Request for Conditional Closure

Site: Abandoned Diesel Tank Farm, also known as Two Party Agreement (TPA) Site 23, National Oceanic and Atmospheric Administration (NOAA) Site 27, Inactive Diesel Tank Farm, and the Diesel Tank Farm. The site will be referred to as the "site" herein.

Location: St. George Island, Alaska is approximately 800 miles southwest of Anchorage in the Bering Sea. On the island, the site is situated east of St. George Village (Figures 1 and 2), south of the Inactive Gasoline Tank Farm (TPA Site 24) and the Bering Sea (56°36'5.22'' North Latitude, 169°32'27.08'' West Longitude).

Legal Property Description: The area of excavation is located at Tract 49 in Section 29, Township 41 South, Range 129 West of the Seward Meridian, Alaska, as shown on the plat of rectangular net survey, officially filed February 15, 1985 (Black-Smith & Richards 1985; Figure 2). The City of St. George owns the property within the area of excavation. [Note: TPA site boundaries are not defined in the TPA. At its discretion, NOAA established a boundary for this TPA site based on site characterization data and historic information.]

Type of Release: Potential release mechanisms include: 1) leaks associated with the storage and dispensation of diesel fuel in fourteen aboveground fuel storage tanks (ASTs) and their appurtenances; and 2) leaks associated with diesel fuel transfers utilizing the pipeline that enters the site from the north.

History and Background:
Reportedly, the use of the site use began in the 1970s when the Former Diesel Tank Farm (TPA Site 1) was decommissioned (WCFS 1995). TPA Site 1 is located along the St. George Village waterfront, approximately 1,500 feet (ft) northwest of the site (Figure 2). The diesel tank farm at the site was originally designed to fuel the Active Power Plant (TPA Site 8) underground storage tanks (USTs) via the Port Fuel Supply Line. Twelve of the tanks were 20,000-gallon capacity, adjacent to each other in an east-west oriented row, supported by individual concrete saddles, and situated within an earthen berm. Another 20,000-gallon capacity tank was situated north of the twelve tanks, and was reportedly used from the late-1980s to 1992. A 2,500-gallon tank was located south of the twelve tanks (Figures 2, 3, and 4).

The City of St. George took over responsibility for the fuel storage and power generation needs of the community in 1983, and subsequently ceased use of the Port Fuel Supply Line due to suspicions of leakage based on AST fuel volume discrepancies (Hart Crowser 1997). The City used tanker trucks to transport fuel from the ASTs to the power plant USTs until 1993, when the City abandoned the site after the Delta Western fuel depot at St. George Harbor became operational (Hart Crowser 1995).

The site is currently unused, and the nearest residence is approximately 200 ft northwest of the site (Figure 2).

Summary of Site Investigations:

During a 1992 site visit, Ecology & Environment, Inc. (E&E) observed stained soil beneath the tank valve for the 20,000-gallon tank located north of the twelve tanks (E&E 1993), though they did not collect samples of the stained soil. Hart Crowser, Inc. (Hart Crowser) observed soil stains and sheens on standing water inside the berm during a 1995 Expanded Site Investigation (ESI). Hart Crowser also observed some stained soil outside the berm along the access road bordering the north and west sides of the site. An estimated 3,000 gallons of water and fuel remained within the tanks in 1996 (Hart Crowser 1997).

Hart Crowser advanced one hand auger boring and excavated twelve test pits during the ESI (Figure 3). The near-surface soil consisted of sandy gravel over basalt rock. Based on backhoe refusal met at various test pits, overburden soil thickness varied across the site with depths of 4 to 7 ft within and immediately south of the bermed area, 2.5 to 4 ft immediately north and adjacent to the berm, and 7.5 to 10 ft further north of the berm.

Hart Crowser set up a field laboratory capable of quantifying gasoline-range organics (GRO), diesel-range organics (DRO), and residual-range organics (RRO) using the U.S. Environmental Protection Agency (EPA) Method 8015 Modified (EPA 1996). The field laboratory also quantified benzene, toluene, ethylbenzene, and total xylenes (BTEX) using a Photovac 10S50 equipped with a photoionization detector (PID). Hart Crowser collected a total of 35 soil samples from the boring and the test pits, and analyzed the samples by the field laboratory for GRO, DRO, and RRO. Hart Crowser also analyzed five of the soil samples in the field laboratory for BTEX. Hart Crowser sent two of the BTEX samples, five of the GRO samples, and thirteen of the DRO samples off island to a fixed laboratory for analysis as part of the ESI's data quality control (QC) program.

The ESI field laboratory sample analysis results indicated that site soil contained DRO from the ground surface to the backhoe's refusal at up to 7 ft below ground surface (bgs). The maximum DRO concentration was 11,000 milligrams per kilogram (mg/kg), found at test pit TP-6 from 0 to 0.5 ft bgs. The Alaska Department of Environmental Conservation (ADEC) Method Two soil cleanup level for DRO at the site is 250 mg/kg. Hart Crowser did not detect GRO, RRO, or BTEX above their ADEC Method Two cleanup levels. The fixed laboratory QC samples were consistent with the field laboratory results. The ESI (Hart Crowser 1997) concluded that an estimated 1,580 cubic yards of petroleum-contaminated soil (PCS) were above site cleanup levels, requiring removal and disposal (Figure 3).

In 2001, Tetra Tech EM Inc. (TTEMI) performed a site characterization to identify potential contaminant sources and to characterize existing contamination in soil and groundwater at the site. TTEMI performed this characterization because confirmation samples collected during a 1997 PCS removal action indicated contamination remained above site cleanup levels (Polarconsult 1997). The *Summary of Cleanup Actions* section of this conditional closure request discusses the 1997 PCS removal.

TTEMI advanced six manual direct-push borings at locations adjacent to the 1997 confirmation sample locations where elevated levels of DRO were encountered. The maximum boring depth was 5.9 ft bgs due to refusal (that is, competent pyroclastic material). TTEMI collected eleven

samples from the six borings, with all the samples field screened using a Petroflag colorimetric test kit. Based on the Petroflag results, seven of the eleven samples were sent for off-island fixed laboratory analyses for GRO, DRO, RRO, volatile organic compounds (VOCs) including BTEX, semivolatile organic compounds (SVOCs), and heavy metals (TTEMI 2002).

GRO, DRO, RRO, VOCs (including BTEX), SVOCs, and heavy metals, excepting arsenic and chromium, were not detected above their ADEC Method Two cleanup levels. TTEMI found arsenic and chromium above their cleanup levels; however, the levels detected are within the range measured in background soil samples on St. George Island (TTEMI 2002). The 2001 characterization samples were shallower than some of the PCS quantified in the adjacent 1997 confirmation samples. However, the 2001 characterization samples indicated that surface and near-surface soil about the 1997 excavation is not contaminated above ADEC Method Two, and that refusal reduces the future likelihood that clean overburden soil would be removed, creating potential contaminated soil ingestion and inhalation pathways.

TTEMI recommended fate and transport modeling of DRO in soil to predict the migration of residual contamination from the soil to the groundwater (TTEMI 2002). Upon review of the TTEMI site investigation work and recommendations, ADEC indicated that groundwater monitoring may be more appropriate than modeling. ADEC requested that NOAA conduct four groundwater monitoring events to establish trends and determine whether groundwater concentrations are increasing, stable, or decreasing (ADEC 2002).

In 2001, TTEMI also installed three groundwater monitoring wells at the site to address potential impacts to groundwater caused by PCS (Figure 4). Monitoring well TPA23-MW-3 is upgradient of the site while monitoring wells TPA23-MW-1 and TPA23-MW-2 are downgradient of the site. Groundwater in the vicinity of the site is interpreted to flow northerly to northeasterly away from the site, toward the Bering Sea (Figure 5). Groundwater at the site begins approximately 90 ft bgs (TTEMI 2002).

TTEMI conducted groundwater monitoring in October 2001, October 2002, August 2003, November 2003, January 2004, and April 2004. During the sampling events, none of the wells at the site had contamination above ADEC Table C levels of concern (Figure 5), indicating PCS at the site has not impacted groundwater.

Summary of Applied Cleanup Levels:
NOAA employed ADEC Method Two cleanup criteria, discussed at 18 AAC 75.341(c) (ADEC 2003), when evaluating site conditions relative to the need for further remedial action. Under the TPA (NOAA 1996), NOAA had the option to cleanup to the less stringent State of Alaska benzene cleanup level in effect in 1991 (ADEC 1991). Thus, the alternative cleanup level (0.5 mg/kg) was applied for benzene. ADEC uses 15 ft bgs to define subsurface soil to which residents will have a reasonable potential to be exposed through the inhalation or ingestion pathways (ADEC 2000; 18 AAC 75.340 (j)(2)). Therefore, NOAA is not obligated to excavate contaminated soil occurring at depths deeper than 15 ft to address the inhalation and ingestion pathways. Cleanup criteria were applied to the maximum extent practicable (18 AAC 75.325 (f), 18 AAC 75.990).

Summary of Cleanup Actions:

St. George Tanaq Corporation (Tanaq), under a grant to NOAA, removed the fourteen ASTs and their appurtenances, and disposed of them off island as scrap metal, in 1997 (Polarconsult 1997). Tanaq also performed a major PCS removal in 1997. Tanaq's objectives were the removal of PCS identified by Hart Crowser (1997) and removal of additional PCS identified by fixed laboratory analyses, field screening with a PID, visual observations, and olfactory observations. Tanaq transported removed PCS to NOAA's permitted short-term PCS stockpile. In most instances, Tanaq pursued these objectives until all petroleum contamination at or above the cleanup levels was removed or refusal was experienced. Refusal was encountered throughout much of the excavation. There were, however, several locations along the sidewall of the excavation's eastern half that exceeded the Method Two cleanup level for DRO; Tanaq did not conduct further excavation of this area (Figure 6). Tanaq observed that diesel fuel contamination at refusal extended into the fractured basalt beyond the practicable limits of removal (Figure 6; Polarconsult 1997).

Tanaq removed and transported an estimated 4,150 cubic yards of contaminated soil to the PCS stockpile in 1997 (Figure 6). The maximum depth of excavation at the site was approximately 15 ft bgs. The minimum vertical distance from contaminated soil at the bottom of the excavation to the regional aquifer below was estimated as 70 ft. NOAA directed Tanaq to leave the excavation open due to budgetary constraints.

During the first phase of excavation Tanaq collected 14 samples from the excavation sidewalls and bottom from locations believed to be below the cleanup levels, as documented in Tanaq's monthly status updates, sample collection dates, and data summary maps (Polarconsult 1997). Eight of these samples contained contamination above the cleanup levels, and Tanaq later excavated soil from the locations of six of the contaminated samples and two of the uncontaminated samples. NOAA considers the results of the other six samples to be final confirmation samples since the soil they represent was not later removed (Table 1; Figure 6).

Tanaq collected 40 final confirmation samples in 1997 from the final extent of the excavation, including the six referenced in the previous paragraph. A total of five field QC duplicate samples were collected and analyzed. Tanaq did not collect any *ex situ* characterization samples from the PCS removed and stockpiled in 1997. Tanaq surveyed the confirmation sample locations and the excavation topography using a total station referenced to a temporary survey control point. [Note: NOAA also surveyed the excavation topography in 2002 using its survey-grade global positioning system referenced to a permanent survey control point installed by the NOAA National Geodetic Survey.]

The soil samples were analyzed for DRO by method AK-102. Tanaq did not analyze samples for BTEX because Tanaq considered DRO the cleanup driver given BTEX was not found at other diesel fuel storage locations on St. George Island (Polarconsult 1997). Tanaq's laboratory detected DRO above the ADEC Method Two cleanup level at 22 of the 40 confirmation sampling locations (Table 1; Figure 6), with a maximum concentration of 7,240 mg/kg (SS 191).

St. George Chadux Corporation (Chadux), a Tanaq subsidiary, remediated PCS hauled to NOAA's stockpile in 1997 using NOAA's enhanced thermal conduction (ETC) thermal desorption system in 2001 and 2002. NOAA directed Chadux to backfill the open excavation in 2002 using remediated soil from the ETC system operation.

During a 2003 remedial action for the adjacent North-South Cargo Fuel Pipeline (TPA 25-2) Site, Chadux performed an additional remedial action at the western portion of the 1997 excavation footprint (Polarconsult 2004). Chadux removed an estimated 900 cubic yards of clean 1997 backfill, then removed an estimated 1,450 cubic yards of PCS associated with 1997 confirmation samples SS186, SS204, SS207, SS210, SS211, SS213, SS214, and SS215 (Figure 7). Chadux removed the PCS at NOAA's direction since it was contiguous with PCS from TPA 25-2. The PCS was added to NOAA's PCS stockpile and currently awaits beneficial reuse as soil berm construction material for the City of St. George's new landfill. Chadux collected 19 confirmation samples from the 2003 excavation as well as characterization samples from the PCS removed in 2003. Samples were analyzed for GRO, DRO and BTEX. Seven of the 19 confirmation samples were found above Method Two for DRO but were at refusal (Table 2; Figure 7). None of the confirmation samples exceeded the Method Two cleanup levels for GRO or BTEX (Polarconsult 2004).

Laboratory reporting limits were below ADEC Method Two cleanup levels for all contaminants. Figure 8 summarizes the 1997 and 2003 confirmation sample results for the soil remaining in the excavation area; confirmation sample results from 1997 for soil subsequently removed in 2003 were omitted from this figure.

Conclusions and Recommended Action:

NOAA removed an estimated 5,600 cubic yards of PCS from the site, backfilling the site with clean soil. NOAA permanently remediated an estimated 4,150 cubic yards of this PCS with its ETC system. An estimated 1,450 cubic yards of this PCS is stockpiled at NOAA's short-term PCS stockpile and awaits final disposal. Soil DRO contamination remains in some locations along the eastern portions of the 1997 excavation sidewall above the ADEC Method Two cleanup level for protection of groundwater (250 mg/kg), including above the refusal depth along the eastern part of the 1997 excavation (Figure 8). However, no soil contamination remains at the site above the ADEC Method Two cleanup levels for the ingestion and inhalation exposure pathways (10,250 mg/kg and 12,500 mg/kg, respectively). Groundwater monitoring results from six monitoring events over a 30-month period indicate that soil DRO contamination at the site has not impacted groundwater. Additionally, site groundwater flows toward the Bering Sea and away from the municipal drinking water supply.

In accordance with paragraph 59 of the Two Party Agreement (NOAA 1996), NOAA requests written confirmation that NOAA completed all appropriate corrective action, to the maximum extent practicable, at the Abandoned Diesel Tank Farm, TPA Site 23/Site 27 in accordance with the Agreement and that ADEC grant a conditional closure not requiring further remedial action from NOAA. NOAA understands ADEC will/may require additional containment, investigation, or cleanup if subsequent information indicates that the level of contamination that remains does not protect human health, safety, or welfare, or the environment.

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Woodward-Clyde Federal Services (WCFS). 1995. *Expanded Site Inspection, St. George Island, Alaska.* March.

For the National Oceanic and Atmospheric Administration

John Lindsay
NOAA, Pribilof Project Office

2/22/05
Date

Approvals:

In accordance with Paragraph 59 of the Two Party Agreement, this is to confirm that all corrective action has been completed to the maximum extent practicable at the Abandoned Diesel Tank Farm, TPA Site 23/NOAA Site 27 in accordance with the Agreement and that no further remedial action is required as a part of this conditional closure granted by ADEC.

For the Alaska Department of Environmental Conservation

Louis Howard
Alaska Department of Environmental Conservation
Remedial Project Manager

2/28/05
Date

Tables

Table 1 – 1997 Corrective Action Confirmation Sample Results

Sample Number	Sample Depth (feet bgs)	Benzene (mg/kg)	Toluene (mg/kg)	Ethyl-benzene (mg/kg)	Total Xylenes (mg/kg)	GRO (mg/kg)	DRO (mg/kg)
NOAA Site 27/TPA Site 23 1997 Confirmation Samples							
SS 006	2.5	--	--	--	--	--	**320**
SS 007	5	--	--	--	--	--	**266**
SS 008	7	--	--	--	--	--	5
SS 010	2	--	--	--	--	--	5
SS 011	4	--	--	--	--	--	36
SS 012	6	--	--	--	--	--	5 U
SS 020 (dup. of SS 007)	5	--	--	--	--	--	**298**
SS 182	9.3	--	--	--	--	--	**3,520**
SS 183	8.9	--	--	--	--	--	**1,730**
SS 184	11	--	--	--	--	--	85
SS 185	8.4	--	--	--	--	--	125
SS 186	14.1	--	--	--	--	--	**344**
SS 187	13.7	--	--	--	--	--	**800**
SS 188	4.2	--	--	--	--	--	5 U
SS 189	9.1	--	--	--	--	--	**525**
SS 190	4.5	--	--	--	--	--	**2,030**
SS 191	5.5	--	--	--	--	--	**7,240**
SS 192	3.7	--	--	--	--	--	**1,000**
SS 193	4.3	--	--	--	--	--	7
SS 194	6.1	--	--	--	--	--	**521**
SS 195	5.8	--	--	--	--	--	5 U
SS 196	4.4	--	--	--	--	--	**1,130**
SS 197	3.6	--	--	--	--	--	**4,030**
SS 198	4.5	--	--	--	--	--	**1,480**
SS 199	2.8	--	--	--	--	--	10
SS 200	1.5	--	--	--	--	--	**1,690**
SS 201	2.3	--	--	--	--	--	6
SS 202	5.8	--	--	--	--	--	20
SS 203	5.5	--	--	--	--	--	5 U
SS 204	6.1	--	--	--	--	--	**573**
SS 205	4.5	--	--	--	--	--	17
SS 206	11.3	--	--	--	--	--	5 U
SS 207	8	--	--	--	--	--	**462**
SS 208	3.7	--	--	--	--	--	5 U
SS 209	4.6	--	--	--	--	--	5 U
SS 210	6.1	--	--	--	--	--	**1,200**
SS 211	5.8	--	--	--	--	--	**1,120**
SS 212	4.7	--	--	--	--	--	5 U
SS 213	12.8	--	--	--	--	--	**591**
SS 214	3.4	--	--	--	--	--	**854**
SS 215	8.7	--	--	--	--	--	**1,070**
SS 216 (dup. of SS 194)	6.1	--	--	--	--	--	169
SS 217 (dup. of SS 201)	2.3	--	--	--	--	--	5 U
SS 218 (dup. of SS 211)	5.8	--	--	--	--	--	**764**
SS 219 (dup. of SS 215)	8.7	--	--	--	--	--	**1,400**
ADEC Method Two Cleanup Level [a]		*0.02*	*5.4*	*5.5*	*78*	*300*	*250*
Alternative Cleanup Level [b]		*0.5* [c]	*NA*	*NA*	*NA*	*NA*	*NA*

Table 2 – 2003 Corrective Action Confirmation Sample Results

Sample Number	Sample Depth (feet bgs)	Benzene (mg/kg)	Toluene (mg/kg)	Ethyl-benzene (mg/kg)	Total Xylenes (mg/kg)	GRO (mg/kg)	DRO (mg/kg)
NOAA Site 27/TPA Site 23 2003 Confirmation Samples							
SG25.2-CS-013-045	4.5	0.01 U	0.07	0.04 U	0.07 U	2 U	5 J
SG25.2-CS-069-160	16	0.01 U	0.03	0.03 U	0.04 J	1 J	**724**
SG25.2-CS-070-120	12	0.02 J	0.03 J	0.02 J	0.06	2 U	70
SG25.2-CS-071-100	10	0.01 U	0.04	0.03 U	0.12	3	**1,020**
SG25.2-CS-072-120	12	0.01 U	0.03 J	0.02 J	0.13	5	**284**
SG25.2-CS-073-110	11	0.01 U	0.03 J	0.03 J	0.11	3	**3,850**
SG25.2-CS-074-090	9	0.01 U	0.02 J	0.03 U	0.03 J	2 U	8 J
SG25.2-CS-075-120	12	0.01 U	0.04	0.03 U	0.03 J	1 U	9 J
SG25.2-CS-076-110	11	0.03 U	0.04	0.03 U	0.04 J	2 U	8 J
SG25.2-CS-077-060	6	0.01 U	0.04 J	0.04 U	0.09 U	1 J	**4,840**
SG25.2-CS-078-150	15	0.01 U	0.04 U	0.04 U	0.07 U	2 U	82
SG25.2-CS-079-130	13	0.01 U	0.02 J	0.05 U	0.10 U	3 U	4 J
SG25.2-CS-080-150	15	0.01 U	0.01 J	0.02 J	0.09	5 J	**1,620**
SG25.2-CS-081-150	15	0.01 U	0.05 U	0.05 U	0.10 U	2 J	3 J
SG25.2-CS-082-140	14	0.08 U	0.08 U	0.08 U	0.16 U	1 J	3 J
SG25.2-CS-083-100	10	0.01 U	0.02 J	0.05 U	0.09 U	1 J	22 J
SG25.2-CS-084-140	14	0.02 U	0.07 U	0.07 U	0.13 U	3 J	3 J
SG25.2-CS-085-130	13	0.01 U	0.04 U	0.04 U	0.08 U	2	**387**
SG25.2-CS-086-130	13	0.01 U	0.03 U	0.03 U	0.05 U	1	4 J
ADEC Method Two Cleanup Level[a]		*0.02*	*5.4*	*5.5*	*78*	*300*	*250*
Alternative Cleanup Level[b]		*0.5*[c]	*NA*	*NA*	*NA*	*NA*	*NA*

Notes for Tables 1 and 2

bold	Indicates concentration above cleanup levels. Although reporting limits for benzene sometimes exceeded the current ADEC Method Two cleanup level of 0.02 mg/kg, reporting limits did not exceed the alternative cleanup level of 0.5 mg/kg.
ADEC	Alaska Department of Environmental Conservation
bgs	Below ground surface
BTEX	Benzene, toluene, ethylbenzene, and total xylenes
DRO	Diesel-range organic compounds
GRO	Gasoline-range organic compounds
J	Analyte was positively identified, but concentration is estimated; result is considered qualitatively acceptable, but quantitatively unreliable.
mg/kg	Milligram per kilogram
--	Not analyzed
NA	Not applicable
TPA	Two-Party Agreement
U	The analyte was analyzed for, but was not detected above the sample reporting limit.
a	Cleanup level is from Title 18 of the *Alaska Administrative Code* 75 "Oil and Hazardous Substances Pollution Control Regulations," published by the State of Alaska and amended through October 28, 2000. Contaminants of concern for this site are limited to BTEX, DRO, and GRO.
b	Cleanup level obtained from ADEC Method Two based on the 1991 cleanup level.
c	Under the TPA, NOAA may utilize the 1991 ADEC cleanup level for benzene (0.5 mg/kg).

Figures

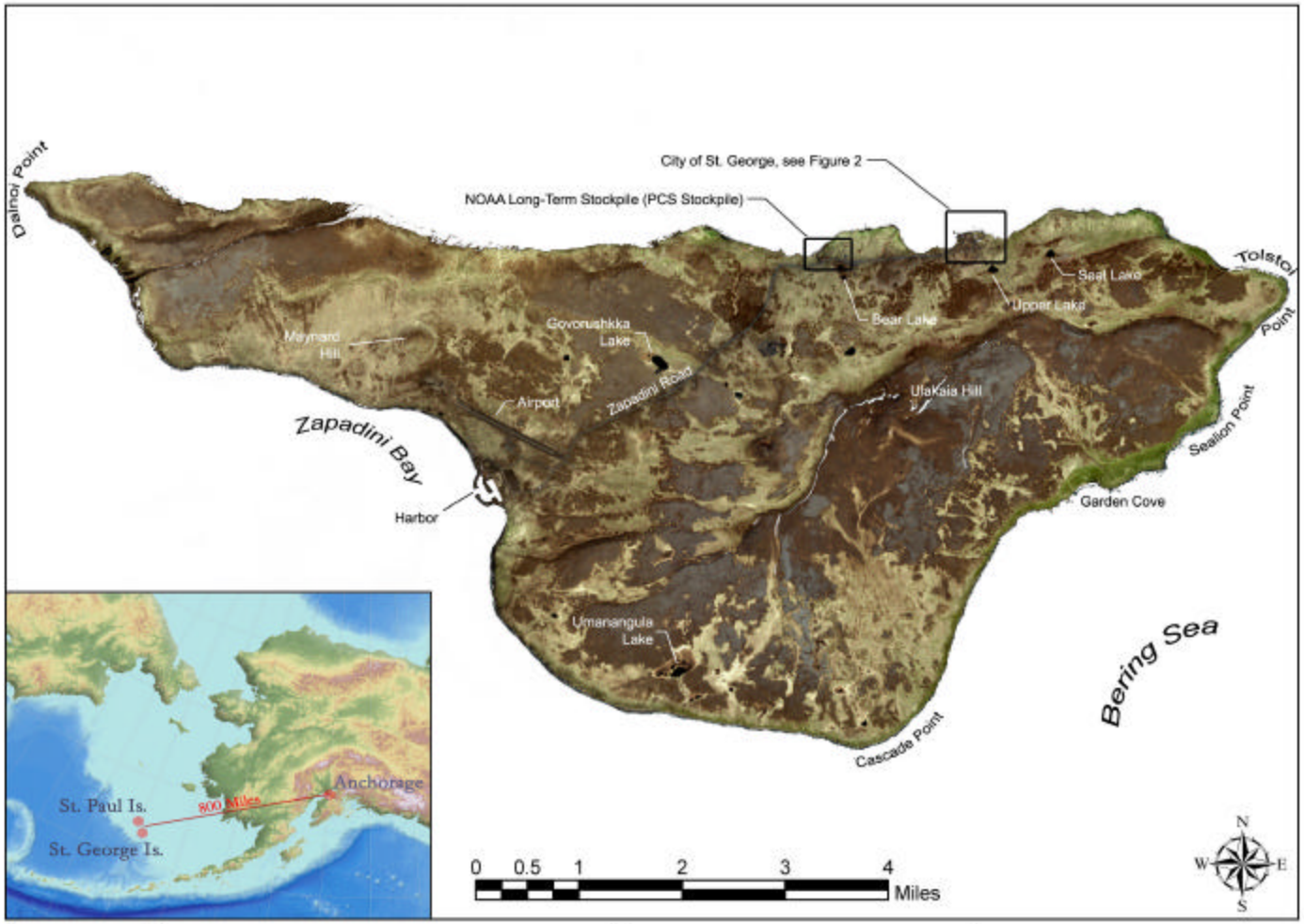

Figure 1	**Island and Vicinity Map Abandoned Diesel Tank Farm TPA Site 23/Site 27 St. George Island, Alaska**	Source: Ikonos 2001 Satellite Image

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Figure 2	City of St. George Map Abandoned Diesel Tank Farm TPA Site 23/Site 27 St. George Island, Alaska	Source: AeroMap U.S. 9/28/96 Aerial Photograph;Bureau of Land Management Land Survey Filed Febuary 15, 1985

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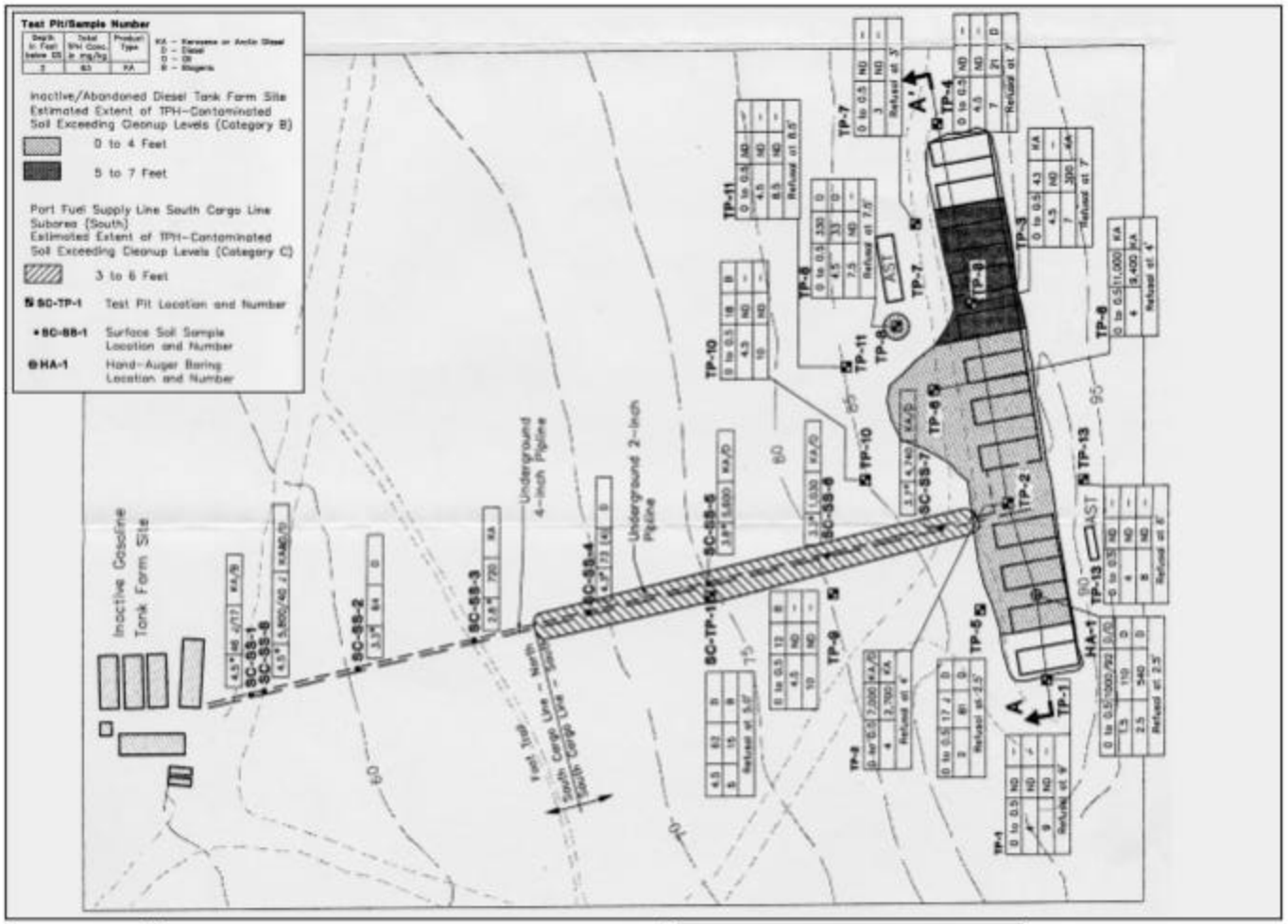

Figure 3	**Hart Crowser 1996 Site Investigation Abandoned Diesel Tank Farm TPA Site 23/Site 27 St. George Island, Alaska**	Source: Expanded Site Inspection St. George Island Pribilof Islands, Alaska. Volume 1 January 1997	Pribilof Islands Restoration Project

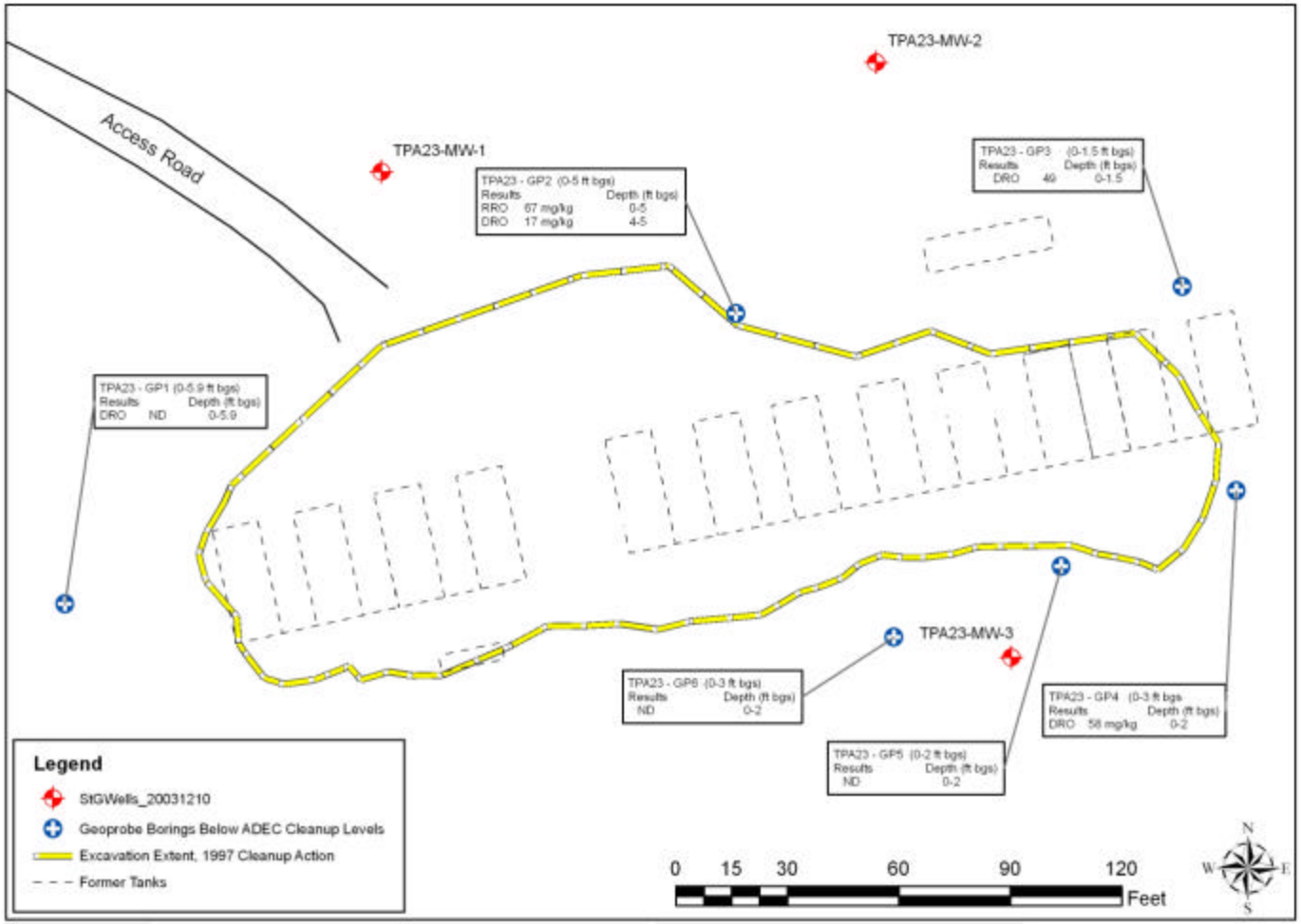

Figure 4

TTEMI 2001 Site Inspection
Abandoned Diesel Tank Farm
TPA Site 23/Site 27
St. George Island, Alaska

Source: Inactive/Abandoned Diesel Tank Farm Two-Party Agreement Site No. 23, Pribilof Island Site Restoration St. George Island,Alaska. January 2002
Note: Detections listed for depth interval, if no detection is listed, or the boring Interval is marked ND, then no analytes were detected at this location.

Pribilof Islands Restoration Project

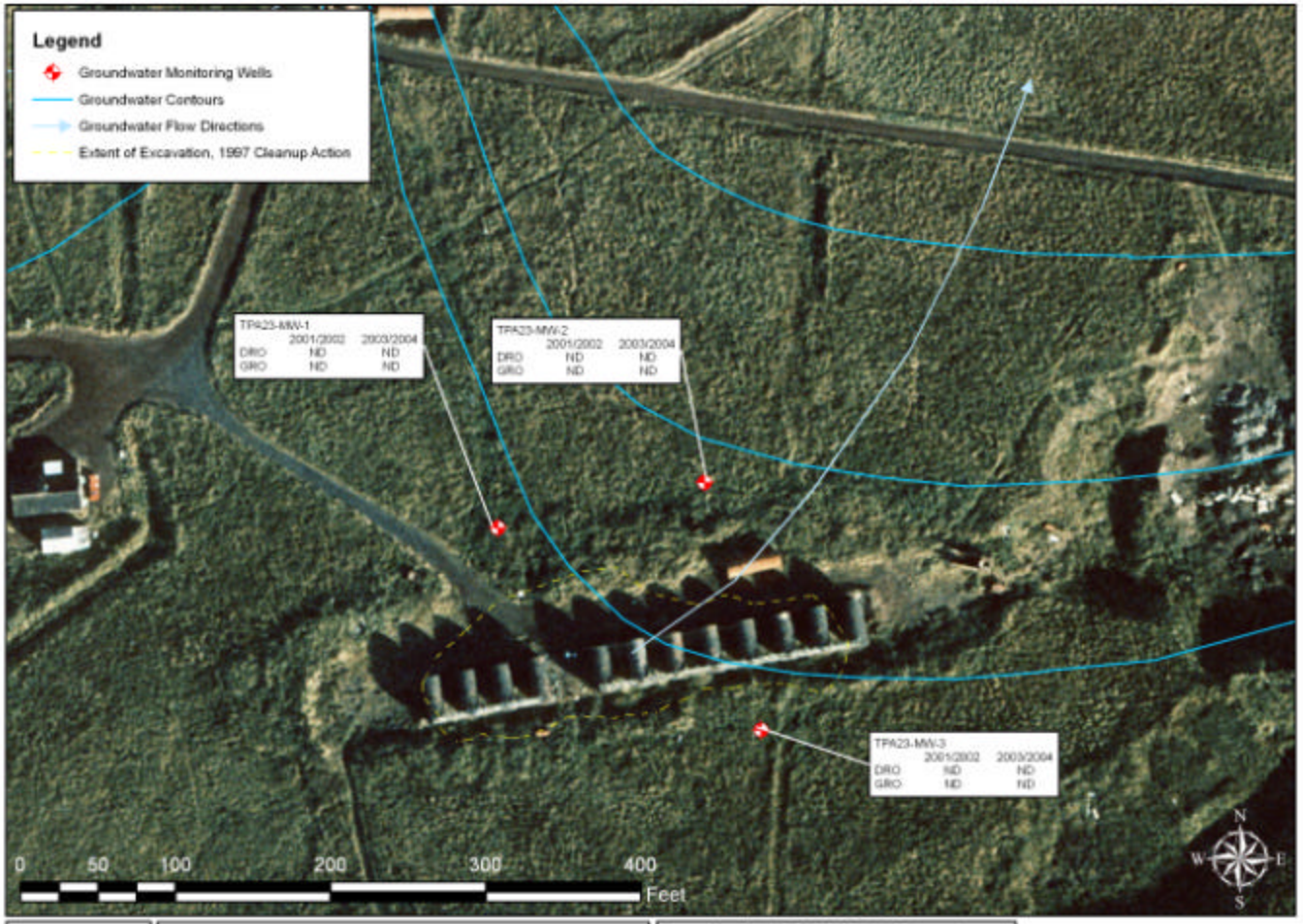

Figure 5

Groundwater Sampling Results
Abandoned Diesel Tank Farm
TPA Site 23/Site 27
St. George Island, Alaska

Source: AeroMap U.S. 9/28/96 Aerial Photograph; Pribilof Project Database; TTEMI Field Investigation Report February 14, 2003
Note: Results in µg/L (Micrograms per Liter; Parts per Billion); ND (analyte was analyzedfor but not detected); Results reflect the highest detection for the round of sampling. Additional analytes were analyzed for but not detected

Pribilof Islands Restoration Project

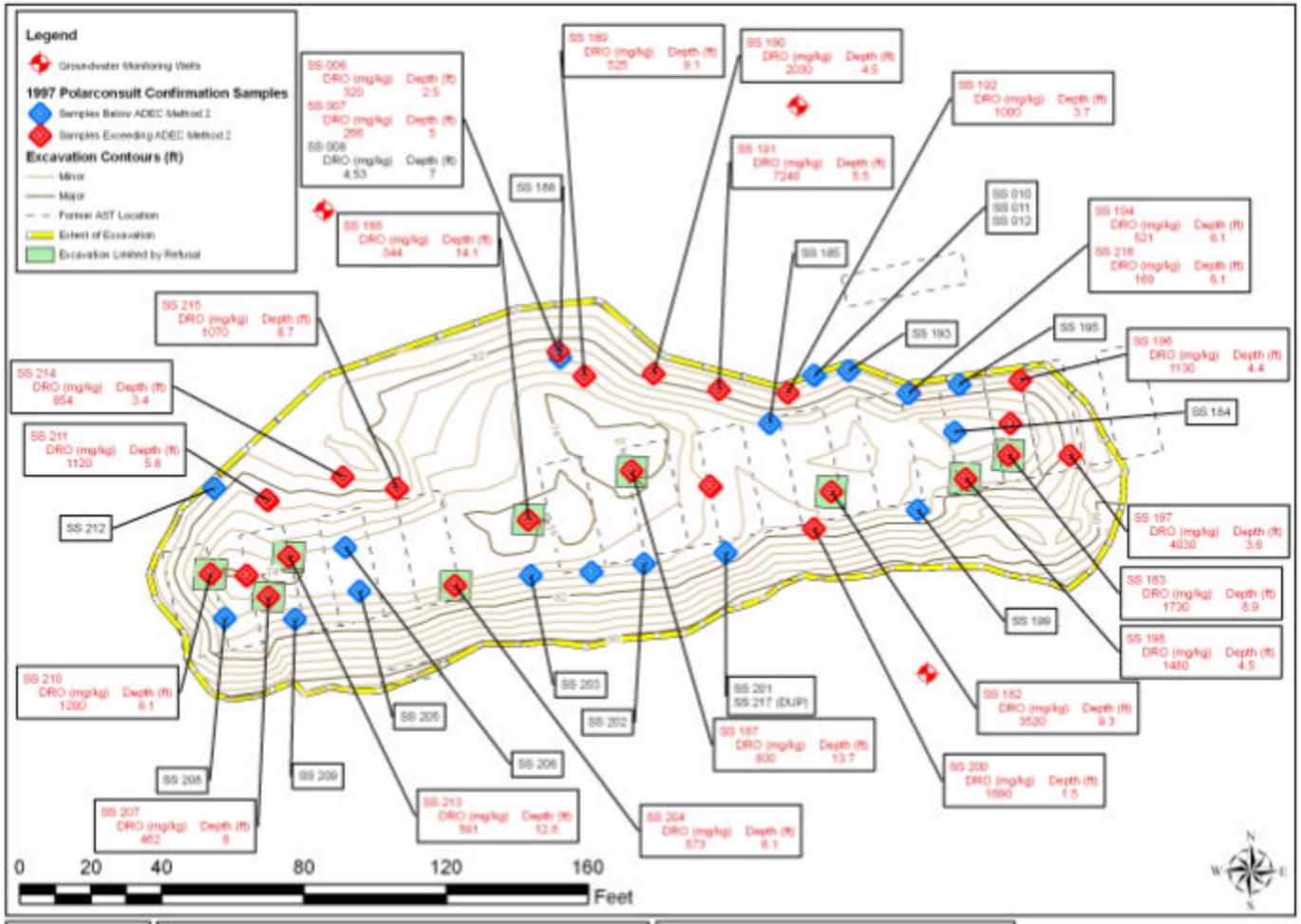

Figure 6	St. George Tanaq Corporation 1997 Cleanup Action Abandoned Diesel Tank Farm TPA Site 23/Site 27 St. George Island, Alaska	Source: Expanded Site Inspection St. George Island Pribilof Islands, Alaska. Volume 1 January 1997

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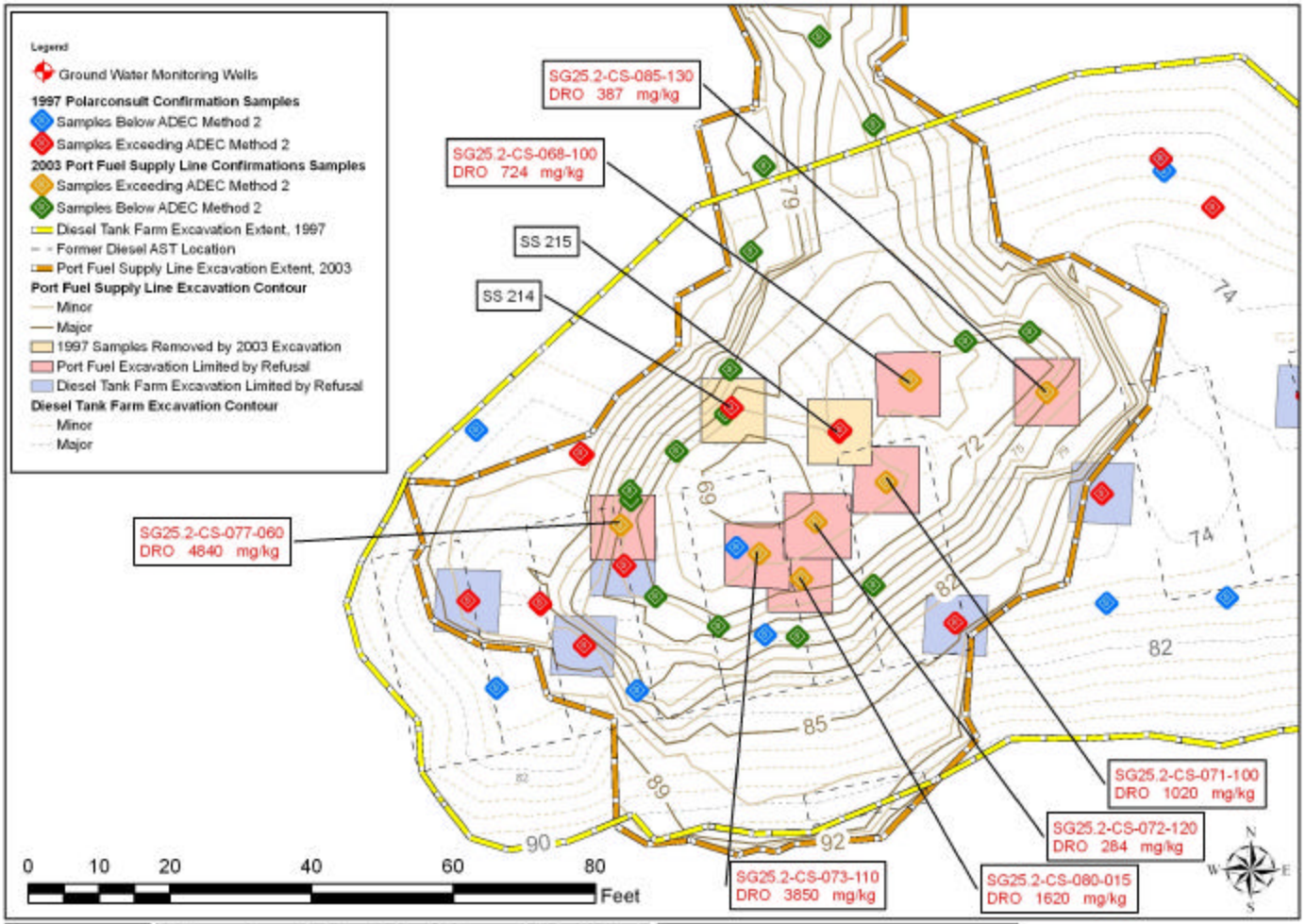

Figure 7	**Abbandoned Diesel Tank Farm & Port Fuel Supply Line N-S (TPA 25-2) Excavation Interface & Confirmation Sampling TPA Site 23/Site 27 St. Geroge Island, Alaska**	Source: Pribilof Project Database; Environmental Site Investigation St. George Debris Cleanup and UST Decommissioning Report, Polarconsult Alaska, Inc.

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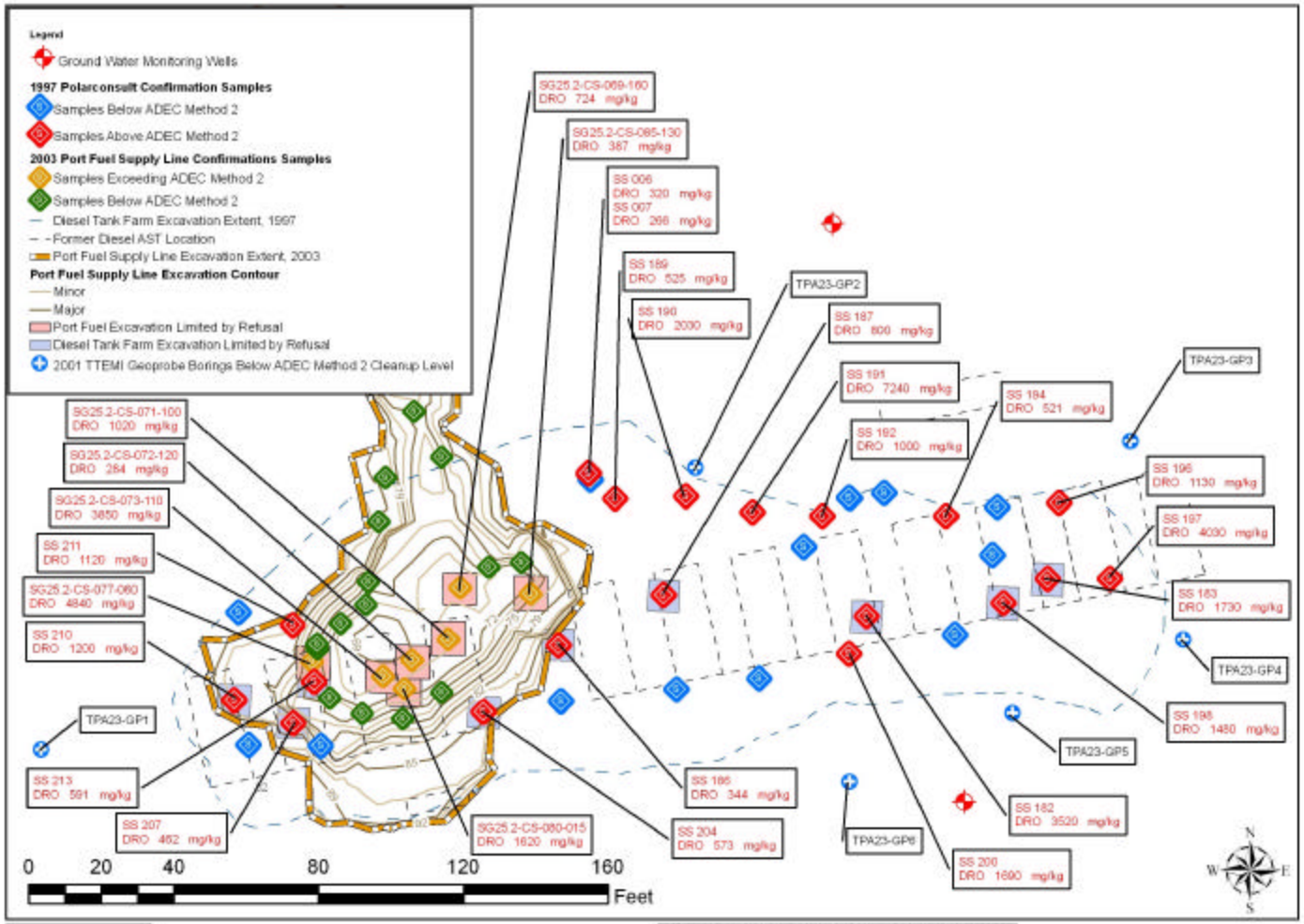

Figure 8	**Residual Contamination Within Excavation Limits Post 2003 Cleanup Action TPA Site 23/Site 27 St. Geroge Island, Alaska**	Source: Pribilof Project Database; Environmental Site Investigation St. George Debris Cleanup and UST Decommissioning Report, Polarconsult Alaska, Inc.; Inactive/Abandoned Diesel Tank Farm Two-Party Agreement Site No. 23, Pribilof Island Site Restoration St. George Island, Alaska. January 2002.

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