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CNC CHARLESTON
5090.3a

UNDERGROUND STORAGE TANK (UST) ASSESSMENT REPORT FOR QUARTERS A CNC CHARLESTON SC
04/27/1998
SOUTH CAROLINA DEPARTMENT OF HEALTH AND ENVIRONMENTAL CONTROL

NFA

Li 6.5.98
Lo 7.15.98

South Carolina Department of Health and Environmental Control (S.C.D.H.E.C.)
Underground Storage Tank (UST) Assessment Report

RECEIVED
JUN 4 1998
Water Monitoring, Assessment & Protection Division

Submit Completed Form to:

Date Received State Use Only

UST Regulatory Section
SCDHEC
2600 Bull Street
Columbia, South Carolina 29201
Telephone (803) 734-5331

I OWNERSHIP OF UST(S)

Agency/Owner: Southern Division, Naval Facilities Engineering Command, Caretaker Site Office

Mailing Address: P.O. Box 190010

City: N. Charleston State: SC Zip Code: 29419-9010

Area Code: 843 Telephone Number: 743-9985 Contact Person: Henry N. Shepard II, P. E.

II SITE IDENTIFICATION AND LOCATION

Site I.D. #: Unregulated

Facility Name: Charleston Naval Base Complex, Housing Quarters A

Street Address: 100 Navy Way

City: North Charleston, 29405-2413 County: Charleston

III CLOSURE INFORMATION

Closure Started: 24 April 1998 Closure Completed: 27 April 1998

Number of USTs Closed: 1

N/A	SPORTENVDETCHASN
Consultant	UST Removal Contractor

IV. CERTIFICATION (Read and Sign after completing entire submittal)

I certify that I have personally examined and am familiar with the information submitted in this and all attached documents; and that based on my inquiry of those individuals responsible for obtaining this information, I believe that the submitted information is true, accurate and complete.

Henry Shepard II, P. E.
Name (Type or Print)

Henry N. Shepard II PE 5/26/98
Signature

V. UST INFORMATION

		Tank 1	Tank 2	Tank 3	Tank 4	Tank 5
A.	Product	Fuel oil				
B.	Capacity	550 gal				
C.	Age	Unk.				
D.	Construction Material	Steel				
E.	Month/Year of Last Use	3/98				
F.	Depth (ft.) To Base of Tank	6'				
G.	Spill Prevention Equipment Y/N	N				
H..	Overfill Prevention Equipment Y/N	N				
I.	Method of Closure Removed/Filled	R				
J.	Visible Corrosion or Pitting Y/N	Y				
K.	Visible Holes Y/N	N				

L. Method of disposal for any USTs removed from the ground (attach disposal manifests)

UST Quarters A was removed, drained, cut open at both ends, and cleaned with a steam cleaner. It was then cut up for recycling as scrap metal. (See Attachment III.)

M. Method of disposal for any liquid petroleum, sludges, or waste waters removed from the USTs (attach disposal manifests)

The sludge, waste water, and residual fuel oil from UST Quarters A were recycled.

N. If any corrosion, pitting, or holes were observed, describe the location and extent for each UST

UST Quarters A was covered with a protective coating of pitch. The tank was in fair to good condition. Patches of corrosion were present, but no holes or pitting were found.

VI. PIPING INFORMATION

	Tank 1	Tank 2	Tank 3	Tank 4	Tank 5
A. Construction Material.....	Copper & Steel				
B. Distance from UST to Dispenser.....	35' See note 1				
C. Number of Dispensers.....	1 see note 1				
D. Type of System P/S.....	S				
E. Was Piping Removed from the Ground? Y/N....	Y				
F. Visible Corrosion or Pitting Y/N.....	Y				
G. Visible Holes Y/N.....	N				
H. Age.....	Unk.				

Note 1: UST Quarters A provided heating fuel oil to housing Quarters A.

I. If any corrosion, pitting, or holes were observed, describe the location and extent for each line.

The steel ventilation pipe had corrosion throughout its length, but no holes were found. The copper supply and return lines were in good condition.

VII. BRIEF SITE DESCRIPTION AND HISTORY

Quarters A was built in 1905. It served as housing for Naval families until base closure.

VIII. SITE CONDITIONS

		Yes	No	Unk
A.	Were any petroleum-stained or contaminated soils found in the UST excavation, soil borings, trenches, or monitoring wells? If yes, indicate depth and location on the site map.		X	
B.	Were any petroleum odors detected in the excavation, soil borings, trenches, or monitoring wells? If yes, indicate location on site map and describe the odor (strong, mild, etc.)		X	
C.	Was water present in the UST excavation, soil borings, or trenches? If yes, how far below land surface (indicate location and depth)? _____		X	
D.	Did contaminated soils remain stockpiled on site after closure? If yes, indicate the stockpile location on the site map. Name of DHEC representative authorizing soil removal: _____		X*	
E.	Was a petroleum sheen or free product detected on any excavation or boring waters? If yes, indicate location and thickness.		X**	

* All excavated soil was returned to the tank pit.

** No groundwater was encountered.

IX. SAMPLE INFORMATION

S.C.D.H.E.C. Lab Certification Number 10120

Sample #	Location	Sample Type (Soil/Water)	Depth*	Date/Time of Collection	Collected By	OVA#
SPORT 0672-2	Middle of supply & return pipe run	Soil	18"	4/27/98 1145	R. Cope	0 ppm
SPORT 0676-4	North end of tank	Soil	5'	4/24/98 1200	R. Cope	0.8 ppm
SPORT 0676-5	South end of tank	Soil	20"	4/24/98 1212	R. Cope	8.1 ppm

* = Depth Below the Surrounding Land Surface

X. SAMPLING METHODOLOGY

Provide a detailed description of the methods used to collect and store (preserve) the samples.

After the removal of UST Quarters A, soil samples were taken. Sampling was performed in accordance with SC DHEC R.61-92 Part 280 and SC DHEC UST Assessment Guidelines.

Sample jars were prepared by the testing laboratory. The grab method was utilized to fill the sample containers leaving as little head space as possible and immediately capped. Samples were extracted at the tank ends and from beneath the piping at the mechanical connections.

The samples were marked, logged, and immediately placed in sample coolers packed with ice to maintain an approximate temperature of 4° C. Tools were thoroughly cleaned and decontaminated with organic-free soap and water after each sample.

The samples remained in the custody of SPORTENVDETCHASN until they were transferred to General Engineering Laboratories for analysis as documented in the attached Chain-of-Custody Record.

The laboratory soil used for the soil trip blanks that accompanied the samples was taken from the wrong container. This soil exhibited contamination of naphthalene at approximately 6 ug/kg, toluene at ~1 ug/kg, and xylenes at ~ 1 ug/kg. Although this had no effect on the soil samples, the condition renders the use of these trip blanks as unsatisfactory for quality control purposes. Accordingly, the data is not included with the site samples. The problem has been corrected and the unsatisfactory soil has been removed from the lab.

XI. RECEPTORS

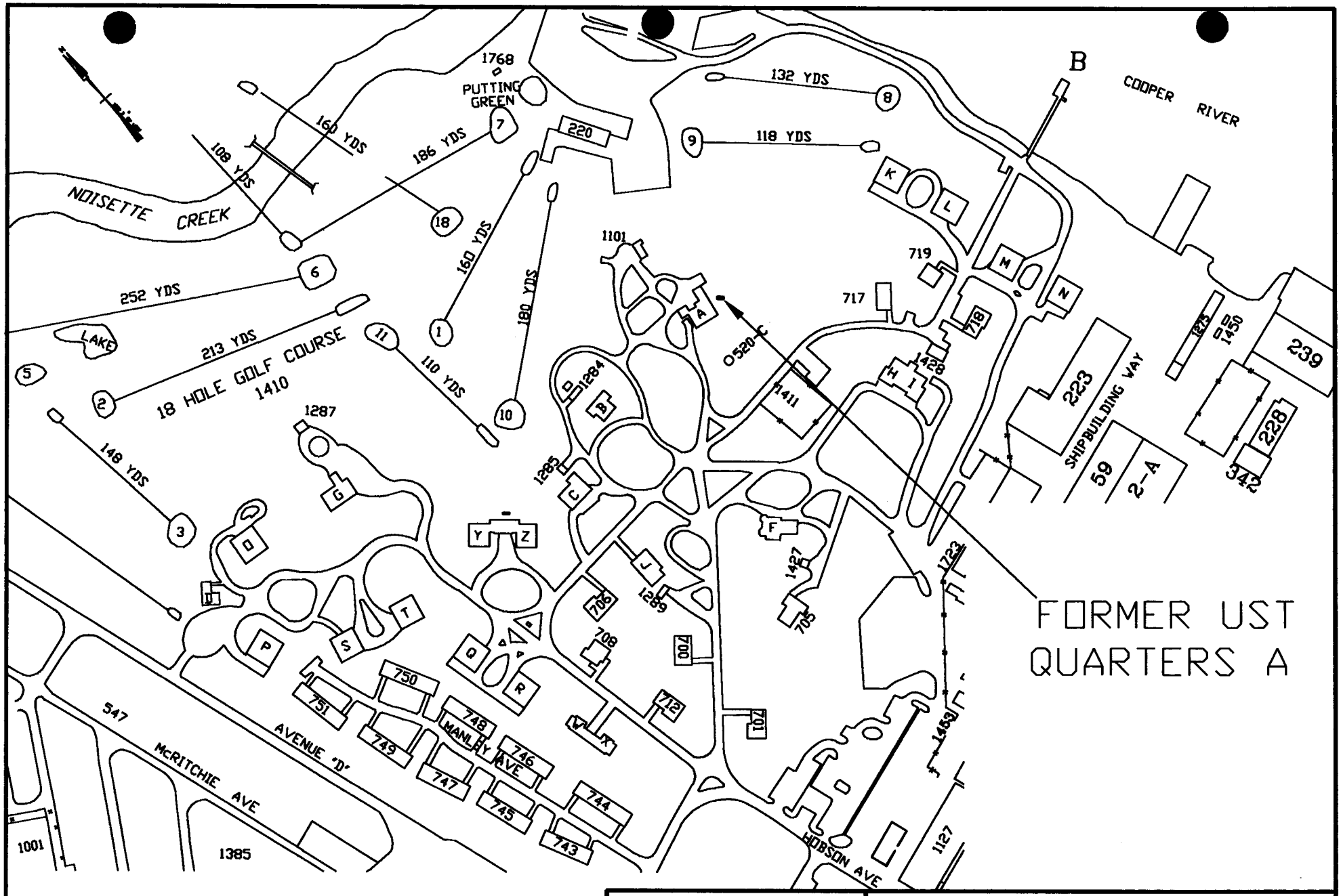
		Yes	No
A.	Are there any lakes, ponds, streams, or wetlands located within 1000 feet of the UST system? **[Noisette Creek ~ 783' & Cooper River ~ 674']**	X	
	If yes, indicate type of receptor, distance, and direction on site map.		
B.	Are there any public, private, or irrigation water supply wells within 1000 feet of the UST system?		X
	If yes, indicate type of well, distance, and direction on site map.		
C.	Are there any underground structures (e.g., basements) located within 100 feet of the UST system?		X
	If yes, indicate the type of structure, distance, and direction on site map.		
D.	Are there any underground utilities (e.g., telephone, electricity, gas, water, sewer, storm drain) located within 100 feet of the UST system that could potentially come in contact with the contamination? **[water, storm drain]**	X	
	If yes, indicate the type of utility, distance, and direction on the site map.		
E.	Has contaminated soil been identified at a depth of less than 3 feet below land surface in an area that is not capped by asphalt or concrete?		X
	If yes, indicate the area of contaminated soil on the site map.		

Attachment I

SITE MAP

You must supply a scaled site map. It should include all buildings, road names, utilities, tank and pump island locations, sample locations, extent of excavation, and any other pertinent information.

Site Maps 1 and 2
Photographs 1 and 2

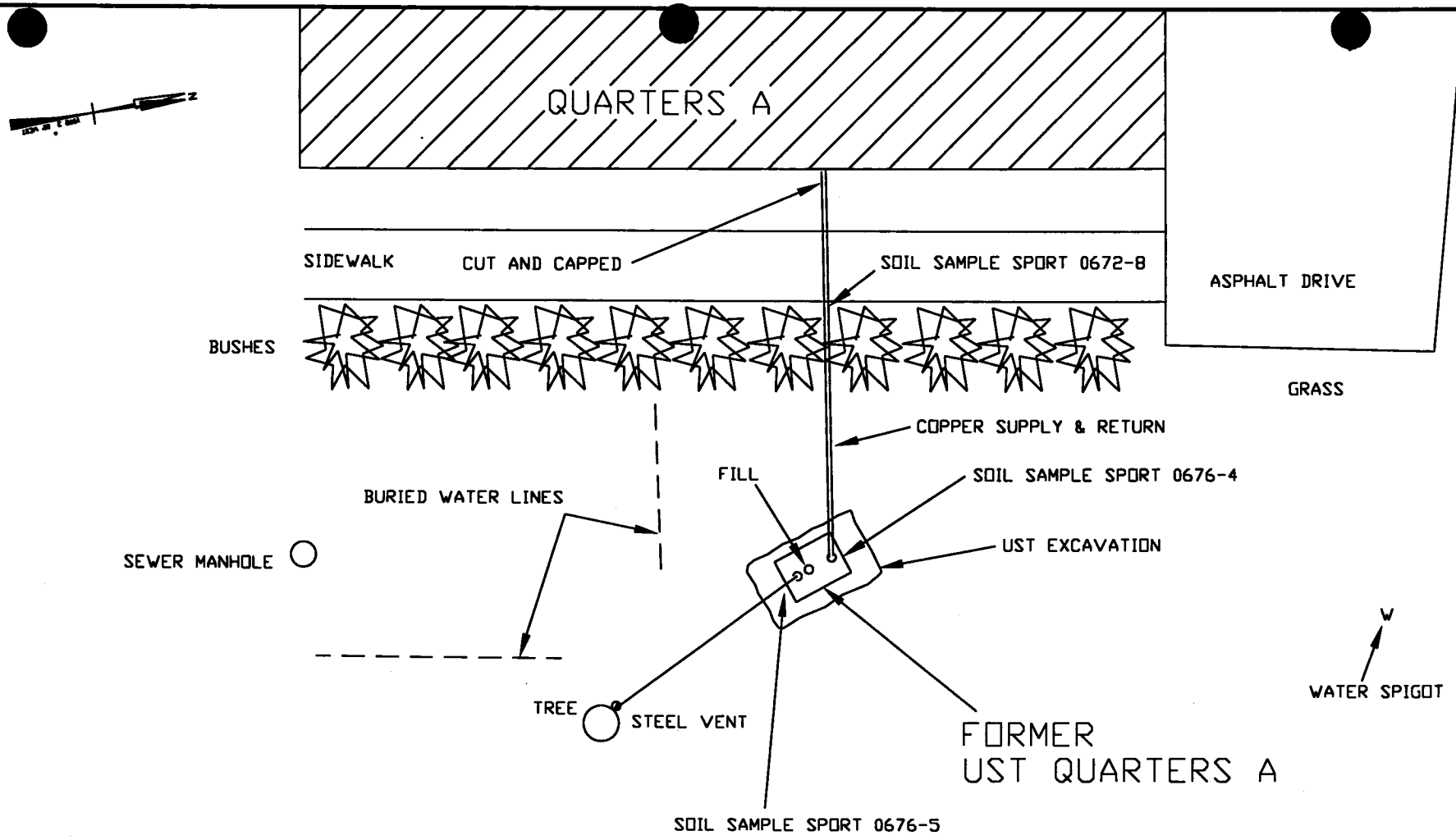


SPORTENVDETCHASN
1899 North Hobson Ave.
North Charleston, SC
29405-2106
Ph. (803) 743-6777

Site Map 1
UST Quarters A
Charleston Naval Base
Charleston, SC

DWG DATE:6 MAY 98

DWG NAME: QT-A_1



SPORTENVDETCHASN
1899 North Hobson Ave.
North Charleston, SC
29405-2106
Ph. (803) 743-6777

Site Map 2
UST Quarters A
Charleston Naval Base
Charleston, SC

DWG DATE: 7 MAY 98 | DWG NAME: QT-A_2

UST Quarters A

Photo 1: UST Quarters A excavation site. The tank is ready for transport to the cleaning and cutting pad.

UST Quarters A

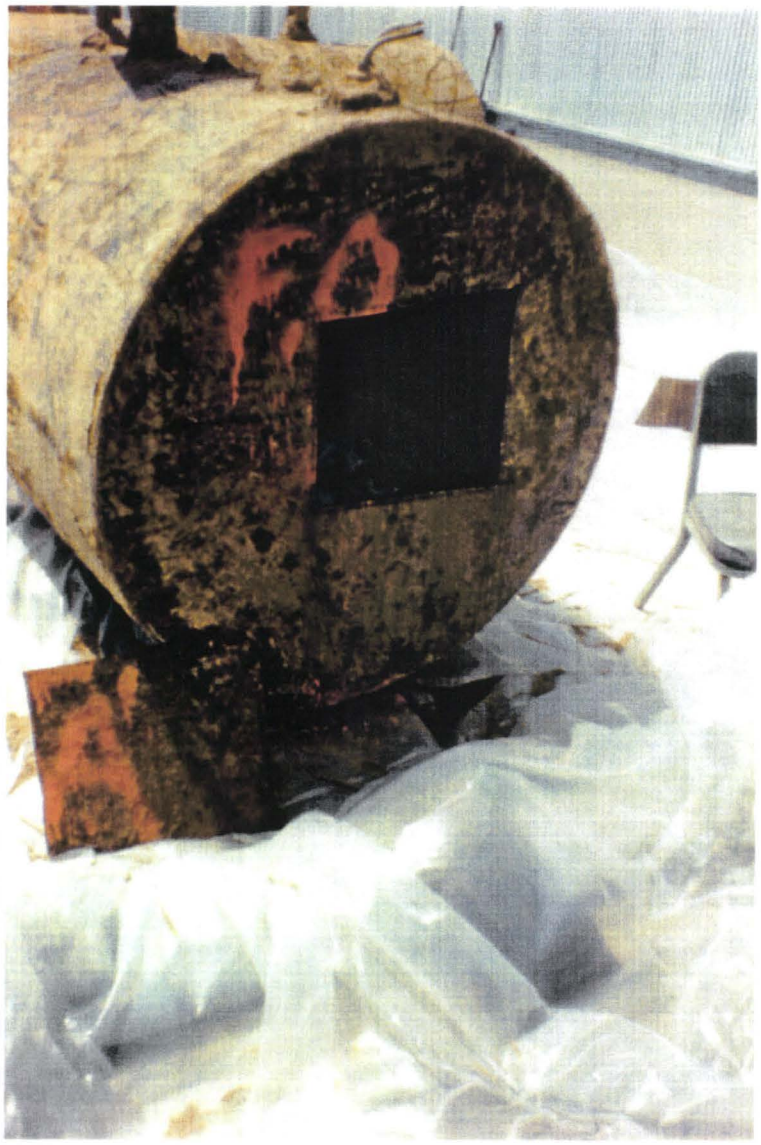


Photo 2: UST Quarters A being cleaned and cut-up for recycling.

Attachment II
ANALYTICAL RESULTS

You must submit the laboratory report and chain-of-custody form for the samples. These samples must be analyzed by a South Carolina certified laboratory.

Certified Analytical Results
Chain-of-Custody

GENERAL ENGINEERING LABORATORIES

Meeting today's needs with a vision for tomorrow.

Laboratory Certifications

STATE	GEL	EPI
FL	E87156/87294	E87472/87458
NC	233	
SC	10120	10582
TN	02934	02934

Client: Supervisor of Ship Building & Conversion
SUPSHIP-Portsmouth Detachment-Env.
1899 North Hobson Ave.
North Charleston, South Carolina 29405-2106
Contact: Mr. Bill Hiers
Project Description: SUPSHIP-Portsmouth Detachment

cc: NPWC00197

Report Date: May 08, 1998

Sample ID	: SPORT0676-4
Lab ID	: 9804679-04
Matrix	: Soil
Date Collected	: 04/24/98
Date Received	: 04/24/98
Priority	: Routine
Collector	: Client

Parameter	Qualifier	Result	DL	RL	Units	DF	Analyst	Date	Time	Batch	M
Volatile Organics											
BTEX - 4 items											
Benzene	U	0.00	1.00	2.00	ug/kg	1.0	TCL	05/01/98	0215	121259	1
Ethylbenzene	J	1.40	1.00	2.00	ug/kg	1.0					
Toluene	J	1.38	1.00	2.00	ug/kg	1.0					
Xylenes (TOTAL)		6.25	1.00	4.00	ug/kg	1.0					
Naphthalene	U	0.00	1.00	2.00	ug/kg	1.0					
Extractable Organics											
Polynuclear Aromatic Hydrocarbons - 16 items											
Acenaphthene	U	0.00	167	333	ug/kg	1.0	RLC	05/06/98	1246	120940	2
Acenaphthylene	U	0.00	167	333	ug/kg	1.0					
Anthracene	U	0.00	167	333	ug/kg	1.0					
Benzo(a)anthracene	U	0.00	167	333	ug/kg	1.0					
Benzo(a)pyrene	U	0.00	167	333	ug/kg	1.0					
Benzo(b)fluoranthene	U	0.00	167	333	ug/kg	1.0					
Benzo(ghi)perylene	U	0.00	167	333	ug/kg	1.0					
Benzo(k)fluoranthene	U	0.00	167	333	ug/kg	1.0					
Chrysene	U	0.00	167	333	ug/kg	1.0					
Dibenzo(a,h)anthracene	U	0.00	167	333	ug/kg	1.0					
Fluoranthene	U	0.00	167	333	ug/kg	1.0					
Fluorene	U	0.00	167	333	ug/kg	1.0					
Indeno(1,2,3-c,d)pyrene	U	0.00	167	333	ug/kg	1.0					
Naphthalene	U	0.00	167	333	ug/kg	1.0					
Phenanthrene	U	0.00	167	333	ug/kg	1.0					
Pyrene	U	0.00	167	333	ug/kg	1.0					

e following prep procedures were performed:
GC/MS Base/Neutral Compounds

RDH 04/28/98 1510 120940 3

GENERAL ENGINEERING LABORATORIES

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Laboratory Certifications

STATE	GEL	EPI
FL	E87156/87294	E87472/87458
NC	233	
SC	10120	10582
TN	02934	02934

Client: Supervisor of Ship Building & Conversion
SUPSHIP-Portsmouth Detachment-Env.
1899 North Hobson Ave.
North Charleston, South Carolina 29405-2106
Contact: Mr. Bill Hiers
Project Description: SUPSHIP-Portsmouth Detachment

cc: NPWC00197 Report Date: May 08, 1998

Sample ID : SPORT0676-4

Surrogate Recovery	Test	Percent%	Acceptable Limits
2-Fluorobiphenyl	M610	92.9	(30.0 - 115.)
Nitrobenzene-d5	M610	116.	(23.0 - 120.)
p-Terphenyl-d14	M610	92.9	(37.3 - 128.)
Bromofluorobenzene	BTEX-8260	92.6	(53.5 - 154.)
Dibromofluoromethane	BTEX-8260	90.4	(63.4 - 136.)
Toluene-d8	BTEX-8260	135.	(72.1 - 137.)
Bromofluorobenzene	NAP-8260	92.6	(53.5 - 154.)
Dibromofluoromethane	NAP-8260	90.4	(63.4 - 136.)
Toluene-d8	NAP-8260	135.	(72.1 - 137.)

M = Method	Method-Description
M 1	EPA 8260
M 2	EPA 8270
M 3	EPA 3550

Notes:
The qualifiers in this report are defined as follows:
ND indicates that the analyte was not detected at a concentration greater than the detection limit.
J indicates presence of analyte at a concentration less than the reporting limit (RL) and greater than the detection limit (DL).
U indicates that the analyte was not detected at a concentration greater than the detection limit.
* indicates that a quality control analyte recovery is outside of specified acceptance criteria.

This data report has been prepared and reviewed in accordance with General Engineering Laboratories standard operating procedures. Please direct any questions to your Project Manager, Karen Blakeney at (803) 769-7386.

Karen D Blakeney
Reviewed By

GENERAL ENGINEERING LABORATORIES

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Laboratory Certifications

STATE	GEL	EPI
FL	E87156/87294	E87472/87458
NC	233	
SC	10120	10582
TN	02934	02934

Client: Supervisor of Ship Building & Conversion
SUPSHIP-Portsmouth Detachment-Env.
1899 North Hobson Ave.
North Charleston, South Carolina 29405-2106
Contact: Mr. Bill Hiers
Project Description: SUPSHIP-Portsmouth Detachment

cc: NPWC00197

Report Date: May 08, 1998

Sample ID	: SPORT0676-5
Lab ID	: 9804679-05
Matrix	: Soil
Date Collected	: 04/24/98
Date Received	: 04/24/98
Priority	: Routine
Collector	: Client

Parameter	Qualifier	Result	DL	RL	Units	DF	Analyst	Date	Time	Batch	M
Volatile Organics											
BTEX - 4 items											
Benzene	U	0.00	1.00	2.00	ug/kg	1.0	TCL	05/01/98	0247	121259	1
Ethylbenzene	U	0.902	1.00	2.00	ug/kg	1.0					
Toluene	U	0.00	1.00	2.00	ug/kg	1.0					
Xylenes (TOTAL)	J	3.49	1.00	4.00	ug/kg	1.0					
Naphthalene	U	0.00	1.00	2.00	ug/kg	1.0					
Extractable Organics											
Polynuclear Aromatic Hydrocarbons - 16 items											
Acenaphthene	U	0.00	167	333	ug/kg	1.0	RLC	05/06/98	1313	120940	2
Acenaphthylene	U	0.00	167	333	ug/kg	1.0					
Anthracene	U	0.00	167	333	ug/kg	1.0					
Benzo(a)anthracene	U	0.00	167	333	ug/kg	1.0					
Benzo(a)pyrene	U	0.00	167	333	ug/kg	1.0					
Benzo(b)fluoranthene	U	0.00	167	333	ug/kg	1.0					
Benzo(ghi)perylene	U	0.00	167	333	ug/kg	1.0					
Benzo(k)fluoranthene	U	0.00	167	333	ug/kg	1.0					
Chrysene	U	0.00	167	333	ug/kg	1.0					
Dibenzo(a,h)anthracene	U	0.00	167	333	ug/kg	1.0					
Fluoranthene	U	0.00	167	333	ug/kg	1.0					
Fluorene	U	0.00	167	333	ug/kg	1.0					
Indeno(1,2,3-c,d)pyrene	U	0.00	167	333	ug/kg	1.0					
Naphthalene	U	0.00	167	333	ug/kg	1.0					
Phenanthrene	U	0.00	167	333	ug/kg	1.0					
Pyrene	U	0.00	167	333	ug/kg	1.0					

The following prep procedures were performed:
GC/MS Base/Neutral Compounds

RDH 04/28/98 1510 120940 3

P O Box 30712 • Charleston, SC 29417 • 2040 Savage Road • 29414
(803) 556-8171 • Fax (803) 766-1178

9804679-05

GENERAL ENGINEERING LABORATORIES

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Laboratory Certifications

STATE	GEL	EPI
FL	E87156/87294	E87472/87458
NC	233	
SC	10120	10582
TN	02934	02934

Client: Supervisor of Ship Building & Conversion
SUPSHIP-Portsmouth Detachment-Env.
1899 North Hobson Ave.
North Charleston, South Carolina 29405-2106
Contact: Mr. Bill Hiers
Project Description: SUPSHIP-Portsmouth Detachment

cc: NPWC00197 Report Date: May 08, 1998

Sample ID : SPORT0676-5

Surrogate Recovery	Test	Percent%	Acceptable Limits
2-Fluorobiphenyl	M610	87.6	(30.0 - 115.)
Nitrobenzene-d5	M610	112.	(23.0 - 120.)
p-Terphenyl-d14	M610	86.8	(37.3 - 128.)
Bromofluorobenzene	BTEX-8260	94.8	(53.5 - 154.)
Dibromofluoromethane	BTEX-8260	88.4	(63.4 - 136.)
Toluene-d8	BTEX-8260	89.0	(72.1 - 137.)
Bromofluorobenzene	NAP-8260	94.8	(53.5 - 154.)
Dibromofluoromethane	NAP-8260	88.4	(63.4 - 136.)
Toluene-d8	NAP-8260	89.0	(72.1 - 137.)

M = Method	Method-Description
M 1	EPA 8260
M 2	EPA 8270
M 3	EPA 3550

Notes:
The qualifiers in this report are defined as follows:
ND indicates that the analyte was not detected at a concentration greater than the detection limit.
J indicates presence of analyte at a concentration less than the reporting limit (RL) and greater than the detection limit (DL).
U indicates that the analyte was not detected at a concentration greater than the detection limit.
* indicates that a quality control analyte recovery is outside of specified acceptance criteria.

This data report has been prepared and reviewed in accordance with General Engineering Laboratories standard operating procedures. Please direct any questions to your Project Manager, Karen Blakeney at (803) 769-7386.

Karen Blakeney
Reviewed By

NPWL 0174

General Engineering Laboratories, Inc.
2040 Savage Road
Charleston, South Carolina 29407
P.O. Box 30712
Charleston, South Carolina 29417
(803) 556-8171

CHAIN OF CUSTODY RECORD

9804679 %

Page 1 of 1

Client Name/Facility Name: SPORT ENV DET CHAS

Collected by/Company: SPORT ENV DET CHAS

SAMPLE ANALYSIS REQUIRED (x) - use remarks area to specify specific compounds or methods

Use F or P in the boxes to indicate whether sample was filtered and/or preserved

CCL 32431

	SAMPLE ID	DATE	TIME	WELL	SOIL	COMP	GRAB	# OF CONTAINERS	pH, conductivity	TOC/DOC	TOX	Chloride, Fluoride, Sulfide	Nitrite/Nitrate	VOC - Specify Method required	METALS - specify	Pesticide	Herbicide	Total Phenol	Acid Extractables	B/N Extractables	PCB's	Cyanide	Coliform - specify type	BTEX/MAT	PAH	Remarks	
01	SPORT 0676-1	4/24/98	0810		X		X																	X		Soil Trip Blank	.2
02	SPOIT 0676-2	4/24/98	0912		X		X																	X	X	QTRS Y-1 EAST	.1
03	SPORT 0676-3	4/24/98	0925		X		X																	X	X	QTRS Y-1 West	.1
04	SPOIT 0676-4	4/24/98	1200		X		X																	X	X	QTRS A North	.1
05	SPOIT 0676-5	4/24/98	1212		X		X																	X	X	QTRS A South	.1

Relinquished by:	Date:	Time:	Received by:	Relinquished by:	Date:	Time:	Received by:
Robert V. Cox	4/24/98	1300	[signature]	[signature]	4/24/98	1500	[signature]
[signature]	4/24/98	1600	Karen Blakeney	4-24-98	1610		

Remarks:

White = sample collector Yellow = file Pink = with report

GENERAL ENGINEERING LABORATORIES

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FL	E87156/87294	E87472/87458
NC	233	
SC	10120	10582
TN	02934	02934

Client: Supervisor of Ship Building & Conversion
SUPSHIP-Portsmouth Detachment-Env.
1899 North Hobson Ave.
North Charleston, South Carolina 29405-2106
Contact: Mr. Bill Hiers
Project Description: SUPSHIP-Portsmouth Detachment

cc: NPWC00197 Report Date: May 08, 1998

Sample ID	: SPORT0672-8
Lab ID	: 9804735-08
Matrix	: Soil
Date Collected	: 04/27/98
Date Received	: 04/28/98
Priority	: Routine
Collector	: Client

Parameter	Qualifier	Result	DL	RL	Units	DF	Analyst	Date	Time	Batch	M
Volatile Organics											
BTEX - 4 items											
Benzene	U	0.00	1.00	2.00	ug/kg	1.0	TCL	05/05/98	1852	121492	1
Ethylbenzene	U	0.00	1.00	2.00	ug/kg	1.0					
Toluene	U	0.00	1.00	2.00	ug/kg	1.0					
Xylenes (TOTAL)	U	0.769	1.00	4.00	ug/kg	1.0					
Naphthalene	U	0.00	1.00	2.00	ug/kg	1.0					
Extractable Organics											
Polynuclear Aromatic Hydrocarbons - 16 items											
Acenaphthene	U	0.00	666	1330	ug/kg	4.0	GWL	05/01/98	2036	121135	2
Acenaphthylene	U	0.00	666	1330	ug/kg	4.0					
Anthracene	U	0.00	666	1330	ug/kg	4.0					
Benzo(a)anthracene	U	0.00	666	1330	ug/kg	4.0					
Benzo(a)pyrene	J	691	666	1330	ug/kg	4.0					
Benzo(b)fluoranthene	J	1300	666	1330	ug/kg	4.0					
Benzo(ghi)perylene	U	0.00	666	1330	ug/kg	4.0					
Benzo(k)fluoranthene	U	0.00	666	1330	ug/kg	4.0					
Chrysene	U	0.00	666	1330	ug/kg	4.0					
Dibenzo(a,h)anthracene	U	0.00	666	1330	ug/kg	4.0					
Fluoranthene	U	0.00	666	1330	ug/kg	4.0					
Fluorene	U	0.00	666	1330	ug/kg	4.0					
Indeno(1,2,3-c,d)pyrene	U	0.00	666	1330	ug/kg	4.0					
Naphthalene	U	0.00	666	1330	ug/kg	4.0					
Phenanthrene	U	0.00	666	1330	ug/kg	4.0					
Pyrene	U	0.00	666	1330	ug/kg	4.0					

The following prep procedures were performed:
GC/MS Base/Neutral Compounds

CPU 04/30/98 1705 121135 3

9804735-08

GENERAL ENGINEERING LABORATORIES

Meeting today's needs with a vision for tomorrow.

Laboratory Certifications

STATE	GEL	EPI
FL	E87156/87294	E87472/87458
NC	233	
SC	10120	10582
TN	02934	02934

Client: Supervisor of Ship Building & Conversion
SUPSHIP-Portsmouth Detachment-Env.
1899 North Hobson Ave.
North Charleston, South Carolina 29405-2106
Contact: Mr. Bill Hiers
Project Description: SUPSHIP-Portsmouth Detachment

cc: NPWC00197 Report Date: May 08, 1998

Sample ID : SPORT0672-8

Surrogate Recovery	Test	Percent%	Acceptable Limits
2-Fluorobiphenyl	M610	75.6	(30.0 - 115.)
Nitrobenzene-d5	M610	59.7	(23.0 - 120.)
p-Terphenyl-d14	M610	84.6	(37.3 - 128.)
Bromofluorobenzene	BTEX-8260	90.0	(53.5 - 154.)
Dibromofluoromethane	BTEX-8260	86.8	(63.4 - 136.)
Toluene-d8	BTEX-8260	85.0	(72.1 - 137.)
Bromofluorobenzene	NAP-8260	90.0	(53.5 - 154.)
Dibromofluoromethane	NAP-8260	86.8	(63.4 - 136.)
Toluene-d8	NAP-8260	85.0	(72.1 - 137.)

M = Method	Method-Description
M 1	EPA 8260
M 2	EPA 8270
M 3	EPA 3550

Notes:
The qualifiers in this report are defined as follows:
ND indicates that the analyte was not detected at a concentration greater than the detection limit.
J indicates presence of analyte at a concentration less than the reporting limit (RL) and greater than the detection limit (DL).
U indicates that the analyte was not detected at a concentration greater than the detection limit.
* indicates that a quality control analyte recovery is outside of specified acceptance criteria.

This data report has been prepared and reviewed
in accordance with General Engineering Laboratories
standard operating procedures. Please direct
any questions to your Project Manager, Karen Blakeney at (803) 769-7386.

Karen Blakeney
Reviewed By

NPWC00197

CHAIN OF CUSTODY RECORD

980735

General Engineering Laboratories, Inc.
2040 Savage Road
Charleston, South Carolina 29407
P.O. Box 30712
Charleston, South Carolina 29417
(803) 556-8171

Page 1 of 1

Client Name/Facility Name: SPORT ENVIRONMENTAL

Collected by/Company: R. Cope / SPORT ENVIRONMENTAL

Use F or P in the boxes to indicate whether sample was filtered and/or preserved

CCL 32477

	SAMPLE ID	DATE	TIME	WELL	SOIL	COMP	GRAB	# OF CONTAINERS	pH, conductivity	TOC/DOC	TOX	Chloride, Fluoride, Sulfide	Nitrite/Nitrate	VOC - Specify Method required	METALS - specify	Pesticide	Herbicide	Total Phenol	Acid Extractables	B/N Extractables	PCB's	Cyanide	Coliform - specify type	BTEX/MEP	PAH	Remarks	
01	SPORT 0672-1	4/27/98	0830		X		X	1																X		Soil Trip Blank	.1
02	SPORT 0672-2	4/27/98	0931		X		X	2																X	X	QTR's N Pg-1	.2
03	SPORT 0672-3	4/27/98	0948		X		X	2																X	X	QTR's N Pg-2	.2
04	SPORT 0672-4	4/27/98	1005		X		X	2																X	X	QTR's M Pg-1	.2
05	SPORT 0672-5	4/27/98	1015		X		X	2																X	X	QTR's M Pg-2	.2
06	SPORT 0672-6	4/27/98	1045		X		X	2																X	X	QTR's L Pg-1	.2
07	SPORT 0672-7	4/27/98	1120		X		X	2																X	X	QTR's K Pg-1	.2
08	SPORT 0672-8	4/27/98	1145		X		X	2																X	X	QTR's A Pg-1	.2

SAMPLE ANALYSIS REQUIRED (x) - use remarks area to specify specific compounds or methods

Remarks

Relinquished by:	Date:	Time:	Received by:	Relinquished by:	Date:	Time:	Received by:
R W Cope	4/27/98	1450			4/28/98	1440	
Relinquished by: Karen Blakeney	Date: 4/28/98	Time: 1510	Received by lab by: Diane Francis 4/28/98	Date:	Time: 1510	Remarks:	

White = sample collector Yellow = file Pink = with report

Attachment III

Certificate of Disposal (tank)

UST Certificate of Disposal

CONTRACTOR

Supervisor of Shipbuilding Conversion and Repair
Portsmouth, VA
Environmental Detachment Charleston
1899 North Hobson Avenue
North Charleston 29405-2106

Telephone (843) 743-6482

TANK ID & LOCATION

UST Quarters A; Quarters A, 100 Navy Way, Charleston SC

DISPOSAL LOCATION

Bldg. 1601 Tank Cleaning
& Disposal Area
Charleston Naval Complex

TYPE OF TANK	SIZE (GAL)
Fuel oil	550 gal

CLEANING/DISPOSAL METHOD

The tank was cut open on both ends, cleaned with a steam cleaner, and disposed of as recyclable scrap metal.

DISPOSAL CERTIFICATION

I certify that the above tank has been properly cleaned and disposed of as recyclable scrap metal.

Sidney C. Ladson — 15 MAY 98 (Date)

D H E C
PROMOTE PROTECT PROSPER
2600 Bull Street
Columbia, SC 29201-1708

15 July 1998

Department of the Navy
Southern Division NFEC
P.O. Box 190010
North Charleston, SC 29419-9010
Attn: Mr. Gabriel Magwood

Re: Underground Storage Tank Assessment Report dated 1 June 1998
Quarters "A" Housing (Site Identification # 15405-General File)
Charleston Naval Complex/Charleston Naval Base
Charleston, SC
Charleston County

Dear Mr. Magwood:

The author has completed technical review of the referenced document. As submitted, the report provides a narrative describing closure activities and analytical results of environmental sampling to determine if releases have occurred as a result of operation of the referenced vessel and/or associated piping system. The analytical results provided indicate reportable concentrations of BTEX and PAH compounds were detected in soil grab samples obtained from the UST excavation and the piping run excavation. The reported concentrations are below levels proposed in the SCAP (Soil Corrective Action Plan, amended July 1997). Based on review of the employed closure activities and sampling results it appears that no additional endeavors for remedial actions and/or contaminant characterization is warranted for Quarters "A" Housing at this time. Please be aware this statement pertains only to the portion of the facility addressed in the referenced document and does not apply to other areas of the facility and/or any other potential regulatory violations. The Department retains the authority to request additional assessments and/or remedial endeavors, as appropriate, if future conditions or information warrant and are deemed necessary.

Should you have any questions please contact me at (803) 734-5328.

Sincerely,

Paul L. Bristol, Hydrogeologist
Groundwater Quality Section
Bureau of Water

Tom Knight, Manager
Groundwater Quality Section
Bureau of Water

cc: Trident District EQC

L: 6.5.98
L: 7.15.98

DEPARTMENT OF THE NAVY
SOUTHERN DIVISION
NAVAL FACILITIES ENGINEERING COMMAND
P.O. BOX 190010
2155 EAGLE DRIVE
NORTH CHARLESTON, S.C. 29419-9010

NFA

5090
Code 1849
1 June 1998

Mr. Paul Bristol
South Carolina Department of Health
And Environmental Control
Division of Underground Storage Tank
2600 Bull Street
Columbia, SC 29201

UST ASSESSMENT REPORTS FOR CHARLESTON NAVAL COMPLEX, CHARLESTON, SC

Dear Mr. Bristol:

Enclosed are the Assessment Reports for the closure of Underground Storage Tanks A, K, L, M, N, Y, 220 and 3909 located at the Charleston Naval Complex, Charleston, SC.

If you have any questions please contact me at (843) 820-7307.

As do be Changed
15405

Sincerely,

GABRIEL L. MAGWOOD
Petroleum/UST

Encl:
(1) Assessment Reports