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NAS CECIL FIELD, FL
5090.3a

JANUARY 2000 TO JULY 2000 GROUNDWATER MONITORING LETTER REPORT FOR DAY TANK 1 NAS CECIL FIELD FL

10/20/2000

TETRA TECH NUS INC

TETRA TECH NUS, INC.
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TTNUS/TAL-00-094/0013-6.2

October 20, 2000

Project Number 0013

Commanding Officer
Department of the Navy
SOUTHNAVFACENGCOM
ATTN: Mr. Nick Ugolini
2155 Eagle Drive
North Charleston, South Carolina 29406

Reference: Clean Contract No. N62467-94-D0888
Contract Task Order No. 0072

Subject: January 2000- July 2000 Groundwater Monitoring Report
Day Tank 1
Former Naval Air Station Cecil Field (NASCF), Florida

Dear Mr. Ugolini:

Tetra Tech NUS, Inc. (TtNUS) is pleased to submit this semi-annual Groundwater Monitoring Report for the subject site. This report was prepared for the U.S. Navy Southern Division Naval Facilities Engineering Command (SOUTHNAVFACENGCOM) under Contract Task Order (CTO) 0072, for the Comprehensive Long-term Environmental Action Navy (CLEAN) Contract Number N62467-94-D0888. This report summarizes the fieldwork and analytical results for semi-annual groundwater monitoring performed at Day Tank 1 (Figure 1) between July 10 and 11, 2000. The work was performed in accordance with the Base-wide Generic Work Plan for the former Naval Air Station Cecil Field (NASCF) Volumes I and II (1998).

FIELD INVESTIGATION

On July 10 and 11, 2000, TtNUS collected groundwater samples from seven monitoring wells, beginning with the well identification prefix CEF-293-, as follows: 4, 11, 13, 14, 19, 20 and 21. Prior to collecting groundwater samples, water level measurements were recorded for each well on July 10, 2000. Water level measurements were recorded to the nearest 0.01-foot. The depth to water ranged from 9.09 feet below top of casing (ft btoc) (CEF-293-13) to 9.78 ft btoc (CEF-293-19). The water level measurements were subtracted from previously determined top-of-casing elevations to calculate the relative groundwater elevation in each well. The groundwater elevations were used to estimate the groundwater flow direction. Based on the July 2000 water level measurements, the groundwater flow direction is to the southeast, which is consistent with results from previous sampling events. Relative groundwater elevations and estimated groundwater flow direction are presented on Figure 2. Groundwater level measurement data sheets are provided in Attachment A.

Following collection, the samples were placed on ice and shipped to Severn Trent Laboratories,

Inc. Savannah, in Savannah, Georgia via Federal Express. The samples were analyzed by United States Environmental Protection Agency (EPA) Method 8021B for benzene, toluene, ethylbenzene, total xylenes (BTEX) and methyl tert-butyl ether (MTBE); and EPA Method 8310 for polynuclear aromatic hydrocarbons (PAHs). The laboratory analytical results are summarized in Table 1 and depicted on Figure 3. The laboratory analytical reports are provided in Attachment B.

A brief discussion of the results for each well is provided below:

- CEF-293-4 (background) – no contaminants of concern (COC) were detected.
- CEF-293-11 – BTEX and naphthalene compounds exceeded GCTLs.
- CEF-293-13 – BTEX and naphthalene compounds exceeded GCTLs.
- CEF-293-14 – no COCs detected.
- CEF-293-19 – benzene exceeded GCTL.
- CEF-293-20 – no COCs detected.
- CEF-293-21 – benzene exceeded GCTL.

CONCLUSIONS

The COC exceedences detected in monitoring well CEF-293-11, coupled with the groundwater flow direction, (Figure 2) suggest the contamination in this well may be from another source located to the north of Day Tank 1. The benzene exceedence detected in monitoring well CEF-293-19 suggests that the plume is not delineated to the northeast (Figure 3). The benzene exceedence detected in monitoring well CEF-293-21 suggests that the plume is not adequately delineated downgradient of CEF-293-21.

Table 2 provides analytical data for monitoring wells associated with an on-going investigation at IR site Building 824A, located downgradient of the Day Tank 1 plume. The analytical data from groundwater sampling conducted at Building 824A on July 27, 2000 was added to Figure 2 for comparison. The analytical results from a groundwater sample collected from monitoring well CEF-824A-4S, located directly downgradient of monitoring well CEF-293-21, indicate that similar COCs were detected in both monitoring wells. The two monitoring wells are separated by a distance of approximately 200 feet. Therefore, additional data is required to draw any conclusions from the data from these two wells.

RECOMMENDATIONS

TtNUS recommends the following steps to adequately delineate the dissolved hydrocarbon plume:

- Collect a groundwater sample from upgradient monitoring well CEF-293-10 (Figure 2) during the next sampling event to determine if the exceedences detected in monitoring well CEF-293-11 are associated with Day Tank 1 or some other source. The samples should be analyzed for the same COCs as in the Day Tank 1 monitoring program.

- Install a shallow monitoring well approximately 50 feet northeast of monitoring well CEF-293-19 (Figure 4) to delineate the northeastern limit of the dissolved hydrocarbon plume.

- Install a shallow monitoring well approximately 100 feet southeast of monitoring well CEF-293-21 (Figure 4). A groundwater sample should be collected from this new monitoring well to determine if the dissolved hydrocarbon plume is continuous between monitoring well CEF-293-21 and monitoring well CEF-824A-4S, or if the exceedences detected in these two wells represent two separate plumes.

The next groundwater-monitoring event is scheduled for January 2001. If you have any questions with regard to this submittal, please contact me at (850) 385-9899.

Sincerely,

PAUL E. CALLIGAN
LICENSE NO. 1864
STATE OF FLORIDA
PROFESSIONAL GEOLOGIST

Paul E. Calligan, P.G.
Task Order Manager
Florida License No. PG-0001864
Date: 10/20/00

MD/pc

Attachments

cc: Mr. M. Davidson
Mr. D. Grabka
Ms. D. Vaughn-Wright
Mr. S. Glass
Mr. S. Ross
Mr. M. Speranza
Ms. D. Wroblewski (Cover Letter Only)
Mr. M. Perry (Unbound)

bcc: G. Roof, Tetra Tech NUS, Inc.
R. Miller, Tetra Tech NUS, Inc. (2 copies, Information Repository, BRAC House Library)
R. Simcik, Tetra Tech NUS, Inc. (bookcase file)

TABLES

Table 1
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Well	GCTL	CEF-293-4							
Sample Date		1993	1996	1997	1998	1999	Jul-1999	Jan-2000	Jul-2000
Field Analyses									
pH (standard units)		NC	NC	NC	NC	NC	6.19	6.31	6.68
Temperature (Fahrenheit)		NC	NC	NC	NC	NC	78.6	70.16	78.26
Conductivity (see notes)		NC	NC	NC	NC	NC	0.292	0.32	0.289
Turbidity (NTU)		NC	NC	NC	NC	NC	NM	990	>990
Compounds									
Benzene (μg/L)	1	NC	NC	NC	NC	NC	ND	<1.0	<1.0
Toluene (μg/L)	40	NC	NC	NC	NC	NC	ND	<1.0	<1.0
Ethylbenzene (μg/L)	30	NC	NC	NC	NC	NC	ND	<1.0	<1.0
Xylenes (μg/L)	20	NC	NC	NC	NC	NC	ND	<1.0	<1.0
Naphthalene (μg/L)	20	NC	NC	NC	NC	NC	ND	<5.0	<5.0
1-methylnaphthalene (μg/L)	20	NC	NC	NC	NC	NC	ND	<5.0	<5.0
2-methylnaphthalene (μg/L)	20	NC	NC	NC	NC	NC	ND	<5.0	<5.0
Total Naphthalenes (μg/L)	N/A	NC	NC	NC	NC	NC	ND	<5.0	<5.0
Methyl tert-butyl ether (μg/L)	35	NC	NC	NC	NC	NC	ND	<10	<10

See notes at end of table.

Table 1 (cont'd)
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Well	GCTL	CEF-293-11							
Sample Date		1993	1996	1997	1998	1999	Jul-1999	Jan-2000	Jul-2000
Field Analyses									
pH (standard units)		NC	5	4.93	5.37	4.94	4.70	4.99	4.20
Temperature (Fahrenheit)		NC	80.6	92.5	65.3	74.84	78.8	73.53	78.26
Conductivity (see notes)		NC	77	120	217	0.066	0.067	0.8	0.065
Turbidity (NTU)		NC	70	12	3.94	4	NM	990	450
Compounds									
Benzene (µg/L)	1	29	27	ND	ND	76	62	74	48
Toluene (µg/L)	40	ND	63	ND	ND	25	30	65	54
Ethylbenzene (µg/L)	30	81	ND	ND	ND	140	110	190	140
Xylenes (µg/L)	20	160	100	ND	ND	730	580	670	360
Naphthalene (µg/L)	20	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	180D
1-methylnaphthalene (µg/L)	20	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	84D
2-methylnaphthalene (µg/L)	20	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	120D
Total Naphthalenes (µg/L)	N/A	429	367	267	59	650	350	477	384
Methyl tert-butyl ether (µg/L)	35	NPR	NPR	NPR	NPR	NPR	40	<100	<50

See notes at end of table.

Table 1 (cont'd)
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Well	GCTL	CEF-293-13							
Sample Date		1993	1996	1997	1998	1999	Jul-1999	Jan-2000	Jul-2000
Field Analyses									
pH (standard units)		NC	5.15	5.47	5.82	5.17	4.77	5.24	5.08
Temperature (Fahrenheit)		NC	79.5	86.2	67.7	71.6	77.4	70.11	75.38
Conductivity (see notes)		NC	94	184	154.3	0.109	0.078	0.08	0.075
Turbidity (NTU)		NC	10	1.56	3.48	0	NM	990	610
Compounds									
Benzene (µg/L)	1	69	330	71	790	580	240	140	67D
Toluene (µg/L)	40	11	89	14	310	100	94	27	1.0
Ethylbenzene (µg/L)	30	100	38	32	430	300	340	200	95D
Xylenes (µg/L)	20	340	340	130	1220	1050	1810	570	27
Naphthalene (µg/L)	20	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	88D
1-methylnaphthalene (µg/L)	20	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	43D
2-methylnaphthalene (µg/L)	20	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	PRTN	62D
Total Naphthalenes (µg/L)	N/A	491	640	335	322	290	334	392	193
Methyl tert-butyl ether (µg/L)	35	NPR	NPR	NPR	NPR	NPR	390	<100	<10

See notes at end of table.

Table 1 (cont'd)
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Well	GCTL	CEF-293-14							
Sample Date		1993	1996	1997	1998	1999	Jul-1999	Jan-2000	Jul-2000
Field Analyses									
pH (standard units)		NC	5.61	5.92	5.84	5.80	5.37	5.73	5.48
Temperature (Fahrenheit)		NC	76.6	80.5	65.2	69.26	75.4	70.18	73.76
Conductivity (see notes)		NC	96	151	136.8	0.115	0.114	0.13	0.132
Turbidity (NTU)		NC	16	3.31	3.76	0	NM	990	999
Compounds									
Benzene (µg/L)	1	ND	ND	ND	ND	ND	ND	<1.0	<1.0
Toluene (µg/L)	40	ND	ND	ND	ND	ND	ND	<1.0	<1.0
Ethylbenzene (µg/L)	30	ND	ND	ND	ND	1.3	ND	<1.0	<1.0
Xylenes (µg/L)	20	ND	ND	ND	ND	2.3	ND	<1.0	<1.0
Naphthalene (µg/L)	20	PRTN	PRTN	ND	ND	PRTN	ND	<5.0	<5.0
1-methylnaphthalene (µg/L)	20	PRTN	PRTN	ND	ND	PRTN	ND	<5.0	<5.0
2-methylnaphthalene (µg/L)	20	PRTN	PRTN	ND	ND	PRTN	ND	<5.0	<5.0
Total Naphthalenes (µg/L)	N/A	11	4.1	ND	ND	7.3	ND	<5.0	<5.0
Methyl tert-butyl ether (µg/L)	35	NPR	NPR	NPR	NPR	NPR	ND	<10	<10

See notes at end of table.

Table 1 (cont'd)
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Well	GCTL	CEF-293-19						
Sample Date		1996	1997	1998	1999	Jul-1999	Jan-2000	Jul-2000
Field Analyses								
pH (standard units)		5.72	5.73	7.01	5.58	5.36	5.60	5.68
Temperature (Fahrenheit)		84	87.5	63.8	75.74	80.8	74.25	80.96
Conductivity (see notes)		250	376	294	0.203	0.181	0.25	0.169
Turbidity (NTU)		140	55	26.2	10	NM	820	>990
Compounds								
Benzene (μg/L)	1	1.4	NC	1	<2.0	1.7	2.8	1.9
Toluene (μg/L)	40	2.1	NC	25	51	34	50	30D
Ethylbenzene (μg/L)	30	3	NC	4	5.4	2.7	5	4.3
Xylenes (μg/L)	20	3.5	NC	10	29.7	16.3	27	12
Naphthalene (μg/L)	20	ND	NC	PRTN	PRTN	PRTN	<5.0	16
1-methylnaphthalene (μg/L)	20	ND	NC	PRTN	PRTN	PRTN	<5.0	<5.0
2-methylnaphthalene (μg/L)	20	ND	NC	PRTN	PRTN	PRTN	<5.0	<5.0
Total Naphthalenes (μg/L)	N/A	ND	NC	37	12.0	13.0	18	16
Methyl tert-butyl ether (μg/L)	35	NPR	NPR	NPR	NPR	ND	<20	13

See notes at end of table.

Table 1 (cont'd)
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Well	GCTL	CEF-293-20						
Sample Date		1996	1997	1998	1999	Jul-1999	Jan-2000	Jul-2000
Field Analyses								
pH (standard units)		5.46	5.68	7.73	5.41	4.97	5.49	5.21
Temperature (Fahrenheit)		83.8	87.2	65	74.48	81.7	75.13	81.68
Conductivity (see notes)		151	216	158	0.121	0.105	0.14	0.103
Turbidity (NTU)		10	>200	18.4	19	NM	520	320
Compounds								
Benzene (µg/L)	1	1.6	NC	1	ND	ND	<1.0	<1.0
Toluene (µg/L)	40	ND	NC	ND	ND	ND	<1.0	<1.0
Ethylbenzene (µg/L)	30	ND	NC	ND	ND	ND	<1.0	<1.0
Xylenes (µg/L)	20	1.3	NC	2	<2.0	ND	<1.0	<1.0
Naphthalene (µg/L)	20	ND	NC	ND	<3.0	ND	<5.0	<5.0
1-methylnaphthalene (µg/L)	20	ND	NC	ND	<3.0	ND	<5.0	<5.0
2-methylnaphthalene (µg/L)	20	ND	NC	ND	<3.0	ND	<5.0	<5.0
Total Naphthalenes (µg/L)	N/A	ND	NC	ND	<3.0	ND	<5.0	<5.0
Methyl tert-butyl ether (µg/L)	35	NPR	NPR	NPR	NPR	ND	<10	<10

See notes at end of table.

Table 1 (cont'd)
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Well	GCTL	CEF-293-21						
Sample Date		1996	1997	1998	1999	Jul-1999	Jan-2000	Jul-2000
Field Analyses								
pH (standard units)		5.67	5.9	6.09	5.65	5.26	5.64	5.11
Temperature (Fahrenheit)		83.3	90.6	67.6	74.3	80.6	74.6	80.06
Conductivity (see notes)		224	357	261	0.188	0.153	0.19	0.132
Turbidity (NTU)		25	3.4	3.23	12	NM	990	140
Compounds								
Benzene (µg/L)	1	ND	NC	28	72	160	46	66D
Toluene (µg/L)	40	ND	NC	3.4	<5.0	ND	<2.0	<1.0
Ethylbenzene (µg/L)	30	ND	NC	5.9	<5.0	18	2.9	4
Xylenes (µg/L)	20	ND	NC	8.4	<10.0	60	3.5	7.4
Naphthalene (µg/L)	20	ND	NC	ND	PRTN	PRTN	PRTN	8.8
1-methylnaphthalene (µg/L)	20	ND	NC	ND	PRTN	PRTN	PRTN	10
2-methylnaphthalene (µg/L)	20	ND	NC	ND	PRTN	PRTN	PRTN	14
Total Naphthalenes (µg/L)	N/A	ND	NC	ND	5.6	25.2	46	32.8
Methyl tert-butyl ether (µg/L)	35	NPR	NPR	NPR	NPR	28	<20	<10

Notes:
- N/A = not applicable.
- NC = not collected.
- ND = not detected.
- NM = not measured.
- NPR = not previously reported.
- PRTN = previously reported as total naphthalenes.
- D = lab result following sample dilution and re-analysis.
- umhos/cm = micromhos per centimeter (these units applicable to conductivity data from 1998 and earlier).
- mS/cm = milliSiemens per centimeter (these units applicable to 1999 and later conductivity data).
- NTU = nephelometric turbidity units.
- µg/L = microgram per liter.
- GCTL = Groundwater Cleanup Target Levels (shaded areas show no levels applicable for this program).

Table 2
Groundwater Sampling Results

Groundwater Monitoring Report
Day Tank 1
Naval Air Station Cecil Field
Jacksonville, Florida

Monitoring Wells	GCTL	CEF-824A-1Sa	CEF-824A-2S	CEF-824A-3S	CEF-824A-4S	CEF-824A-5S
Sample Date		7/27/00	7/27/00	7/27/00	7/27/00	7/27/00
Field Analyses						
pH (standard units)		5.11	4.85	4.43	4.78	4.54
Temperature (Fahrenheit)		83.5	71.8	82.4	83.7	83.7
Conductivity (mS/cm)		0.092	0.093	0.07	0.121	0.079
Turbidity (NTU)		13.2	37.5	-10	85	28.1
Compounds						
Benzene (µg/L)	1	1 U	1 U	1.9	251 J	1 U
Toluene (µg/L)	40	1 U	1 U	1 U	2	1 U
Ethylbenzene (µg/L)	30	1 U	1 U	1.4	27	1 U
Xylenes (µg/L)	20	3 U	6.1	16.4	97.9	7.9
Naphthalene (µg/L)	20	1.1 J	2.2 U	2.2 U	13.6	2.2 U
1-methylnaphthalene (µg/L)	20	16.5	2 J	2.2 U	5.8	2.2 U
2-methylnaphthalene (µg/L)	20	25.5	3.3	2.2 U	7.1	2.2 U
Total Naphthalenes (µg/L)	N/A	43.1	5.3	2.2 U	26.5	2.2 U
Methyl tert-butyl ether (µg/L)	35	NS	NS	NS	NS	NS

Notes:
NS = not sampled.
U=Undetected.
J = estimated.
mS/cm = milliSiemens per centimeter.
NTU = nephelometric turbidity units.
µg/L = microgram per liter.
GCTL = Groundwater Cleanup Target Levels (shaded areas show no levels applicable for this program).
N/A = not applicable.

FIGURES

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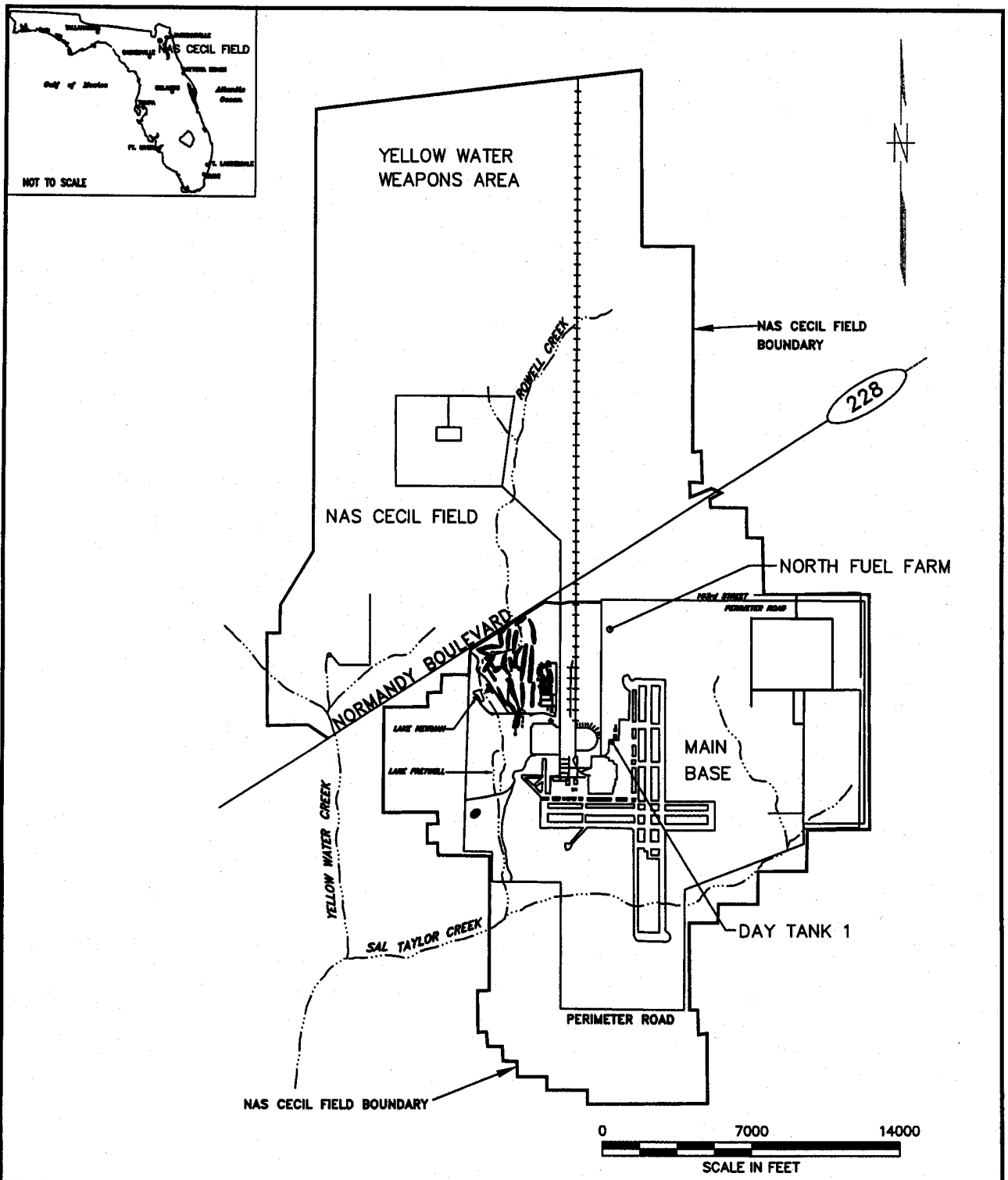

DRAWN BY KW	DATE 3/4/99	SITE LOCATION MAP GROUNDWATER MONITORING REPORT NAVAL AIR STATION CECIL FIELD JACKSONVILLE, FLORIDA	CONTRACT NO. 0013
CHECKED BY	DATE		APPROVED BY / DATE
COST/SCHED-AREA			APPROVED BY / DATE
SCALE AS NOTED			DRAWING NO. FIGURE 1 / REV. 0

FORM CADD NO. SDIV_AV.DWG - REV 0 - 1/20/98

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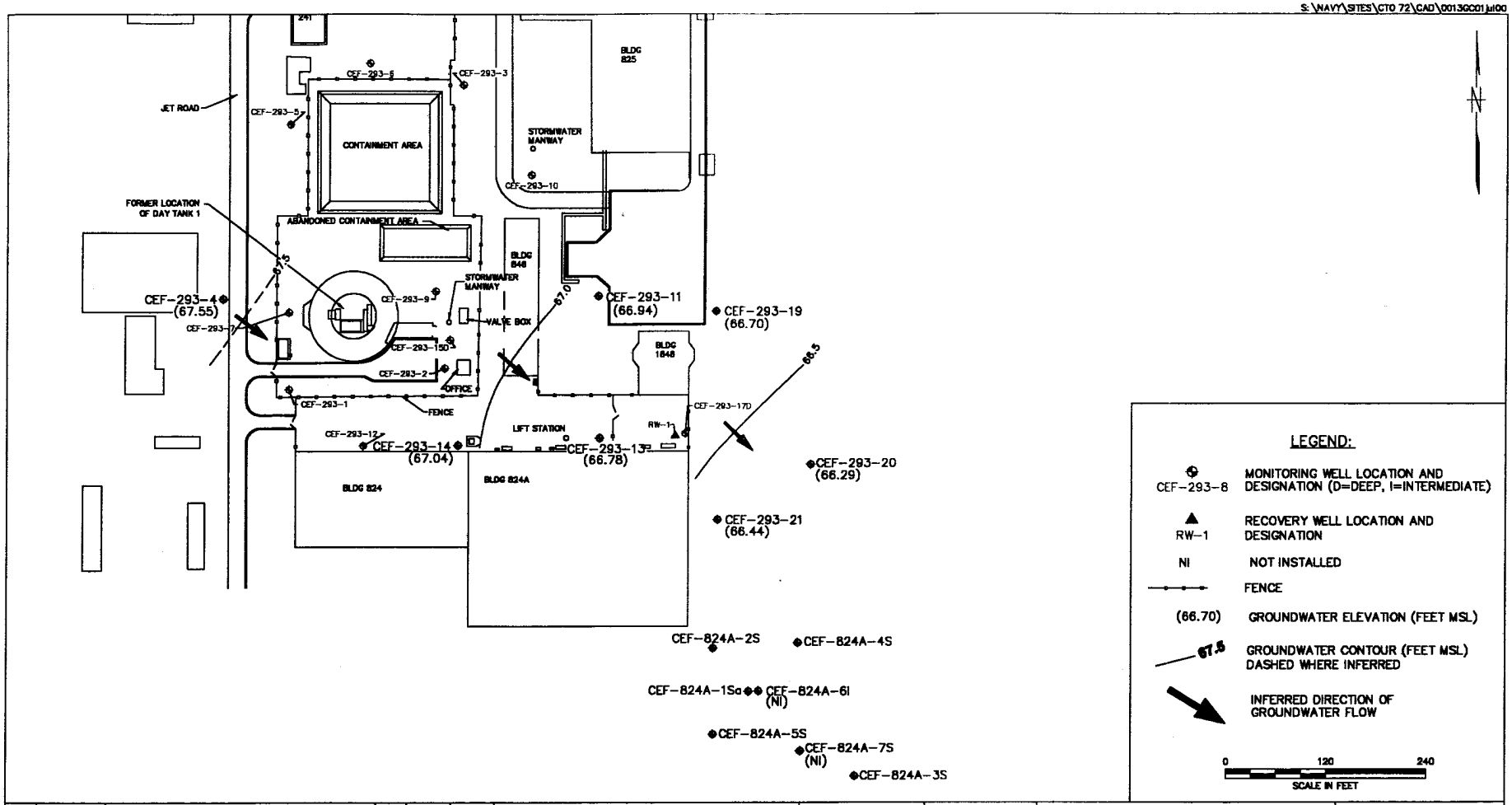

NO.	DATE	REVISIONS	BY	CHKD	APPD	REFERENCES

DRAWN BY CW DATE 8/21/00
CHECKED BY DATE
COST/SCHED-AREA
SCALE AS NOTED

DAY TANK 1, FACILITY 293
GROUNDWATER FLOW MAP

JULY 10, 2000
NAVAL AIR STATION CECIL FIELD
JACKSONVILLE, FLORIDA

CONTRACT NO. 0013
APPROVED BY DATE
APPROVED BY DATE
DRAWING NO. FIGURE 2
REV. 0

FORM CADD NO. SDIV_BLDWG - REV 0 - 1/20/98

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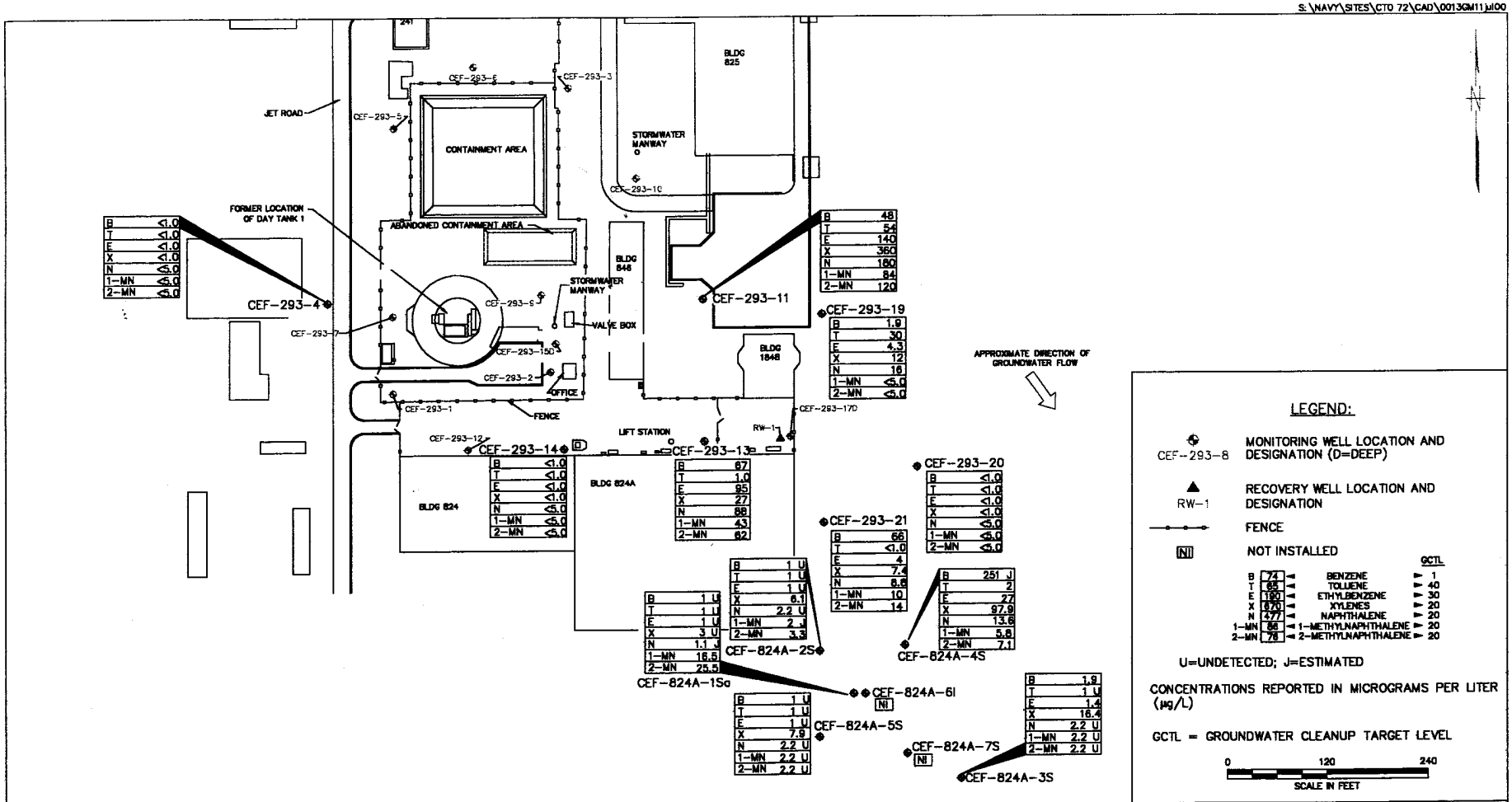

NO.	DATE	REVISIONS	BY	CHKD	APPD	REFERENCES

DRAWN BY CW DATE 8/21/00
CHECKED BY DATE
COST/SCHED--AREA
SCALE AS NOTED

DAY TANK 1, FACILITY 293
DISSOLVED HYDROCARBON CONCENTRATION MAP

JULY 2000
NAVAL AIR STATION CECIL FIELD
JACKSONVILLE, FLORIDA

CONTRACT NO. 0013
APPROVED BY DATE
APPROVED BY DATE
DRAWING NO. FIGURE 3
REV. 0

FORM CADD NO. SDIV_SH.DWG – REV 0 – 1/20/98

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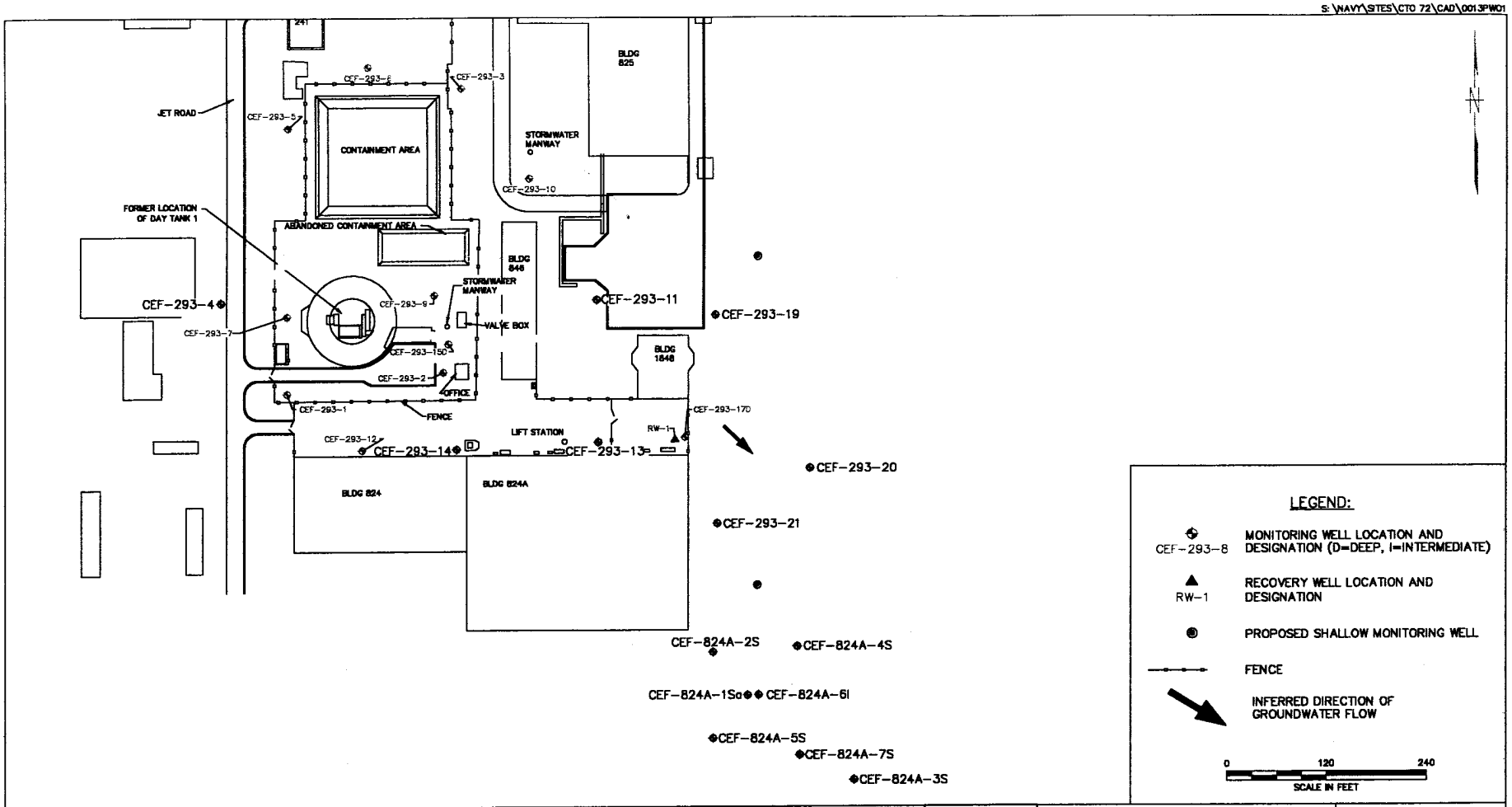

NO.	DATE	REVISIONS	BY	CHKD	APPD	REFERENCES

DRAWN BY CW DATE 8/21/00
CHECKED BY DATE
COST/SCHED-AREA
SCALE AS NOTED

DAY TANK 1, FACILITY 293
PROPOSED MONITORING WELL LOCATIONS

NAVAL AIR STATION CECIL FIELD
JACKSONVILLE, FLORIDA

CONTRACT NO. 0013
APPROVED BY DATE
APPROVED BY DATE
DRAWING NO. FIGURE 4
REV. 0

FORM CADD NO. SDIV_BH.DWG - REV 0 - 1/20/98

ATTACHMENT A

GROUNDWATER ELEVATION DATA SHEETS

Tetra Tech NUS, Inc.

GROUNDWATER LEVEL MEASUREMENT SHEET

Project Name: NAS Cecil Field
Project No.: 0013
Location: Day Tank 1
Personnel: Joe Ferranti/Louis Knight
Weather Conditions: Sunny
Measuring Device: Slope W.L.I.
Tidally Influenced: Yes ___ No _X_
Remarks:

Well or Piezometer Number (CEF-293-)	Date	Time	Elevation of Reference Point (feet)*	Total Well Depth (feet)*	Water Level Indicator Reading (feet)*	Thickness of Free Product (feet)*	Groundwater Elevation (feet)*	Comments
4	7/10/00	1230	77.13	11.00	9.58	N/A	67.55	
11	7/10/00	1245	76.70	13.18	9.76	N/A	66.94	
13	7/10/00	1235	75.87	14.71	9.09	N/A	66.78	
14	7/10/00	1240	76.47	14.20	9.43	N/A	67.04	
19	7/10/00	1250	76.48	13.80	9.78	N/A	66.70	
20	7/10/00	1255	75.79	14.40	9.50	N/A	66.29	
21	7/10/00	1300	76.05	14.46	9.61	N/A	66.44	

* All measurements to the nearest 0.01 foot

ATTACHMENT B

LABORATORY ANALYTICAL REPORTS

DAY TANK 1

SEVERN TRENT SERVICES

CASE NARRATIVE

SDG# TTKW15
SL PROJECT#s S004537, S004619

Polynuclear Aromatics (8310) Fraction

The following samples were analyzed according to SW-846 method 8310.

SL#	SAMPLE DESCRIPTION	MATRIX
S004537*1	CEF-293-13-GW-04	Liquid
S004537*2	CEF-293-4-GW-04	Liquid
S004537*3	CEF-293-21-GW-04	Liquid
S004537*4	CEF-293-19-GW-04	Liquid
S004537*5	CEF-293-11-GW-04	Liquid
S004537*6	CEF-293-20-GW-04	Liquid
S004537*7	CEF-293-DU01-GW-04	Liquid
S004619*1	CEF-076-53I-GW-04	Liquid
S004619*2	CEF-076-51D-GW-04	Liquid
S004619*3	CEF-076-58I-GW-04	Liquid
S004619*4	CEF-076-47I-GW-04	Liquid
S004619*5	CEF-076-64I-GW-04	Liquid
S004619*6	CEF-076-63S-GW-04	Liquid
S004619*7	CEF-076-30-GW-04	Liquid
S004619*8	CEF-076-65D-GW-04	Liquid
S004619*9	CEF-076-DU02-GW-04	Liquid

Sample S004537-5 (CEF-293-11-GW-04) was the designated matrix spike/matrix spike duplicate. Due to the abundance of target analytes, the unspiked sample was analyzed at a secondary dilution of 1:10; therefore, the MS/MSD were also analyzed at 1:10. Surrogates were not recovered in the 1:10 dilutions and several spiking compounds were outside advisory limits in the MS/MSD due to abundance in the unspiked sample.

Sample S004537-1 was analyzed at a secondary dilution of 1:5 due to the abundance of target analytes. Results concurred and both sets of data have been provided.

SEVERN TRENT SERVICES

CASE NARRATIVE

SDG# TTKW15
SL PROJECT#s S004537, S004619

Halogenated and Aromatic Volatiles (8021A) Fraction

The following samples were analyzed according to SW-846 Method 8021A.

SL#	SAMPLE DESCRIPTION	MATRIX
S004537*1	CEF-293-13-GW-04	Liquid
S004537*2	CEF-293-4-GW-04	Liquid
S004537*3	CEF-293-21-GW-04	Liquid
S004537*4	CEF-293-19-GW-04	Liquid
S004537*5	CEF-293-11-GW-04	Liquid
S004537*6	CEF-293-20-GW-04	Liquid
S004537*7	CEF-293-DU01-GW-04	Liquid
S004619*1	CEF-076-53I-GW-04	Liquid
S004619*2	CEF-076-51D-GW-04	Liquid
S004619*3	CEF-076-58I-GW-04	Liquid
S004619*4	CEF-076-47I-GW-04	Liquid
S004619*5	CEF-076-64I-GW-04	Liquid
S004619*6	CEF-076-63S-GW-04	Liquid
S004619*7	CEF-076-30-GW-04	Liquid
S004619*8	CEF-076-65D-GW-04	Liquid
S004619*9	CEF-076-DU02-GW-04	Liquid

Sample S004537-5 (CEF-293-11-GW-04) was the designated matrix spike/matrix spike duplicate, and all recoveries were within advisory limits.

Due to the abundance of target analytes, the following dilutions were required: samples S004619-2, S004619-5, and S004619-8 were analyzed at a primary dilution of 1:100; samples S004619-3 and S004619-9 were analyzed at a primary dilution of 1:50; sample S004537-5 was analyzed at a primary dilution of 1:5; sample S004537-1 was analyzed at a secondary dilution of 1:5; samples S004537-3 and S004537-4 were analyzed at a secondary dilution of 1:2; and sample S004537-7 was analyzed at a primary dilution of 1:2 and a secondary dilution of 1:5.

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LOG NO: S0-04537
Received: 11 JUL 00
Reported: 22 AUG 00

Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112700822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04537-7	CEF-293-DU01-GW-04	07-10-00	TTKW15
04537-7-DL	CEF-293-DU01-GW-04	07-10-00	TTKW15

PARAMETER	04537-7	04537-7-DL

Methods: EPA SW-846, Update III.

Angie Weimerskirk

Angie Weimerskirk, Project Manager

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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

CC: HOWARD ENGLE/TALL,FL
Sampled By: Client
Code: 160200822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04619-6	CEF-076-63S-GW-04	07-12-00/14:10	TTKW15
04619-7	CEF-076-30-GW-04	07-12-00/15:30	TTKW15
04619-8	CEF-076-65D-GW-04	07-12-00/15:50	TTKW15
04619-9	CEF-076-DU02-GW-04	07-12-00	TTKW15

PARAMETER	04619-6	04619-7	04619-8	04619-9

Methods: EPA SW-846, Update III.

Angie Weimerskirk
Angie Weimerskirk, Project Manager

Final Page Of Report

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LOG NO: S0-TTKW15
Received: 11 JUL 00
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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112200822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , QC REPORT FOR LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
TTKW15-1	Method Blank		TTKW15
TTKW15-2	Lab Control Standard % Recovery		TTKW15
TTKW15-3	LCS Accuracy Control Limit (%R)		TTKW15
TTKW15-4	Method Blank		TTKW15
TTKW15-5	Lab Control Standard % Recovery		TTKW15

PARAMETER	TTKW15-1	TTKW15-2	TTKW15-3	TTKW15-4	TTKW15-5
Halogenated and Aromatic Volatiles (8021)					
Benzene, ug/l	<1.0	80 %	48-152 %	<1.0	90 %
Ethylbenzene, ug/l	<1.0	---	---	<1.0	---
Toluene, ug/l	<1.0	90 %	62-133 %	<1.0	100 %
o-Xylene, ug/l	<1.0	---	---	<1.0	---
m&p-Xylene, ug/l	<1.0	---	---	<1.0	---
Surrogate - a,a,a-Trifluorotoluene	100 %	93 %	70-130 %	93 %	93 %
Methyl t-butyl ether (MTBE), ug/l	<10	---	---	<10	---
Dilution Factor	1	1	---	1	1
Analysis Date	07.13.00	07.13.00	---	07.14.00	07.14.00
Batch ID	1I0713	1I0713	---	1I0714	1I0714

Methods: EPA SW-846, Update III.

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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112200822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , QC REPORT FOR LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
TTKW15-6	Method Blank		TTKW15
TTKW15-7	Lab Control Standard % Recovery		TTKW15
TTKW15-8	Method Blank		TTKW15
TTKW15-9	Lab Control Standard % Recovery		TTKW15
TTKW15-10	Method Blank		TTKW15

PARAMETER	TTKW15-6	TTKW15-7	TTKW15-8	TTKW15-9	TTKW15-10
Polynuclear Aromatics (8310)					
Halogenated and Aromatic Volatiles (8021)					
Benzene, ug/l	<1.0	90 %	<1.0	85 %	<1.0
Ethylbenzene, ug/l	<1.0	---	<1.0	---	<1.0
Toluene, ug/l	<1.0	95 %	<1.0	95 %	<1.0
o-Xylene, ug/l	<1.0	---	<1.0	---	<1.0
m&p-Xylene, ug/l	<1.0	---	<1.0	---	<1.0
Surrogate - a,a,a-Trifluorotoluene	93 %	93 %	97 %	87 %	97 %
Methyl t-butyl ether (MTBE), ug/l	<10	---	<10	---	<10
Dilution Factor	1	1	1	1	1
Analysis Date	07.18.00	07.18.00	07.19.00	07.19.00	07.20.00
Batch ID	1I0718	1I0718	1I0719	1I0719	1I0720

Methods: EPA SW-846, Update III.

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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112200822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , QC REPORT FOR LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
TTKW15-11	Lab Control Standard % Recovery		TTKW15

PARAMETER	TTKW15-11
Polynuclear Aromatics (8310)	
Halogenated and Aromatic Volatiles (8021)	
Benzene, %	85 %
Toluene, %	95 %
Surrogate - a,a,a-Trifluorotoluene	87 %
Dilution Factor	1
Analysis Date	07.20.00
Batch ID	1I0720

Methods: EPA SW-846, Update III.

Angie Weimerskirk

Angie Weimerskirk, Project Manager

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Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112200822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , QC REPORT FOR LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
TTKW15-1	Method Blank		TTKW15
TTKW15-2	Lab Control Standard % Recovery		TTKW15
TTKW15-3	LCS Accuracy Control Limit (%R)		TTKW15
TTKW15-4	Method Blank		TTKW15
TTKW15-5	Lab Control Standard % Recovery		TTKW15

PARAMETER	TTKW15-1	TTKW15-2	TTKW15-3	TTKW15-4	TTKW15-5
Polynuclear Aromatics (8310)					
Acenaphthene, ug/l	<5.0	56 %	32-128 %	<5.0	49 %
Acenaphthylene, ug/l	<5.0	---	---	<5.0	---
Anthracene, ug/l	<5.0	---	---	<5.0	---
Benzo(a)anthracene, ug/l	<5.0	---	---	<5.0	---
Benzo(a)pyrene, ug/l	<5.0	---	---	<5.0	---
Benzo(b)fluoranthene, ug/l	<5.0	---	---	<5.0	---
Benzo(g,h,i)perylene, ug/l	<5.0	---	---	<5.0	---
Benzo(k)fluoranthene, ug/l	<5.0	---	---	<5.0	---
Chrysene, ug/l	<5.0	62 %	40-122 %	<5.0	64 %
Dibenzo(a,h)anthracene, ug/l	<5.0	---	---	<5.0	---
Fluoranthene, ug/l	<5.0	---	---	<5.0	---
Fluorene, ug/l	<5.0	57 %	31-130 %	<5.0	53 %
Indeno(1,2,3-cd)pyrene, ug/l	<5.0	---	---	<5.0	---
Naphthalene, ug/l	<5.0	52 %	15-130 %	<5.0	50 %
Phenanthrene, ug/l	<5.0	---	---	<5.0	---
Pyrene, ug/l	<5.0	64 %	29-137 %	<5.0	60 %
1-Methylnaphthalene, ug/l	<5.0	---	---	<5.0	---
2-Methylnaphthalene, ug/l	<5.0	---	---	<5.0	---
Surrogate - Terphenyl-d14	72 %	80 %	32-141 %	72 %	72 %
Dilution Factor	1	1	---	1	1
Prep Date	07.19.00	07.19.00	---	07.12.00	07.12.00
Analysis Date	07.21.00	07.21.00	---	07.14.00	07.14.00
Batch ID	0719J	0719J	---	0712J	0712J

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LOG NO: S0-04537
Received: 11 JUL 00
Reported: 22 AUG 00

Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112700822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04537-1	CEF-293-13-GW-04	07-10-00/17:25	TTKW15
04537-1-DL	CEF-293-13-GW-04	07-10-00/17:25	TTKW15
04537-2	CEF-293-4-GW-04	07-10-00/17:00	TTKW15
04537-3	CEF-293-21-GW-04	07-10-00/15:25	TTKW15
04537-3-DL	CEF-293-21-GW-04	07-10-00/15:25	TTKW15

PARAMETER	04537-1	04537-1-DL	04537-2	04537-3	04537-3-DL
Halogenated and Aromatic Volatiles (8021)					
Benzene, ug/l	58E	67D	<1.0	55E	66D
Ethylbenzene, ug/l	71E	95D	<1.0	4.0	5.0D
Toluene, ug/l	1.0	<5.0	<1.0	<1.0	<2.0
o-Xylene, ug/l	<1.0	<5.0	<1.0	<1.0	<2.0
m&p-Xylene, ug/l	27	35D	<1.0	7.4	9.6D
Surrogate - a,a,a-Trifluorotoluene	57 %	80 %	93 %	83 %	93 %
Methyl t-butyl ether (MTBE), ug/l	<10	<50	<10	<10	<20
Dilution Factor	1	5	1	1	2
Analysis Date	07.13.00	07.14.00	07.13.00	07.14.00	07.14.00
Batch ID	1I0713	1I0714	1I0713	1I0714	1I0714

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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112700822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04537-4	CEF-293-19-GW-04	07-10-00/16:10	TTKW15
04537-4-DL	CEF-293-19-GW-04	07-10-00/16:10	TTKW15
04537-5	CEF-293-11-GW-04	07-10-00/13:30	TTKW15
04537-5-DL	CEF-293-11-GW-04	07-10-00/13:30	TTKW15
04537-6	CEF-293-20-GW-04	07-10-00/14:40	TTKW15

PARAMETER	04537-4	04537-4-DL	04537-5	04537-5-DL	04537-6
Halogenated and Aromatic Volatiles (8021)					
Benzene, ug/l	1.9	<2.0	48	---	<1.0
Ethylbenzene, ug/l	4.3	2.6D	140	---	<1.0
Toluene, ug/l	44E	30D	54	---	<1.0
o-Xylene, ug/l	<1.0	<2.0	<5.0	---	<1.0
m&p-Xylene, ug/l	12	8.1D	360	---	<1.0
Surrogate - a,a,a-Trifluorotoluene	107 %	87 %	77 %	---	93 %
Methyl t-butyl ether (MTBE), ug/l	13	<20	<50	---	<10
Dilution Factor	1	2	5	---	1
Analysis Date	07.18.00	07.18.00	07.14.00	---	07.18.00
Batch ID	1I0718	1I0718	1I0714	---	1I0718

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LOG NO: S0-04537
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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112700822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04537-7	CEF-293-DU01-GW-04	07-10-00	TTKW15
04537-7-DL	CEF-293-DU01-GW-04	07-10-00	TTKW15

PARAMETER	04537-7	04537-7-DL
Halogenated and Aromatic Volatiles (8021)		
Benzene, ug/l	100E	100D
Ethylbenzene, ug/l	14	13D
Toluene, ug/l	<2.0	<5.0
o-Xylene, ug/l	<2.0	<5.0
m&p-Xylene, ug/l	27	27D
Surrogate - a,a,a-Trifluorotoluene	83 %	87 %
Methyl t-butyl ether (MTBE), ug/l	<20	<50
Dilution Factor	2	5
Analysis Date	07.14.00	07.14.00
Batch ID	1I0714	1I0714

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LOG NO: S0-04537
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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112700822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04537-1	CEF-293-13-GW-04	07-10-00/17:25	TTKW15
04537-1-DL	CEF-293-13-GW-04	07-10-00/17:25	TTKW15
04537-2	CEF-293-4-GW-04	07-10-00/17:00	TTKW15
04537-3	CEF-293-21-GW-04	07-10-00/15:25	TTKW15
04537-3-DL	CEF-293-21-GW-04	07-10-00/15:25	TTKW15

PARAMETER	04537-1	04537-1-DL	04537-2	04537-3	04537-3-DL
Polynuclear Aromatics (8310)					
Acenaphthene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Acenaphthylene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Anthracene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Benzo(a)anthracene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Benzo(a)pyrene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Benzo(b)fluoranthene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Benzo(g,h,i)perylene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Benzo(k)fluoranthene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Chrysene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Dibenzo(a,h)anthracene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Fluoranthene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Fluorene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Indeno(1,2,3-cd)pyrene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Naphthalene, ug/l dw	80E	88D	<5.0	8.8	---
Phenanthrene, ug/l dw	<5.0	<25	<5.0	<5.0	---
Pyrene, ug/l dw	<5.0	<25	<5.0	<5.0	---
1-Methylnaphthalene, ug/l dw	41E	43D	<5.0	10	---
2-Methylnaphthalene, ug/l dw	75E	62D	<5.0	14	---
Surrogate - Terphenyl-d14	50 %	50 %	48 %	62 %	---
Dilution Factor	1	5	1	1	---
Prep Date	07.12.00	07.12.00	07.12.00	07.12.00	---
Analysis Date	07.14.00	07.14.00	07.14.00	07.14.00	---
Batch ID	0712J	0712J	0712J	0712J	---

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LOG NO: S0-04537
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Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112700822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04537-4	CEF-293-19-GW-04	07-10-00/16:10	TTKW15
04537-4-DL	CEF-293-19-GW-04	07-10-00/16:10	TTKW15
04537-5	CEF-293-11-GW-04	07-10-00/13:30	TTKW15
04537-5-DL	CEF-293-11-GW-04	07-10-00/13:30	TTKW15
04537-6	CEF-293-20-GW-04	07-10-00/14:40	TTKW15

PARAMETER	04537-4	04537-4-DL	04537-5	04537-5-DL	04537-6
Polynuclear Aromatics (8310)					
Acenaphthene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Acenaphthylene, ug/l dw	5.3	---	<5.0	<50	<5.0
Anthracene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Benzo(a)anthracene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Benzo(a)pyrene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Benzo(b)fluoranthene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Benzo(g,h,i)perylene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Benzo(k)fluoranthene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Chrysene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Dibenzo(a,h)anthracene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Fluoranthene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Fluorene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Indeno(1,2,3-cd)pyrene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Naphthalene, ug/l dw	16	---	170E	180D	<5.0
Phenanthrene, ug/l dw	<5.0	---	<5.0	<50	<5.0
Pyrene, ug/l dw	<5.0	---	<5.0	<50	<5.0
1-Methylnaphthalene, ug/l dw	<5.0	---	79E	84D	<5.0
2-Methylnaphthalene, ug/l dw	<5.0	---	140E	120D	<5.0
Surrogate - Terphenyl-d14	50 %	---	56 %	0 %D	48 %
Dilution Factor	1	---	1	10	1
Prep Date	07.12.00	---	07.12.00	07.12.00	07.12.00
Analysis Date	07.14.00	---	07.14.00	07.14.00	07.14.00
Batch ID	0712J	---	0712J	0712J	0712J

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LOG NO: S0-04537
Received: 11 JUL 00
Reported: 22 AUG 00

Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 112700822

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04537-7	CEF-293-DU01-GW-04	07-10-00	TTKW15
04537-7-DL	CEF-293-DU01-GW-04	07-10-00	TTKW15

PARAMETER	04537-7	04537-7-DL
Polynuclear Aromatics (8310)		
Acenaphthene, ug/l dw	<5.0	---
Acenaphthylene, ug/l dw	<5.0	---
Anthracene, ug/l dw	<5.0	---
Benzo(a)anthracene, ug/l dw	<5.0	---
Benzo(a)pyrene, ug/l dw	<5.0	---
Benzo(b)fluoranthene, ug/l dw	<5.0	---
Benzo(g,h,i)perylene, ug/l dw	<5.0	---
Benzo(k)fluoranthene, ug/l dw	<5.0	---
Chrysene, ug/l dw	<5.0	---
Dibenzo(a,h)anthracene, ug/l dw	<5.0	---
Fluoranthene, ug/l dw	<5.0	---
Fluorene, ug/l dw	<5.0	---
Indeno(1,2,3-cd)pyrene, ug/l dw	<5.0	---
Naphthalene, ug/l dw	8.9	---
Phenanthrene, ug/l dw	<5.0	---
Pyrene, ug/l dw	<5.0	---
1-Methylnaphthalene, ug/l dw	9.2	---
2-Methylnaphthalene, ug/l dw	12	---
Surrogate - Terphenyl-d14	68 %	---
Dilution Factor	1	---
Prep Date	07.12.00	---
Analysis Date	07.14.00	---
Batch ID	0712J	---

TETRA TECH NUS, INC. CHAIN OF CUSTODY | NUMBER DTI-071000 | PAGE 1 OF ____

PROJECT NO: 0013	SITE NAME: DAY TANK 1 CECIL FIELD	PROJECT MANAGER AND PHONE NUMBER: Paul Calligan 850	LABORATORY NAME AND CONTACT: SAVANNAH LABS, Angie Weimers-Kirk
SAMPLERS (SIGNATURE): Jacob Knight		FIELD OPERATIONS LEADER AND PHONE NUMBER: MERV DAVE 904 281 1941 x.14	ADDRESS: 5102 La Roche Av.
		CARRIER/WAYBILL NUMBER: Fedex 8188 2608 2521	CITY, STATE: SAVANNAH, GA 31404

STANDARD TAT ☒
RUSH TAT ☐
☐ 24 hr. ☐ 48 hr. ☐ 72 hr. ☐ 7 day ☐ 14 day

CONTAINER TYPE PLASTIC (P) or GLASS (G): G G
PRESERVATIVE USED: HCl None

DATE YEAR 2000	TIME	SAMPLE ID	MATRIX	GRAB (G) COMP (C)	No. OF CONTAINERS	VOCs (8021B)	PAHs (8310)							COMMENTS
7/10	1725	CEF-293-13-GW-04	GW	G	5	3	2							Cool to 4°C
	1700	CEF-293-4-GW-04			5	3	2							
	1525	CEF-293-21-GW-04			5	3	2							
	1610	CEF-293-19-GW-04			5	3	2							
	1330	CEF-293-11-GW-04			3	3								
	1440	CEF-293-20-GW-04			3	3								
	1330	CEF-293-MSMSD01-GW-04			3	3								
	–	CEF-293-DU01-GW-04			3	3								

1. RELINQUISHED BY: Jacob Knight	DATE 7.10.00	TIME 1900	1. RECEIVED BY: J. Sewaffard	DATE 7/11/00	TIME 8:45
2. RELINQUISHED BY	DATE	TIME	2. RECEIVED BY	DATE	TIME
3. RELINQUISHED BY	DATE	TIME	3. RECEIVED BY	DATE	TIME

COMMENTS: 5004537

DISTRIBUTION: WHITE (ACCOMPANIES SAMPLE) YELLOW (FIELD COPY) PINK (FILE COPY)

3/99
FORM NO. TtNUS-001

TETRA TECH NUS, INC.

CHAIN OF CUSTODY | NUMBER DTI-071000 | PAGE ___ OF ___

PROJECT NO: 0013

SITE NAME: DAY TANK 2

PROJECT MANAGER AND PHONE NUMBER: Paul Culligan 850 385 9866

LABORATORY NAME AND CONTACT: SAVANNAH Labs Angie Weimers

SAMPLERS (SIGNATURE): Louis Knight

FIELD OPERATIONS LEADER AND PHONE NUMBER: Merv Daun 904 281 1941 x.14

ADDRESS: 5102 LA Roche Av.

CARRIER/WAYBILL NUMBER: Fedex 8188 2608 2521

CITY, STATE: SAVANNAH, GA 31404

STANDARD TAT ☒
RUSH TAT ☐
☐ 24 hr. ☐ 48 hr. ☐ 72 hr. ☐ 7 day ☐ 14 day

DATE YEAR 2000	TIME	SAMPLE ID	MATRIX	GRAB (G) COMP (C)	No. OF CONTAINERS	VOCs (8021B)	PAHS (8310)							COMMENTS
					CONTAINER TYPE PLASTIC (P) or GLASS (G)	G	G							
					PRESERVATIVE USED	HCl	none							
7/10	1330	CEF-293-11-GW-04	GW	G	2		2							Cool to 4°C
	—	CEF-293-DU01-GW-04	GW		2		2							
	1330	CEF-293-MSMSD01-GW-04	GW		4		4							
	1440	CEF-293-20-GW-04	GW		2		2							

1. RELINQUISHED BY: Louis Knight	DATE 7.10.00	TIME 1900	1. RECEIVED BY: J. Swafford	DATE 7/11/00	TIME 8:45
2. RELINQUISHED BY	DATE	TIME	2. RECEIVED BY	DATE	TIME
3. RELINQUISHED BY	DATE	TIME	3. RECEIVED BY	DATE	TIME

COMMENTS: S004537

DISTRIBUTION: WHITE (ACCOMPANIES SAMPLE) YELLOW (FIELD COPY) PINK (FILE COPY)

3/99
FORM NO. TtNUS-001

SEVERN TRENT SERVICES

CASE NARRATIVE

SDG# TTKW16
SL PROJECT#s S004673, S004716

Halogenated and Aromatic Volatiles (8021) Fraction

The following samples were analyzed according to SW-846 method 8021.

SL#	SAMPLE DESCRIPTION	MATRIX
S004673*1	CEF-293-14-GW-04	Liquid
S004673*2	CEF-076-71D-GW-04	Liquid
S004673*3	CEF-076-69S-GW-04	Liquid
S004673*4	CEF-076-70I-GW-04	Liquid
S004673*5	CEF-076-40D-GW-04	Liquid
S004673*6	CEF-076-21-GW-04	Liquid
S004673*7	CEF-076-39D-GW-04	Liquid
S004673*8	CEF-076-11-GW-04	Liquid
S004716*1	CEF-076-67I-GW-04	Liquid
S004716*2	CEF-076-80D-GW-04	Liquid
S004716*3	CEF-076-DU01-GW-04	Liquid

Sample S004716-2 (CEF-076-80D-GW-04) was the designated matrix spike/matrix spike duplicate. Due to the abundance of benzene the unspiked sample was analyzed at a secondary dilution of 1:10. The MS and MSD were also analyzed at dilutions of 1:10.

Due to the abundance of target analytes sample S004673-7 was analyzed at a dilution of 1:25 and sample S004673-4 was analyzed at a primary dilution of 1:200 and a secondary dilution of 1:500 and all data has been reported.

SEVERN TRENT SERVICES

CASE NARRATIVE

SDG# TTKW16
SL PROJECT#s S004673, S004716

Polynuclear Aromatics (8310) Fraction

The following samples were analyzed according to SW-846 method 8310.

SL#	SAMPLE DESCRIPTION	MATRIX
S004673*1	CEF-293-14-GW-04	Liquid
S004673*2	CEF-076-71D-GW-04	Liquid
S004673*3	CEF-076-69S-GW-04	Liquid
S004673*4	CEF-076-70I-GW-04	Liquid
S004673*5	CEF-076-40D-GW-04	Liquid
S004673*6	CEF-076-21-GW-04	Liquid
S004673*7	CEF-076-39D-GW-04	Liquid
S004673*8	CEF-076-11-GW-04	Liquid
S004716*1	CEF-076-67I-GW-04	Liquid
S004716*2	CEF-076-80D-GW-04	Liquid
S004716*3	CEF-076-DU01-GW-04	Liquid

Sample S004716-2 (CEF-076-80D-GW-04) was the designated matrix spike/matrix spike duplicate.

Due to the abundance of napthalene samples S004673-4 and S004673-7 were analyzed at secondary dilutions of 1:5. Results concurred and all data has been provided.

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LOG NO: S0-04673
Received: 14 JUL 00
Reported: 16 AUG 00

Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 173400817

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04673-1	CEF-293-14-GW-04	07-13-00/07:58	TTKW16
04673-2	CEF-076-71D-GW-04	07-13-00/09:22	TTKW16
04673-3	CEF-076-69S-GW-04	07-13-00/09:25	TTKW16
04673-4	CEF-076-70I-GW-04	07-13-00/10:32	TTKW16
04673-4-DL	CEF-076-70I-GW-04	07-13-00/10:32	TTKW16

PARAMETER	04673-1	04673-2	04673-3	04673-4	04673-4-DL
Halogenated and Aromatic Volatiles (8021)					
Benzene, ug/l	<1.0	<1.0	1.6	11000E	8800D
Ethylbenzene, ug/l	<1.0	<1.0	4.4	940	680D
Toluene, ug/l	<1.0	<1.0	<1.0	<200	<500
o-Xylene, ug/l	<1.0	<1.0	<1.0	<200	<500
m&p-Xylene, ug/l	<1.0	<1.0	52	4500	3800D
Surrogate - a,a,a-Trifluorotoluene	87 %	97 %	73 %	87 %	83 %
Methyl t-butyl ether (MTBE), ug/l	<10	<10	<10	<2000	<5000
Dilution Factor	1	1	1	200	500
Analysis Date	07.20.00	07.21.00	07.21.00	07.20.00	07.21.00
Batch ID	1I0720	1I0721	1I0721	1I0720	1I0721

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LOG NO: S0-04673
Received: 14 JUL 00
Reported: 16 AUG 00

Mr. Paul Calligan
Tetra Tech NUS, Inc.
661 Anderson Drive
Pittsburgh, PA 15220

Requisition: N62467-94-D-0888/CTO72

CC: HOWARD ENGLE/TALL,FL

Project: North Fuel Farm/Day Tank 1
Sampled By: Client
Code: 173400817

REPORT OF RESULTS

LOG NO	SAMPLE DESCRIPTION , LIQUID SAMPLES	DATE/ TIME SAMPLED	SDG#
04673-1	CEF-293-14-GW-04	07-13-00/07:58	TTKW16
04673-2	CEF-076-71D-GW-04	07-13-00/09:22	TTKW16
04673-3	CEF-076-69S-GW-04	07-13-00/09:25	TTKW16
04673-4	CEF-076-70I-GW-04	07-13-00/10:32	TTKW16
04673-4-DL	CEF-076-70I-GW-04	07-13-00/10:32	TTKW16

PARAMETER	04673-1	04673-2	04673-3	04673-4	04673-4-DL
Polynuclear Aromatics (8310)					
Acenaphthene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Acenaphthylene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Anthracene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Benzo(a)anthracene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Benzo(a)pyrene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Benzo(b)fluoranthene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Benzo(g,h,i)perylene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Benzo(k)fluoranthene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Chrysene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Dibenzo(a,h)anthracene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Fluoranthene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Fluorene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Indeno(1,2,3-cd)pyrene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Naphthalene, ug/l	<5.0	<5.0	<5.0	28E	27D
Phenanthrene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Pyrene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
1-Methylnaphthalene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
2-Methylnaphthalene, ug/l	<5.0	<5.0	<5.0	<5.0	<25
Surrogate - Terphenyl-d14	48 %	68 %	68 %	64 %	68 %
Dilution Factor	1	1	1	1	5
Prep Date	07.19.00	07.19.00	07.19.00	07.19.00	07.19.00
Analysis Date	07.21.00	07.21.00	07.21.00	07.22.00	07.25.00
Batch ID	0719J	0719J	0719J	0719J	0719J

TETRA TECH NUS, INC. CHAIN OF CUSTODY | NUMBER DT1-071300 | PAGE 1 OF 1

PROJECT NO: 0013	SITE NAME: DAY TANK 1 CECIL FIELD
SAMPLERS (SIGNATURE)	Alan Pate
PROJECT MANAGER AND PHONE NUMBER	PAUL CALLIGAN 850 385 9866 x24
FIELD OPERATIONS LEADER AND PHONE NUMBER	MERV DAVE 904 281 1941 x.14
CARRIER/WAYBILL NUMBER	Fedex 8217 5407 0700
LABORATORY NAME AND CONTACT:	SAVANNAH Labs
ADDRESS	5102 La Roche Av.
CITY, STATE	SAVANNAH, GA 31404

STANDARD TAT ☒
RUSH TAT ☐
☐ 24 hr. ☐ 48 hr. ☐ 72 hr. ☐ 7 day ☐ 14 day

DATE YEAR 2000	TIME	SAMPLE ID	MATRIX	GRAB (G) COMP (C)	No. OF CONTAINERS	VOCs (8021B)	PAHs (8310)							COMMENTS
CONTAINER TYPE PLASTIC (P) or GLASS (G)						G	G							
PRESERVATIVE USED						HCl	none							
7/13	0758	CEF-293-14-GW-04	GW	G	5	3	2							Cool to 4°C
														* BTEX + MTBE

1. RELINQUISHED BY Alan Pate	DATE 7/13/00	TIME 1615	1. RECEIVED BY K Conner	DATE 7/14/00	TIME 920
2. RELINQUISHED BY	DATE	TIME	2. RECEIVED BY	DATE	TIME
3. RELINQUISHED BY	DATE	TIME	3. RECEIVED BY	DATE	TIME

COMMENTS CTO 72 N0013.DM0.050.240

DISTRIBUTION: WHITE (ACCOMPANIES SAMPLE) YELLOW (FIELD COPY) PINK (FILE COPY)

3/99

BUILDING 824A

ACCUTEST

Sample Summary

Tetra Tech, NUS

Job No: F7189

NAS Cecil Field
Project No: WORK RELEASE# cf-14 / B.824A

Sample Number	Collected Date	Time By	Received	Matrix Code	Type	Client Sample ID
F7189-1	07/27/00	12:05 MD	07/28/00	AQ	Ground Water	CEF-824A-GW-01SA-03'
F7189-2	07/27/00	10:50 MD	07/28/00	AQ	Ground Water	CEF-824A-GW-02S-01
F7189-3	07/27/00	12:22 MD	07/28/00	AQ	Ground Water	CEF-824A-GW-03S-01
F7189-4	07/27/00	11:09 MD	07/28/00	AQ	Ground Water	CEF-824A-GW-04S-01
F7189-5	07/27/00	10:55 MD	07/28/00	AQ	Ground Water	CEF-824A-GW-05S-01
F7189-6	07/27/00	00:00 MD	07/28/00	AQ	Ground Water	CEF-824A-GW-DUP1-01

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-01SA-03'		
Lab Sample ID:	F7189-1	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	B001630.D	1	08/08/00	RAW	n/a	n/a	VB51
Run #2							

VOA TCL List

CAS No.	Compound	Result	RL	Units	Q
67-64-1	Acetone	ND	5.0	ug/l	
71-43-2	Benzene	ND	1.0	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	ug/l	
75-25-2	Bromoform	ND	1.0	ug/l	
108-90-7	Chlorobenzene	ND	1.0	ug/l	
75-00-3	Chloroethane	ND	1.0	ug/l	
67-66-3	Chloroform	ND	1.0	ug/l	
75-15-0	Carbon disulfide	ND	5.0	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	ug/l	
75-35-4	1,1-Dichloroethylene	ND	1.0	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	ug/l	
156-59-2	cis-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	ug/l	
156-60-5	trans-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	ug/l	
100-41-4	Ethylbenzene	ND	1.0	ug/l	
591-78-6	2-Hexanone	ND	5.0	ug/l	
108-10-1	4-Methyl-2-pentanone	ND	5.0	ug/l	
74-83-9	Methyl bromide	ND	1.0	ug/l	
74-87-3	Methyl chloride	ND	1.0	ug/l	
75-09-2	Methylene chloride	ND	5.0	ug/l	
78-93-3	Methyl ethyl ketone	ND	5.0	ug/l	
100-42-5	Styrene	ND	1.0	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	ug/l	
127-18-4	Tetrachloroethylene	ND	1.0	ug/l	
108-88-3	Toluene	ND	1.0	ug/l	
79-01-6	Trichloroethylene	47.0	1.0	ug/l	
75-01-4	Vinyl chloride	ND	1.0	ug/l	
1330-20-7	Xylene (total)	ND	3.0	ug/l	

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-01SA-03'		
Lab Sample ID:	F7189-1	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	EPA 8310	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	AA003448.D	1	08/03/00	NF	07/31/00	OP1890	GAA112
Run #2							

CAS No.	Compound	Result	RL	Units	Q
83-32-9	Acenaphthene	ND	2.2	ug/l	
208-96-8	Acenaphthylene	ND	2.2	ug/l	
120-12-7	Anthracene	ND	2.2	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.22	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.22	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.22	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.22	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.22	ug/l	
218-01-9	Chrysene [a]	ND	4.4	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.22	ug/l	
206-44-0	Fluoranthene	ND	2.2	ug/l	
86-73-7	Fluorene	ND	2.2	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.22	ug/l	
91-20-3	Naphthalene	1.1	2.2	ug/l	J
90-12-0	1-Methylnaphthalene	16.5	2.2	ug/l	
91-57-6	2-Methylnaphthalene	25.5	2.2	ug/l	
85-01-8	Phenanthrene	ND	2.2	ug/l	
129-00-0	Pyrene	ND	2.2	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
84-15-1	o-Terphenyl	86%		29-133%
92-94-4	p-Terphenyl	87%		33-133%

(a) Elevated reporting limits due to matrix interference.

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-01SA-03'		
Lab Sample ID:	F7189-1	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

VOA TCL List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	98%		80-120%
17060-07-0	1,2-Dichloroethane-D4	101%		69-128%
2037-26-5	Toluene-D8	99%		80-120%
460-00-4	4-Bromofluorobenzene	98%		80-120%

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-02S-01		
Lab Sample ID:	F7189-2	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	B001631.D	1	08/08/00	RAW	n/a	n/a	VB51
Run #2							

VOA TCL List

CAS No.	Compound	Result	RL	Units	Q
67-64-1	Acetone	ND	5.0	ug/l	
71-43-2	Benzene	ND	1.0	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	ug/l	
75-25-2	Bromoform	ND	1.0	ug/l	
108-90-7	Chlorobenzene	ND	1.0	ug/l	
75-00-3	Chloroethane	ND	1.0	ug/l	
67-66-3	Chloroform	ND	1.0	ug/l	
75-15-0	Carbon disulfide	ND	5.0	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	ug/l	
75-35-4	1,1-Dichloroethylene	ND	1.0	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	ug/l	
156-59-2	cis-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	ug/l	
156-60-5	trans-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	ug/l	
100-41-4	Ethylbenzene	ND	1.0	ug/l	
591-78-6	2-Hexanone	ND	5.0	ug/l	
108-10-1	4-Methyl-2-pentanone	ND	5.0	ug/l	
74-83-9	Methyl bromide	ND	1.0	ug/l	
74-87-3	Methyl chloride	ND	1.0	ug/l	
75-09-2	Methylene chloride	ND	5.0	ug/l	
78-93-3	Methyl ethyl ketone	ND	5.0	ug/l	
100-42-5	Styrene	ND	1.0	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	ug/l	
127-18-4	Tetrachloroethylene	ND	1.0	ug/l	
108-88-3	Toluene	ND	1.0	ug/l	
79-01-6	Trichloroethylene	ND	1.0	ug/l	
75-01-4	Vinyl chloride	ND	1.0	ug/l	
1330-20-7	Xylene (total)	6.1	3.0	ug/l	

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-02S-01		
Lab Sample ID:	F7189-2	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

VOA TCL List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	99%		80-120%
17060-07-0	1,2-Dichloroethane-D4	102%		69-128%
2037-26-5	Toluene-D8	98%		80-120%
460-00-4	4-Bromofluorobenzene	99%		80-120%

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-02S-01		
Lab Sample ID:	F7189-2	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	EPA 8310	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1 [a]	AA003449.D	1	08/03/00	NF	07/31/00	OP1890	GAA112
Run #2							

CAS No.	Compound	Result	RL	Units	Q
83-32-9	Acenaphthene	ND	2.2	ug/l	
208-96-8	Acenaphthylene	ND	2.2	ug/l	
120-12-7	Anthracene	ND	2.2	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.22	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.22	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.22	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.22	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.22	ug/l	
218-01-9	Chrysene	ND	2.2	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.22	ug/l	
206-44-0	Fluoranthene	ND	2.2	ug/l	
86-73-7	Fluorene	ND	2.2	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.22	ug/l	
91-20-3	Naphthalene	ND	2.2	ug/l	
90-12-0	1-Methylnaphthalene	2.0	2.2	ug/l	J
91-57-6	2-Methylnaphthalene	3.3	2.2	ug/l	
85-01-8	Phenanthrene	ND	2.2	ug/l	
129-00-0	Pyrene	ND	2.2	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
84-15-1	o-Terphenyl	79%		29-133%
92-94-4	p-Terphenyl	92%		33-133%

(a) Confirmed by reanalysis.

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-03S-01		
Lab Sample ID:	F7189-3	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	B001634.D	1	08/09/00	RAW	n/a	n/a	VB51
Run #2							

VOA TCL List

CAS No.	Compound	Result	RL	Units	Q
67-64-1	Acetone	ND	5.0	ug/l	
71-43-2	Benzene	1.9	1.0	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	ug/l	
75-25-2	Bromoform	ND	1.0	ug/l	
108-90-7	Chlorobenzene	ND	1.0	ug/l	
75-00-3	Chloroethane	ND	1.0	ug/l	
67-66-3	Chloroform	ND	1.0	ug/l	
75-15-0	Carbon disulfide	ND	5.0	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	ug/l	
75-35-4	1,1-Dichloroethylene	ND	1.0	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	ug/l	
156-59-2	cis-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	ug/l	
156-60-5	trans-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	ug/l	
100-41-4	Ethylbenzene	1.4	1.0	ug/l	
591-78-6	2-Hexanone	ND	5.0	ug/l	
108-10-1	4-Methyl-2-pentanone	ND	5.0	ug/l	
74-83-9	Methyl bromide	ND	1.0	ug/l	
74-87-3	Methyl chloride	ND	1.0	ug/l	
75-09-2	Methylene chloride	ND	5.0	ug/l	
78-93-3	Methyl ethyl ketone	ND	5.0	ug/l	
100-42-5	Styrene	ND	1.0	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	ug/l	
127-18-4	Tetrachloroethylene	ND	1.0	ug/l	
108-88-3	Toluene	ND	1.0	ug/l	
79-01-6	Trichloroethylene	ND	1.0	ug/l	
75-01-4	Vinyl chloride	ND	1.0	ug/l	
1330-20-7	Xylene (total)	16.4	3.0	ug/l	

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-03S-01		
Lab Sample ID:	F7189-3	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	EPA 8310	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	AA003452.D	1	08/03/00	NF	07/31/00	OP1890	GAA112
Run #2							

CAS No.	Compound	Result	RL	Units	Q
83-32-9	Acenaphthene	ND	2.2	ug/l	
208-96-8	Acenaphthylene	ND	2.2	ug/l	
120-12-7	Anthracene	ND	2.2	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.22	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.22	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.22	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.22	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.22	ug/l	
218-01-9	Chrysene [a]	ND	4.4	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.22	ug/l	
206-44-0	Fluoranthene	ND	2.2	ug/l	
86-73-7	Fluorene	ND	2.2	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.22	ug/l	
91-20-3	Naphthalene	ND	2.2	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.2	ug/l	
91-57-6	2-Methylnaphthalene	ND	2.2	ug/l	
85-01-8	Phenanthrene	ND	2.2	ug/l	
129-00-0	Pyrene	ND	2.2	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
84-15-1	o-Terphenyl	79%		29-133%
92-94-4	p-Terphenyl	84%		33-133%

(a) Elevated reporting limits due to matrix interference.

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-03S-01		
Lab Sample ID:	F7189-3	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

VOA TCL List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	98%		80-120%
17060-07-0	1,2-Dichloroethane-D4	101%		69-128%
2037-26-5	Toluene-D8	99%		80-120%
460-00-4	4-Bromofluorobenzene	97%		80-120%

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-04S-01		
Lab Sample ID:	F7189-4	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	B001635.D	1	08/09/00	RAW	n/a	n/a	VB51
Run #2	B001649.D	2	08/09/00	RAW	n/a	n/a	VB51

VOA TCL List

CAS No.	Compound	Result	RL	Units	Q
67-64-1	Acetone	ND	5.0	ug/l	
71-43-2	Benzene	251 [a]	2.0	ug/l	E
75-27-4	Bromodichloromethane	ND	1.0	ug/l	
75-25-2	Bromoform	ND	1.0	ug/l	
108-90-7	Chlorobenzene	ND	1.0	ug/l	
75-00-3	Chloroethane	ND	1.0	ug/l	
67-66-3	Chloroform	ND	1.0	ug/l	
75-15-0	Carbon disulfide	ND	5.0	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	ug/l	
75-35-4	1,1-Dichloroethylene	ND	1.0	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	ug/l	
156-59-2	cis-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	ug/l	
156-60-5	trans-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	ug/l	
100-41-4	Ethylbenzene	27.0	1.0	ug/l	
591-78-6	2-Hexanone	ND	5.0	ug/l	
108-10-1	4-Methyl-2-pentanone	ND	5.0	ug/l	
74-83-9	Methyl bromide	ND	1.0	ug/l	
74-87-3	Methyl chloride	ND	1.0	ug/l	
75-09-2	Methylene chloride	ND	5.0	ug/l	
78-93-3	Methyl ethyl ketone	ND	5.0	ug/l	
100-42-5	Styrene	ND	1.0	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	ug/l	
127-18-4	Tetrachloroethylene	ND	1.0	ug/l	
108-88-3	Toluene	2.0	1.0	ug/l	
79-01-6	Trichloroethylene	ND	1.0	ug/l	
75-01-4	Vinyl chloride	ND	1.0	ug/l	
1330-20-7	Xylene (total)	97.9	3.0	ug/l	

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-04S-01		
Lab Sample ID:	F7189-4	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

VOA TCL List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	98%	99%	80-120%
17060-07-0	1,2-Dichloroethane-D4	102%	97%	69-128%
2037-26-5	Toluene-D8	99%	98%	80-120%
460-00-4	4-Bromofluorobenzene	98%	98%	80-120%

(a) Result is from Run# 2

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-04S-01		
Lab Sample ID:	F7189-4	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	EPA 8310	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	AA003453.D	1	08/03/00	NF	07/31/00	OP1890	GAA112
Run #2							

CAS No.	Compound	Result	RL	Units	Q
83-32-9	Acenaphthene [a]	ND	11	ug/l	
208-96-8	Acenaphthylene	ND	2.2	ug/l	
120-12-7	Anthracene	ND	2.2	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.22	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.22	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.22	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.22	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.22	ug/l	
218-01-9	Chrysene [a]	ND	4.4	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.22	ug/l	
206-44-0	Fluoranthene	ND	2.2	ug/l	
86-73-7	Fluorene	ND	2.2	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.22	ug/l	
91-20-3	Naphthalene	13.6	2.2	ug/l	
90-12-0	1-Methylnaphthalene	5.8	2.2	ug/l	
91-57-6	2-Methylnaphthalene	7.1	2.2	ug/l	
85-01-8	Phenanthrene	ND	2.2	ug/l	
129-00-0	Pyrene	ND	2.2	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
84-15-1	o-Terphenyl	78%		29-133%
92-94-4	p-Terphenyl	89%		33-133%

(a) Elevated reporting limits due to matrix interference.

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-05S-01		
Lab Sample ID:	F7189-5	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	B001636.D	1	08/09/00	RAW	n/a	n/a	VB51
Run #2							

VOA TCL List

CAS No.	Compound	Result	RL	Units	Q
67-64-1	Acetone	ND	5.0	ug/l	
71-43-2	Benzene	ND	1.0	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	ug/l	
75-25-2	Bromoform	ND	1.0	ug/l	
108-90-7	Chlorobenzene	ND	1.0	ug/l	
75-00-3	Chloroethane	ND	1.0	ug/l	
67-66-3	Chloroform	ND	1.0	ug/l	
75-15-0	Carbon disulfide	ND	5.0	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	ug/l	
75-35-4	1,1-Dichloroethylene	ND	1.0	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	ug/l	
156-59-2	cis-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	ug/l	
156-60-5	trans-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	ug/l	
100-41-4	Ethylbenzene	ND	1.0	ug/l	
591-78-6	2-Hexanone	ND	5.0	ug/l	
108-10-1	4-Methyl-2-pentanone	ND	5.0	ug/l	
74-83-9	Methyl bromide	ND	1.0	ug/l	
74-87-3	Methyl chloride	ND	1.0	ug/l	
75-09-2	Methylene chloride	ND	5.0	ug/l	
78-93-3	Methyl ethyl ketone	ND	5.0	ug/l	
100-42-5	Styrene	ND	1.0	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	ug/l	
127-18-4	Tetrachloroethylene	ND	1.0	ug/l	
108-88-3	Toluene	ND	1.0	ug/l	
79-01-6	Trichloroethylene	ND	1.0	ug/l	
75-01-4	Vinyl chloride	ND	1.0	ug/l	
1330-20-7	Xylene (total)	7.9	3.0	ug/l	

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-05S-01		
Lab Sample ID:	F7189-5	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	EPA 8310	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	AA003454.D	1	08/03/00	NF	07/31/00	OP1890	GAA112
Run #2							

CAS No.	Compound	Result	RL	Units	Q
83-32-9	Acenaphthene	ND	2.2	ug/l	
208-96-8	Acenaphthylene	ND	2.2	ug/l	
120-12-7	Anthracene	ND	2.2	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.22	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.22	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.22	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.22	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.22	ug/l	
218-01-9	Chrysene	ND	2.2	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.22	ug/l	
206-44-0	Fluoranthene	ND	2.2	ug/l	
86-73-7	Fluorene	ND	2.2	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.22	ug/l	
91-20-3	Naphthalene	ND	2.2	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.2	ug/l	
91-57-6	2-Methylnaphthalene	ND	2.2	ug/l	
85-01-8	Phenanthrene	ND	2.2	ug/l	
129-00-0	Pyrene	ND	2.2	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
84-15-1	o-Terphenyl	79%		29-133%
92-94-4	p-Terphenyl	95%		33-133%

ND = Not detected
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-05S-01		
Lab Sample ID:	F7189-5	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

VOA TCL List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	99%		80-120%
17060-07-0	1,2-Dichloroethane-D4	103%		69-128%
2037-26-5	Toluene-D8	99%		80-120%
460-00-4	4-Bromofluorobenzene	98%		80-120%

ND = Not detected
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E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-DUP1-01		
Lab Sample ID:	F7189-6	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	B001637.D	1	08/09/00	RAW	n/a	n/a	VB51
Run #2							

VOA TCL List

CAS No.	Compound	Result	RL	Units	Q
67-64-1	Acetone	ND	5.0	ug/l	
71-43-2	Benzene	ND	1.0	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	ug/l	
75-25-2	Bromoform	ND	1.0	ug/l	
108-90-7	Chlorobenzene	ND	1.0	ug/l	
75-00-3	Chloroethane	ND	1.0	ug/l	
67-66-3	Chloroform	ND	1.0	ug/l	
75-15-0	Carbon disulfide	ND	5.0	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	ug/l	
75-35-4	1,1-Dichloroethylene	ND	1.0	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	ug/l	
156-59-2	cis-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	ug/l	
156-60-5	trans-1,2-Dichloroethylene	ND	1.0	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	ug/l	
100-41-4	Ethylbenzene	ND	1.0	ug/l	
591-78-6	2-Hexanone	ND	5.0	ug/l	
108-10-1	4-Methyl-2-pentanone	ND	5.0	ug/l	
74-83-9	Methyl bromide	ND	1.0	ug/l	
74-87-3	Methyl chloride	ND	1.0	ug/l	
75-09-2	Methylene chloride	ND	5.0	ug/l	
78-93-3	Methyl ethyl ketone	ND	5.0	ug/l	
100-42-5	Styrene	ND	1.0	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	ug/l	
127-18-4	Tetrachloroethylene	ND	1.0	ug/l	
108-88-3	Toluene	ND	1.0	ug/l	
79-01-6	Trichloroethylene	ND	1.0	ug/l	
75-01-4	Vinyl chloride	ND	1.0	ug/l	
1330-20-7	Xylene (total)	7.9	3.0	ug/l	

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N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-DUP1-01		
Lab Sample ID:	F7189-6	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	SW846 8260B	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

VOA TCL List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	99%		80-120%
17060-07-0	1,2-Dichloroethane-D4	102%		69-128%
2037-26-5	Toluene-D8	98%		80-120%
460-00-4	4-Bromofluorobenzene	97%		80-120%

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

ACCUTEST

Report of Analysis

Client Sample ID:	CEF-824A-GW-DUP1-01		
Lab Sample ID:	F7189-6	**Date Sampled:**	07/27/00
Matrix:	AQ - Ground Water	**Date Received:**	07/28/00
Method:	EPA 8310	**Percent Solids:**	n/a
Project:	NAS Cecil Field		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	AA003455.D	1	08/03/00	NF	07/31/00	OP1890	GAA112
Run #2							

CAS No.	Compound	Result	RL	Units	Q
83-32-9	Acenaphthene	ND	2.4	ug/l	
208-96-8	Acenaphthylene	ND	2.4	ug/l	
120-12-7	Anthracene	ND	2.4	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.24	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.24	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.24	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.24	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.24	ug/l	
218-01-9	Chrysene	ND	2.4	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.24	ug/l	
206-44-0	Fluoranthene	ND	2.4	ug/l	
86-73-7	Fluorene	ND	2.4	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.24	ug/l	
91-20-3	Naphthalene	ND	2.4	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.4	ug/l	
91-57-6	2-Methylnaphthalene	ND	2.4	ug/l	
85-01-8	Phenanthrene	ND	2.4	ug/l	
129-00-0	Pyrene	ND	2.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
84-15-1	o-Terphenyl	80%		29-133%
92-94-4	p-Terphenyl	95%		33-133%

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