	50	ug/Kg	08/05/1996
Dibromochloromethane	ND	5.0	ug/Kg	08/05/1996
Ethylbenzene	ND	5.0	ug/Kg	08/05/1996
Styrene	ND	5.0	ug/Kg	08/05/1996
Tetrachloroethene	ND	5.0	ug/Kg	08/05/1996
Toluene	ND	5.0	ug/Kg	08/05/1996
Trichloroethene	ND	5.0	ug/Kg	08/05/1996
Trichlorofluoromethane	ND	5.0	ug/Kg	08/05/1996
Vinyl Acetate	ND	5.0	ug/Kg	08/05/1996
Vinyl Chloride	ND	5.0	ug/Kg	08/05/1996
m,p-xylene	ND	5.0	ug/Kg	08/05/1996
o-xylene	ND	5.0	ug/Kg	08/05/1996
cis-1,2-Dichloroethene	ND	5.0	ug/Kg	08/05/1996
cis-1,3-Dichlororopene	ND	5.0	ug/Kg	08/05/1996
trans-1,2-Dichloroethene	ND	5.0	ug/Kg	08/05/1996
1,2-Dichloroethane-d4 (Surr.)	100		†	08/05/1996
Toluene-d8 (Surr.)	97		†	08/05/1996
Bromofluorobenzene (Surr.)	94		†	08/05/1996
BTEX/WTPH-Gasoline (W)				
Dilution Factor	1			07/30/1996
Benzene	ND	0.5	ug/L	07/30/1996
Toluene	ND	0.5	ug/L	07/30/1996
Ethyl Benzene	ND	0.5	ug/L	07/30/1996
Xylenes, total	ND	0.5	ug/L	07/30/1996

## Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.

## QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996

NET Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
WTPH-Gasoline	ND	50	ug/L	07/30/1996
aaa-TFT (Gas Surr.)	86		%	07/30/1996
aaa-TFT (BTEX-Surr.)	89		%	07/30/1996
BTEX / WA-TPH-GAS (S)				
Benzene	ND	0.3	mg/Kg	08/01/1996
Toluene	ND	0.3	mg/Kg	08/01/1996
Ethyl Benzene	ND	0.3	mg/Kg	08/01/1996
Xylenes, total	ND	0.3	mg/Kg	08/01/1996
WA TPH-Gas	ND	5.0	mg/Kg	08/01/1996
aaa-TFT (BTEX Surr.)	77		%	08/01/1996
aaa-TFT (Gas Surr.)	96		%	08/01/1996
BFB (Gas Surr.)	99		%	08/01/1996

### Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.

## QUALITY CONTROL REPORT DUPLICATES

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/07/1996  
Job Number: 96.02228

Contact: Mr. Dan Krause  
Project: West Pac, Tacoma, WA

Analyte	Original Analysis	Duplicate Analysis	Units	RPD	Date Analyzed	Flag
BTEX / WA-TPH-GAS (S)						
Benzene	ND		mg/Kg		08/01/1996	
Toluene	ND		mg/Kg		08/01/1996	
WA TPH-Gas	13.	ND	mg/kg		08/01/1996	

NOTE: Duplicates may not be samples from this job.

RPD - Relative Percent Difference



A This sample does not have a typical gasoline pattern.

B1 This sample does not have a typical diesel pattern.

B The blank exhibited a positive result greater than the reporting limit for this compound.

C The sample appears to contain a lighter hydrocarbon than gasoline.

D The sample appears to extend to a heavier hydrocarbon range than gasoline.

E The sample appears to extend to a lighter hydrocarbon range than diesel.

F The sample appears to extend to a heavier hydrocarbon range than diesel.

G The positive result for gasoline is due to single component contamination.

H The gasoline elution pattern for the sample is not typical.

I The oil pattern for this sample is not typical.

J The result for this compound is an estimated concentration.

L The LCS recovery exceeded control limits. See the LCS page of this report.

M MS and/or MSD percent recovery exceeds control limits.

MR The MS/MSD RPD is greater than 20%. The sample was re-extracted and re-analyzed with similar results. This is due to a matrix interference, likely a non-homogeneity of the sample.

P A post digestion spike was analyzed, and recoveries are within control limits.

Q Detection limits elevated due to sample matrix.

R The duplicate RPD was greater than 20%. The sample was re-extracted and re-analyzed with similar results. This indicates a matrix interference in the sample, likely a non-homogeneity of the sample.

SR Surrogate recovery outside control limits. See the surrogate page of the report.

W The duplicate RPD was greater than 20%. Due to insufficient sample, re-analysis was not possible.

X Sample was analyzed outside recommended holding times.

Y The result for this parameter was greater than the TCLP regulatory limit.

Z The pattern seen for the parameter being analyzed is not typical.



COMPANY ALS Consulting  
ADDRESS 9205 Woodlawn Ave N., Seattle, WA 98103  
PHONE (206) 526-9602 FAX \_\_\_\_\_  
PROJECT NAME/LOCATION West Pac, Tacoma, WA  
PROJECT NUMBER 1-96-0004  
PROJECT MANAGER Daniel Krause

REPORT TO: ALS Consulting

INVOICE TO: ALS Consulting

P.O. NO. \_\_\_\_\_

NET QUOTE NO. \_\_\_\_\_

7400 SW Upper Boones Ferry Rd.  
Suite # 260  
Portland, OR 97224  
Tel: (503) 624-5449 FAX: (503) 639-6889

IMPLED BY  
Daniel Krause  
(PRINT NAME)

SIGNATURE

SIGNATURE

WTPH-6/BTEX

DATE	TIME	SAMPLE ID/DESCRIPTION	GRAB	COMP	# OF CONTAINERS TYPE	MATRIX	PRESERVED Y/N	WTPH	COMMENTS
1/25/19	11:30	SW-7'	X		1	Soil	N	X	
	11:32	B-1-10.5'	X		1	Soil	N	X	
	13:18	BGW	X		(2)WA	Water	Y	X	
	13:40	BW-5.5'	X		1	Soil	N	X	
	13:45	B-2-10.5'	X		1	Soil	N	X	
	14:10	B-3-10.5'	X		1	Soil	N	X	
	14:42	WW-7'	X		1	Soil	N	X	
	15:28	NW-6'	X		1	Soil	N	X	
	15:31	B-4-10.5'	X		1	Soil	N	X	
	16:11	SI-3.5'	X		1	Soil	N	X	
	16:02	WI-4'	X		1	Soil	N	X	
	16:15	WP-4'	X		1	Soil	N	X	
	16:28	EP-3'	X		1	Soil	N	X	

CONDITION OF SAMPLE: BOTTLES INTACT? YES / NO  
FIELD FILTERED? YES / NO

COC SEALS PRESENT AND INTACT? YES / NO  
VOLATILES FREE OF HEADSPACE? YES / NO

TEMPERATURE UPON RECEIPT:

SAMPLE REMAINDER DISPOSAL: RETURN SAMPLE REMAINDER TO CLIENT VIA \_\_\_\_\_  
I REQUEST NET TO DISPOSE OF ALL SAMPLE REMAINDERS

may run additional analysis  
(after holding time expires) DATE 7/26/96

RELINQUISHED BY:	DATE/TIME
	7/26/96 8:40

RECEIVED BY:

RELINQUISHED BY:

DATE/TIME  
7/26/86 18:20

RECEIVED FOR NET BY:

**METHOD OF SHIPMENT**

REMARKS:

Greyhound



NATIONAL  
ENVIRONMENTAL  
TESTING, INC.

Portland Division  
17400 SW Upper Boones Ferry Rd.  
Suite #260  
Portland, OR 97224  
Tel: (503) 624-5449  
Fax: (503) 639-6889

Mr. Dan Krause  
ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/10/1996  
NET Account No.: 390  
NET Job Number: 96.02349

Project: West Pac Tacoma, WA  
Location: 1-96-0004

Sample analysis in support of the project referenced above has been completed and results are presented on the following pages. Should you have questions regarding procedures or results, please feel welcome to contact Client Services.

Sample Number	Sample Description	Matrix Type	Date Taken	Date Received
67745	WI-8'	SOIL	08/02/1996	08/06/1996
67746	SP-1	SOIL	08/02/1996	08/06/1996
67747	SP-2	SOIL	08/02/1996	08/06/1996
67748	SP-3	SOIL	08/02/1996	08/06/1996

Post-it® Fax Note	7671	Date	8/21	# of pages
To	DW	From	JE	
Co./Dept.		Co.		
Phone #		Phone #		
Fax #		Fax #		

Approved by:

Marty French  
NET, INC. Division Manager



## ANALYTICAL REPORT

Mr. Dan Krause  
 ALS Consulting  
 9205 Woodlawn Avenue North  
 Seattle, WA 98103

08/10/1996  
 Job No.: 96.02349

Page: 2

Project Name: West Pac Tacoma, WA  
 Date Received: 08/06/1996

Sample Number Sample Description  
 67745 WI-8'

PARAMETERS	METHODS	RESULTS	REPORT LIMIT	UNITS	DATE ANALYZED	FLAG
Solids, Total	160.3	88	0.01	%	08/09/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/09/1996	
Benzene	8020	ND	0.3	mg/kg d	08/09/1996	
Toluene	8020	ND	0.3	mg/kg d	08/09/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/09/1996	
Xylenes, total	8020	1.4	0.3	mg/kg d	08/09/1996	
WA TPH-Gas	TPH-G	140	5.0	mg/kg d	08/09/1996	A

Sample Number Sample Description  
 67746 SP-1

PARAMETERS	METHODS	RESULTS	REPORT LIMIT	UNITS	DATE ANALYZED	FLAG
Solids, Total	160.3	90	0.01	%	08/09/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/09/1996	
Benzene	8020	ND	0.3	mg/kg d	08/09/1996	
Toluene	8020	ND	0.3	mg/kg d	08/09/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/09/1996	
Xylenes, total	8020	ND	0.3	mg/kg d	08/09/1996	
WA TPH-Gas	TPH-G	23.	5.0	mg/kg d	08/09/1996	

Sample Number Sample Description  
 67747 SP-2

PARAMETERS	METHODS	RESULTS	REPORT LIMIT	UNITS	DATE ANALYZED	FLAG
Solids, Total	160.3	87	0.01	%	08/09/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/09/1996	
Benzene	8020	ND	0.3	mg/kg d	08/09/1996	
Toluene	8020	0.47	0.3	mg/kg d	08/09/1996	MR
Ethyl Benzene	8020	0.36	0.3	mg/kg d	08/09/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.

## ANALYTICAL REPORT

Mr. Dan Krause  
ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

08/10/1996  
Job No.: 96.02349

Page: 3

Project Name: West Pac Tacoma, WA  
Date Received: 08/06/1996

Sample Number      Sample Description  
67747                SP-2

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Xylenes, total	8020	ND	0.3	mg/kg d	08/09/1996	
WA TPH-Gas	TPH-G	100	5.0	mg/kg d	08/09/1996	MR

Sample Number      Sample Description  
67748                SP-3

<u>PARAMETERS</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>REPORT LIMIT</u>	<u>UNITS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
Solids, Total	160.3	88	0.01	†	08/09/1996	
BTEX / WA-TPH-GAS (S)						
Dilution Factor		1			08/09/1996	
Benzene	8020	ND	0.3	mg/kg d	08/09/1996	
Toluene	8020	ND	0.3	mg/kg d	08/09/1996	
Ethyl Benzene	8020	ND	0.3	mg/kg d	08/09/1996	
Xylenes, total	8020	ND	0.3	mg/kg d	08/09/1996	
WA TPH-Gas	TPH-G	ND	5.7	mg/kg d	08/09/1996	

A sample result of ND indicates the parameter was Not Detected at the reporting limit.

**SURROGATE REPORT**

Mr. Dan Krause  
ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

08/10/1996  
Job No.: 96.02349

Page: 4

Project Name: West Pac Tacoma, WA  
Date Received: 08/06/1996

<u>SURROGATES</u>	<u>METHODS</u>	<u>RESULTS</u>	<u>DATE ANALYZED</u>	<u>FLAG</u>
-------------------	----------------	----------------	----------------------	-------------

Sample Number	Sample Description
67745	WI-8'

aaa-TFT (BTEX Surr.)	8020	111	‡	08/09/1996
aaa-TFT (Gas Surr.)	TPH-G	102	‡	08/09/1996
BFB (Gas Surr.)	TPH-G	MI	‡	08/09/1996

Sample Number	Sample Description
67746	SP-1

aaa-TFT (BTEX Surr.)	8020	116	‡	08/09/1996
aaa-TFT (Gas Surr.)	TPH-G	112	‡	08/09/1996
BFB (Gas Surr.)	TPH-G	118	‡	08/09/1996

Sample Number	Sample Description
67747	SP-2

aaa-TFT (BTEX Surr.)	8020	MI	‡	08/09/1996
aaa-TFT (Gas Surr.)	TPH-G	MI	‡	08/09/1996
BFB (Gas Surr.)	TPH-G	MI	‡	08/09/1996

Sample Number	Sample Description
67748	SP-3

aaa-TFT (BTEX Surr.)	8020	106	‡	08/09/1996
aaa-TFT (Gas Surr.)	TPH-G	98	‡	08/09/1996
BFB (Gas Surr.)	TPH-G	98	‡	08/09/1996



## QUALITY CONTROL REPORT CONTINUING CALIBRATION VERIFICATION

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/10/1996

NET Job Number: 96.02349

Contact: Mr. Dan Krause  
Project: West Pac Tacoma, WA

Analyte	CCV		Percent Recovery	Date Analyzed
	True Concentration	Concentration Found		
BTEX / WA-TPH-GAS (S)				
Benzene	20	18.8	94.0	08/08/1996
Toluene	20	19.1	95.5	08/08/1996
WA TPH-Gas	700	632	90.3	08/08/1996
BTEX / WA-TPH-GAS (S)				
Benzene	20	20.6	103.0	08/09/1996
Toluene	20	20.8	104.0	08/09/1996
WA TPH-Gas	700	700	100.0	08/09/1996

CCV - Continuing Calibration Verification

Note: Recovery limits for 8240, 8260, 8270, 8010, 8020, 624, 625 specified in method.  
Gasoline, Diesel, 418.1, 418.1M limits 80-120%. Metals recovery limits 80-120%.

## QUALITY CONTROL REPORT LABORATORY CONTROL STANDARD

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/10/1996

NET Job Number: 96.02349

Contact: Mr. Dan Krause  
Project: West Pac Tacoma, WA

Analyte	LCS True Concentration	Concentration Found	LCS % Recovery	Date Analyzed
BTEX / WA-TPH-GAS (S)				
Benzene	1.84	1.65	89.7	08/08/1996
Toluene	5.58	5.85	104.8	08/08/1996
WA TPH-Gas	50.8	49.0	96.5	08/08/1996
BTEX / WA-TPH-GAS (S)				
Benzene	1.84	1.72	93.5	08/08/1996
Toluene	5.58	6.05	108.4	08/08/1996
WA TPH-Gas	50.8	58.5	115.2	08/08/1996
BTEX / WA-TPH-GAS (S)				
Benzene	12.7	11.4	89.8	08/08/1996
Toluene	38.4	37.9	98.7	08/08/1996
WA TPH-Gas	350	329	94.0	08/08/1996
BTEX / WA-TPH-GAS (S)				
Benzene	12.7	12.2	96.1	08/08/1996
Toluene	38.4	40.2	104.7	08/08/1996
WA TPH-Gas	350	338	96.6	08/08/1996

LCS - Laboratory Control Standard

Note: Recovery limits for fuels 80-120%. 8010, 8020, 8240, 8260, 8270, 624, 625 specified in method.  
Recovery limits for metals analyses 80-120%. 418.1 limits are 90-140%.

## QUALITY CONTROL REPORT BLANKS

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/10/1996

NET Job Number: 96.02349

Contact: Mr. Dan Krause  
Project: West Pac Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
BTEX / WA-TPH-GAS (S)				
Benzene	ND	0.3	mg/Kg	08/08/1996
Toluene	ND	0.3	mg/Kg	08/08/1996
Ethyl Benzene	ND	0.3	mg/Kg	08/08/1996
Xylenes, total	ND	0.3	mg/Kg	08/08/1996
WA TPH-Gas	ND	5.0	mg/Kg	08/08/1996
aaa-TFT (BTEX Surr.)	103		%	08/08/1996
aaa-TPT (Gas Surr.)	93		%	08/08/1996
BFB (Gas Surr.)	79		%	08/08/1996
BTEX / WA-TPH-GAS (S)				
Benzene	ND	0.3	mg/Kg	08/08/1996
Toluene	ND	0.3	mg/Kg	08/08/1996
Ethyl Benzene	ND	0.3	mg/Kg	08/08/1996
Xylenes, total	ND	0.3	mg/Kg	08/08/1996
WA TPH-Gas	ND	5.0	mg/Kg	08/08/1996
aaa-TFT (BTEX Surr.)	106		%	08/08/1996
aaa-TPT (Gas Surr.)	97		%	08/08/1996
BFB (Gas Surr.)	84		%	08/08/1996
BTEX / WA-TPH-GAS (S)				
Benzene	ND	0.3	mg/Kg	08/09/1996
Toluene	ND	0.3	mg/Kg	08/09/1996
Ethyl Benzene	ND	0.3	mg/Kg	08/09/1996
Xylenes, total	ND	0.3	mg/Kg	08/09/1996
WA TPH-Gas	ND	5.0	mg/Kg	08/09/1996
aaa-TFT (BTEX Surr.)	106		%	08/09/1996
aaa-TPT (Gas Surr.)	97		%	08/09/1996

### Advisory Control Limits for Blanks:

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.



**QUALITY CONTROL REPORT  
BLANKS**

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/10/1996

NET Job Number: 96.02349

Contact: Mr. Dan Krause  
Project: West Pac Tacoma, WA  
Location: 1-96-0004

Analyte	Blank Analysis	MDL	Units	Date Analyzed
BFB (Gas Surr.)	82		t	08/09/1996

**Advisory Control Limits for Blanks:**

Metals/Wet Chemistry/ Conventional/GC - all compounds should be less than the Reporting Limit.

GC/MS - Semi-Volatiles - all compounds should be less than the Reporting Limit except for phthalates which should be less than 5 times the reporting limit.

**QUALITY CONTROL REPORT  
DUPLICATES**

ALS Consulting  
9205 Woodlawn Avenue North  
Seattle, WA 98103

Date: 08/10/1996

Job Number: 96.02349

Contact: Mr. Dan Krause  
Project: West Pac Tacoma, WA

Analyte	Original Analysis	Duplicate Analysis	Units	RPD	Date Analyzed	Flag
BTEX / WA-TPH-GAS (S)						
Benzene	ND	ND	mg/kg		08/09/1996	
Toluene	ND	ND	mg/kg		08/09/1996	
WA TPH-Gas	140	140	mg/kg	0.0	08/09/1996	A
BTEX / WA-TPH-GAS (S)						
Benzene	ND	ND	mg/kg		08/09/1996	
Toluene	ND	ND	mg/kg		08/09/1996	
WA TPH-Gas	23.	26.	mg/kg	9.1	08/09/1996	
BTEX / WA-TPH-GAS (S)						
Benzene	ND	ND	mg/kg		08/09/1996	
Toluene	0.47	1.0	mg/kg	74.8	08/09/1996	MR
WA TPH-Gas	100	180	mg/kg	54.9	08/09/1996	MR

NOTE: Duplicates may not be samples from this job.

RPD - Relative Percent Difference



NATIONAL  
ENVIRONMENTAL  
TESTING, INC.

# CHAIN OF CUSTODY RECORD

COMPANY ALS Consulting  
ADDRESS 9305 Woodlawn Ave N., Seattle, WA 98103  
PHONE (206) 526-9602 FAX (206) 522-5695  
PROJECT NAME/LOCATION West Park Tacoma, WA  
PROJECT NUMBER 1-96-0004  
PROJECT MANAGER Daniel Krause

960-234911  
8/1/96  
REPORT TO: \_\_\_\_\_  
INVOICE TO: \_\_\_\_\_  
P.O. NO. \_\_\_\_\_  
NET QUOTE NO. \_\_\_\_\_

SAMPLED BY		SIGNATURE		ANALYSES												To assist us in selecting the proper method							
(PRINT NAME)																Is this work being conducted for regulatory compliance monitoring? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>							
(PRINT NAME)																Is this work being conducted for regulatory enforcement action? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>							
																Which regulations apply: RCRA <input type="checkbox"/> NPDES Wastewater <input type="checkbox"/>							
																UST <input checked="" type="checkbox"/> Drinking Water <input type="checkbox"/>							
																Other <input type="checkbox"/> None <input checked="" type="checkbox"/>							
DATE	TIME	SAMPLE ID/DESCRIPTION	MATRIX	GRAB	COMP	HCl	NaOH	HNO <sub>3</sub>	H <sub>2</sub> SO <sub>4</sub>	OTHER													COMMENTS
8/2/96	11:05	WT-8'	SP-1	X							X					normal 3-day turnaround (samples placed on ice)							
8/2/96	11:30	SP-1	SP-1	X							X												
8/2/96	11:35	SP-2	SP-1	X							X												
8/2/96	11:40	SP-3	SP-1	X							X												

CONDITION OF SAMPLE: BOTTLES INTACT? YES / NO  
FIELD FILTERED? YES / NO

COC SEALS PRESENT AND INTACT? YES / NO  
VOLATILES FREE OF HEADSPACE? YES / NO

TEMPERATURE UPON RECEIPT: 20  
Bottles supplied by NET? YES / NO

SAMPLE REMAINDER DISPOSAL: RETURN SAMPLE REMAINDER TO CLIENT VIA \_\_\_\_\_  
REQUEST NET TO DISPOSE OF ALL SAMPLE REMAINDERS Daniel Krause

DATE 8/2/96

RELINQUISHED BY: <u>Daniel Krause</u>	DATE: <u>8/5/96</u>	TIME: <u>8:40am</u>	RECEIVED BY: _____	RELINQUISHED BY: _____	DATE: <u>8/6/96</u>	TIME: <u>1:30pm</u>	RECEIVED FOR NET BY: _____
---------------------------------------	---------------------	---------------------	--------------------	------------------------	---------------------	---------------------	----------------------------

METHOD OF SHIPMENT

Greyhound Bus

REMARKS:



WA-5/2/96



# UNDERGROUND STORAGE TANK

## 30 Day Notice of Intent to Close/Decommission Tanks

The purpose of this form is to provide the Department of Ecology with notice of intent to close/decommission an UST. It must be received 30 days prior to the closure activities. It must be signed and dated by either the owner/operator of the UST to be closed or his/her authorized representative. (This could be the firm contracted to do the work.) Ecology will notify the identified person of the earliest date closure/decommissioning activities may commence.

For questions on completing this form please call (206) 459-6293.

Please type or use ink.

The completed checklist should be mailed to:

Underground Storage Tank Section  
Department of Ecology  
Mail Stop PV-11  
Olympia, WA 98504

### 1. TANK OWNER AND LOCATION

UST Owner/Operator: FIRST INTERSTATE BANK - TACOMA PRIVATE CLIENT SERVICE

Owners Mailing Address: P.O. BOX 1997

TACOMA WA 98401

Telephone: (800) 688 8938 (CONTACT JOE FIGG)

Site ID Number (on invoice or available from Ecology if tank is registered): FAX 206 593 5229

Site/Business Name: VACANT

Site Address: 3733 - 3737 S. G STREET

TACOMA WA

### 2. TANK PERMANENT CLOSURE TO BE PERFORMED BY (if known):

Firm: WEST PAC ENVIRONMENTAL

Address: 54 S. DAWSON ST.

SEATTLE WA

Telephone: (206) 762-1190

Contact Name: MARK MC CULLOUGH

### 3. TANK INFORMATION

Tank Identification	Approx. Closure Date	Tank Capacity (gallons)	Tank Age (years)	Last Substance Stored
<u>NONE</u>	<u>6/3/96</u>	<u>2,000</u>	<u>UNKNOWN - (OLD)</u>	<u>GASOLINE</u>
<u>NONE</u>	<u>11</u>	<u>2,000</u>	<u>11</u>	<u>11</u>
<u>NONE</u>	<u>11</u>	<u>2,000</u>	<u>11</u>	<u>11</u>
<u>NONE</u>	<u>11</u>	<u>2,000</u>	<u>11</u>	<u>11</u>
<u>NONE</u>	<u>11</u>	<u>500</u>	<u>11</u>	<u>WASTE OIL</u>

### 4. SIGNATURE OF TANK OWNER/OPERATOR OR AUTHORIZED REPRESENTATIVE:

Mark McCullough

PROJECT ENGINEER

5/2/96



STATE OF WASHINGTON

DEPARTMENT OF ECOLOGY

P.O. Box 47775 • Olympia, Washington 98504-7775 • (360) 407-6300

**CERTIFIED MAIL**

February 11, 2003

**RECEIVED**

**FEB 14 2003**

Tacoma-Pierce County  
Health Dept.

Ms. Bich Lam,  
769 South 38<sup>th</sup> Street  
Tacoma, Washington

Dear Ms. Lam:

Re: Former Service Station, 3733-3737 South G Street, Tacoma, Pierce County, Washington,  
Ecology Facility ID 427942

Department of Ecology (Ecology) has recently amended the Model Toxics Control Act Cleanup (MTCA) Regulation, Chapter 173-340 WAC. Some of the cleanup levels for contaminants in soil have been changed. In light of these amendments, the Southwest Regional Office (SWRO) has reviewed records on the site listed above. The reports that have been reviewed are as follows:

- *Underground Storage Tank Site Assessment Activities*, ALS Consulting, August 19, 1996

Prior to the file review, the status of this site was listed on Ecology's leaking underground storage tank database as 'Awaiting cleanup'.

Based on the file review, the following site conditions and missing elements were noted as follows:

- Extent of petroleum contamination in the tank excavation and piping/dispenser island areas needs to be defined.
- Water was found in the tank excavation. Extent of contamination in water needs to be defined.

After completing a file review, Ecology has retained the data base listing of the 3733 South G Street, Tacoma, Washington site as 'Awaiting Cleanup'.

In conversations with consultants and the Tacoma Pierce County Health Department, it appears that extensive work has been done at this site to remediate petroleum contamination. However, Ecology has not received any of the resulting reports. Please submit copies of all reports (except the on listed above) concerned with cleanup activities (performed or planned) to Ecology by March 24, 2003. Please include a copy of any interim or final cleanup reports generated for the site which are not listed in this letter.



Mr. Bich Lam  
February 11, 2003  
Page 2 of 2

Ecology copies of documents on this site are kept in the Records Center for the Southwest Regional Office of Ecology. Ecology documents that are stored in the Records Center are made available for public review by appointment only. Appointments can be made to review site files by calling the SWRO Records Center at (360) 407-6365 or 407-6366.

Thank you for your work toward remediation of this site. If you have any questions, I may be reached at (360) 407-6263.

Sincerely,

A handwritten signature in cursive script, appearing to read "Carol A. Johnston".

Carol A. Johnston, R.G.  
Site Manager  
Toxics Cleanup Program

CAJ:ksc/021103 Lam Tacoma

cc: Michael Lam, Nowicki & Associates  
Rob Olsen, TPCHD

11-30-00

3733 - S. 6 st.

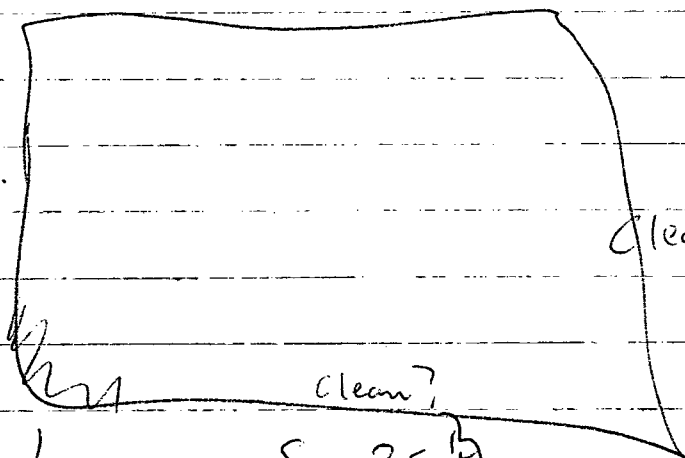
per Michael Lamb of Nowicki + Assoc  
~ 60,000 gallons of  $H_2O$  from Pit has  
been pumped to Storm Drain - City  
of Tacoma has approved This pump out.

- Existing stockpile ~ 250 yd<sup>3</sup> is being  
segregated Hot + Clean. Hot PCS is going  
to Olympic view "clean" stockpiled soil  
is being sampled to determine if it can  
be used as backfill.

- all walls have been Sampled

↑  
N

S. 6 st.



Hot Per

previous

Investigation

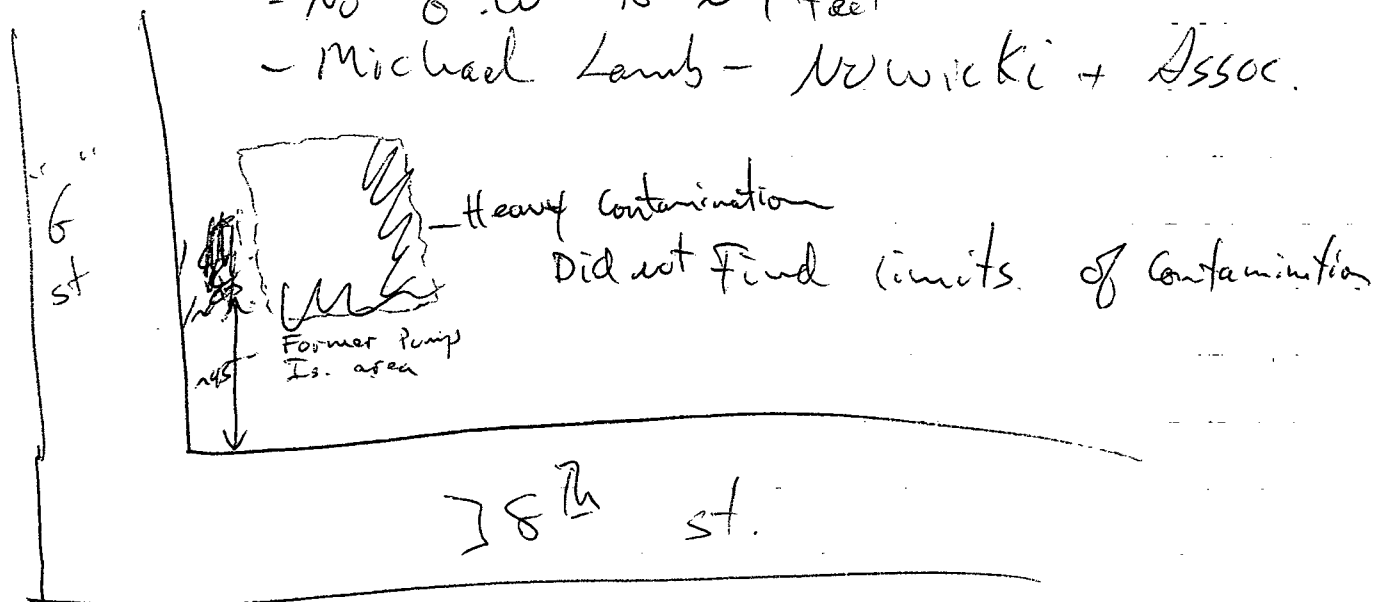
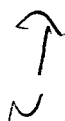


(3737)

3733 - S. 6. St

4-14-98 - ML - Onsite Overexcavation Taking place in Western portion of property.

- at 1:45<sub>pm</sub> ~ 230 Tons of PCS to JPS
- No G.W. to ~ 9 feet
- Michael Lamb - Nowicki + Assoc.



4-29-98 Per Michael Lamb of Nowicki + Assoc. The owner does not have enough \$ to finish the "dig + haul" cleanup, Nowicki may attempt to get a "method B" cleanup closure

1-28-99, ML - Spoke to Leroy Hinds Regarding property, he wanted know status of site. I told him the site is still contaminated and Per Nowicki + Assoc. The pit is still hot.

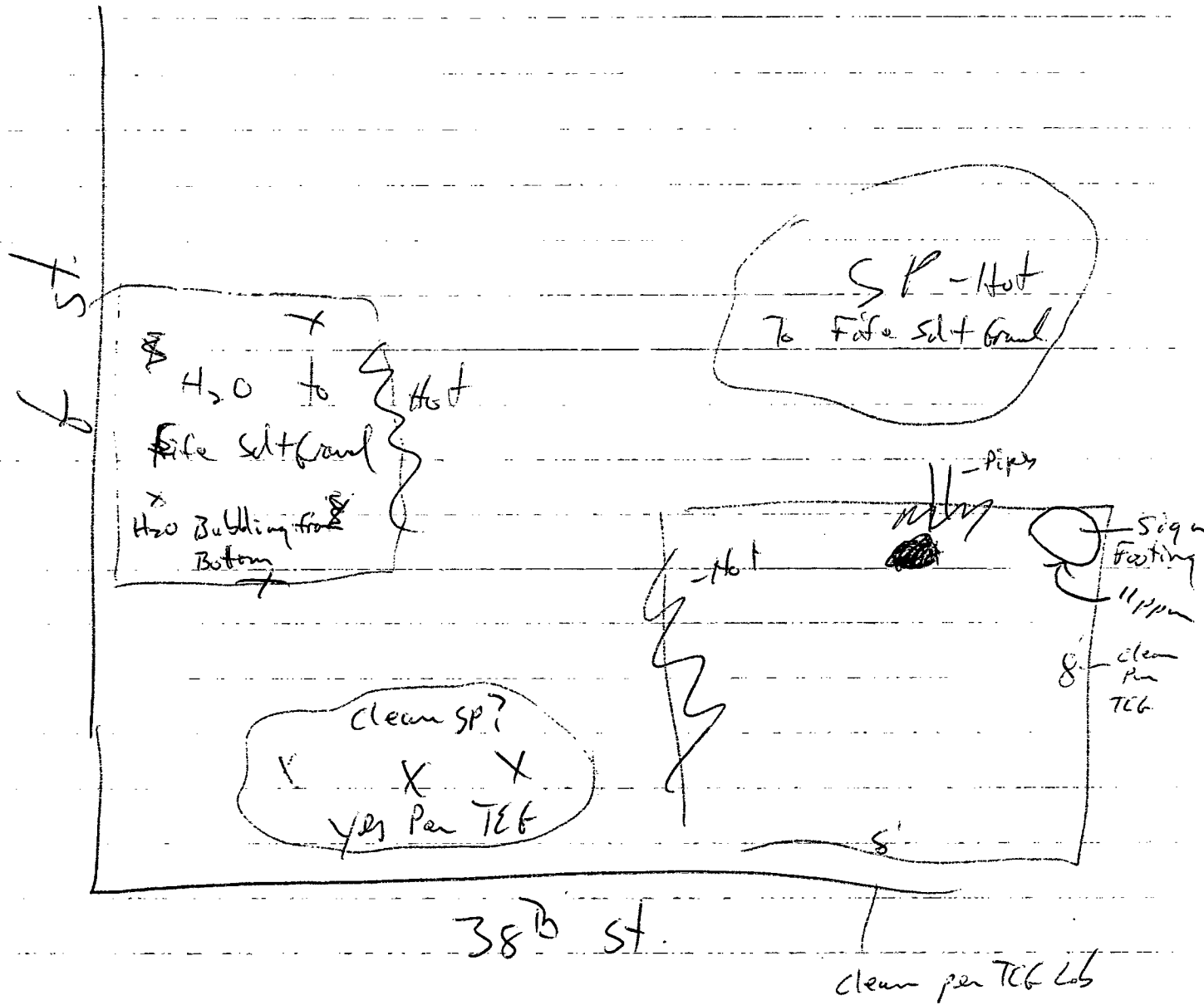
1-28-99 - Left message w/ Michael Lamb at Nowicki to to send Lab Data and Disposal Receipts

Per Michael  
in Pump Is. area

1400 ppm Gas @ 10' BGS, 600 ppm sidewall

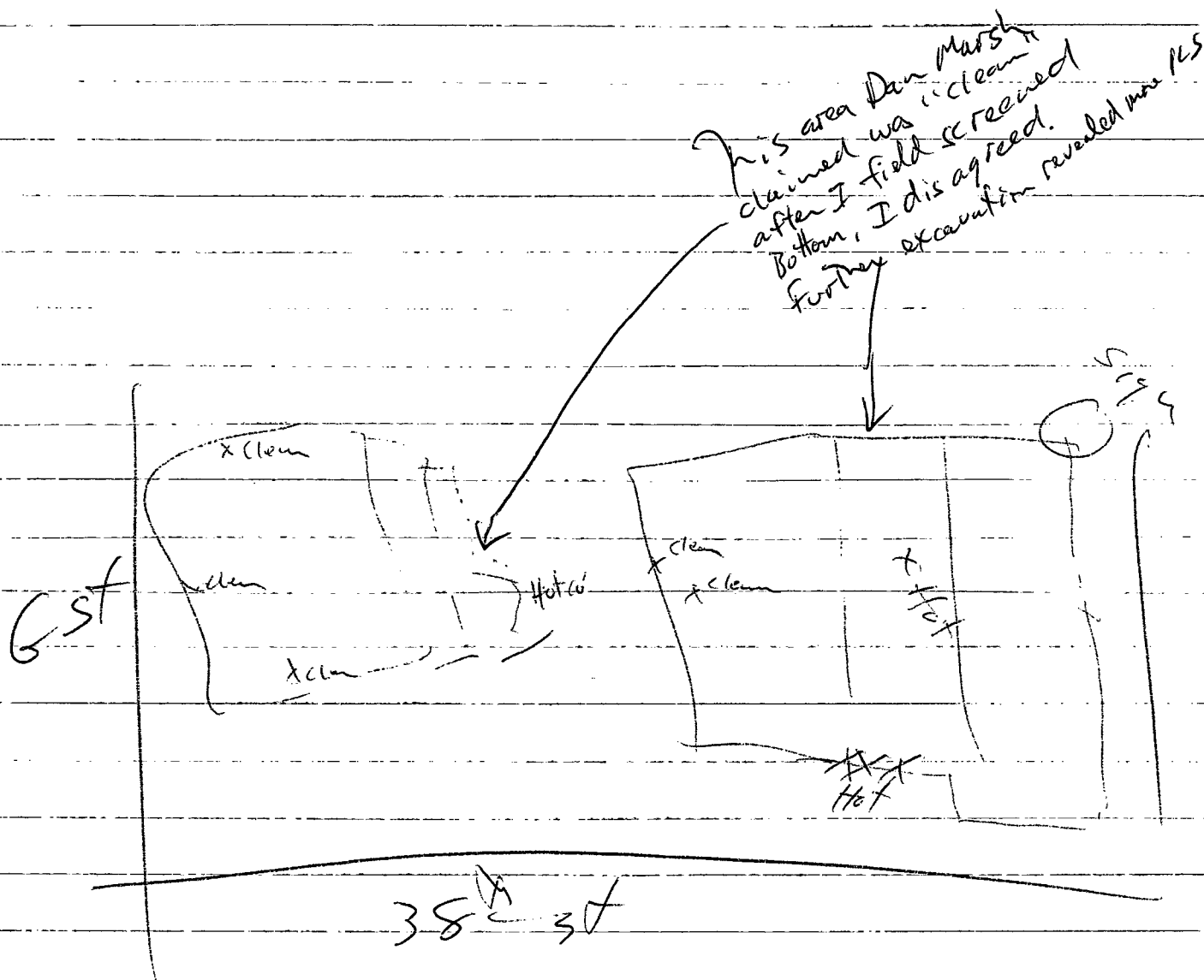
3-16-99-MC 3733 S. 6 St.

- No Workplan was turned in to TPC#D



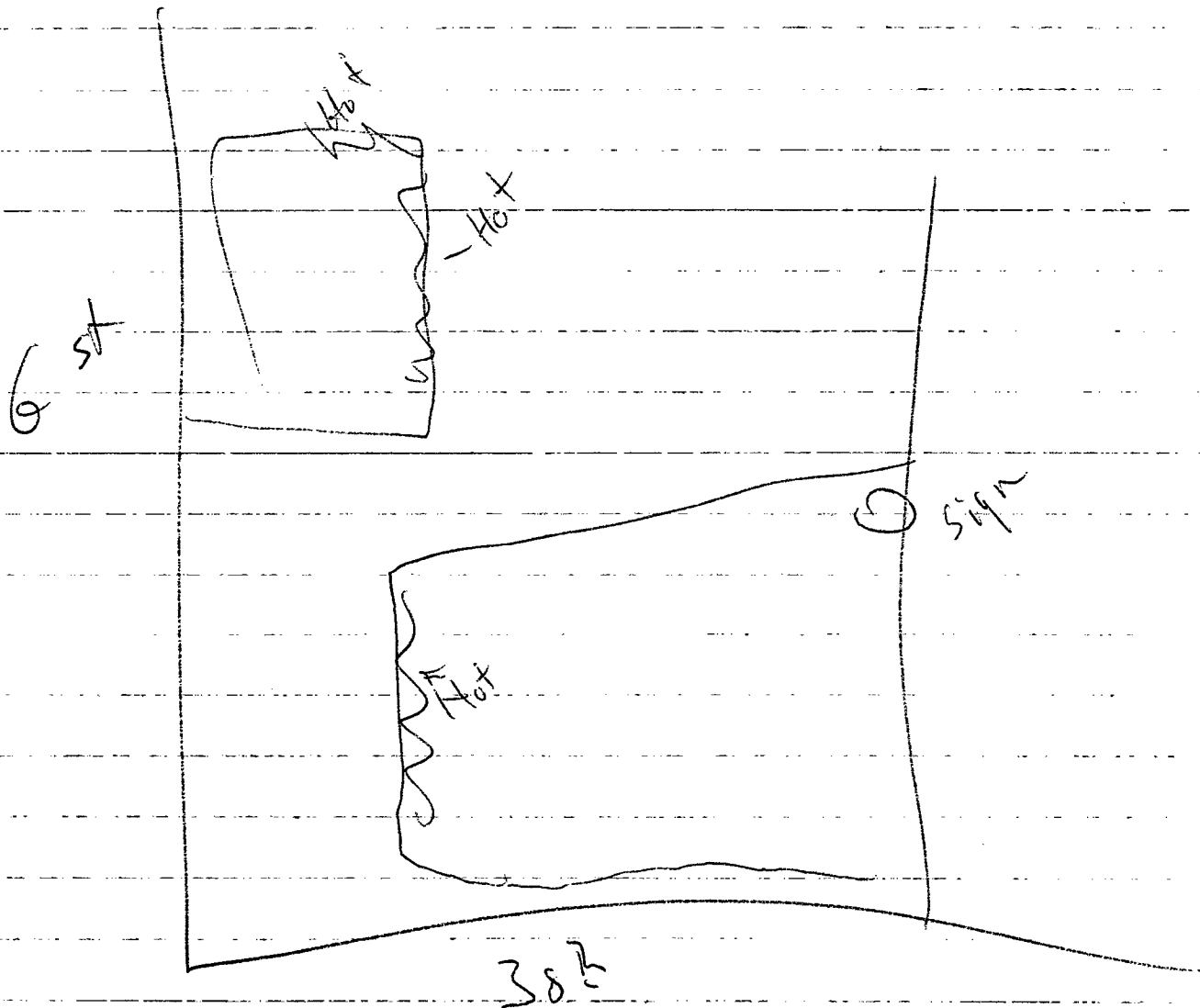
- TEG - Mobile Lab onsite, TPH-6, BTEX, Lead, Tank Truck onsite, one Tank load was ND for H<sub>2</sub>O.
- Another Tank truck to be used in Fire Sdt Gravel Remediation Process?
- Fire Pond -> where GW went from Pump Trucks ~35,000 Gal of H<sub>2</sub>O

3-16-99-m



3-17-99 - MC - Onsite 3733 - S. 6 st.

↑  
~ no Site Assessor Onsite, Backhoe operator.





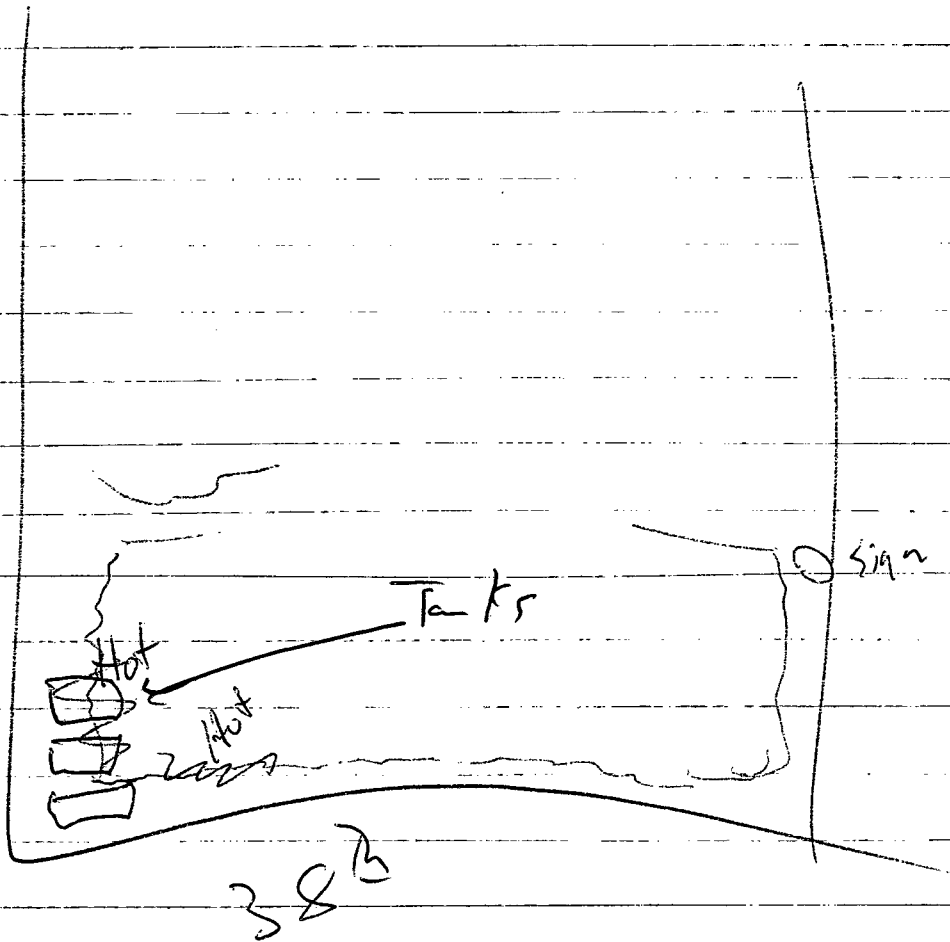
3-18-99-MC- 3733 - So. 6 street

11:15 Am

↑  
~

- After Pit was pumped of standing H<sub>2</sub>O, no  
recharge has occurred

6<sup>st</sup>



3-18-99-ML - per Dan Marsh, Contamination runs all the way from the west side of lot to East side

Station originally built in ~~the~~ 1917.

4 new vts (1600 gal ea) full of water left onsite.

- Per Dan Marsh There was ground water in the 4 tanks they just found. I asked Dan what they did w/ the H<sub>2</sub>O that was in the tanks. He said they just drained the H<sub>2</sub>O onto the "dirty" stock pile onsite. I told him that is not an approved way of disposing of potentially contaminated G.W. w/out analytical


11-1-00 - ml - Approve work plan to do further characterization of pit, then dig & haul PCS to Kitsap Co. Landfill.



Federico Cruz-Urbe, MD, MPH  
Director of Health

Governed by a local  
Board of Health

- Community Based
- Competitive
- Integrated
- Preventive

 Printed on 100% recycled paper

3629 South D Street  
Tacoma, WA 98408-6897

253/798-6500  
TDD: 798-6050  
800/992-2456

[www.healthdept.co.pierce.wa.us](http://www.healthdept.co.pierce.wa.us)

November 1, 2000

Michael Lam  
Nowicki & Associates  
33516 - 9<sup>th</sup> Ave S. Bldg # 6  
Federal Way, WA. 98003

**RE: Underground Storage Tank (UST) Removal-  
Site Remediation Work Plan  
3733 - 3737 South G Street, Tacoma, WA.  
Parcel #: 7470032870**

Dear Mr. Lam:

This letter is to inform you that the Tacoma-Pierce County Health Department (TPCHD) has reviewed the October 2000 Remediation Work Plan prepared by Nowicki & Associates for the above referenced property. The TPCHD approves this work plan with the following comments:

- ♦ The owner/operator of this property is responsible to demonstrate that no UST contamination has occurred onsite. The owner shall be responsible for soil and / or groundwater testing, the removal of contaminated soil and its proper disposal to the satisfaction of the TPCHD, per City of Tacoma Code Chapter 5.47.
- ♦ Please provide at least 2 days notice prior to any remedial activities take place onsite, so that site visits may be scheduled.

Please contact me at (253) 798-6566 if you have any questions regarding this site.

Sincerely,



Mark LaVergne  
Environmental specialist  
Source Protection Program

cc: Carol Johnston, Department of Ecology

NOWICKI & ASSOCIATES, INC.  
33516 9<sup>th</sup> Avenue South, Bldg #6  
Federal Way, WA 98003  
(253) 927-5233  
(253) 924-0323 FAX  
E-Mail: RENowicki@AOL.com

## facsimile transmittal

TPCHD

To: Mark La Vergne Fax: 253 798 6498  
From: Michael Lam Date: Nov 1, 2000  
Re: 38th & G SITE Pages: 5

CC:

☐ Urgent ☐ For Review ☐ Please Comment ☐ Please Reply ☐ Please Recycle

Mark,  
Attached is the permit from City of  
Tacoma - Stormwater Discharge -  
for the site @ 3717 1/2 G Street.

Michael

Rec  
11-1-00  
ML





City of Tacoma  
Public Works Department

October 31, 2000

Mr. Michael Lam  
Nowicki & Associates  
33516 9<sup>th</sup> Avenue So.  
Federal Way, WA 98003

RE: Special Approved Discharge Permit

Dear Mr. Lam:

Enclosed please find the Special Approved Discharge Permit for discharging groundwater into Tacoma's municipal storm drainage system from 3717 So. G Street. Please contact me 24 hours prior to discharging so I can verify the initial reading off of the flow meter. Should you have any questions please contact me at (253) 502-2120.

Sincerely,

  
Paul Tollefson  
Stormwater Quality Representative  
Environmental Services Technical Support Division

File: Nowicki & Associates S.A.D. file



**SPECIAL AUTHORIZATION  
TO  
DISCHARGE TO THE CITY OF TACOMA'S  
STORM DRAINAGE SYSTEM**

In accordance with Tacoma Municipal Code Chapter 12.08.080, 12.08.365, and subject to any other applicable conditions contained in Chapter 12.08 and in this authorization the entity specified herein is authorized to discharge to the City of Tacoma's (TACOMA) storm drainage system:

Nowicki & Associates, Michael Lam, (253) 927-5233

Name of Responsible Company, Authorized Representative, Phone Number

33516 9<sup>th</sup> Avenue So., Federal Way, WA 98003

Address of Company, Street, City, State, Zip

Michael Lam, Nowicki & Associates, (253) 927-5233

Company Contact Person, Phone Number, Emergency (24-Hour) Phone Number

Mr. & Mrs. Bich Lam, (253) 472-1320

Name of Property Owner, Phone Number

769 So. 38<sup>th</sup> Street, Tacoma, WA 98409

Address of Property Owner, Street, City, State, Zip

3737 So. G Street, Tacoma, WA

Address of Discharge Location, Street, City

**A. DISCHARGE CONDITIONS:**

1. Flow Limitations and Monitoring Requirements:

(a) Discharge must not exceed 450 gpm during dry conditions, 225 gpm during rainy conditions. Discharge must not cause flooding during dry or rainy conditions.

(b) Flow rate must be metered (in gallons) for billing purposes.

(c) Discharging must be performed between the hours of 8:00 AM and 5:00 PM.

(d) Discharge must not interfere with vehicular or pedestrian traffic.

2. Quality Limitations and Monitoring Requirements:

Discharge must be monitored for turbidity and total petroleum hydrocarbons (TPH) during the duration of the operation. There shall be no visible sheen or discoloration (turbidity). Water must be prescreened prior to discharge. Samples may be required during discharge to insure compliance with Federal, State and Local water quality regulations.

If samples for compliance are required, they shall be by grab method and shall be analyzed in conformance with **Guidelines Establishing Test Procedures for the Analysis of Pollutants**, contained in 40 CFR Part 136 and appendices, as amended.

**B. DISCHARGE LOCATION:**

Discharge from site will be to a catch basin located in the Northeast corner of South 38<sup>th</sup> and G streets. Basin is located in City right of way.

**C. OTHER CONDITIONS:**

1. Must possess a valid NPDES Permit or equivalent authorization from Department of Ecology and/or Environmental Protection Agency (if applicable), and operate in compliance with that permit as determined by the issuing agency.
2. Must sign and submit to Tacoma prior to discharge, a Hold Harmless Agreement provided by Tacoma (as with any legally binding document, you are advised and may wish to consult with your attorney before executing it).
3. Must pay the applicable fees and maintain payments as provided for in Tacoma Municipal Code Chapter 12.08.365.
4. Must cease discharge upon any of the following conditions:
  - a. Violation, either suspected or detected, of any of the discharge conditions specified in A. above.
  - b. When directed to by TACOMA.
  - c. During rain events when 0.8 inches or more of precipitation has fallen during a consecutive 7-hour period (discharge may resume after less than or equal to 0.01 inches of precipitation has fallen during a consecutive 6-hour period); a rain gauge shall be placed on site and maintained for this purpose.
5. Must deliver a letter to TACOMA at the Utility Services Engineering Division, 2201 Portland Ave. E., Tacoma, WA 98421-2711, FAX 253-502-2107, within 5 calendar days of any exceedance of the discharge conditions specified in A. above, explaining the limitations exceeded, the cause, the measures taken to mitigate it and to prevent reoccurrence.

**D. PRIOR TO COMMENCEMENT OF DISCHARGE:**

At least 2 business days prior to the anticipated start of discharge, you must call the TACOMA representative at 253-591-5588 of your intent to start and receive final discharge approval. An on-site inspection may be performed by TACOMA staff including discharge sampling.

**E. ENFORCEMENT:**

Violations of this authorization or of Tacoma Municipal Code Chapter 12.08 will be subject to enforcement provisions of said Chapter.

**F. DURATION:**

This permit covers discharges from this event only. The permit will expire immediately after the discharge event is over or within 60 days after the issuance date of this permit, whichever occurs first.

ON BEHALF OF THE CITY OF TACOMA

Signature

Dated

10/27/00

The 24-hour emergency telephone number is 253-591-5595. The regular business hours (Mon-Fri 8:00 a.m. to 4:30 p.m.) number is 253-591-5588. Fax 253-502-2160.



October 27, 2000

**NOWICKI  
& ASSOCIATES**  
ENERGY & ENVIRONMENTAL MANAGEMENT

Mr. Mark LaVergne  
Environmental Health Specialist  
Source Protection Program  
Tacoma Pierce County Health Department  
3629 South D Street  
Tacoma, WA 98408-6897

TPCHD  
3629 SOUTH D STREET  
TACOMA WA 98408

10/27/2000 2:37 PM  
Rcpt: 25195 R-1

CHECK #7309 \$240.00

RE: Site Remediation Work Plan  
3733-3737 South G Street  
Tacoma, Washington

This Work Plan has been prepared for the site remediation at the above referenced site, where gasoline impacted soil is present as a result of the removal of the former underground storage tanks (USTs). The work plan outlines the site remedial method, site sampling & analytical methods, and site reporting and closure.

Site Background:

Four gasoline USTs were removed from the site in July of 1996 by Wes Pac Environmental. A site assessment was completed by ALS Consulting and laboratory results confirmed gasoline product release exceeding Washington State Model Toxics Control Act (MTCA) Method A clean-up levels at the tank excavation pit and the fuel dispenser island. Gas TPHs were found in the range of 700 ppm to 2,700 ppm. Approximately 30 cubic yards of impacted soil were excavated and stockpiled at the site during tank removal activities.

In April of 1998, Nowicki & Associates, Inc. (NAI) was retained by Well Fargo to oversee the soil clean-up. Approximately 300 tons of impacted soil were removed from the former fuel island area and disposed of at TPS Technologies. Soil samples were detected with gas TPHs concentrations at varying levels. The bottom sample collected at 10' below ground surface had the highest gasoline level of 2,100 ppm. The west and south wall samples were below MTCA clean up level. Final excavation dimensions were approximately 23' x 28' x 10' bgs. Because of insufficient funding for the project, site activities were halted. No groundwater was encountered.

Additional work was completed under the direction of Fife Sand & Gravel in 1999 and three additional abandoned USTs were discovered during soil excavation. It is assumed that because of unresolved issues between the site owner representative at the time and Fife Sand & Gravel, site work was stopped. It is unknown whether any soil was transported off-site for treatment disposal. However, the site is observed with several large soil stockpiles, which are assumed to be the excavated impacted soil.

Site Remediation:

Accumulated surface runoff in excavated pit:

Surface run-off and precipitation have accumulated in the tank excavation. The excavation water was sampled by NAI on 9/18/00 and laboratory results were non-detect for Gas, BTEX, diesel and oil. Prior to soil excavation, the water will be discharged into the catch basin located at the northeast corner of 38<sup>th</sup> & G Street. A discharge permit has been issued by the City of Tacoma Public Works Department.

Water in the excavation will be pumped using a 3" suction pump with a minimum flow rate of 60 GPM. Discharge will be pre-screened with a silt filter. Highly turbid water or water with sediment will be collected into a holding tank and disposed of based on laboratory data, accordingly.

33516 9th Avenue South  
Building #6  
Federal Way, Washington 98003  
Phone: (253) 927-5233  
FAX: (253) 924-0323

RECEIVED  
OCT 27 2000  
Tacoma-Pierce County  
Health Department

#### Impacted Soil Removal & Disposal:

Impacted soil above MTCA Method A clean-up levels for gas/BTEX will be excavated and disposed of at Kitsap County Landfill. Because laboratory data are not available to us for the site activities to date (including the discovery of additional USTs), preliminary site characterization will be conducted by either field screening or laboratory analysis. Based on preliminary evaluation, soil excavation will proceed accordingly. As mentioned previously, limited data indicate vertical extent of soil impact at the former fuel dispenser island to be below 10' below ground surface (bgs).

Additional impacted soil is anticipated in the former tank excavation pit, southeast corner of the lot. Previous data indicate soil under the north former tank (UST#4) with gas TPHs at 700 ppm at 11' bgs (Refer to attached ALS Soil Results Figure 2). Soil excavation is anticipated to proceed to at least 12' bgs in the former tank excavation. Lateral extents of soil impact are assumed confined to the north end of the excavation and to the north half of the west sidewall, where product lines entered/exited from the tank area. Sidewall sample was detected at 640 ppm gas at 6' bgs in this area.

The exact location(s) of the additional abandoned USTs are unknown but based on the existing outline of the excavated pit, they are assumed to be at the southwest corner of the lot. Soil samples will be collected on sidewalls at various depths, after the water in the excavation has been pumped, for field screening. No work is anticipated for impacted soils under public sidewalk or in the streets until requested by the site owner and required permits have been obtained.

The existing excavated stockpiled soil will be field screened prior to transport off-site for disposal. Soils with low or no detection of contaminants will be separated into another stockpile and re-sampled for final disposal determination.

#### Field Screening and Sampling Method:

Field screening will be completed using a combustible gas indicator (CGI) Tank Techtor. Soil samples for laboratory analysis will be collected into pre-cleaned laboratory-supplied 4-oz glass jars with teflon lids. All samples will be labeled and logged onto a sample Chain of Custody. All samples will be stored in an ice cooler until delivery to the laboratory. The number of soil samples collected will depend on the extents of soil impact and excavation. Samples will be collected from the center of the trackhoe bucket or from a location not in contact with the bucket and directly inserted into sample jars. Whenever possible, samples will be collected with handtools which will be decontaminated between sampling.

#### Analytical Method:

Samples will be lab-analyzed by Transglobal Geosciences (TEG) located in Lacey, Washington. Samples will be analyzed for gas-TPHs and BTEX using method NWTPH-Gx and EPA 8020. Samples from the abandoned UST area will also be initially analyzed for total lead. If lead is detected above MTCA A level, then additional sampling for lead will continue as part of the sampling program.

#### Sample and Laboratory Quality Assurance:

One field duplicate may be collected for every batch of soil samples and will be evaluated for result consistency.

Laboratory quality assurance will include TEG's QA/QC program, which meets all appropriate established requirements. Standard practice includes analysis of method blank, duplicates, matrix or blank spiked samples, and duplicate spiked samples, with each batch of samples. Detection limits are 10 mg/Kg for gas-

Mark La Vergne  
October 27, 2000

Page 3

TPHs and 1.0 mg/Kg for BTEX for soil matrix. For water matrix, detection levels are 100 ug/L for gas TPHs and 1.0 ug/L for BTEX.

Site Reporting and Closure:

The results of site clean-up will be documented in a final report and will be submitted to Ecology and TPCHD, within 30 days after completion. It is anticipated that the site will also participate in Ecology's Voluntary Clean-up Program to obtain a No Further Action Status.

We anticipate starting site work by November 6, 2000, pending Wm Dickson's schedule of availability. Please call me at 253-927-5233 if I can answer any questions you may have.

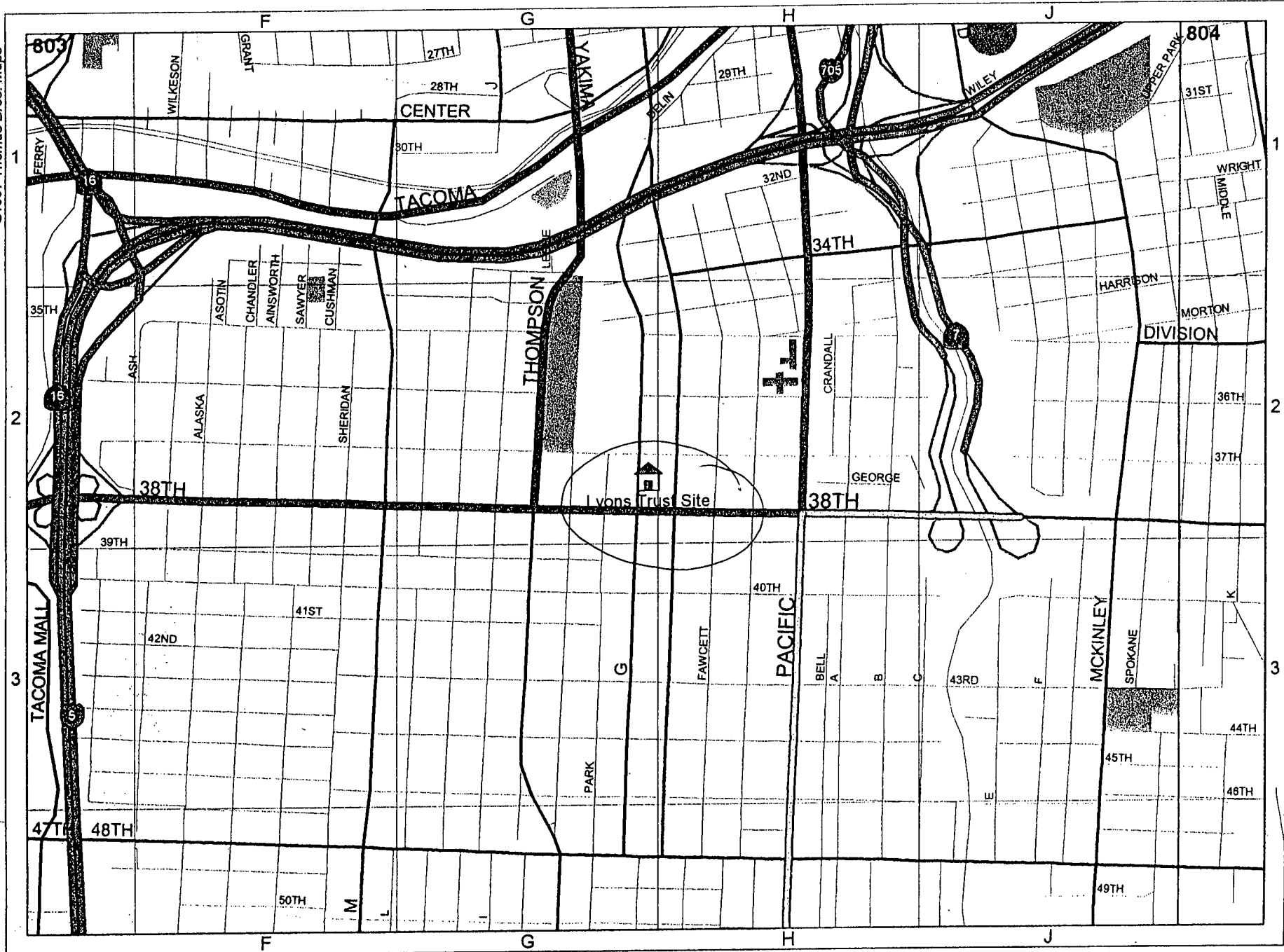
Sincerely,



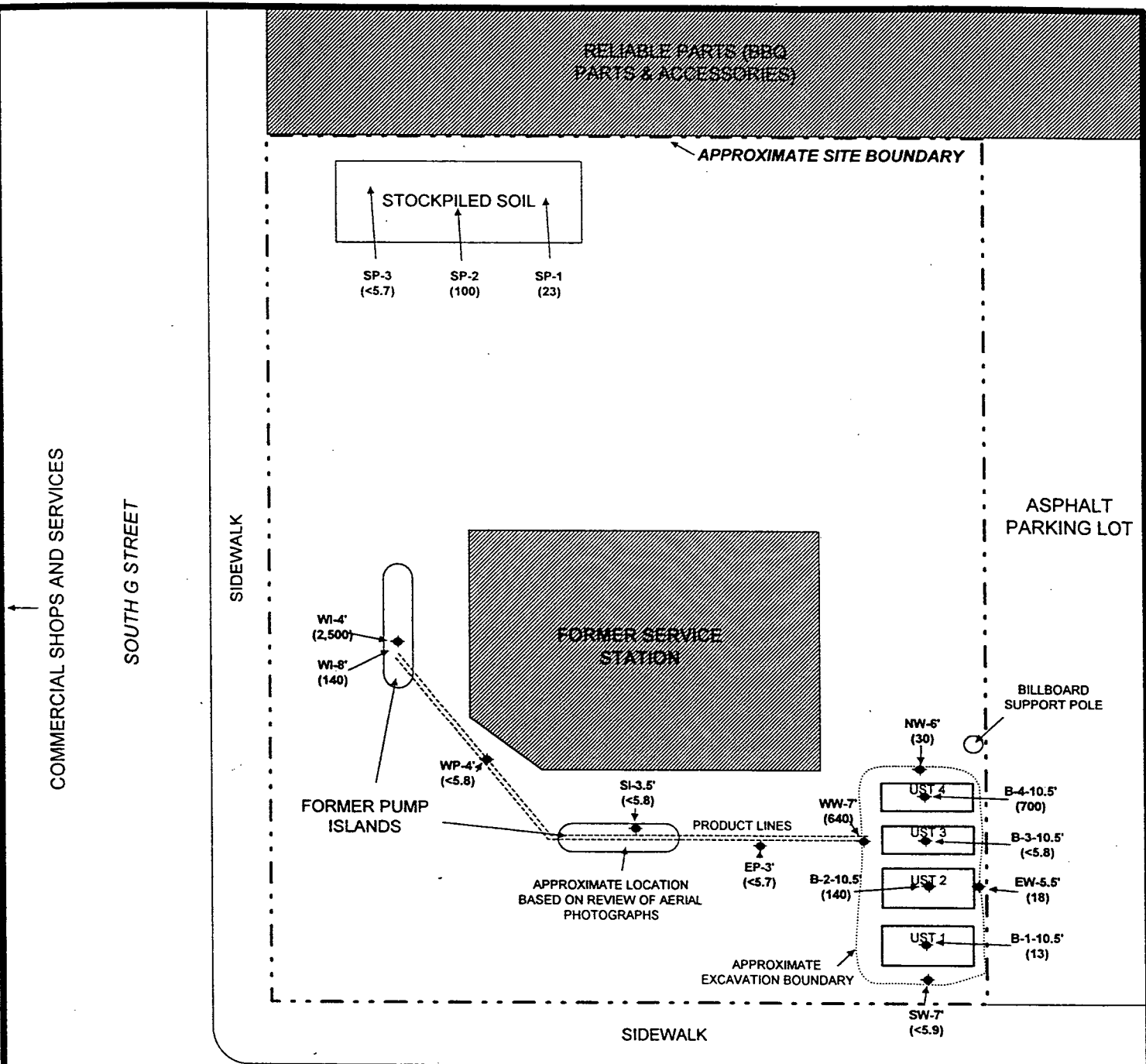
Michael Lam  
Project Engineer  
cc: Mr. & Mrs. Lam

Attachs:

- Site Map
- ALS Soil Data Results
- NAI Soil Sample Location Figure with Lab Results (4-15-98)
- City of Tacoma Application for Storm Drainage System Discharge with Site Sketch and
- OnSite Laboratory Report of Excavation Water







# **LEGEND:**

- SI-3.5'◆ = APPROXIMATE LOCATION OF SOIL SAMPLE
- BGW ◆ = APPROXIMATE LOCATION OF EXCAVATION WATER SAMPLE
- (640) = TOTAL PETROLEUM HYDROCARBONS (WTPH-G) mg/kg (~ppm)

SOUTH 38TH STREET

US POST OFFICE

FLYING BOOTS CAFE

PROJECT NO.: 1-96-0004

DESIGNED BY: DFK

SCALE: 1" ~ 15'

DRAWN BY: DFK

CHECKED BY:

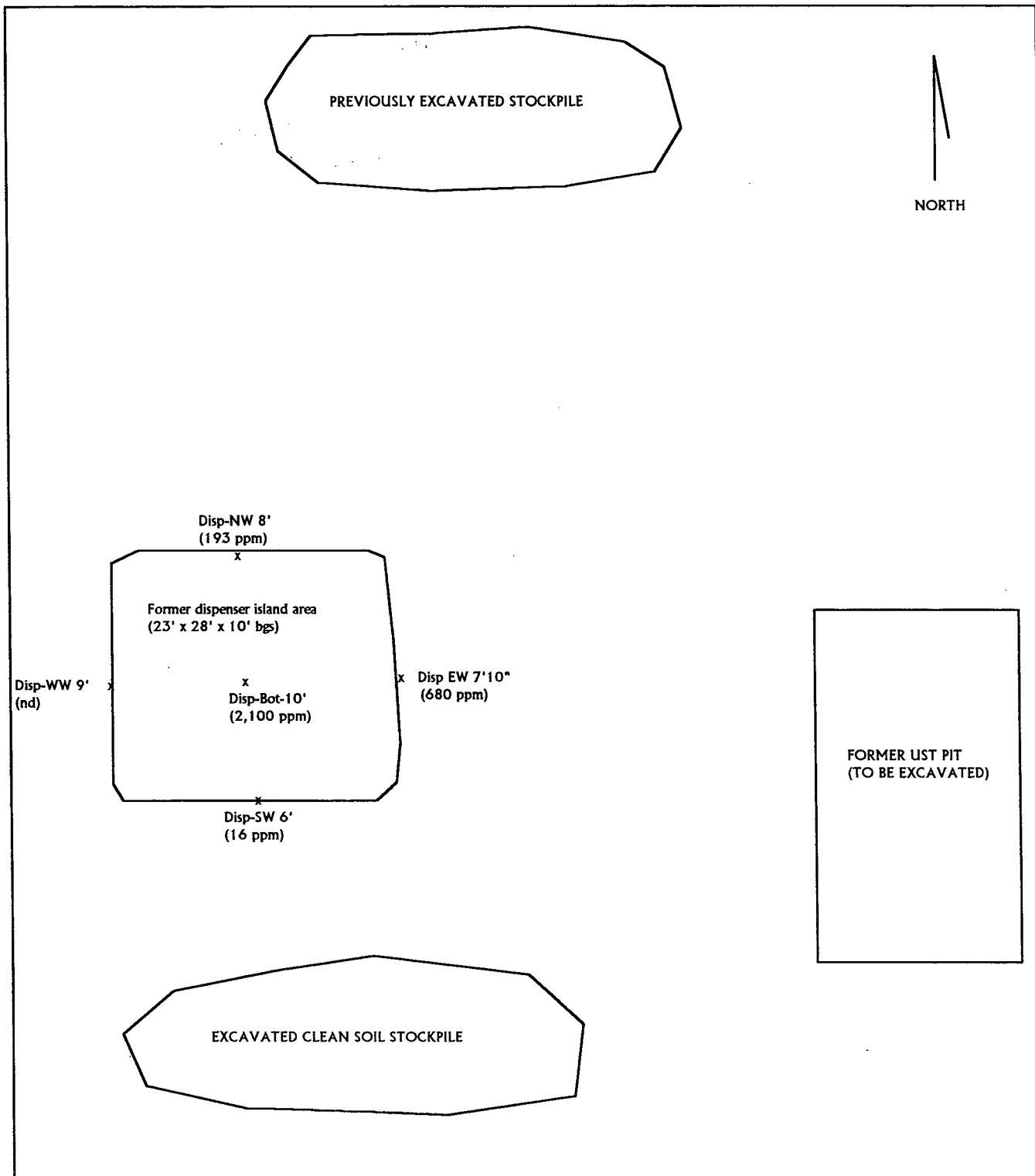
DATE: 08/12/96

**FIGURE 2**

## **SOIL ANALYTICAL RESULTS**

UST SITE ASSESSMENT  
WELLS FARGO BANK PROPERTY  
3733 - 3737 SOUTH G STREET  
TACOMA, WASHINGTON 98408

*AS*



Note:  
 bgs ... below ground surface  
 x Bot-10' ... Soil sample location with sample ID  
 ( 900 ppm) ... Gasoline range intermediate petroleum distillates

LYONS TRUST - 3733-3737 SOUTH G, TACOMA, WA

FIGURE 1. SOIL SAMPLE LOCATIONS

1"=15'

NOWICKI & ASSOCIATES, INC.

4-15-98

## TRANSGLOBAL ENVIRONMENTAL GEOSCIENCES NORTHWEST INC.

## LYONS TRUST PROJECT

Tacoma, Washington

Nowicki &amp; Associates, Inc.

## Intermediate Petroleum Distillates (IPD), Gasoline (NWTPH-Gx) &amp; BTEX (EPA 8020) Analyses for Soils

Sample Number	Date Analyzed	Benzene mg/kg	Toluene mg/kg	Eth Benz mg/kg	Xylene mg/kg	Gasoline mg/kg	IPD mg/kg	Recovery (%)
Meth. Blank	04/14/98	nd	nd	nd	nd	nd	nd	80
Disp-Bot 10'	04/14/98	nd	nd	nd	11.7	nd	2190	94
Disp-NW 8'	04/14/98	nd	nd	nd	1.16	nd	193	85
Disp-NW 8' Dup	04/14/98	--	--	--	--	nd	162	110
Disp-SW 6'	04/14/98	nd	nd	nd	nd	nd	16	106
Disp-EW 7 10"	04/14/98	nd	nd	nd	1.14	nd	680	int
Disp-WW 9'	04/14/98	nd	nd	nd	nd	nd	nd	109
Disp-FX 1	04/14/98	nd	nd	nd	2.73	nd	450	int
Detection Limits		0.05	0.05	0.05	0.05	10	10	

"nd" Indicates not detected at the listed detection limits.

"int" Indicates that interferences prevent determination.

CLIENT: Nowicki & Assoc  
ADDRESS: 33516 9th Ave S, #6 Fed Wy WA 98003  
PHONE 253 927-5233 FAX: 253-924-0323  
CLIENT PROJECT #: \_\_\_\_\_ PROJECT MANAGER: Michael Lam

DATE: 4/14/78 PAGE 1 OF 1  
PROJECT NAME: Lyons Trst  
LOCATION: Tacoma, WA  
COLLECTOR: ML DATE OF COLLECTION 4/14/78

[illegible]

RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)	DATE/TIME
-----------------------------	-----------	-------------------------	-----------

Michaelson - NAI 4-14-98 4<sup>45</sup> PM

RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)	DATE/TIME
-----------------------------	-----------	-------------------------	-----------

## SAMPLE RECEIPT

TOTAL NUMBER OF CONTAINERS

CHAIN OF CUSTODY SEALS Y/N/NA

SEALS INTACT? Y/N/NA

RECEIVED GOOD COND./COLD

NOTES:

LABORATORY NOTES:

### SAMPLE DISPOSAL INSTRUCTIONS

☐ TEG DISPOSAL @ \$2.00 each      ☐ Return      ☐ Pickup





APPLICATION  
FOR  
SPECIAL AUTHORIZATION TO DISCHARGE  
TO THE CITY OF TACOMA  
STORM DRAINAGE SYSTEM

A. APPLICANT(S)

Name: MICHAEL LAM

Company: NOVICKI & ASSOC, INC

Address: 33516 9TH AVE SOUTH, #6

City, State, Zip: FEDERAL WAY WA 98003

Relationship to Project: CONSULTANT

Contact Person: MICHAEL LAM

Business Phone Number: 253 927-5233

Emergency (24-hr) Phone Number: SAME

Name of Other Participant: TED PAGGEOT

Company: WM DICKSON COMPANY

Address: 3315 SOUTH PINE ST

City, State, Zip: TACOMA WA 98409

Relationship to Project: CONTRACTOR

Business Phone Number: 253-472-4489

Emergency (24-hr) Phone Number:

Name of Property Owner: MR. & MRS. BICH LAM

Address: 769 SOUTH 38 STREET

City, State, Zip: TACOMA WA 98409

Phone Number: 253 472 1320

Proposed Discharge Location: NEARBY STORM DRAIN CATCH  
BASIN

Final Discharge Location: \_\_\_\_\_  
\_\_\_\_\_

- B. MAP AND DESCRIPTION OF THE PROPOSED DISCHARGE IN TERMS OF FLOW RATE(S) AS WELL AS TYPE AND CONCENTRATION OF CONTAMINANTS PRESENT OR SUSPECTED PRESENT (provide site map, copies of analyses, design of pretreatment equipment, spill control, etc.):

WATER WILL BE DISCHARGED USING A SECTION 3" DIAPHRAM  
PUMP WITH MINIMUM FLOW RATE OF 60 GAL/MIN.  
DISCHARGE WILL BE PRE-SCREENED WITH A SILT/  
DEBRIS FILTER. PUMP WILL BE SUSPENDED ONTO A  
PVC PIPE (PLACED ACROSS PIT). HIGHLY TURBID WATER OR  
WITH SEDIMENT WILL BE COLLECTED INTO A HOLDING TANK.  
WATER IS NON-DETECT FOR CONTAMINANTS AT SITE.

- C. TIME DURATION OF THE DISCHARGE IN TERMS OF START DATE, END DATE, HOURS PER DAY, AND TOTAL NUMBER OF DAYS: DISCHARGE IS

ANTICIPATED TO START ON NOV 1<sup>ST</sup> & CONTINUE THRU  
NOV 2<sup>ND</sup>. TOTAL DISCHARGE VOLUME ESTIMATE IS BETWEEN  
20,000 - 40,000 GALLONS. 8-HR OPERATION DAY.

ACTUAL DAYS MAY CHANGE BASED ON ACTUAL DISCHARGE RATE.

- D. OTHER PERMITS WHICH YOU NEED, HAVE APPLIED FOR AND/OR RECEIVED -- Specify permit type (i.e. NPDES or Road Obstruction), to whom applied or from whom received (i.e. Department of Ecology or City Public Works Department) and dates:

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

- E. OTHER RELEVANT INFORMATION:

DISCHARGE WILL BE A ONE TIME OCCURENCE


\_\_\_\_\_  
\_\_\_\_\_

I have personally examined and am familiar with the information submitted in this document and attachments (if applicable). Based upon my inquiry of those individuals immediately responsible for obtaining the information reported herein, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and/or imprisonment.

10-20-00  
Date

MICHAEL LAM / DONTICKI & ASSOC  
Name of Applicant/Company

MICHAEL LAM  
Name of Authorized Representative

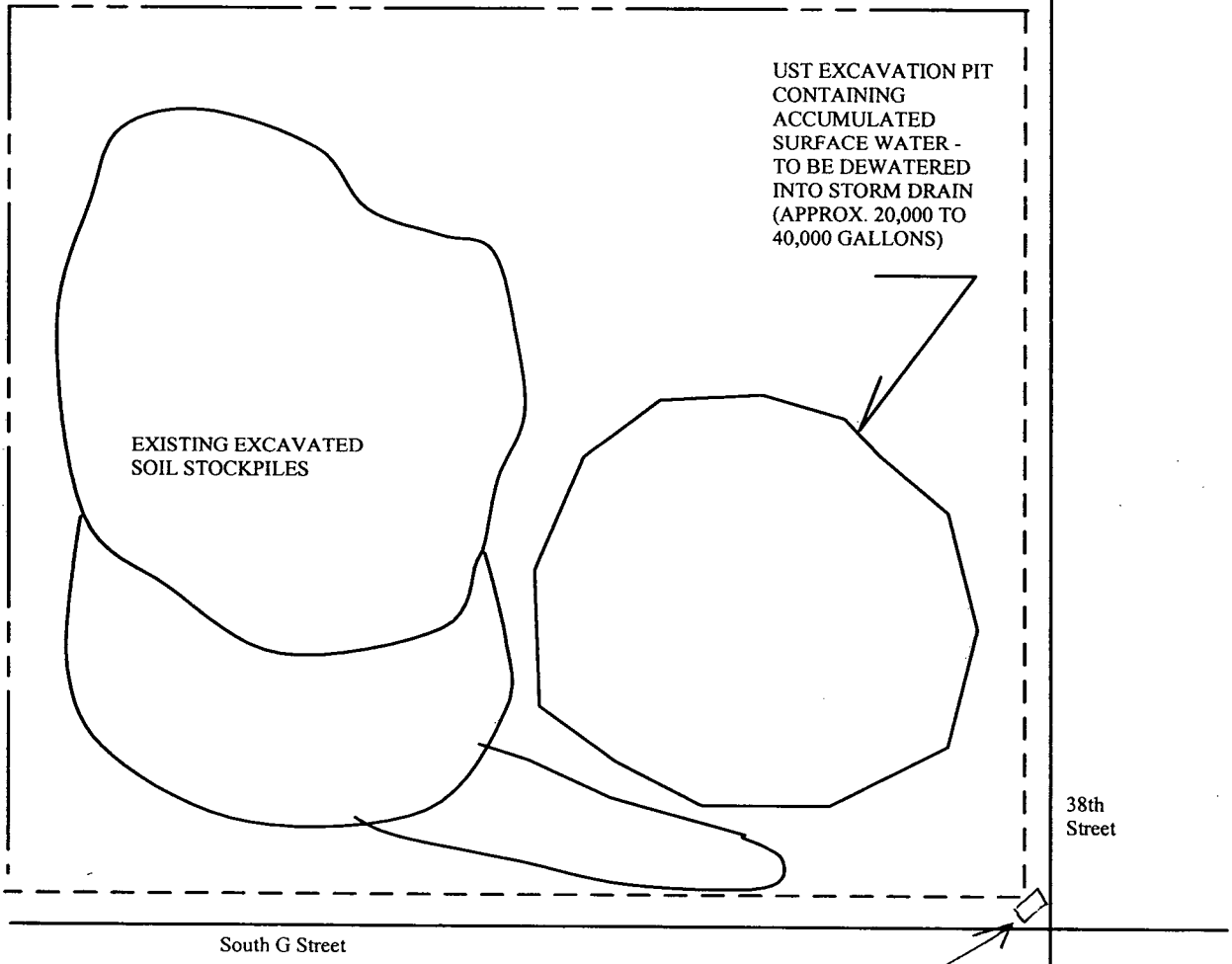
  
Signature of Authorized Representative

10-20-00  
Date

MR. & MRS. BICH LAM  
Name of Property Owner

TED PAGGOTT - WM DICKSON CO.  
Name of Other Participant

ADJACENT SITE  
ASPHALT PAVED PARKING LOT



EXISTING EXCAVATED  
SOIL STOCKPILES

UST EXCAVATION PIT  
CONTAINING  
ACCUMULATED  
SURFACE WATER -  
TO BE DEWATERED  
INTO STORM DRAIN  
(APPROX. 20,000 TO  
40,000 GALLONS)

38th  
Street

South G Street

STORMDRAIN CATCH BASIN LOCATION  
WHERE WATER WILL BE  
DISCHARGED AFTER PRE-FILTERED

--- APPROX FENCE LINE

— APPROX. PROPERTY LINE

NORTH

NE CORNER OF 38TH & G ST
UST SOIL REMEDIATION PROJECT
NOT TO SCALE 10-20-00
NOWICKI & ASSOCIATES, INC.



October 4, 2000

Mr. Paul Tollefson  
City of Tacoma  
Sewer Utilities  
Utilities Services Engineering Department  
Via Fax: 253-502-2107

NOWICKI  
& ASSOCIATES  
ENERGY & ENVIRONMENTAL MANAGEMENT

RE: UST Excavation De-watering  
Northwest Corner Vacant Lot of South 38<sup>th</sup> St and G St (3737 South G Street)  
Tacoma, Washington

Dear Mr. Tollefson:

Pursuant to our phone conversation yesterday regarding the above referenced site, a narrative for the project is provided below. Laboratory results of the water sample is also attached.

Project Narrative:

Four gasoline USTs were removed from the site in July of 1996 and soil contamination with gasoline were identified. Approximately 300 tons of impacted soil were removed for off-site disposal in April of 1998, at which time additional work was halted because of insufficient funding for the project.

Additional work was then completed (or attempted) by Fife Sand & Gravel and two or three additional UST were discovered. Again, site work was halted because of unresolved issue between Fife Sand & the site owner.

Currently, the site is under new ownership and site remediation including removal and disposal of the remaining impacted soils has been planned. However, prior to soil removal the accumulated water in the excavated pit must be removed. A grab water sample was collected by Nowicki & Associates on September 18, 2000 for laboratory analysis. Laboratory results show non-detect for gas, diesel, oil and BTEX.

Because of the non-detect results of the water sample, we would like to request authorization from the City of Tacoma to discharge the water in the excavation into the local storm drain system. The water volume has been estimated to be between 20,000 and 40,000 gallons and this is anticipated to be a one time discharge. Since the site is occupied by a large soil stockpile and also there is insufficient space to place a large water settling tank, we plan to directly pump the water into the storm drain. Because the water has been settled in the excavation for an extended period, over a year, we believe the clear water layer can be pumped without creating much sediment. The remaining turbid water or sediment may be collected into holding drums or mixed with the stockpiled soil for disposal.

At the present, we are planning to start the site work as soon as your approval is given or any permit, if required, is completed.

Please call me at 253- 927-5233 if I can answer any questions.

Sincerely,



Michael Lam  
Project Engineer  
cc: Ted Paggeot - Wm Dickson Co.  
Mr. & Mrs. Bich Lam

33516 9th Avenue South  
Building #6  
Federal Way, Washington 98003  
Phone: (253) 927-5233  
FAX: (253) 924-0323



**OnSite  
Environmental Inc.**

Analytical Testing and Mobile Laboratory Services

September 27, 2000

Michael Lam  
Nowicki & Associates  
33516 9<sup>th</sup> Avenue S, Building 6  
Federal Way, WA 98003

Re: Analytical Data for Project Lam Site  
Laboratory Reference No. 0009-158

Dear Michael:

Enclosed are the analytical results and associated quality control data for samples submitted on September 18, 2000.

The standard policy of OnSite Environmental Inc. is to store your samples for 30 days from the date of receipt. If you require longer storage, please contact the laboratory.

We appreciate the opportunity to be of service to you on this project. If you have any questions concerning the data, or need additional information, please feel free to call me.

Sincerely,



David Baumeister  
Project Manager

Enclosures

Date of Report: September 27, 2000  
Samples Submitted: September 18, 2000  
Lab Traveler: 09-158  
Project: Lam Site

**NWTPH-Gx/BTEX**

Date Extracted: 9-19-00  
Date Analyzed: 9-19-00

Matrix: Water  
Units: ug/L (ppb)

Client ID: EXC-W  
Lab ID: 09-158-01

	Result	Flags	PQL
Benzene	ND		1.0
Toluene	ND		1.0
Ethyl Benzene	ND		1.0
m,p-Xylene	ND		1.0
o-Xylene	ND		1.0
TPH-Gas	ND		100
Surrogate Recovery:			
Fluorobenzene	99%		

Date of Report: September 27, 2000  
Samples Submitted: September 18, 2000  
Lab Traveler: 09-158  
Project: Lam Site

**NWTPH-Gx/BTEX  
METHOD BLANK QUALITY CONTROL**

Date Extracted: 9-19-00  
Date Analyzed: 9-19-00

Matrix: Water  
Units: ug/L (ppb)

Lab ID: MB0919W1

	Result	Flags	PQL
Benzene	ND		1.0
Toluene	ND		1.0
Ethyl Benzene	ND		1.0
m,p-Xylene	ND		1.0
o-Xylene	ND		1.0
TPH-Gas	ND		100
Surrogate Recovery: Fluorobenzene	99%		

Date of Report: September 27, 2000  
Samples Submitted: September 18, 2000  
Lab Traveler: 09-158  
Project: Lam Site

**NWTPH-Gx/BTEX  
DUPLICATE QUALITY CONTROL**

Date Extracted: 9-19-00  
Date Analyzed: 9-19-00

Matrix: Water  
Units: ug/L (ppb)

Lab ID:	09-159-01 Original	09-159-01 Duplicate	RPD	Flags
Benzene	ND	ND	NA	
Toluene	ND	ND	NA	
Ethyl Benzene	ND	ND	NA	
m,p-Xylene	ND	ND	NA	
o-Xylene	ND	ND	NA	
TPH-Gas	ND	ND	NA	
Surrogate Recovery:				
Fluorobenzene	100%	96%		



Date of Report: September 27, 2000  
Samples Submitted: September 18, 2000  
Lab Traveler: 09-158  
Project: Lam Site

**NWTPH-Gx/BTEX  
MS/MSD QUALITY CONTROL**

Date Extracted: 9-19-00  
Date Analyzed: 9-19-00

Matrix: Water  
Units: ug/L (ppb)

Spike Level: 50.0 ppb

Lab ID:	09-159-01 MS	Percent Recovery	09-159-01 MSD	Percent Recovery	RPD	Flags
Benzene	53.1	106	55.0	110	3.5	
Toluene	53.8	108	55.7	111	3.5	
Ethyl Benzene	53.2	106	55.4	111	4.1	
m,p-Xylene	53.4	107	55.6	111	4.0	
o-Xylene	53.1	106	55.5	111	4.3	

Surrogate Recovery:

Fluorobenzene	99%	102%
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Date of Report: September 27, 2000  
Samples Submitted: September 18, 2000  
Lab Traveler: 09-158  
Project: Lam Site

**NWTPH-Dx**

Date Extracted: 9-21-00  
Date Analyzed: 9-21-00

Matrix: Water  
Units: mg/L (ppm)

Client ID: EXC-W  
Lab ID: 09-158-01

Diesel Fuel: ND  
PQL: 0.25

Heavy Oil: ND  
PQL: 0.50

Surrogate Recovery:  
o-Terphenyl 77%

Flags:

Date of Report: September 27, 2000  
Samples Submitted: September 18, 2000  
Lab Traveler: 09-158  
Project: Lam Site

**NWTPH-Dx**  
**METHOD BLANK QUALITY CONTROL**

Date Extracted: 9-21-00  
Date Analyzed: 9-21-00

Matrix: Water  
Units: mg/L (ppm)

Lab ID: MB0921W1

Diesel Fuel: ND  
PQL: 0.25

Heavy Oil: ND  
PQL: 0.50

Surrogate Recovery:  
o-Terphenyl 72%

Flags:

Date of Report: September 27, 2000  
Samples Submitted: September 18, 2000  
Lab Traveler: 09-158  
Project: Lam Site

NWTPH-Dx  
DUPLICATE QUALITY CONTROL

Date Extracted: 9-21-00  
Date Analyzed: 9-21-00

Matrix: Water  
Units: mg/L (ppm)

Lab ID: 09-154-04 09-154-04 DUP

Diesel Fuel: 1.46 1.62  
PQL: 0.25 0.25

RPD: 11

Surrogate Recovery:  
o-Terphenyl 75% 52%

Flags:



**OnSite  
Environmental Inc.**

#### DATA QUALIFIERS AND ABBREVIATIONS

A - Due to a high sample concentration, the amount spiked is insufficient for meaningful MS/MSD recovery data.

B - The analyte indicated was also found in the blank sample.

C - The duplicate RPD is outside control limits due to high result variability when analyte concentrations are within five times the quantitation limit.

D - Data from 1: \_\_\_\_ dilution.

E - The value reported exceeds the quantitation range, and is an estimate.

F - Surrogate recovery data is not available due to the high concentration of coeluting target compounds.

G - Insufficient sample quantity for duplicate analysis.

H - The analyte indicated is a common laboratory solvent and may have been introduced during sample preparation, and be impacting the sample result.

I - Compound recovery is outside of the control limits.

J - The value reported was below the practical quantitation limit. The value is an estimate.

K - Sample duplicate RPD is outside control limits due to sample inhomogeneity. The sample was re-extracted and re-analyzed with similar results.

L - The RPD is outside of the control limits.

M - Hydrocarbons in the gasoline range (toluene-naphthalene) are present in the sample.

O - Hydrocarbons outside the defined gasoline range are present in the sample; NWTPH-Dx recommended.

P - The RPD of the detected concentrations between the two columns is greater than 40.

Q - Surrogate recovery is outside of the control limits.

S - Surrogate recovery data is not available due to the necessary dilution of the sample.

T - The sample chromatogram is not similar to a typical \_\_\_\_.

U - The analyte was analyzed for, but was not detected above the reported sample quantitation limit.

V - Matrix Spike/Matrix Spike Duplicate recoveries are outside control limits due to matrix effects.

W - Matrix Spike/Matrix Spike Duplicate RPD are outside control limits due to matrix effects.

X - Sample extract treated with a silica gel cleanup procedure.

Y - Sample extract treated with an acid cleanup procedure.

Z -

ND - Not Detected at PQL

MRL - Method Reporting Limit

PQL - Practical Quantitation Limit

RPD - Relative Percent Difference





# Chain of Custody

Company:	Nowicki & Assoc, Inc
Project No.:	
Project Name:	Lamv Site
Project Manager:	Michael Lam

**Turnaround Request  
(in working days)**

(Check One)

☐ Same Day ☐ 1 Day

☐ 2 Day ☐ 3 Day

☒ Standard  
(Hydrocarbon analyses: 5 days,  
All other analyses: 7 days)

☐ \_\_\_\_\_

(other)

Project Chemist: DB	Laboratory No. 09-158
---------------------	-----------------------

Requested Analysis									
	NWTPH-HCID								
	NWTPH-Gx/BTEX								
	NWTPH-Dx								
	Volatiles by 8260B								
	Halogenated Volatiles by 8260B								
	Semivolatiles by 8270C								
	PAHs by 8270C								
	PCB's by 8082								
	Pesticides by 8081								
	Total RCRA Metals (8)								
	TCLP Metals								
	VPH								
	EPH								
	% Moisture								

RELINQUISHED BY <i>Hall</i>	DATE 9/18/00	RECEIVED BY <i>Speedy 61</i>	DATE	COMMENTS:
FIRM <i>NAD</i>	TIME	FIRM	TIME	
RELINQUISHED BY	DATE	RECEIVED BY <i>Clark</i>	DATE 9/18/00	
FIRM	TIME	FIRM <i>OSE</i>	TIME 4:45 pm	
REVIEWED BY	DATE REVIEWED			
				Chromatographs with final report <input type="checkbox"/>

## HOLD HARMLESS AGREEMENT

In consideration of the CITY OF TACOMA's (herein referenced to as TACOMA) consent to discharge **groundwater**, (herein referenced to as "the discharge"), from 3737 South G Street by the **William Dickson Company (contractor)** and **Mr. & Mrs. Bich Lam (property owners)** to a catch basin located in the Northeast corner of South 38<sup>th</sup> and G streets;

We, **Nowicki and Associates** and **Mr. And Mrs. Bich Lam** hereby agree to indemnify, defend and save harmless TACOMA, its officers, agents, and officials, against any and all claims and to pay legal costs, fees, and charges in defense thereof for injury to person or property damage, including but not limited to payment of fines, penalties, or other charges which may be imposed against TACOMA for permit or other actual or alleged violations arising out of or in connection with the operation of or the discharge <sup>to</sup> TACOMA sanitary sewage system, *only with respect to the discharge referenced in paragraph 1.* *RAW*

**Nowicki and Associates** and **Mr. And Mrs. Bich Lam** shall not, by this provision, be required to indemnify TACOMA for loss of damages, or costs incurred in defense, which arise out of the negligence of TACOMA.

SIGNED this 24<sup>th</sup> day of October, 2000.

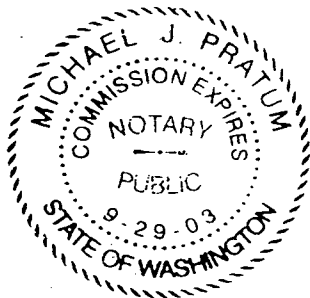
By Ronald E Nowicki, PRESIDENT of  
[Name of company official/title]

NOWICKI & ASSOCIATES, INC.  
[Name of responsible company]

STATE OF WASHINGTON )  
County of King ) ss  
~~Pierce~~ )

ON this day personally appeared before me [name of responsible company official], to me known to be the individual described in and who executed the foregoing instrument, and acknowledge that he (she) signed the same as his (her) free and voluntary act and deed, for the uses and purposes therein mentioned.

GIVEN under my hand and official seal this 24<sup>th</sup> day of October, 2000.



[Signature]  
NOTARY PUBLIC in and for the State  
of Washington, residing at Adams

MY COMMISSION EXPIRES: 9-29-2003



# TACOMA-PIERCE COUNTY HEALTH DEPARTMENT

## REQUEST FOR PUBLIC RECORDS

The following information is required in order to process your request for records. There may be a fee for this information. You will be notified of the fee in advance and requested to send that amount before the information can be released.

Name: Terry McCoy

Agency/Business Name: NEVADA SOILS, INC.

Mailing address: P.O. Box 61018

City: BOULDER CITY State: NV ZIP: 89006-1018

Date of Request: 10/28/99 Daytime Phone Number: 702-768-8960 (cell)

Description of requested information (please be specific): FILE ON 3733-3737

"G" ST (PORTION THEREOF)

For what purpose is this information to be used: IN ORDER TO SUBMIT

PROPOSAL TO OWNERS FOR CLEAN-UP

If the public records requested involves lists of individuals, I certify that the lists will not be used for commercial purposes.

Signature: Terry McCoy Representing NEVADA SOILS, INC.

### Billing Information for Public Records:

Charges: Retrieval \$6.00 Photocopy .25 each/per page

Retrieval Fee: \_\_\_\_\_

Number of copies \_\_\_\_\_ x .25: \_\_\_\_\_

Total Charge: \_\_\_\_\_

Records Copied: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

TPCHD Approval: \_\_\_\_\_

\*-----: **MetroScan / Pierce** :-----\*

Owner :Hintz Leroy J Ttee	Account # :747003 287 0
Site :3733-3737 S G St Tacoma 98408	RecordDate :
Mail :232 S 53Rd St Tacoma Wa 98408	Sale Price :
Use :9700 Vacant,Commercial Land	TotAV :\$86,200 YB:
R:03E T:20N S:16 Q:NW QQ:SW	Plat :1ST SCHOOL LD ADD
Bedrm: Bth F3H: / / Stories:	BldgSF: Ac:.35 Ph: