

UNITED STATES MARINE CORPS

Marine Corps Base Camp Lejeune, North Carolina 28542-5001 6280/11 FAC FEB 17 1987

North Carolina Department of Environmental Management Attn: Mr. Rick Shiver 7225 Wrightsville Avenue Wilmington, North Carolina 28403-3969

> Ref: JP-5 Fuel Recovery Project MCAS, New River Rapid Refueling Area

Dear Mr. Shiver:

We are forwarding the report of borings installed to locate the subject plume. In summary, the report states:

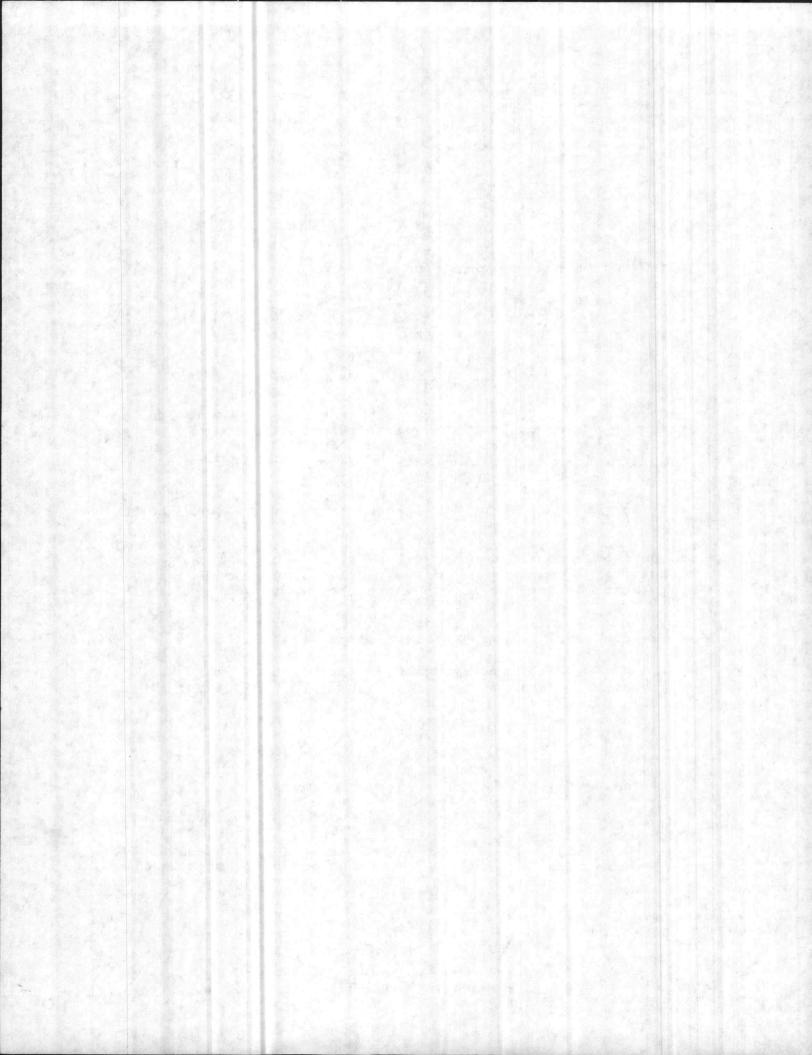
- a. A lens of fuel approximately 4-5 feet thick appears to be located to the north of the fuel tanks.
- b. The fuel observed in one of the surface drainage ditches may be discharging from this lens of fuel (Note: Oil skimming booms installed downstream in 1982 have prevented floating oil discharge to New River).
- c. Fuel thickness was measurable in 8 of 23 soil borings installed.

Based on this report, Camp Lejeune will proceed with design of a recovery system. Any comments on this data which would assist us in the recovery process will be most appreciated. Our point of contact is Mr. Bob Alexander, (919) 451-3034.

Sincerely,

T. J. DALZELL
Colonel, U. S. Marine Corps
Assistant Chief of Staff, Facilities
By direction of the Commanding General

COpy to: (w/o encl) CO, MCAS (Attn: S-4) PWO



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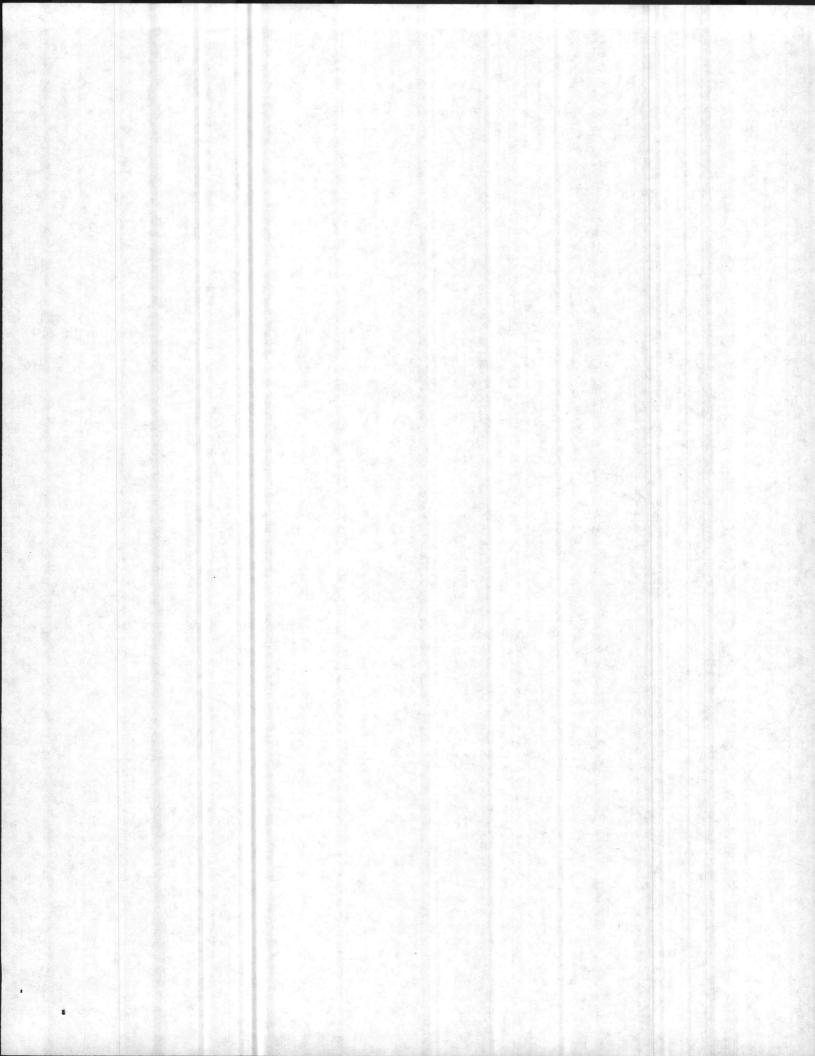
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UNITED STATES MARINE CORPS MARINE CORPS BASE

CAMP LEJEUNE, NORTH CAROLINA 28542-5001

IN REPLY REFER TO: 6280/11 FAC FEB 11 1987

Fill Aviation tail amplay

Commanding General, Marine Corps Base, Camp Lejeune,

North Carolina

Commanding Officer, Marine Corps Air Station, New River, To:

Jacksonville, North Carolina 28545-5000

JP-5 FUEL RECOVERY PROJECT, MCAS RAPID REFUELING AREA Subj:

(1) Soils Investigation, Interim Report, Environmental Encl: Science and Engineering, 9 Jan 1987

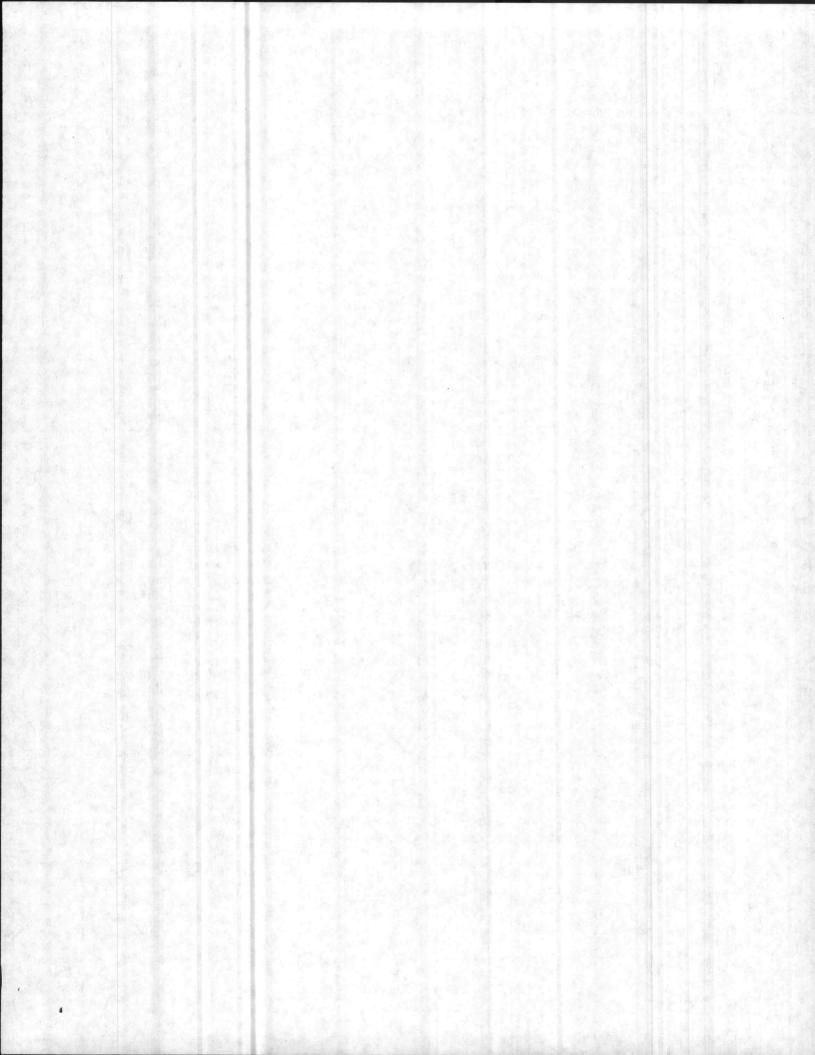
(2) Preliminary Scope of Work: Recovery System Design

1. We are forwarding the enclosures for your review and comment. A portion of enclosure (1), Appendix A, Soil Boring Logs; represents field data sheets and will be forwarded upon request.

2. Upon completing your review, please contact Mr. Bob Alexander, extension 3034, with your comments or suggestions. NAVFACENGCOM currently estimates recovery system designs can be initiated in July 1987. We are pursuing alternatives to expedite this time frame.

COPOULO Joulob

Copy to: CMC (LFL)



INTERIM REPORT

CONFIRMATION STUDY TO DETERMINE EXISTENCE AND POSSIBLE MIGRATION OF SPECIFIC CHEMICALS IN SITU

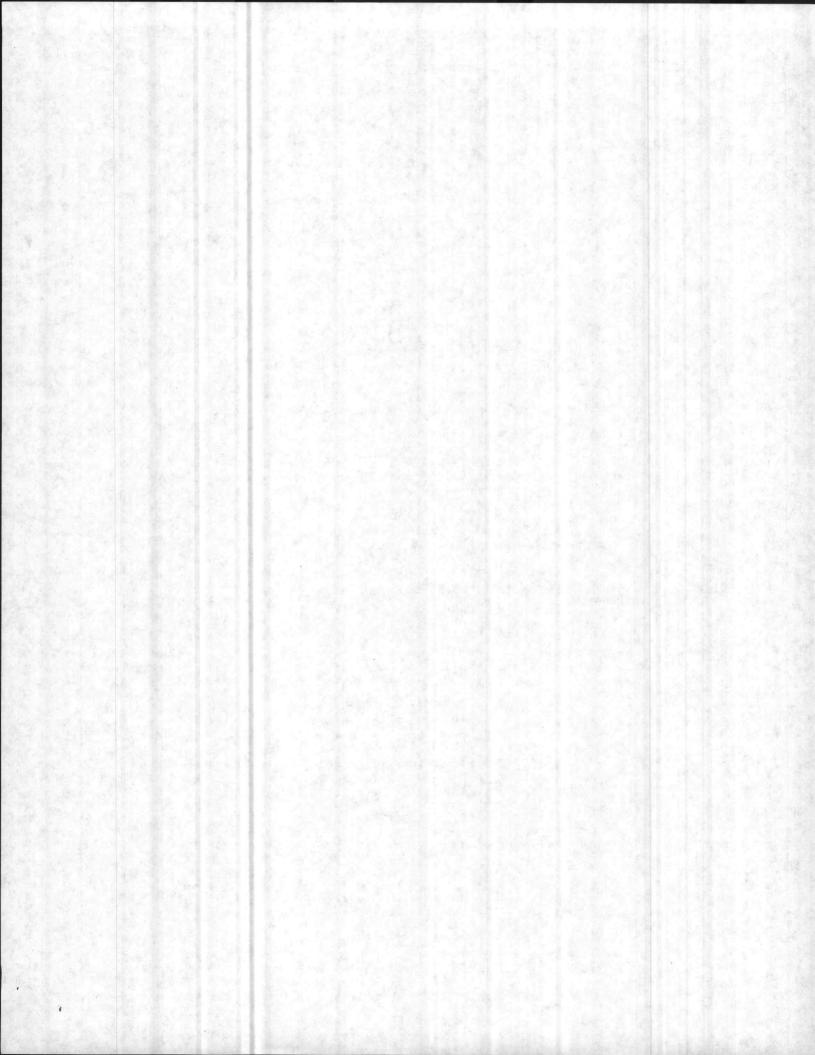
SOILS INVESTIGATION MCAS NEW RIVER RAPID REFUELING AREA

MARINE CORPS BASE Camp Lejeune, North Carolina

Contract No. N6.470-83-8-6106

ENVIRONMENTAL SCIENCE AND ENGINEERING, INC. Gainesville, Florida

January 9, 1987



1.0 INTRODUCTION

This report presents the final results of a soils investigation at the Rapid Refueling Area at Marine Corps Air Station (MCAS) New River conducted as part of the Confirmation Study at the Marine Corps Base (MCB), Camp Lejeune, North Carolina.

The objective of the soils study was to identify visually the extent of soil and shallow ground water contamination resulting from leakage of fuel from the fuel pipeline leading to the rapid refueling area as well as the refueling area itself.

2.0 METHODOLOGY

The extent of fuel contamination was determined by the completion of 23 soil borings to a depth of 10 feet (ft) and subsequent measurement of the depth to shallow ground water and/or fuel and determination of the depth to ground water/fuel interface.

2.1 Soil Borings

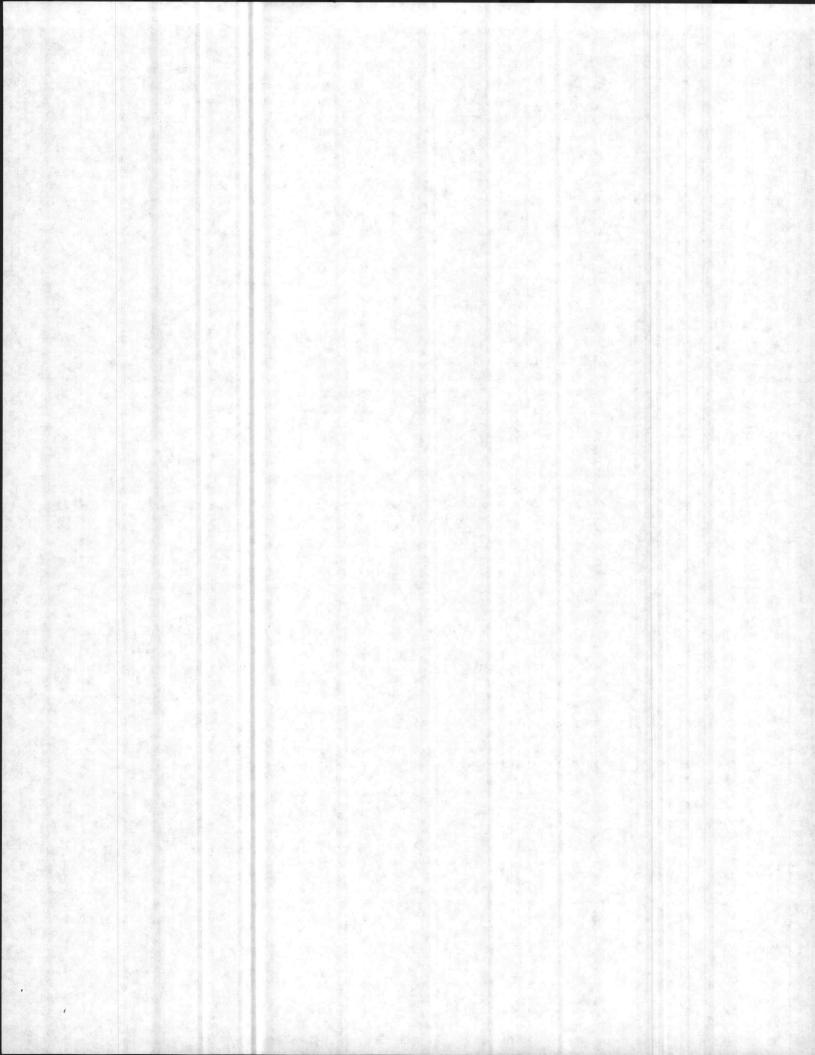
Twenty-three soil borings were distributed in the area suspected of contamination by fuel (Fig. 2-1). Each boring was completed using 6-inch outside diameter (OD) hollow stem augers. Continuous soil samples, obtained by standard penetration tests (SPT) with a split-barrel sampler, were collected from each boring. These samples were visually described according to the Unified Soil Classification System (USCS). Boring logs for these borings are presented in Appendix A of this report.

After completion of the first few borings, it was noted that bore holes were collapsing below the water table after a short amount of time. As this would preclude accurate measurement of the depth to water and/or fuel, 4-inch inside diameter (ID) polyvinyl chloride (PVC) well screen, factory slotted with a slot size of 0.010 inch, was installed in each boring to allow the required measurements.

2.2 Measurements

After a period of approximately 24 hours, during which the effects of drilling on the static water/fuel levels were allowed to dissipate, measurements of depth to shallow ground water, depth to floating fuel, and depth to the water/fuel interface were conducted. The procedures described in the following paragraphs were utilized at each of the 23 borings.

The static ground water and/or fuel level was determined using the U.S. Geological Survey (USGS) wetted tape method. The depth to fluid measurements are presented in Table 2-1. Once the static level of the fluid was determined, both petroleum and water sensitive pastes were applied to the water level tape, and the tape was lowered into the boring. The paste allowed the quick determination of the presence of fuel in the



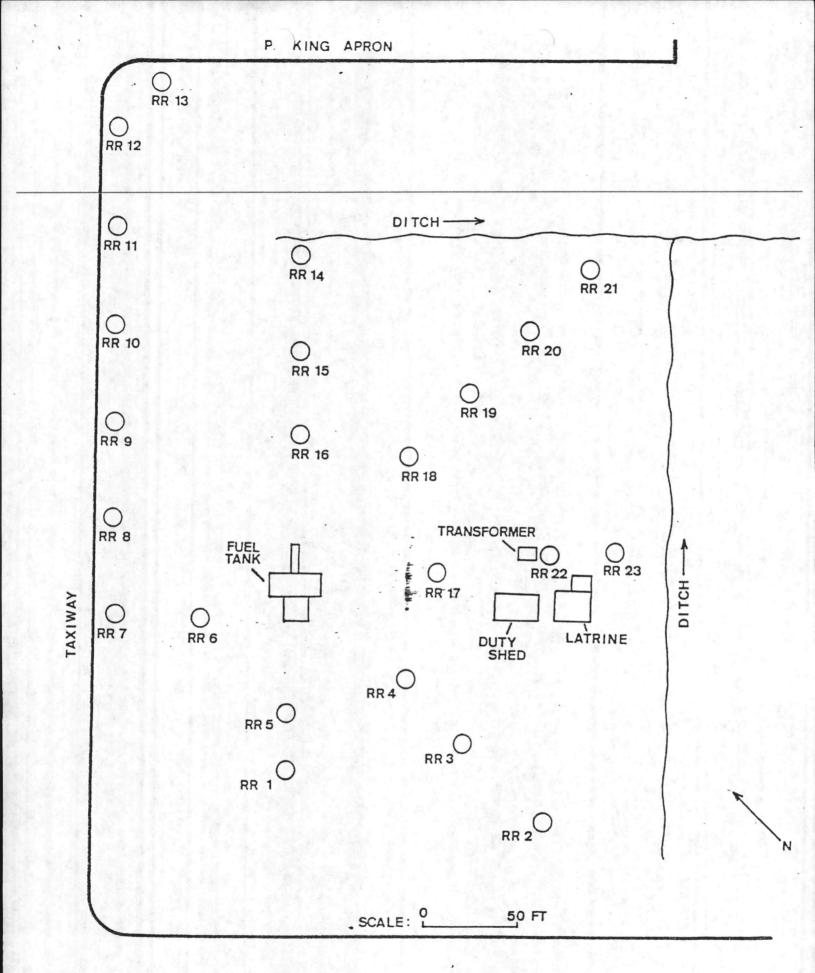


Figure 2-1. Locations of Soil Borings at Rapid Refueling Area, MCAS New River

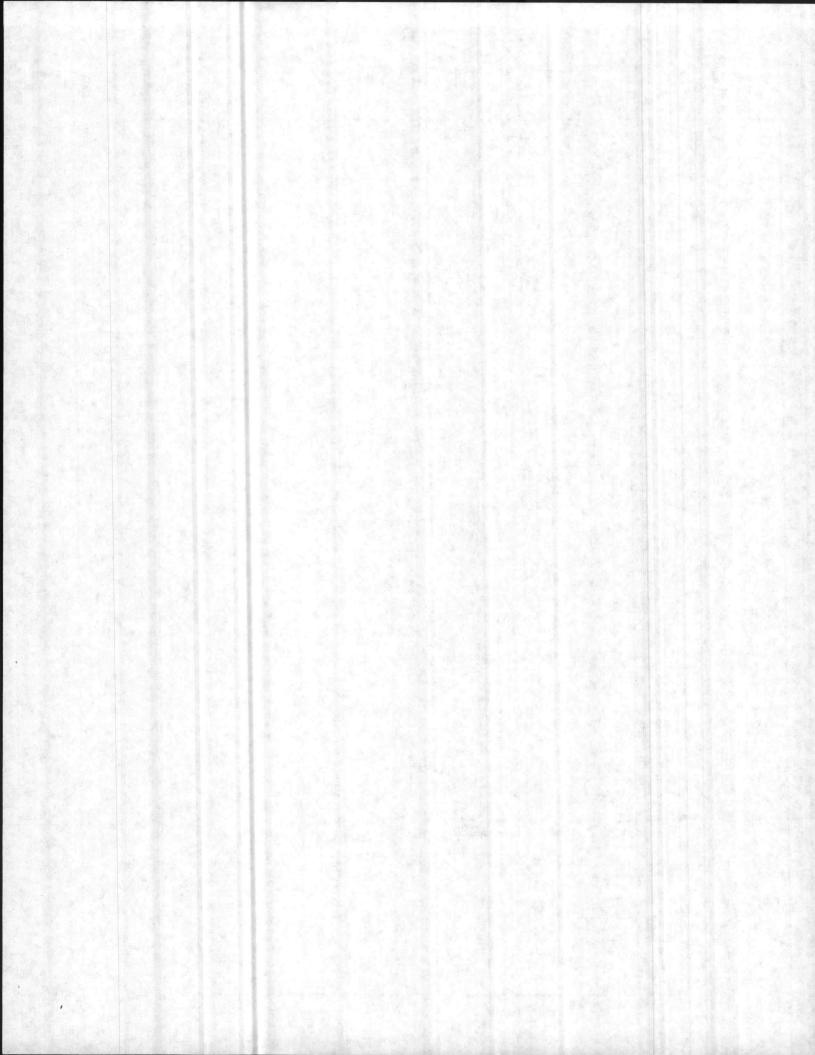


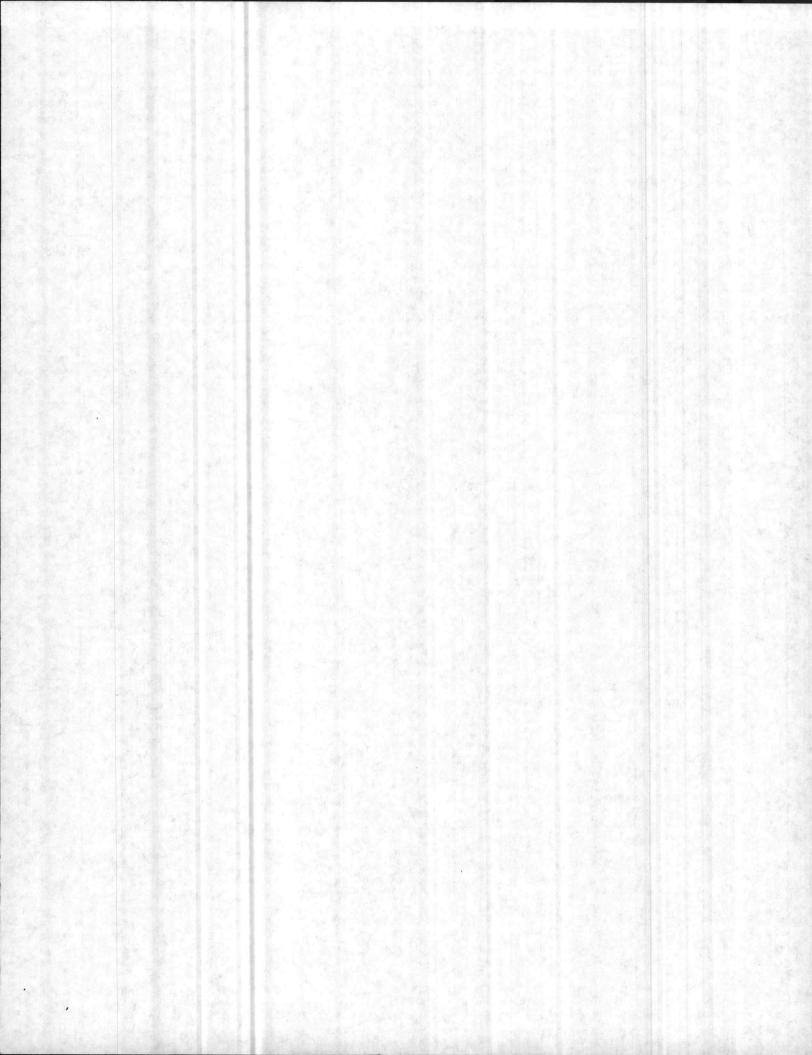
Table 2-1. Static Fluid Levels in Soil Borings

Baring No.	Stick Up* (ft)	Measurement** (ft)	Depth to Fluid+ (ft)
RR-1	1.70	10.10	8.40
RR-2	1.50	9.00	7.50
RR-3	1.75	8.00	6.25
RR-4	1.83	6.92	5.09
RR-5	1.83	8.00	6.17
RR-6	1.42	7.92	6.50
RR-7	1.38	7.92	6.54
RR-8	1.33	7.58	6.25
RR-9	1.58	7.50	5.92
RR-10	1.58	7.12	5.54
RR-11	1.25	7.20	5.95
RR-12	1.50	7.83	6.33
RR-13	1.58	9.50	7.92
RR-14	2.25	7.30	5.05
RR-15	1.50	4. 성급 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 -	5.80
RR-16	1.83	7.92	6.09
RR-17	1.50	7.30 7.92 8.70	7.20
RR-18	1.58	8.10	6.52
RR-19 -	2.83	9.10	6.27
RR-20	1.65	7.42	5.77
RR-21	1.50	7.92	6.42
RR-22	1.58	8.70	7.12
RR-23	1.75	7.50	5.75

Note: * = Height of casing above ground. ** = Depth of fluid from top of casing.

+ = Depth below land surface.

Source: ESE, 1987.



borings and the approximate depth of the water/fuel interface.

When fuel was detected in a boring, the thickness of the fuel was determined precisely. The bailer was lowered until it was completely submerged in the fluid. The drop line was then marked and measured as the bailer was lowered to the approximate location of the water/fuel interface, as indicated by the use of the petroleum and water sensitive pastes. When the bailer was removed, the interface could be seen through the clear plastic wall of the bailer. The bailer wall is calibrated and the distance from the bottom of the bailer to the interface was recorded. The length of fuel in the bailer, added to the distance the bailer was lowered after being completely submerged, is equal to the thickness of the fuel floating on the shallow ground water surface. The measured fuel thicknesses are presented in Table 2-2.

3.0 DATA ANALYSIS

The field efforts generated two catagories of information, geologic data and contaminant (fuel) distribution data.

3.1 Geologic Data

The lithologic units penetrated by the soil borings consist of interbedded silty and clayey sands, and sandy and silty clays. These materials are typical of the materials encountered throughout MCAS New River. Small lateral distances between borings result in similar small changes in the character of the subsurface materials. Because of this tendency of the sediments to vary in character over small distances, correlation of individual units cannot be done from boring to boring. However, the nature of the sediments does not suggest preferred ground water flow in any specific direction. Ground water flow will be controlled by the areal flow patterns which are governed by the presence of discharge points (ditches), recharge areas (grassed areas), and areas of no recharge (paved areas).

3.2 Distribution of Fuel

The distribution of measurable fuel thickness is shown in Fig. 2-2. A lens of fuel, approximately 4-5 ft thick, appears to be located to the north of the fuel tank, and may extend under the taxiway which forms the northern limit of the grassed tank area.

Fuel has been observed in both of the drainage ditches shown in Fig. 2-2. The lens of fuel floating on the shallow ground water detected in the current study may discharge into the northern ditch under the action of percolating rainfall. The presence of fuel in the eastern ditch does not appear to be supported by the relative location of the fuel lens. However, fuel was detected along a fuel line to the southwest of the current study area by a similar soils investigation conducted by Soil & Material Engineers, Inc. in 1983. A separate fuel lens or lenses in this area may discharge into the upstream end of the eastern ditch.

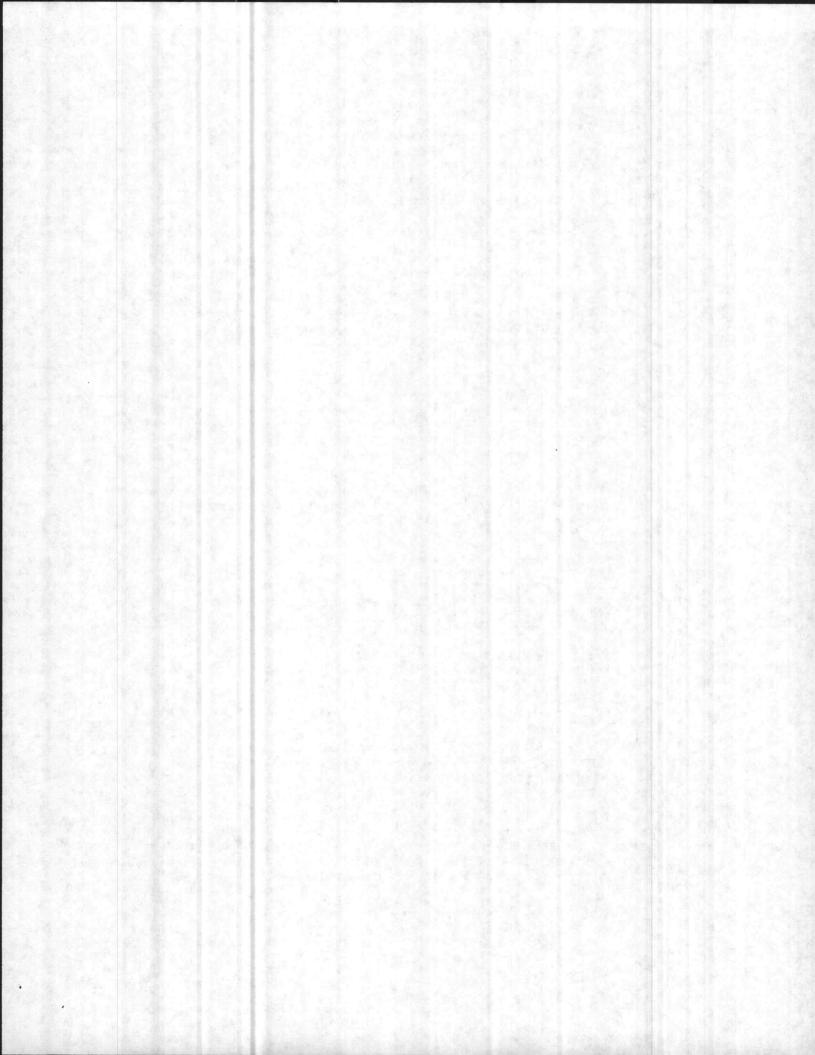
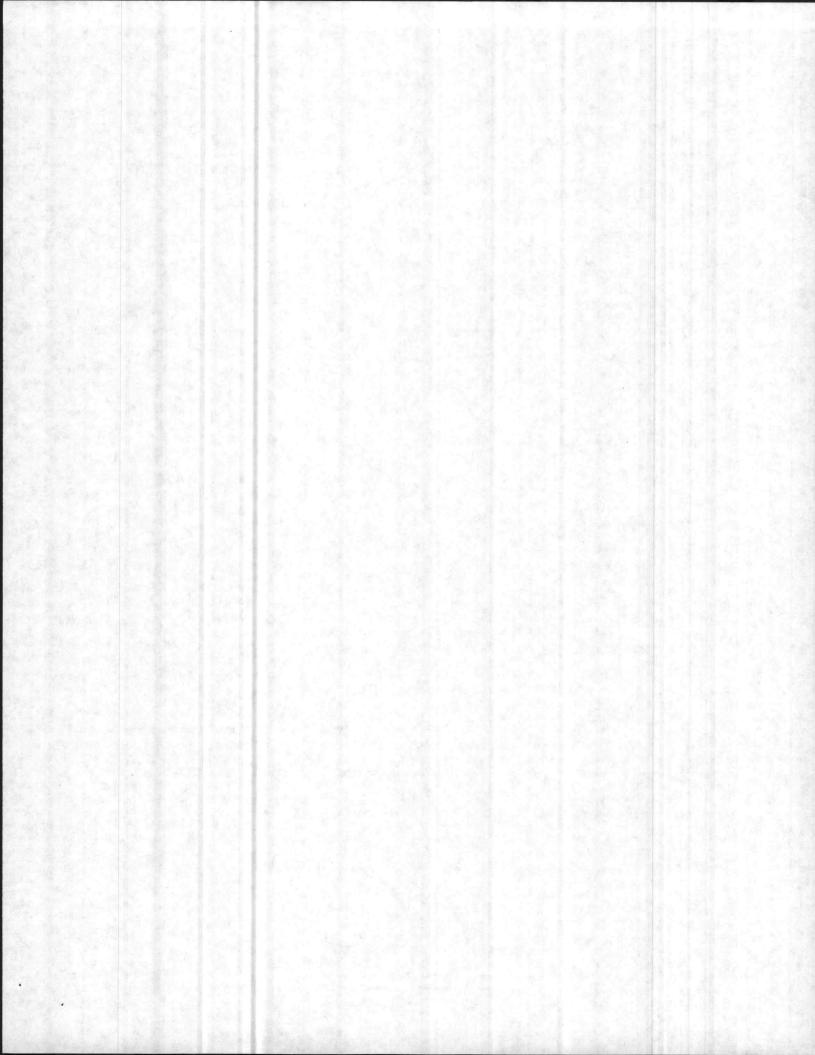


Table 2-2. Measured Thickness of Fuel in Soil Borings

oring No.	Fuel Thickness (ft)
RR-1	4.19
RR-5	4.23
RR-6	4.82
RR-7 ·	4.39
RR-8	4.29
RR-9	4.87
RR-10	4.75
RR-11	_4.85
	. [1227] - [124] - [124] - [124] - [124] - [124] - [124] - [124] - [124] - [124] - [124] - [124] - [124] - [124]

Source: ESE, 1987.



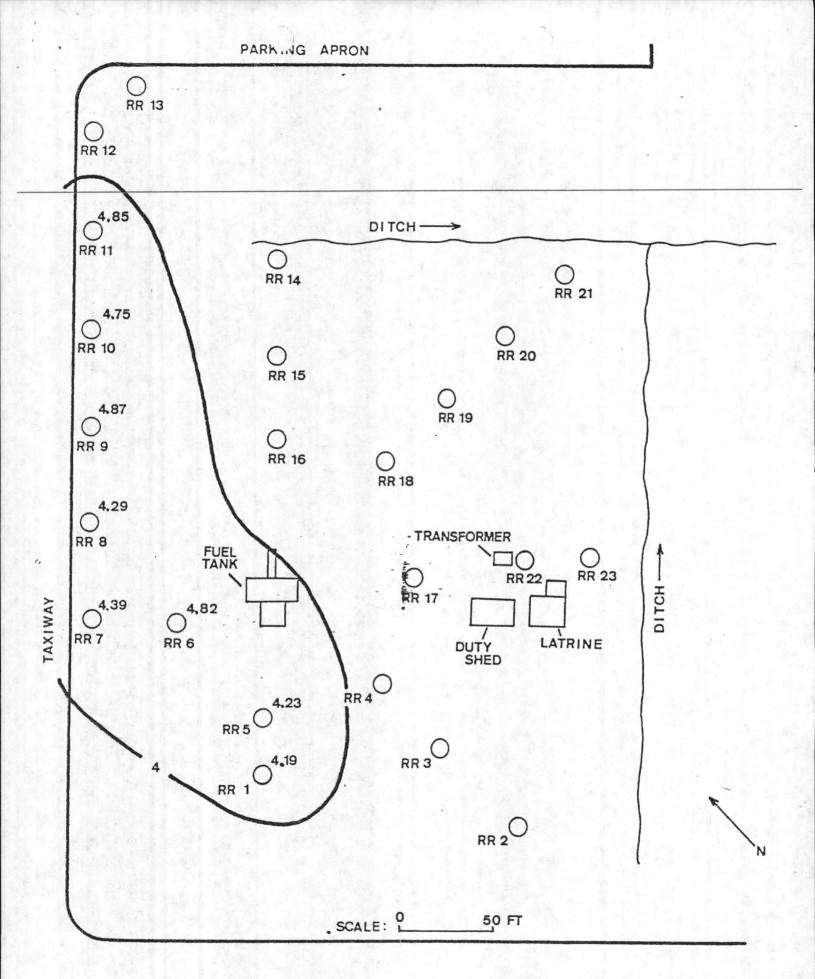
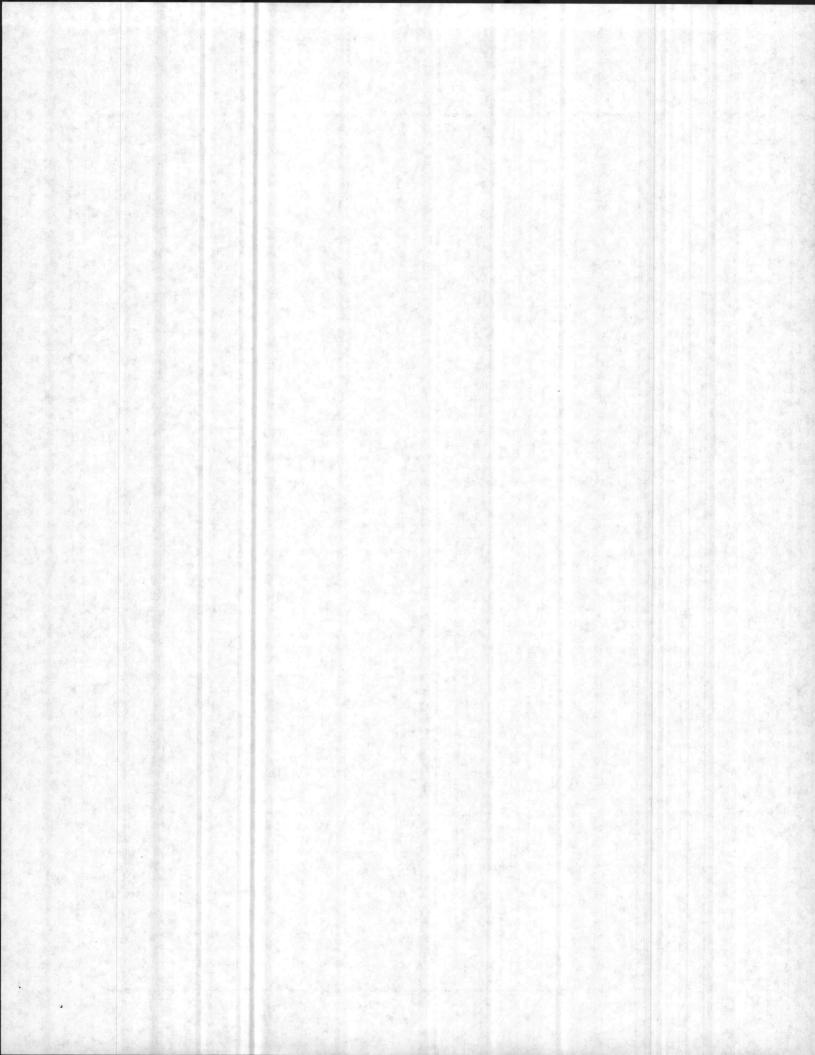
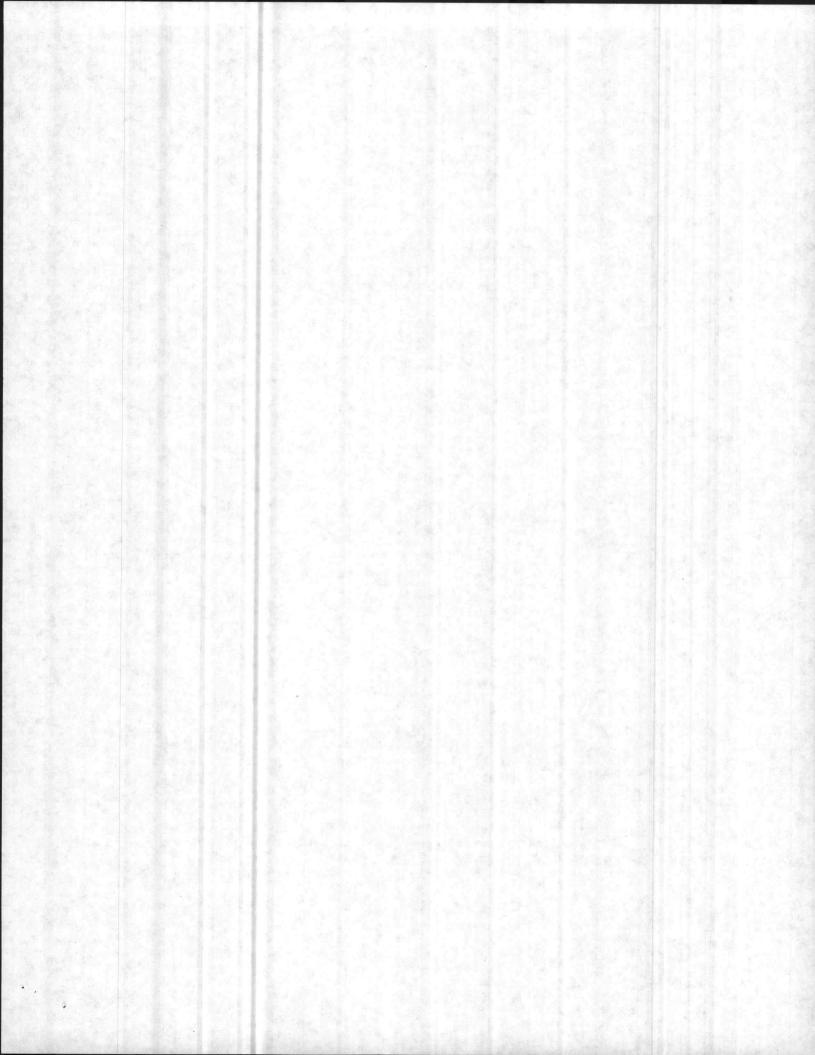


Figure 2-2. Measured Fuel Thickness (ft) at Rapid Refueling Area, MCAS New River



4.0 CONCLUSIONS

The detected fuel lens at the rapid refueling area suggests that a significant quantity of fuel has leaked into the ground water at this site. This has been corroborated by fuel inventories of the refueling system as well as previous soils investigations along the fuel pipeline. The fuel may not be able to migrate in the ground water to any great distance because of the low-permeability nature of the fine-grained sediments at this site. However, discharge of fuel into the surface drainage network as a result of percolating rainfall will provide a more rapid migration pathway for the fuel. The surface drainage network drains into the New River located to the east of the site, and fuel has been detected in this network within approximately 1000 ft of the New River.

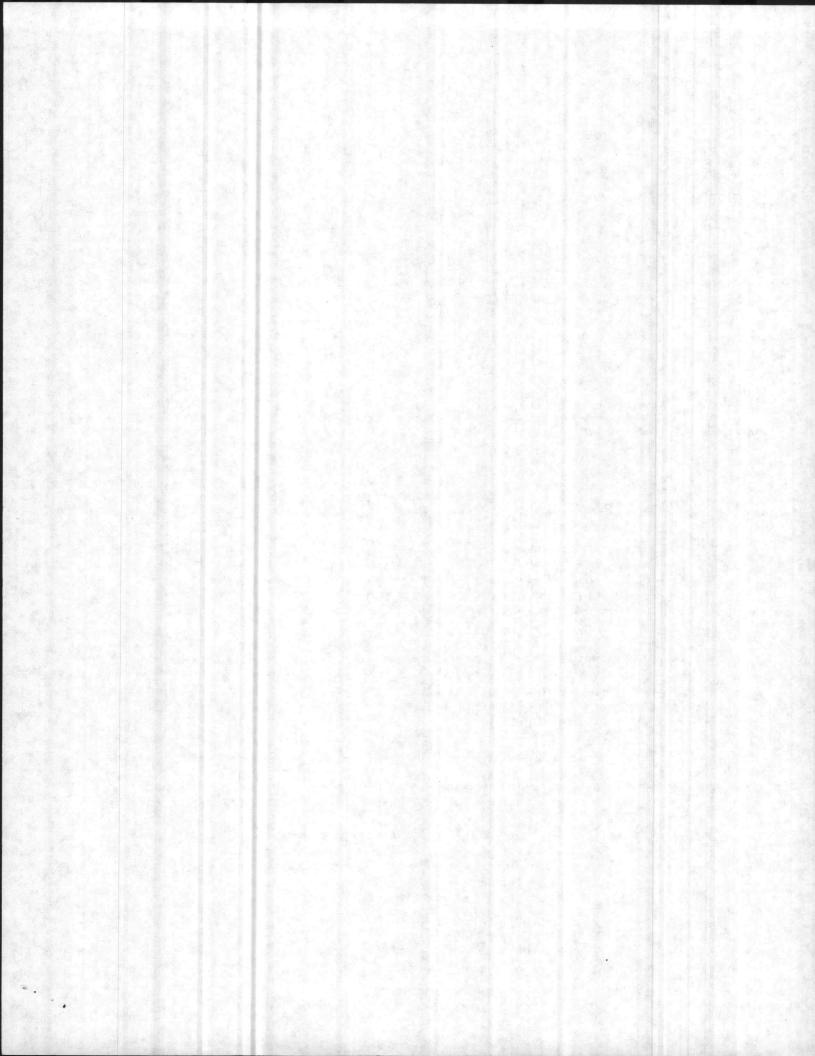


SCOPE OF WORK PRODUCT RECOVERY SYSTEM DESIGN RAPID REFUELING AREA MCAS (H) NEW RIVER MARINE CORPS BASE CAMP LEJEUNE, NORTH CAROLINA

Preparation of plans and specifications for a product recovery system in the vicinity of the of the Rapid Refueling Area at MCAS (H) New River. The Environmental Science and Engineering, Incorporated. Report date January 9, 1987 is to be used as a basis for initial design (Attached).

For the pupose of this scope of work and its associated cost estimate it is assumed that the proposed system shall consist of the following:

- 1. Two (2) 4-inch diameter recovery wells. PVC casing with slotted PVC screen.
- 2. Two (2) product recovery systems that includes a 4-inch scavenger type recovery pump mounted on a water depression pump.
- 3. Installation of two discharge piping systems one to a product holding tank and the other to the nearest storm water inlet.
- 4. Installation of power supply. Explosion proof control panel and power connections.
- 5. Specification preparation should include Oil Recovery Systems type specifications similar to Section 02900 attached.



REPORT OF CONFERENCE

DATE: 16 AUG 1485

LOCATION: _

Bldgt-1005, Public Works, MCB, CLNC

TIME & DATE: 0830 -16 AUG 1985

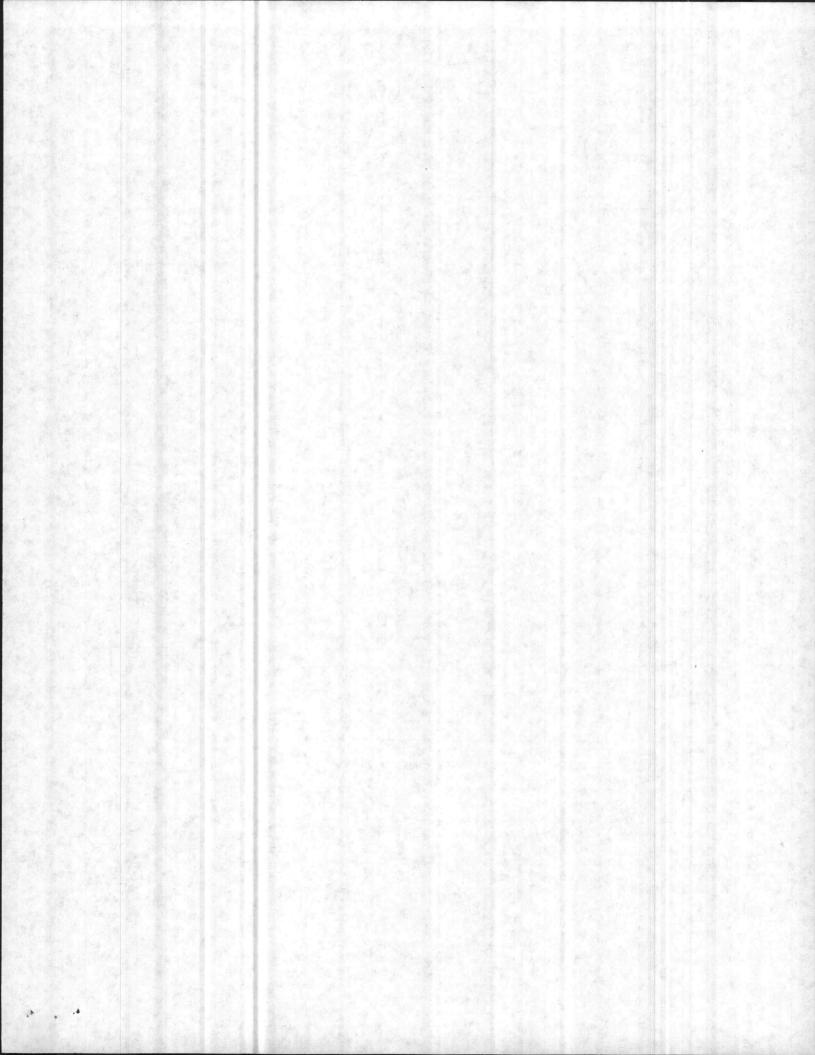
SUBJECT:

INSPECTION STESTING OF FUEL OIL TANKS MCB & MCAS

PURPOSE:

LIST OF ATTENDEES

	1	1 OF ATTENDEES		
NAME	RANK	TITLE	ORGANIZATION	TELEPHONE NO.
T.H. HANKINS JR	65-12	ME MIL SECTION	P.W	3238
OT BELKER.	11 7	Env. Prot : Spac.		2195
OR Finney	65-11	aut DICASS	OSSC, Logistics	5301-5762
Ronald H WALERS	859	OR SHOP DING	NSIG 406	220.7
FECONE	cio	OBMO	BASE MAINT.	2511
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GREG Shoemaker	Civ.	CONT. MONAGER	BASE MAINT,	5.80.9
BOD ALEXANDER	65-12	EMPLEMAR	AC/S FAULITIES	3034/5
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SITE 45--CAMPBELL STREET FUEL FARM AND MCAS AIR FIELD RAPID REFUELING AREA

CAMPBELL STREET FUEL FARM

Site Investigation

o Three shallow ground water monitoring wells:

Well 45GWl--Located in southwest corner of site in area of known POL seeps.

Well 45GW2--Located north of site.

15 kound wells Well 45GW3--Located east of site between site and deep water supply well No. 131 (Well 45GW4).

o Two deep water supply wells:

Well No. 131 (Well 45GW4)

Well No. 4140 (Well 45GW5)

Data Evaluation

O&G was detected in all sampled wells at this site, including the two water supply wells (see Table 2-23). The levels were generally low except in Well 45GW2. Pb (above criterion) was detected only in Well 45GW1 (see Table 2-24). The volatile components of the fuels reported to have spill/leaked at this site were not detected.

Migration Potential

The Campbell Street Fuel Farm is located in an area without significant topographic relief. As a result, ground water gradients under natural conditions are extremely low. Migration of contaminants from this site is possible because of the pumping of two water supply wells in close. proximity. The observed levels of O&G indicate that some migration has occurred, although it does not appear that organoleptic limits have been exceeded in the water supply wells.

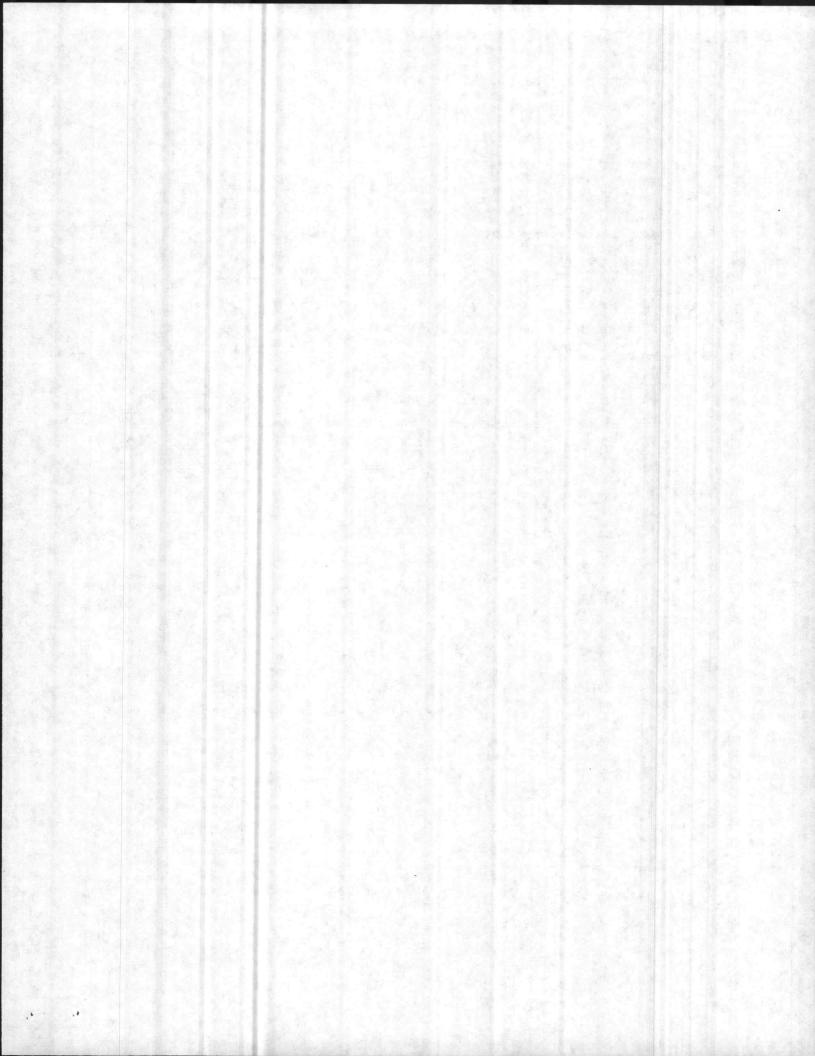


Table 2-23. Site 45--Campbell Street Fuel Farm Sampling Data

ENVIRONMENTAL SCIENCE & FUGINEERING

MULTIPLE FIELD GROUP REPORT

REPORT DATE: TUE. DEC 18 1184

CAMP LEJEUNE STATION 45

										1
		45GW1 374743	456W1 398527	456 N 2 374744	45G W2	456113 374745	456W? 398549	45G44 374746	456W4 30851	45' 10
COLLECTION DATE		7/16/84 8	/1/84	8/1/84	P/1/84	8/1/84	8/1/84	8/1/84	8/1/64	8/1/64
COLLECTION TIME			930	1015	1015	1130	113	11 1	113	1:
ACROLEIN (UG/L)	34210	<7	NA	<6	N A	<7	AM	<7	NI	<
ACRYLONITRILE (UG/L)	34215	<7	NA	<6	. NA	<7	. NA	<7	N A	('
BENZENE (UG/L) .	34 30	< 9.2	NA	<(.2	NA	<5.2	МФ	<1.2	NA	< .3
BROMODICHLOROMETHANE	32161	<0.50	NA	<0.40	14A	<0.50	P! A	<0.50	NA	< .1 "
(UG/L) BROMOFORM (UG/L)	321(4	<1.40	NA	< .70	NA	<1.10	NA	<1.10	11 V	(1.7
BROMOMETHANE (UG/L)	34413	<0.9	NA	<0.7	NA	<0.9	NΑ	<:-8	٨١٨	• • • •
CARBON TETRACHLORIDE	32102	<1.1	MA	<0.90	NA	<1.1	. NA	<1.1	4 (*	<1.2
(UG/L) CHLOROBENZENE (UG/L)	34561	< 0.40	NA	< r. 30	NA	< 0 . 40	11 Φ	< 1.40	1 11	(.40
CHLOROETHANE (UG/L)	34311	<1	. NA	<0.9	NA	<1	N A	<1	, N:	<1
2-CHL ETH VINYLETHER	34576	<n.9< td=""><td>NA</td><td><0.8</td><td>N A</td><td><0.9</td><td>NA</td><td><).9</td><td>N/</td><td>(1</td></n.9<>	NA	<0.8	N A	<0.9	NA	<).9	N/	(1
(UG/L) CHLOROFORM (UG/L)	321:6	<0.50	NA	. <0.40	МА	<0.50	NA	<".50) NA	٠٠٠٠ ٢
CHLOROMETHANE (UG/L)	34418	<1.7	N A	< 0.6	N A	<0.8	N A	< 0.7	N)	1
DIBROMOCHLOROMETHANE	34306	<0.80	NA	<0.70	114	<0.90	N A	<1.80) N	:
(UG/L) DICHL DIFLUO METHANE	34668	<0.8	NA	<^.7	NA	<r.9< td=""><td>N A</td><td>< f. • 9</td><td>9 10</td><td>٠</td></r.9<>	N A	< f. • 9	9 10	٠
(UG/L) 1.1-DICHLOROETHANE	34496	<0.40	N A	<0.30	N/	<6.45) N: A	<40	0 :1	A (. 4 [i
(UG/L) 1,2-DICHLGROETHANE	34531	<0.70	A14	<1.60	N/	4 <0.80) NA	<0.70	0 11	£
(UG/L) 1,1-PICHLOROETHYLENE	345:1	C8.83	NA	<r.70< td=""><td>N/</td><td>4 <0.90</td><td>) 14</td><td>(:.80</td><td>0 N</td><td>4</td></r.70<>	N/	4 <0.90) 14	(:.80	0 N	4
(UG/L) T-1.2-DICHLOROETHENE	34546	<0.90	N	<1.61	, N	A <0.80	n NA	<3.80	0 N	×
(UG/L) 1,2-DICHLOROPPOPANE	0 34541	<€.5	111	<^.4	N	A <	5 NA	< 5	5 N	Α . (. "
(UG/L) C1S-1,3-DICH*PROPENE (UG/L)	347:4	<0.5	NA	<n.< td=""><td>, NJ</td><td>A < (</td><td>5 11/</td><td><0.5</td><td>5 1</td><td>A < • f</td></n.<>	, NJ	A < (5 11/	<0.5	5 1	A < • f

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	A DOMESTIC STREET

FNVIRONMENTAL SCIENCE & ENGINEERING

MULTIPLE FIELD GROUP REPORT

REPORT DATE: TUE. DET 18 1784

CAMP LEJEUNE STATION 45

		45681. 374743	456W1 398507	45GU2 374744	456N2 . 398508	456W3 374745	45GW3 398509	45684 374746	456W4 3'85'	450-11
COLLECTION DATE		7/16/84	8/1/84	8/1/84	8/1/84	8/1/84	8/1/84	8/1/84	8/1/54	8/1/44
COLLECTION TIME			931	1615	1015	1136	113	11	119	1:
T-1.3-DICHL PROPENE	34699	<0.4	NA	<^.3	AIT	<0.4	A-1	<:.4	AII	< .4
(UG/L) ETHYLBENZENE (UG/L)	34371	<0.8	NA	<n.6< td=""><td>NA</td><td>8.1></td><td>NA</td><td>< .8</td><td>NA</td><td></td></n.6<>	NA	8.1>	NA	< .8	NA	
METHYLENE CHLORIDE	34423	<0.7	NA	<n.6< td=""><td>NA</td><td>8.9></td><td>NA</td><td><0.7</td><td>NA</td><td></td></n.6<>	NA	8.9>	NA	<0.7	NA	
(UG/L) 1,1,2,2-TE CH ETHANE	34516	<0.5	NA.	<r.4< td=""><td>. NA</td><td><0.5</td><td>NA</td><td><0.5</td><td>Li V</td><td>.6</td></r.4<>	. NA	<0.5	NA	<0.5	Li V	.6
(UG/L) TETRACHLOROETHENE	34475	<1.3	· NA	<1.0	NA	<1.3	An	<1.3	NA	14
(UG/L)	34506	<n.90< td=""><td>, NA</td><td><0.70</td><td>NA</td><td><0.90</td><td>NA</td><td><0.90</td><td>AM</td><td><1.</td></n.90<>	, NA	<0.70	NA	<0.90	NA	<0.90	AM	<1.
(UG/L) 1,1,2-TRICHL*ETHANE	34511	<0.80	NA	< 2.60	NA	<0.80	N A	(i.80	NA	90
(UG/L) TRICHLOROFTHENF	39180	<0.90	NA	<0.80	NA	<1.0	N A	<0.90	NA	÷1.
(UG/L) TRICHL•FLUOROMETHANE	34488	<1.8	NA	<:.7	NA	<n.9< td=""><td>NA</td><td><0.9</td><td>NA</td><td></td></n.9<>	NA	<0.9	NA	
(UG/L) TOLUFNE (UG/L)	34 10	<0.4	NA	<0.4	NA	<0.5	NA	<0.4	NA	< .4
VINYL CHLORIDE (UG/L)	39175	<0.6	, NA	<0.5	NA	< 0.6	ŅΛ	< 0.6	NV	7
LFAD.TOTAL(UG/L)	1 51	73.6	<50.0	<50.0	NA	<50.0	NA	<50.0	. NV	€ . e
OILSGR , IR (MG/L)	560	2	4	22	<0.9	2	1	2	<1.	1

Source: ESE, 1984.

2-8

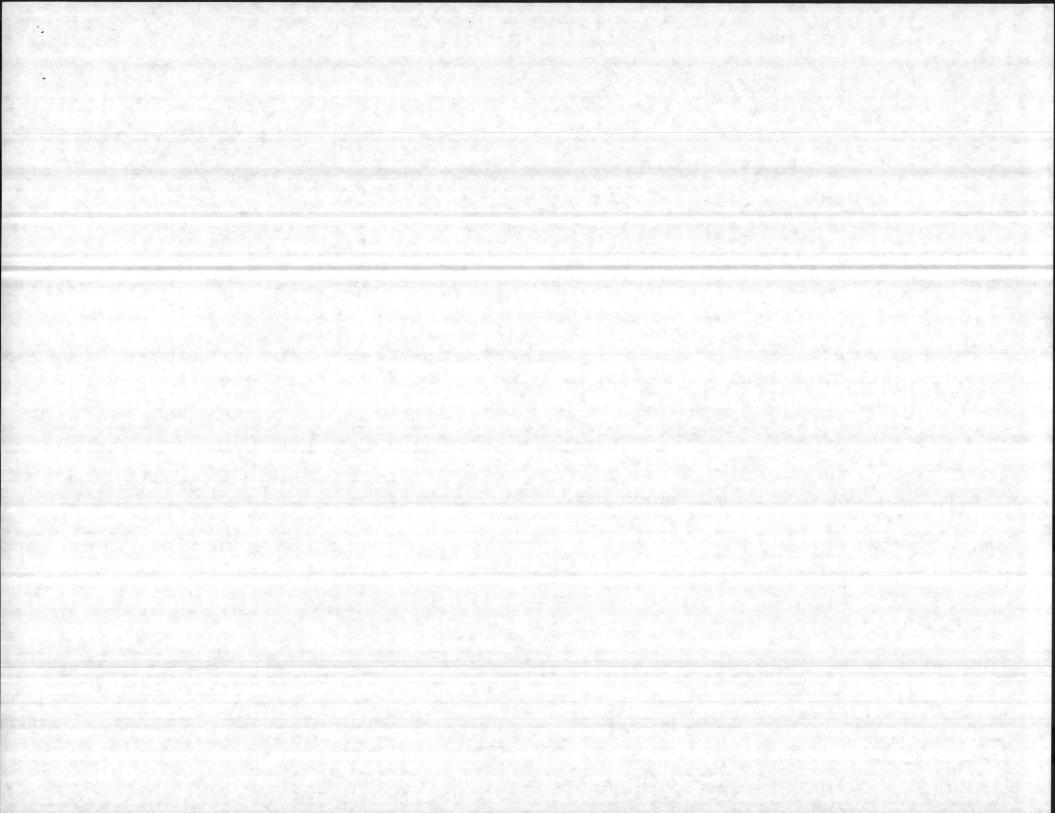
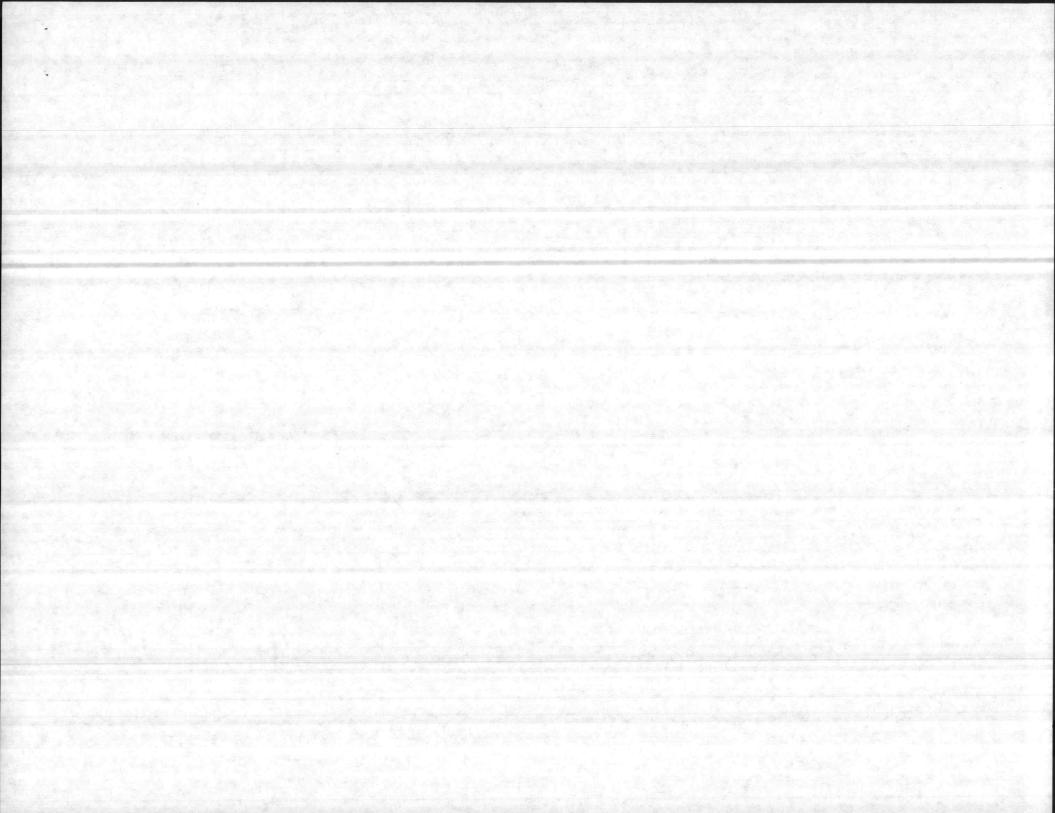


Table 2-24. Site 45--Campbell Street Fuel Farm Data Evaluation

Analytes Detected	Regulatory Limits	Value (ug/L)	Samples Exceeding Limits
0&G	Organoleptic	NL*	45GW2
Pb	Drinking Water/Ambient Water	50	45GW1

^{*}NL = No numerical limit.

Source: ESE, 1984.



Recommendations

All wells sampled in the initial verification sampling event should be resampled in the second sampling event. The same analytes tested in the first sampling event should be repeated in the second sampling event.

MCAS AIR FIELD RAPID REFUELING AREA Site Investigation o Nine soil borings (hand auger).

Data Evaluation

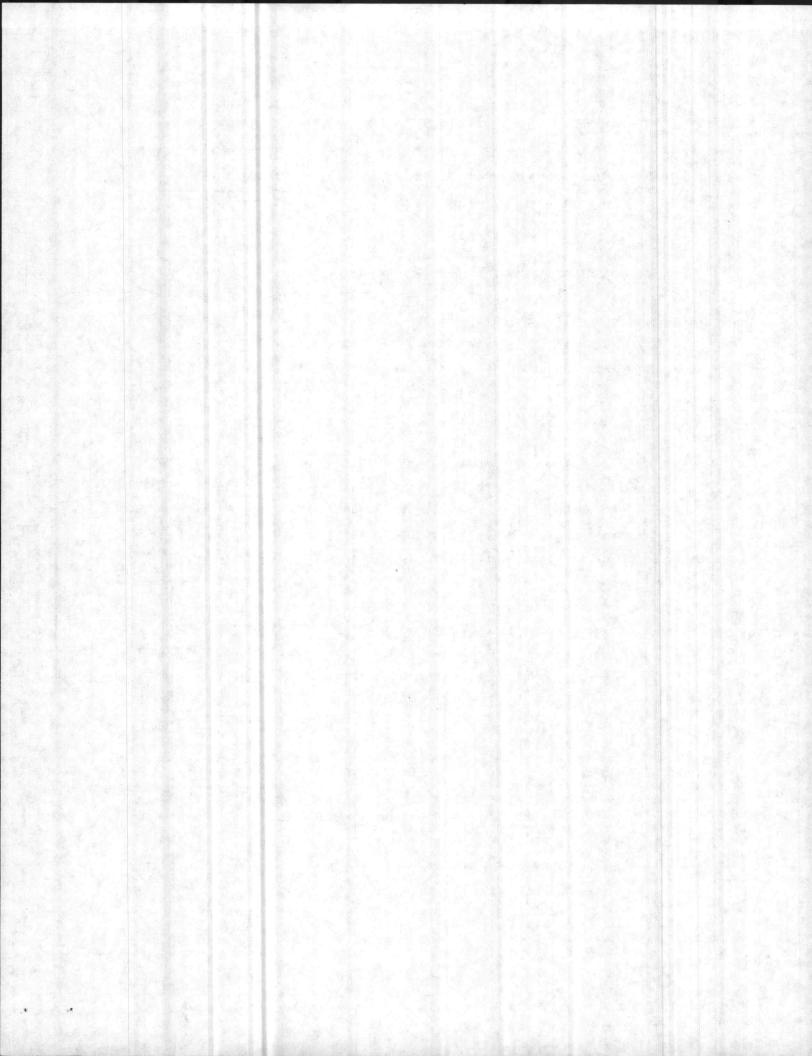
The purpose of the soil boring investigation at the MCAS Air Field Rapid Refueling Area was to determine if the extent of underground fuel contamination had increased. The extent of fuel contamination is documented in the report "Leaked Fuel Inventory Direct Fueling Pipeline Marine Corps Naval Air Station Camp Lejeune, North Carolina," Soil & Material Engineers, Inc., December 1983. The approximate locations of the nine soil borings performed in this investigation are shown in Figure 2-2, and the results of the investigation are presented in Table 2-25. The data presented in Table 2-25 indicate that the underground fuel contamination has not spread and remains in the area identified in the previous investigation conducted by Soil & Material Engineers, Inc.

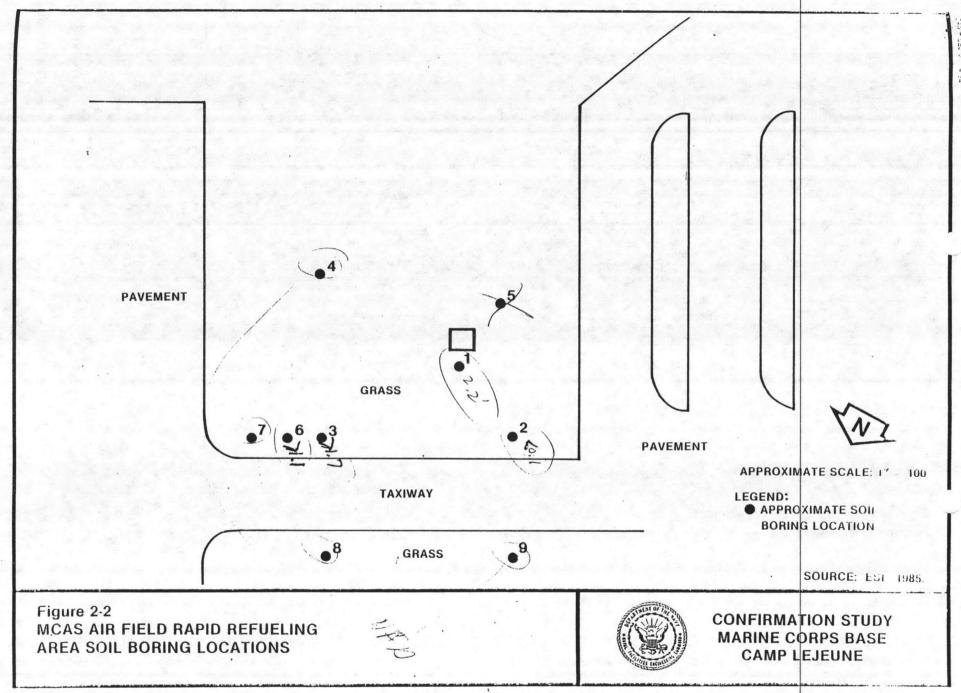
Migration Potential

Due to the lack of significant topographic relief in the Rapid Refueling Area, ground water gradients under normal conditions are extremely low, and rapid horizontal migration of the fuel floating above the shallow ground water is not expected. This is corroborated by the relative immobility of the existing underground contamination indicated by the soil boring investigation.

Recommendations

No further verification monitoring is recommended. Serious consideration should be given to installing a recovery well(s) in this area to recover the large volume of fuel currently floating above the shallow ground water.





	£

Table 2-25. Site 45--MCAS Air Field Rapid Refueling Area Soil Boring Investigation

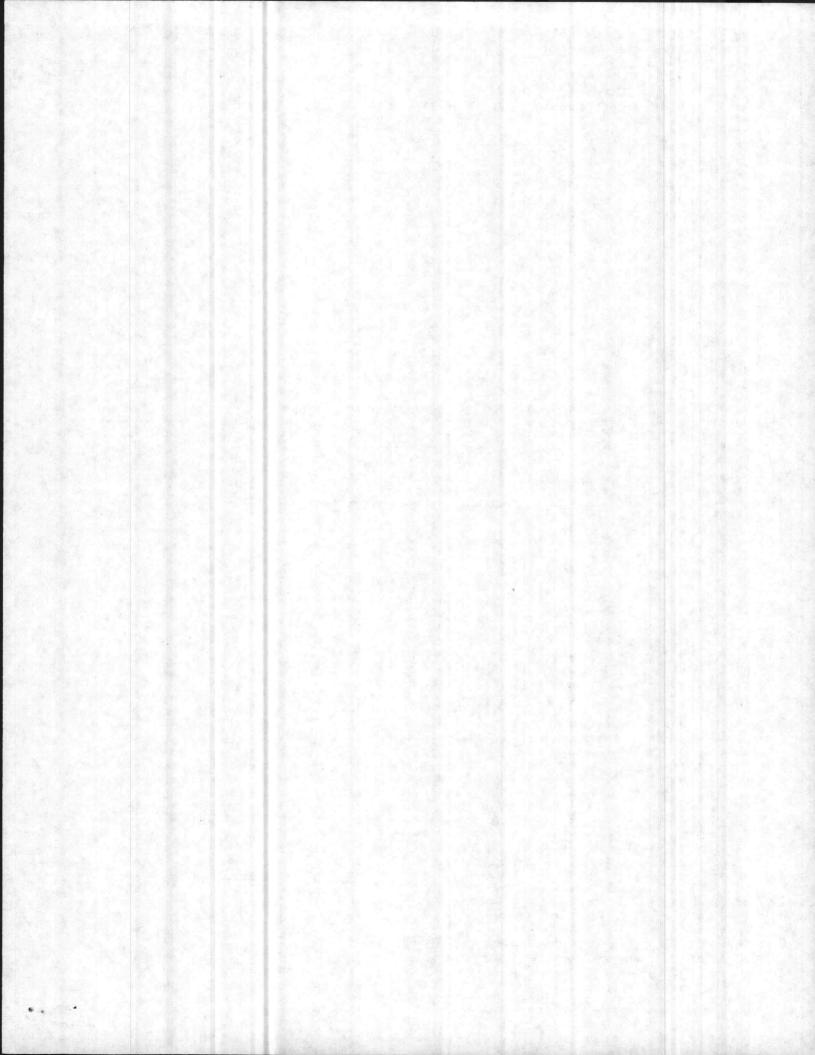
Boring No.*	Depth to Boring (ft)	Depth to Liquid (ft)	Estimated Thickness of Fuel Layer (ft)
1	7.6	5.4	>2.2
2 .	7.4	7.1	<0.1
3	6.8	5.1	>1.7
4	5.6	t	NFD**
5	Boring was stabilizat	filled in during 24-ho ion period following d	our ground water rilling.
6	6.6	5.5	>1.1
7	4.3	3.4	NF Ď
8	3.6	1.2	NFD
9	4.2	3.95	NFD

^{*}Drilling was performed on August 5, 1984. Depth to liquid measurements were made on August 7, 1984.

Source: ESE, 1984.

Tho free standing liquid present. Boring collapsed during 24-hour ground water stabilization period following drilling.

^{**}NFD = No fuel detected by odor or conductivity meter.



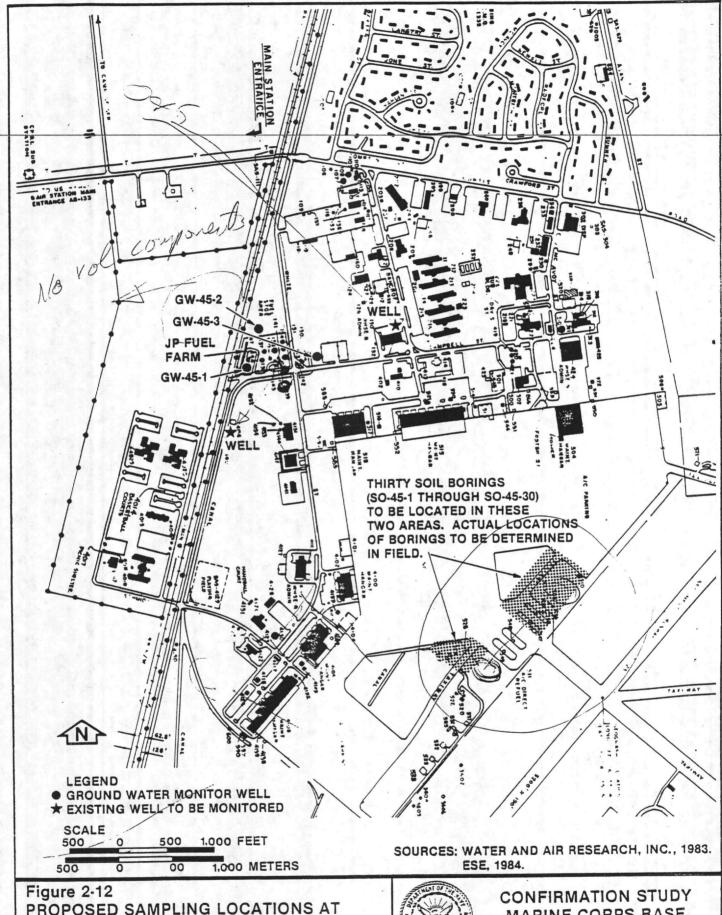
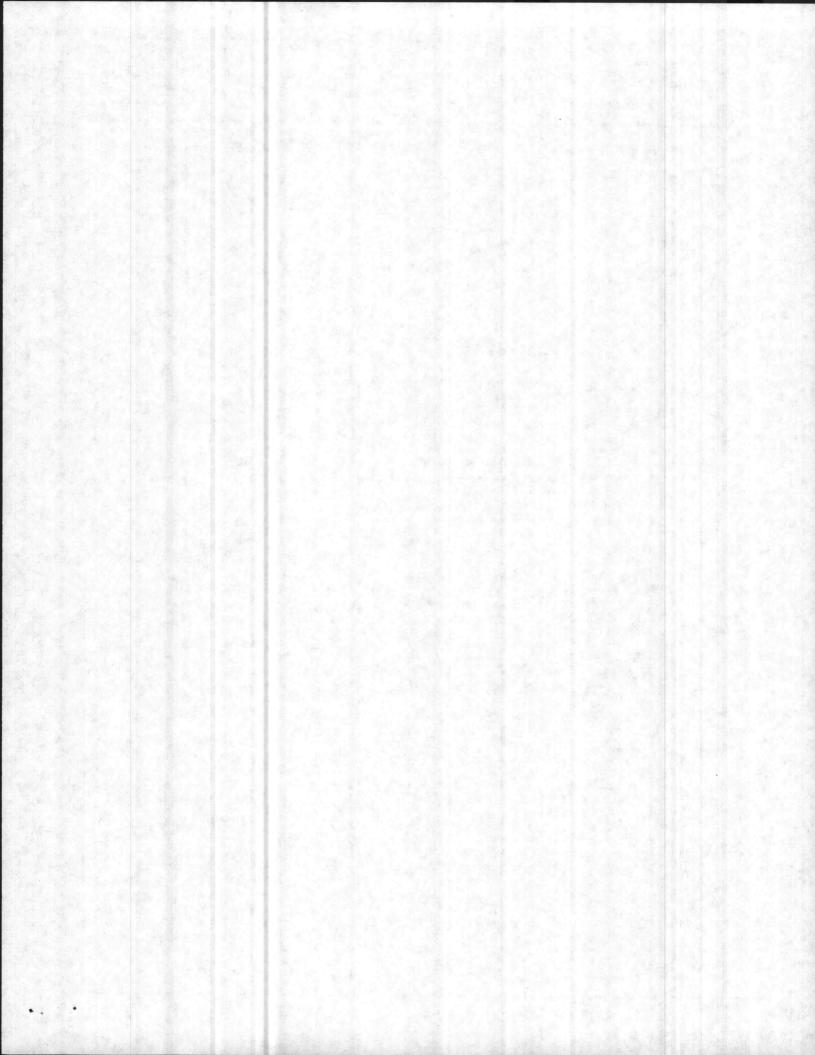


Figure 2-12
PROPOSED SAMPLING LOCATIONS AT SITE NO. 45, CAMPBELL STREET UNDERGROUND FUEL STORAGE AREA



MARINE CORPS BASE
CAMP LEJEUNE



Spoke with Jesse Sollers

PW & Bob Alexander Ary

everdinating. A & & contract

Being Let & Low Div being

Asked to 455ist. No status

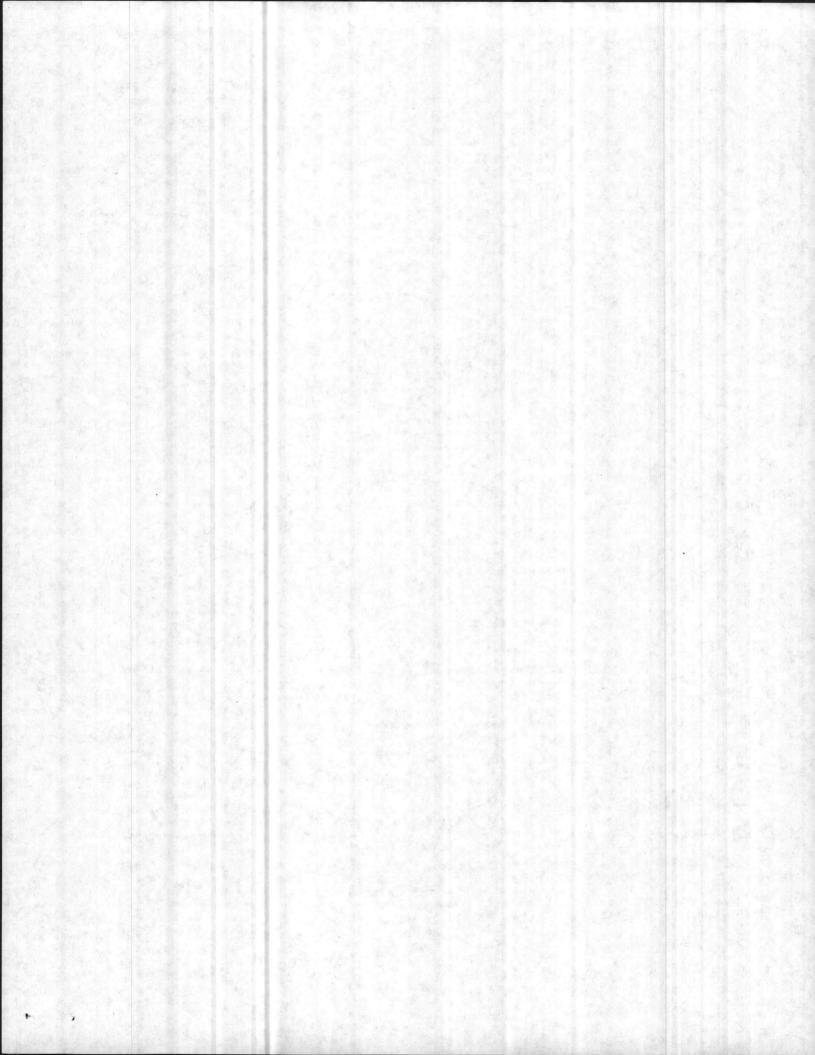
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Fuel tank Ms and of OX14532 Jun 85 CALL MAING
Stocked in spectric
TANKS 4 & 5 Demo.



COMM NOTE CORRECTED TON

MESSAGE CORNECTES TO

S-1 S-3 5-4 COMP DAAC

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ASO NAVY SJA

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ROUTINE

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FM CG MCB CAMP LEJEUNE NO

TO LANTNAVFACENGOUM NURFOLK VA

INFO MCAS HINEW RIVER NO

31 JNCLAS //N06280//

SUBJ: CONTRACT 81-0-3849, INSPECTION AND TESTING OF POL TANKS AT MCAS H, NEW RIVER, REQUEST FOR FIELD INVESTIGATION

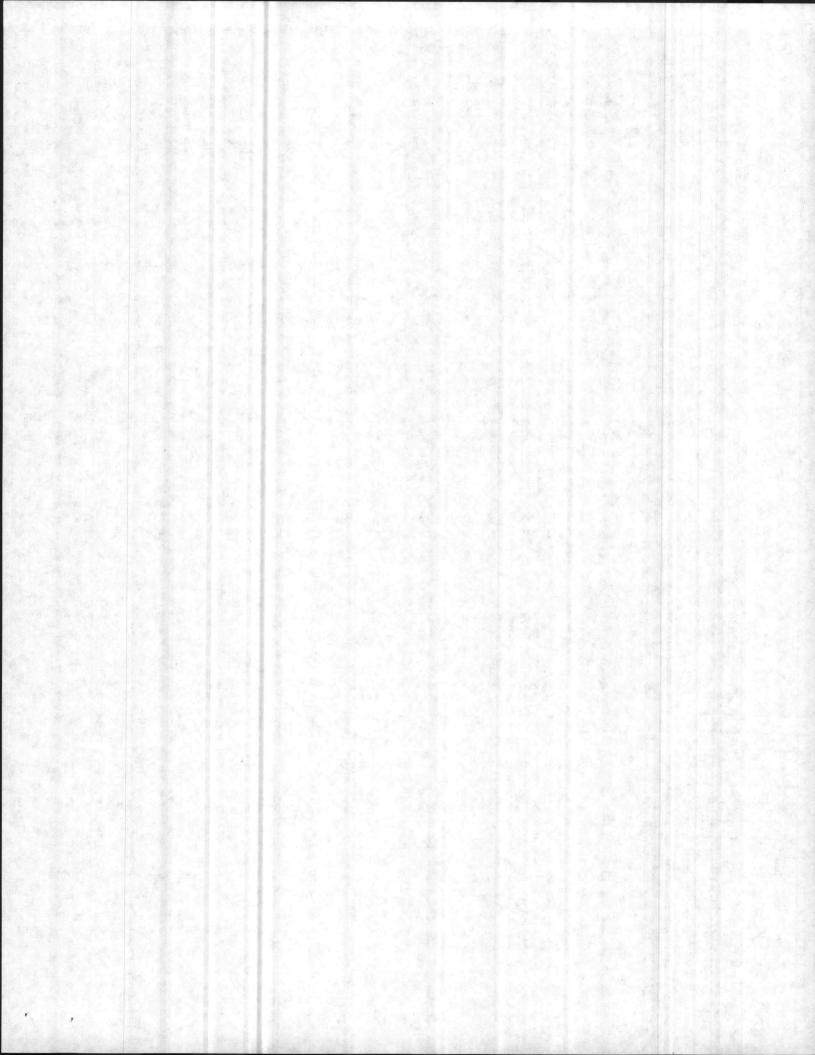
"CONFIRMATION STUDY TO DETERMINE EXISTENCE AND POSSIBLE AIGRATIUN OF SPECIFIC CHEMICALS IN SITU", ENVIRUNMENTAL SCIENCE IND ENGINEERING, GAINESVILLE, FL., JANUARY 1985 (NOTAL) CG MCB 221534Z APR 85

REF (A) PROVIDED DATA FROM THE FIRST ROUND OF SAMPLE COLLECTION IND ANALYSIS AT THE 22 NACIP SITES BEING STUDIED FOR HAZARDUUS MATERIAL CONTAMINATION. THE CAMPBELL STREET FUEL FARM AT MCAS H, IEW RIVER WAS SELECTED AS ONE OF THE 22 SITES DUE TUTTHE RECURRENT 'UEL SEEPAGE VIA GRUUNDWATER INTO SURFACE AND SUBSURFACE DRAINAGE. REF (A) INDICATED THAT UIL AND GREASE WAS DETECTED IN THE GROUND-MATER MONITORING WELLS BUT DID NOT DETECT VOLATILE FUEL COMPONENTS. JECOND ROUND OF NACIP SAMPLING OF THE GROUNDWATER TABLE HAS BEEN ICHEDULED TO CONFIRM THE EXTENT OF CONTAMINATION.

- THIS MSG FOLLOWS REF B REGARDING SIMILAR SITUATION AT THE MCB IAIN FUEL FARM AND REQUESTS ENGINEERING ASSISTANCE AT THE MCAS H 'UEL FARM AS DESCRIBED HEREIN.
- RECENT INSPECTION OF THE PHYSICAL CONDITION OF THE 105,000 FALLON JP-5 UNDERGROUND TANK WAS PERFURMED IN MARCH DURING ROUTINE 'AINTENANCE. THE PRESENCE UF PITTING AND HOLES WERE DISCUVERED IN 'HIS TANK WHICH INDICATES LEAKAGE OF FUEL HAS OCCURRED.
- INSPECTION AND TESTING OF THE MCAS H FUEL FARM IS NECESSARY TO ONFIRM THE SIGNIFICANCE OF THE LEAKS AND TO DEVELOP A SCOPE OF WORK OR CORRECTIVE ACTION.

LVR: MCAS NEW R VER NC(8) ... INFO 941202 4942/15 SN: RNRS0105

161/20:00Z CG MCB CAMP LEJEUNE NC

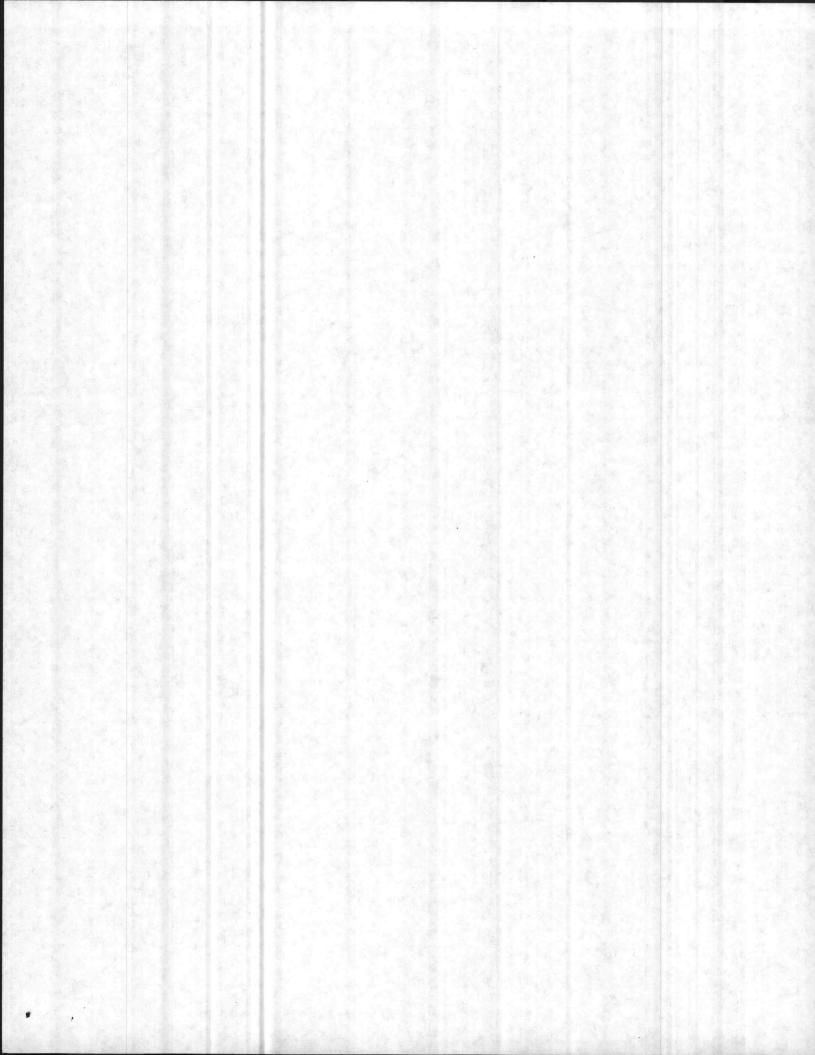


A: FIELD INVESTIGATION BY THE A/E IS REQUESTED UNDER THE SUBJECT CONTRACT AS SOON AS ARRANGEMENTS CAN BE COMPLETED.

PCC IS T. H. HANKINS JR, PW MECH ENG. AV 484-3738.

BT

941202/4942/155 2 UF 2 M1 0109 161/20:00Z 0414532 JUN 85 :RNRS0105 CG MCB CAMP LEJEUNE NC



PETER PETOBREDO BYON MMCO

MESSAGE CORNECTED TERMINATE

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CG MCB CAMP LEJEUNE NO

LANTHAVFACENGOUM NURFOLK VA

FU MCAS HINEW RIVER NO

CLAS //N06280//

3J: CONTRACT 81-0-3849, INSPECTION AND TESTING OF POL TANKS MCAS H, NEW RIVER, REQUEST FOR FIELD INVESTIGATION

"CONFIRMATION STUDY TO DETERMINE EXISTENCE AND PUSSIBLE SRATIUN OF SPECIFIC CHEMICALS IN SITU", ENVIRUNMENTAL SCIENCE) ENGINEERING, GAINESVILLE, FL., JANUARY 1985 (NOTAL) CG MCB 2215342 APR 85

REF (A) PROVIDED DATA FROM THE FIRST ROUND OF SAMPLE COLLECTION ANALYSIS AT THE 22 NACIP SITES BEENG STUDIED FOR HAZARDUUS TERIAL CONTAMINATION. THE CAMPBELL STREET FUEL FARM AT MCAS H, A RIVER WAS SELECTED AS ONE OF THE 22 SITES DUE TUTHE RECURRENT EL SEEPAGE VIA GRUUNDWATER INTO SURFACE AND SUBSURFACE DRAINAGE. F (A) INDICATED THAT UIL AND GREASE WAS DETECTED IN THE GROUND-TER MONITORING WELLS BUT DID NOT DETECT VOLATILE FUEL COMPONENTS. TOND ROUND OF NACIP SAMPLING OF THE GROUNDWATER TABLE HAS BEEN HEDULED TO CONFIRM THE EXTENT OF CONTAMINATION.

THIS MSG FOLLOWS REF B REGARDING SIMILAR SITUATION AT THE MCB IN FUEL FARM AND REQUESTS ENGINEERING ASSISTANCE AT THE MCAS H EL FARM AS DESCRIBED HEREIN.

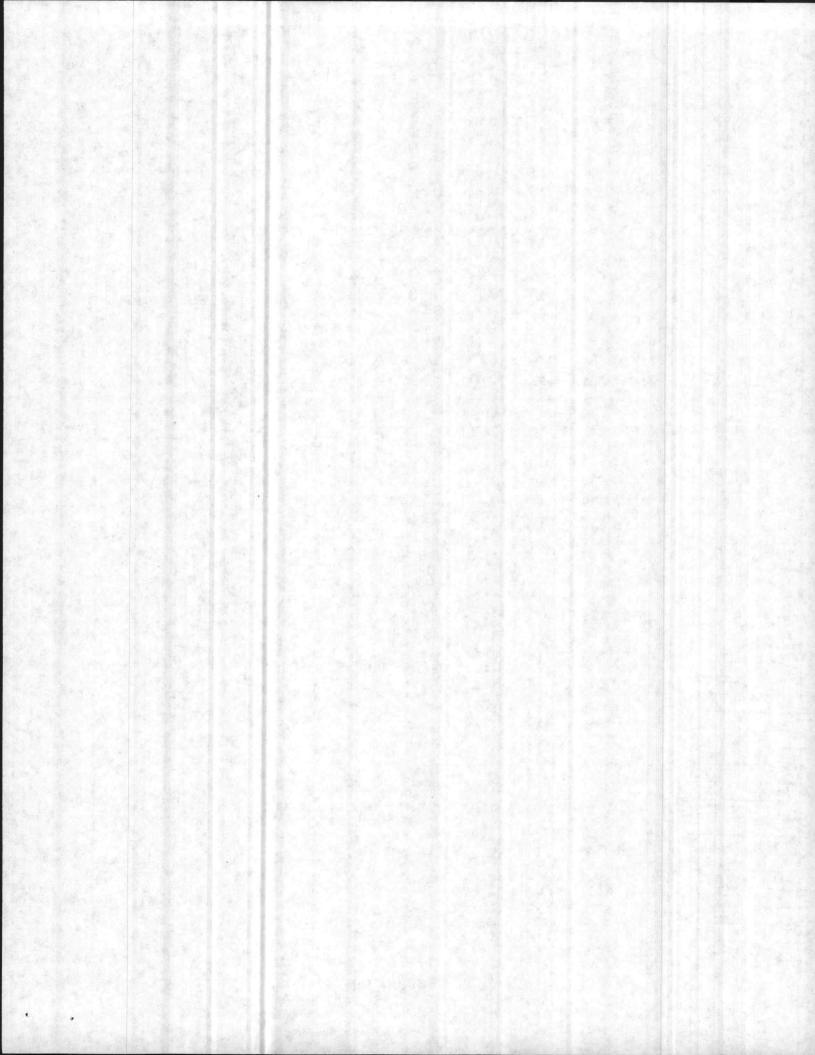
RECENT INSPECTION OF THE PHYSICAL CONDITION OF THE 105,000 -LON JP-5 UNDERGROUND TANK WAS PERFURMED IN MARCH DURING ROUTINE INTENANCE. THE PRESENCE UF PITTING AND HOLES WERE DISCUVERED IN IS TANK WHICH INDICATES LEAKAGE OF FUEL HAS OCCURRED.

INSPECTION AND TESTING OF THE MCAS H FUEL FARM IS NECESSARY TO VEIRM THE SIGNIFICANCE OF THE LEAKS AND TO DEVELOP A SCOPE OF WORK ? CORRECTIVE ACTION.

NEW RIVER NC(8) 19:MCA 941202 1: RNRS0105

161/20:0UZ

CG MCB CAMP LEJEUNE

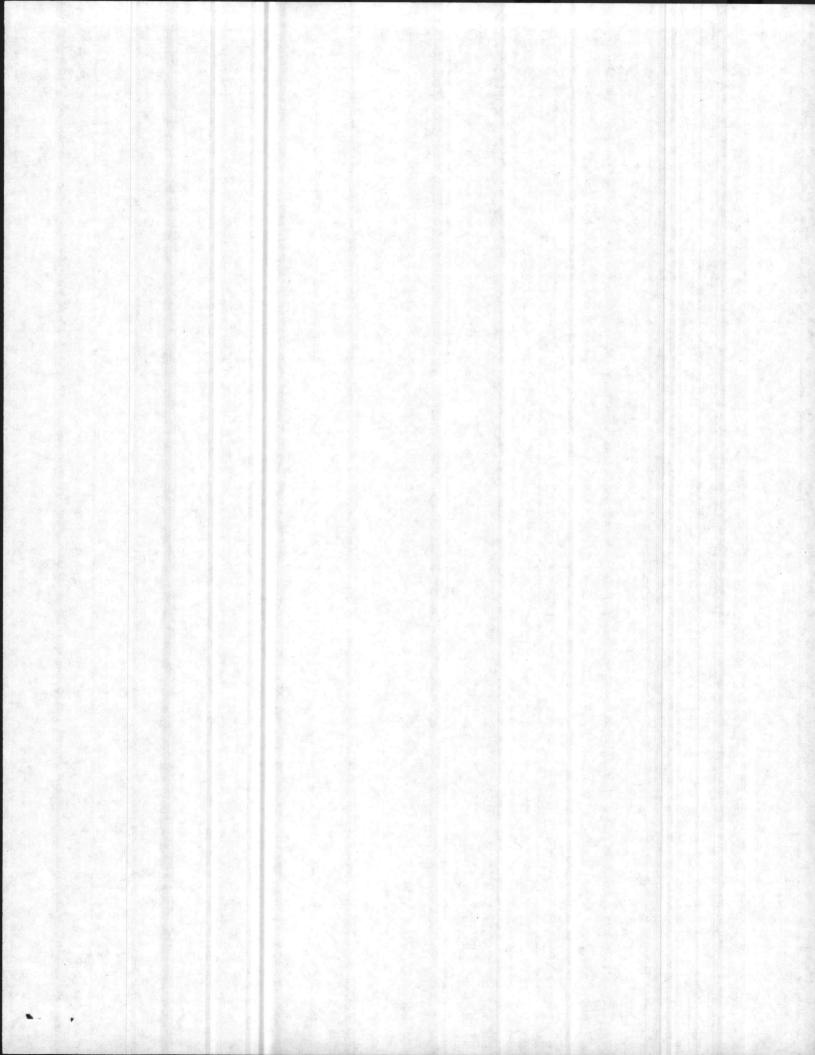


4. FIELD INVESTIGATION BY THE AZE IS RÉQUESTED UNDER THE SUBJECT DUNTRACT AS SOON AS ARRANGEMENTS CAN BE COMPLETED.

PLC IS T. H. HANKINS JR, PW MECH ENG, AV 484-3738.

3 T

941202/4942/155 2 OF 2 M1 0109 161/20:00Z 041453Z JUN 85 :RNRS0105 CG MCB CAMP LEJEUNE NC



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M CG MCB CAMP LEJEUNE NC

O LANTNAVFACENGOUM NURFOLK VA

NFO MCAS HINEW RIVER NC

NCLAS //N06280//

REMARKS:

FAC OPS

AVNORD

SAFETY

S-4 CHIEF

ACTION DATE

COMMISSARY

UBJ: CONTRACT 81-0-3849, INSPECTION AND TESTING OF POL TANKS T MCAS H, NEW RIVER, REQUEST FOR FIELD INVESTIGATION

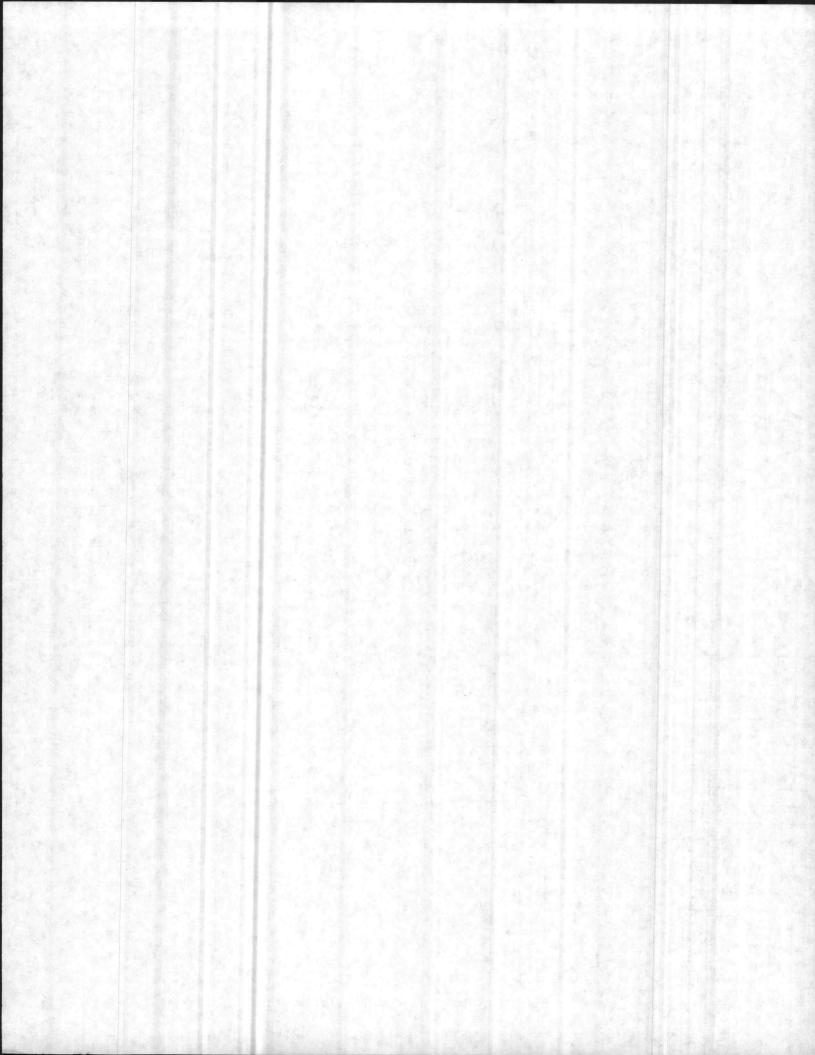
- "CONFIRMATION STUDY TO DETERMINE EXISTENCE AND POSSIBLE IGRATION OF SPECIFIC CHEMICALS IN SITU", ENVIRONMENTAL SCIENCE ND ENGINEERING, GAINESVILLE, FL., JANUARY 1985 (NOTAL) CG MCB 221534Z APR 85
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_VR:MCAS H NEW RIVER NC(8) ... INFO

RTD:000-000/CUPIES:0008

941202/4942/155 1 UF 2 M1 0109 161/20:00Z 0414532 JUN 85 3N: RNRS0105 CG MCB CAMP LEJEUNE NC

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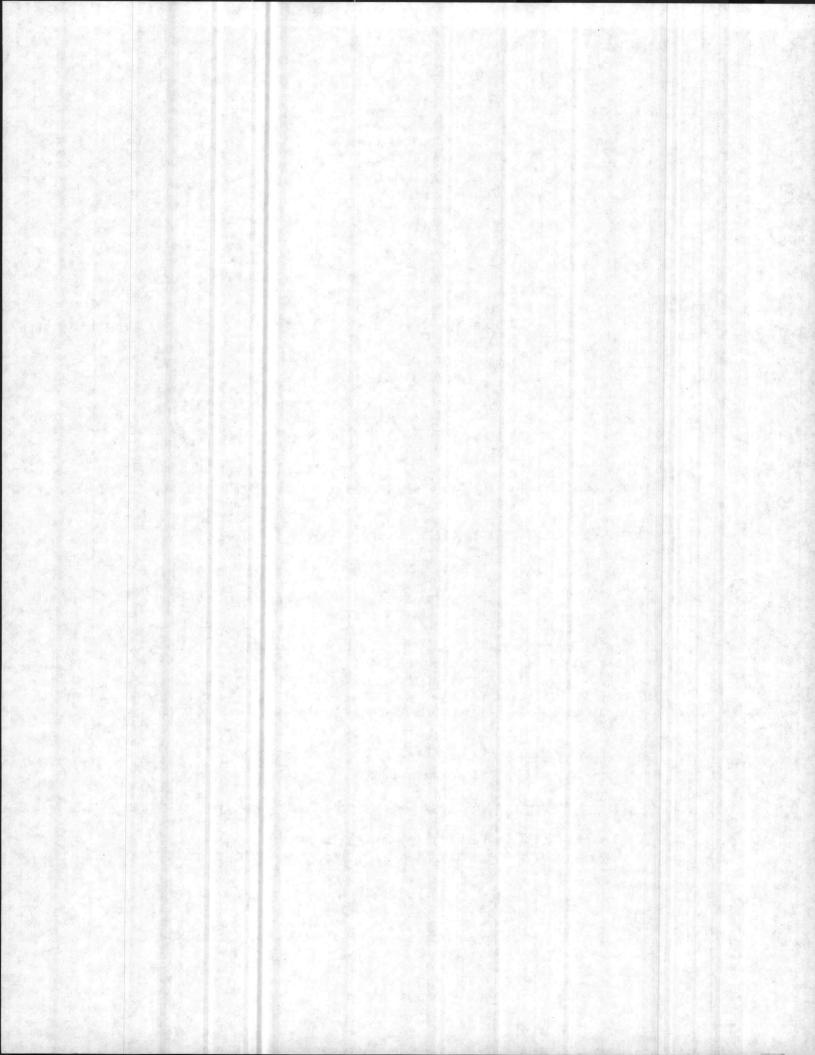
From: Base Maintenance Officer, Marine Corps Base, Camp Lejeune To: Public Works Officer, Marine Corps Base, Camp Lejeune

Subj: ENGINEERING SERVICE REQUEST FOR MCAS (H) NEW RIVER FUEL FARM

- 1. It is requested that an urgent ESR be provided to study the fuel tank pitting problem at MCAS (H), New River and provide recommended solutions and cost estimates.
- a. Problem The number six underground JP-5 fuel tank (capacity 105,000 gallons) was installed in 1952. Exterior pitting is appearing in the lower seven foot portion of the 15 foot wall of the tank. Pitting or leaks in other sections of the tank have not appeared but conditions are unknown. The condition of the other underground tanks in the fuel farm is also unknown.
 - b. Possible Solutions to Consider
 - (1) Complete replacement of the tanks.
- (2) Excavating and welding a seven foot band of metal around the number six tank.
- (3) Procuring a contract to construct an epoxy/fiberglass tank on the inside of the existing tank.
 - (4) Sonic testing of the remaining tanks.
- 2. Point of contact is Jesse Sellers 451-1580.

J. L. SELLERS By direction

CO, MCAS(H) (Atin: S-4)





UNITED STATES MARINE CORPS

Marine Corps Base Camp Lejeune, North Carolina 28542

IN REPLY REFER TO FAC/MGL/nh

6280 89 FEB 1984

From:

Commanding General

To:

Commanding Officer, Marine Corps Air Station (Helicopter),

New River, Jacksonville, North Carolina 28545

(Attn: S-4)

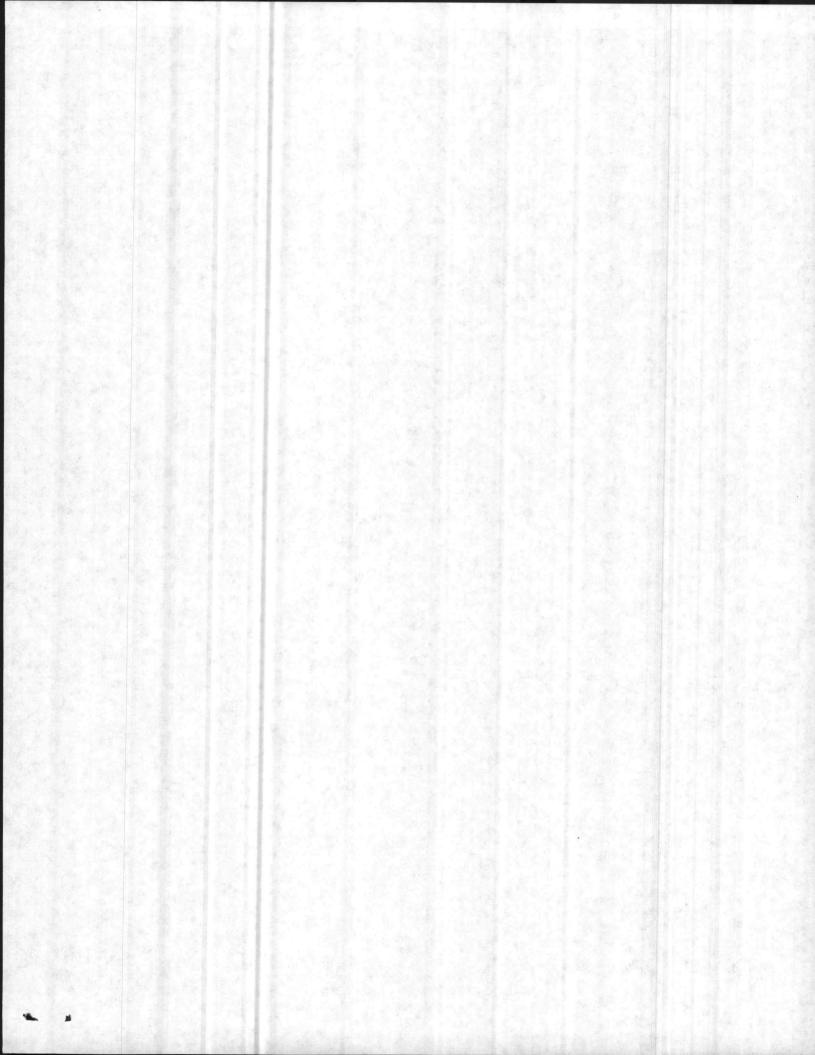
Subj: Fuel Oil Leakage

(1) CO, NAVFACENGCOM ltr 114:PBP:pkk 5090 dtd 17 Feb 84 Encl:

The enclosure is forwarded for your information.

M. G. LILLEY By direction

Chitic Property (early farm)



(804) 444-9559

IN REPULLER

114:PBP:pkk 5090

1 7 FEB 1984

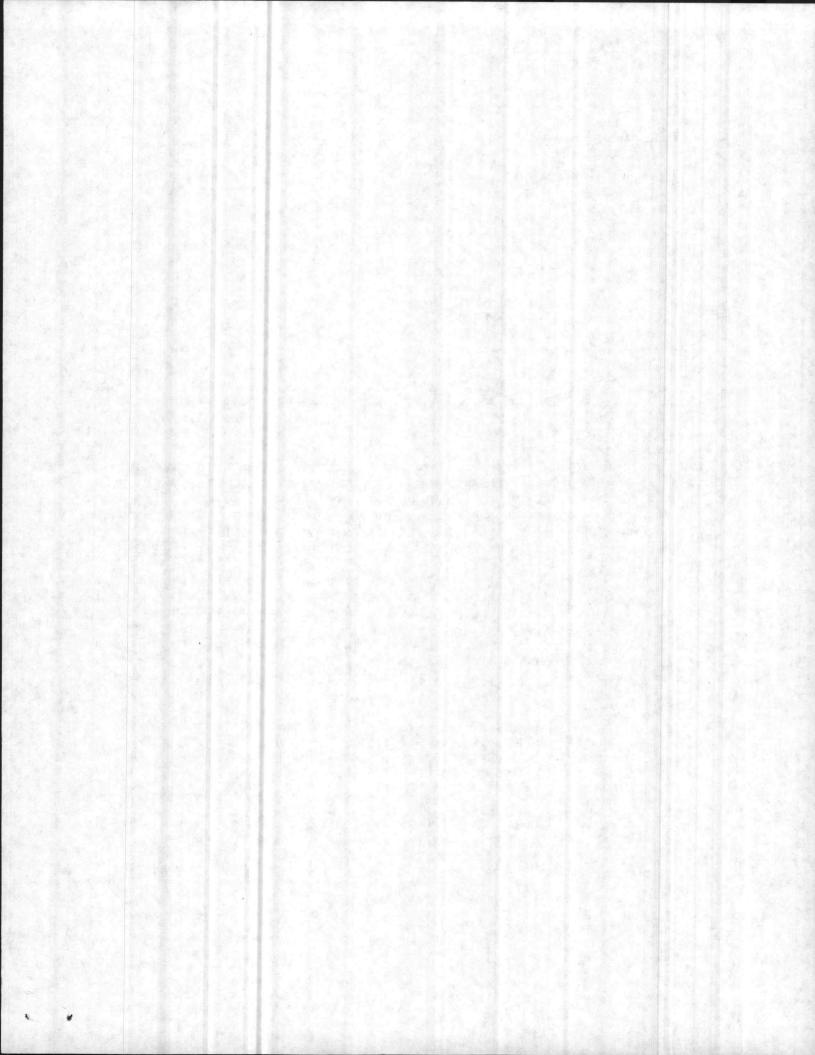
Commander, Atlantic Division, Naval Facilities Engineering Command

Commanding General, Marine Corps Base, Camp Lejeune To:

Subj: Fuel Oil Leakage

- (a) MCB CAMP LEJEUNE ltr PWO:04:ELR:sj of 3 Jan 1984
 - (b) Soil and Material Engineers, Incorporated Report dated 7 Dec 1983
 - (c) Initial Assessment Study of MCB CAMP LEJEUNE dated **April 1983**
- 1. Reference (a) requested that, based on reference (b), a study be conducted to determine the location and quantity of fuel in the ground, and to determine contaminant cleanup methods/costs.
- 2. This work will be accomplished by the NACIP Confirmation Study contractor. Award is anticipated in February 1984. It is also anticipated that the contractor will be on site 45 days after award of the contract.
- Reference (c) is the Initial Assessment Study which states that Site 45 (Campbell Street Underground Avgas Storage and adjacent JP Fuel Farm) is a potential migration and groundwater problem. The confirmation work includes three wells to be drilled and sampled for lead, oil and grease and volatile organics, plus 30 holes to be hand augured and visually observed for evidence of POL. This Office will direct the contractor to the specific area outlined reference (b).
- 4. If there are any questions on the above, please contact Mr. J. G. Wallmeyer Code 114 of this Command at AUTOVON 564-9566 or (804) 444-9566.

By direction



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I Atlanted no formaded for your

2. See Cel lilley's Concurrence on for 3 of the memo. We need to the this project by the members.

Told Lt. Col Welch (MCLB, Albany),

we would not need into the project.

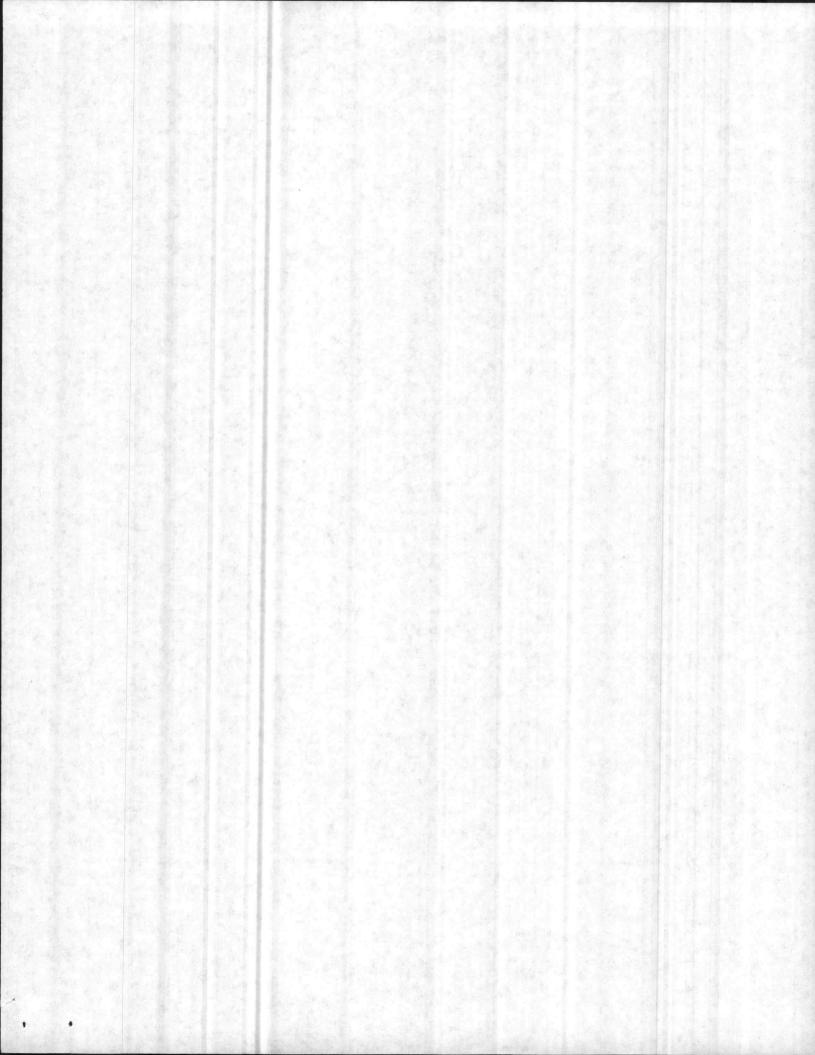
3. Coordinate up my Altandar if your need to.

27. Col. fitzgrald Dep ACIS, facilities

Chang/

3. In the event that a test is approved a the contractor should be required to provi vention, control and countermeasures plan, the contractor proposes to prevent spills and dispose of residues from any spills wh the test.

4. It should be noted that clean-up of a expensive if it reached water or soaked in otherwise provided, Marine Corps Base woul cost and provide required personnel and eq



NATURAL RESOURCES AND ENVIRONMENTAL AFFAIRS DIVISION Marine Corps Base

Camp Lejeune, North Carolina 28542

NREAD/DDS/jc 11000

JAN 2 7 1984

Director From:

Assistant Chief of Staff, Facilities To:

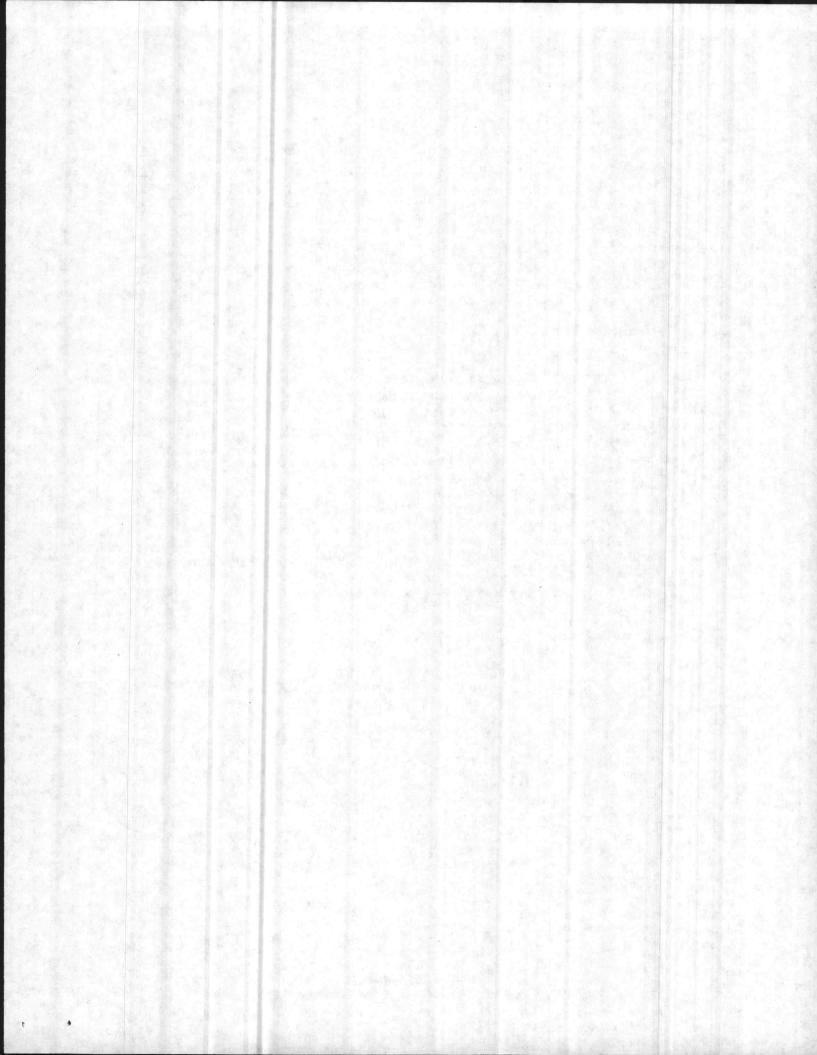
Subj: Proposed Fuel Storage and Storage Bladder Overload Test

- Ref: (a) BO 11000.1A
 - (b) MCO 6280.5
 - (c) FONCON btwn Mr. ACOSTA, Station S-4 Office MCAS(H) and Mr. Danny SHARPE, NREAD on 26 Jan 1984

(1) EnvEngineer Memo dated 24 Jan 1984

(2) EnvEngineer Memo dated 24 Jan 1984

- Enclosures (1) and (2) have been reviewed and the following comments are provided.
- There is no specific environmental regulation prohibiting 2. the implementation of the subject action provided appropriate environmental protection measures are provided. References (a) and (b) require an Environmental Assessment (EA) submission to HQMC unless a determination is made that the proposed action meets the definition of a "categorically excluded action" as defined by reference (b). Unless directed otherwise by higher headquarters, the proposed action should not be implemented until a Preliminary Environmental Assessment (PEA) has been reviewed and approved by Chairman of the EIRB. Findings should be made available to official(s) responsible for approving both the action and the site where action is to be implemented. An "after the fact" PEA should not be prepared. To do so would acknowledge a failure to follow required procedures. If a decision to proceed without a PEA is made, it should be assumed that decision maker has determined that references (a) and (b) do not apply.
- In the event that a test is approved aboard the installation, the contractor should be required to provide a written spill prevention, control and countermeasures plan, which specifies how the contractor proposes to prevent spills and contain, clean-up and dispose of residues from any spills which may occur during the test.
- It should be noted that clean-up of a spill could be extremely expensive if it reached water or soaked into the ground. Unless otherwise provided, Marine Corps Base would have to absorb the cost and provide required personnel and equipment.

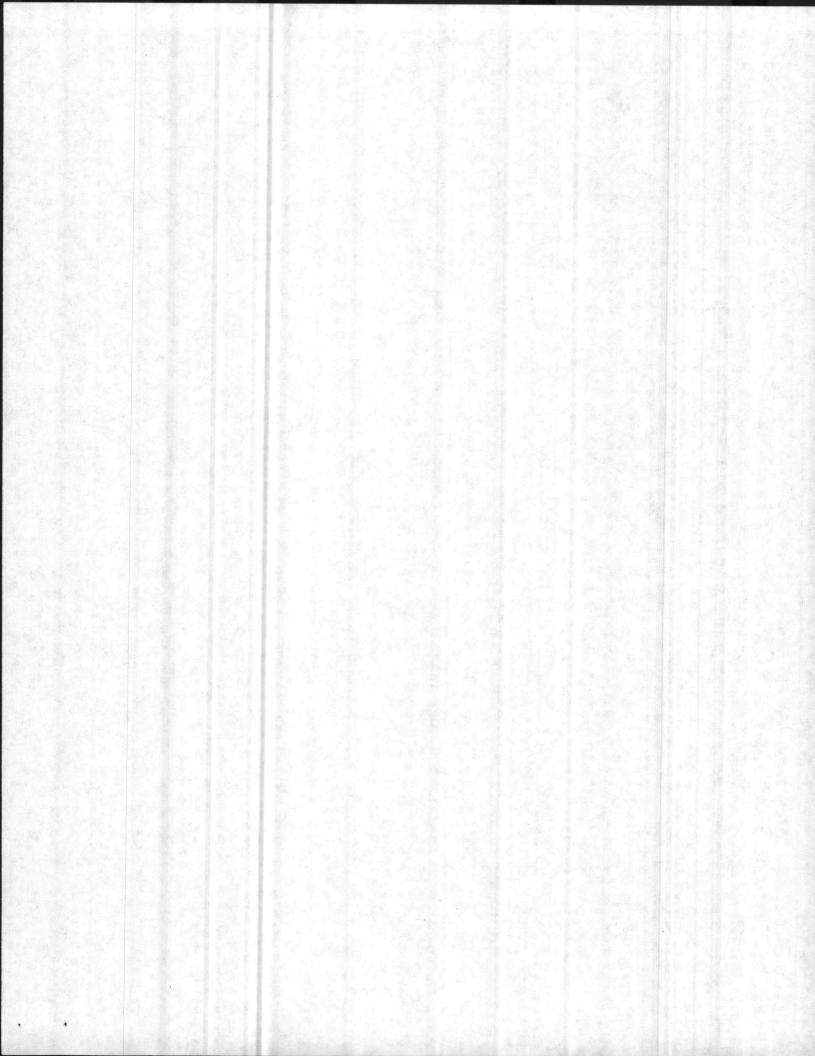


NREAD/DDS/jc 11000

Subj: Proposed Fuel Storage and Storage Bladder Overload Test

5. During reference (c), Mr. Acosta advised that the MCAS(H), New River, preferred that the proposed action be thoroughly reviewed and evaluated prior to implementation.

J. I. WOOTEN



FROM: EAU Engr, AUS FAC, MCB
TO: Fuels Officer, MCAS(N)

SUBJ: Fuel Storage & Tank Overload Test

Ref (a) this bin two field, MISG+ Miller, MCDEC, and
Mr. Wash kowski, Minowitz Manuf., 24 Jan 88

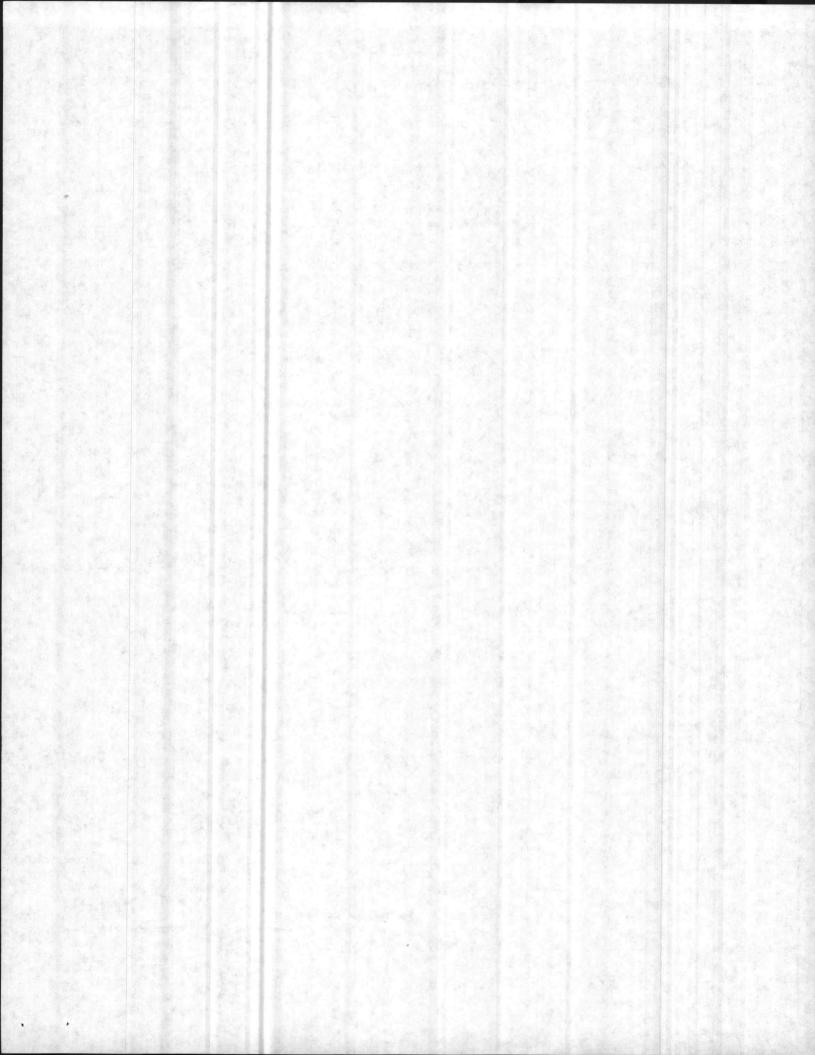
- 1. Per retunts, the site approval request should be forwarded to the CG, MCB, Attn: Ac/s Fac for the proposed test of the bladders.
- 2. Into which should be submitted should include:
 a). Brief description of the test site, dates
 equipment and procedures.
 - b). Poc's for the test including mass (+) for monitoring of installation of deily inspections.
 - c) Spill Aneventum Countrell and Countrermentures

 Plan (in brief) which will describe

 the Quantity of Full, bern liners,

 and spill response procedures per

 B.O. 11090.18. (over)

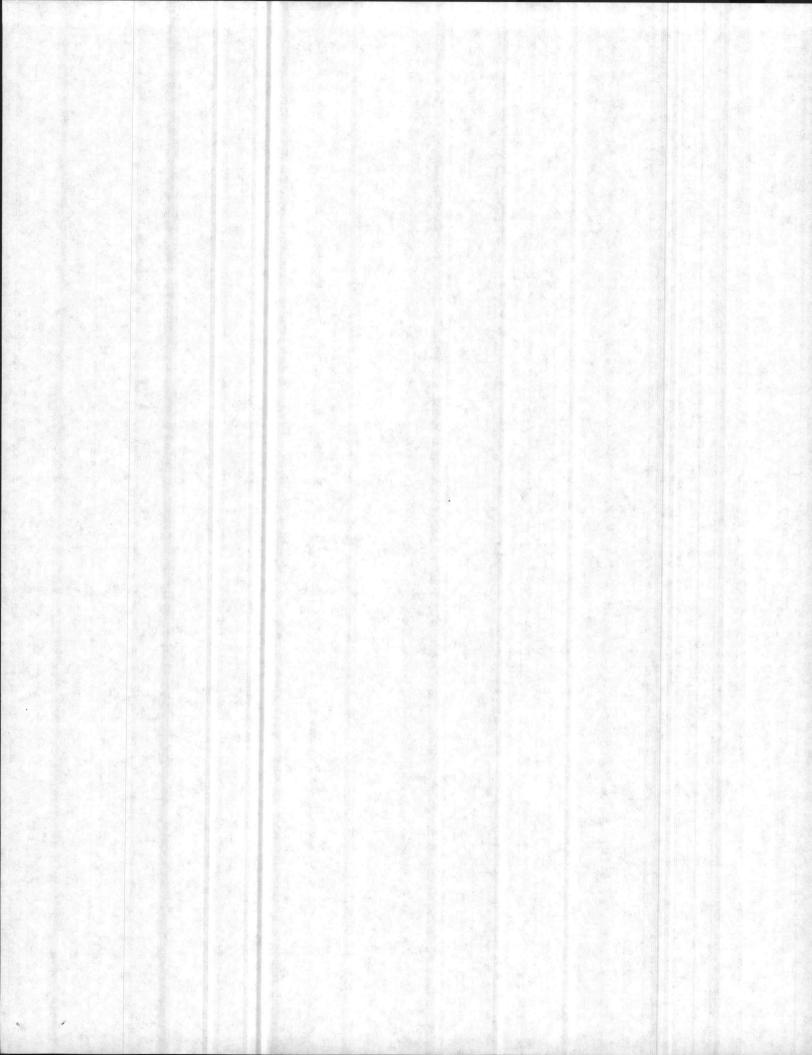


3. Following the request (and prosumely, the approval of the site for the test, a Preliminary Envir. Assess of should be formedled for MCB Envir Impact Review Board Review.

4. Due to the short time frame available
this approval may be given verbally
by Acts Facilities with PEA to follow
(since the contractor is on the scene
& incurring costs already).

Y/R Besterna ect. 3034/5

COPY to: NREAD Environge



DATE: 24 Jun 84

FROM: Env Eng

TO FACO

VIAI DED FACO

Fuel Bladder Test @ MCARCH)

1. Per mtg as describ on the enclosure, a CMC msg is "on the way" to co, meas(w) comeabout requesting. permission to set up a TAFOS-style equipment test.

I advised the meas fuels officer to come to MCB for approval per the attached memo, since they wanted to start work tomorrow", etc.

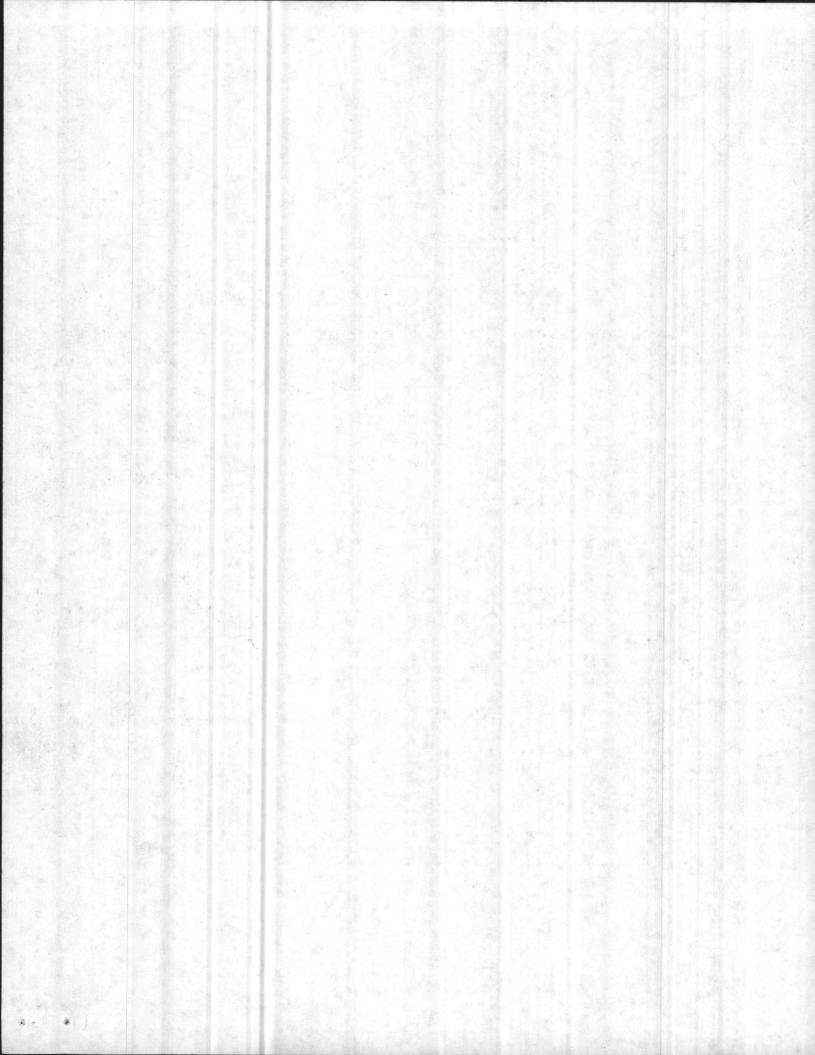
I will return from mic LEAVE Friday a.m.,

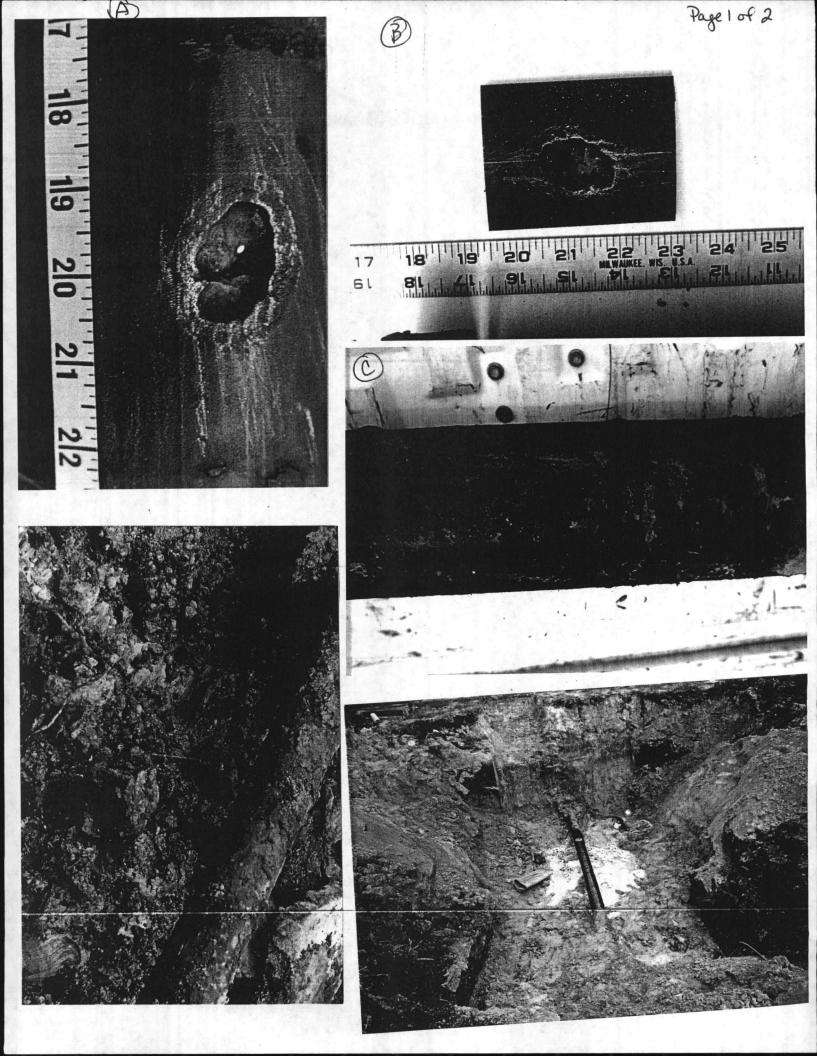
the meas request may not arrive until

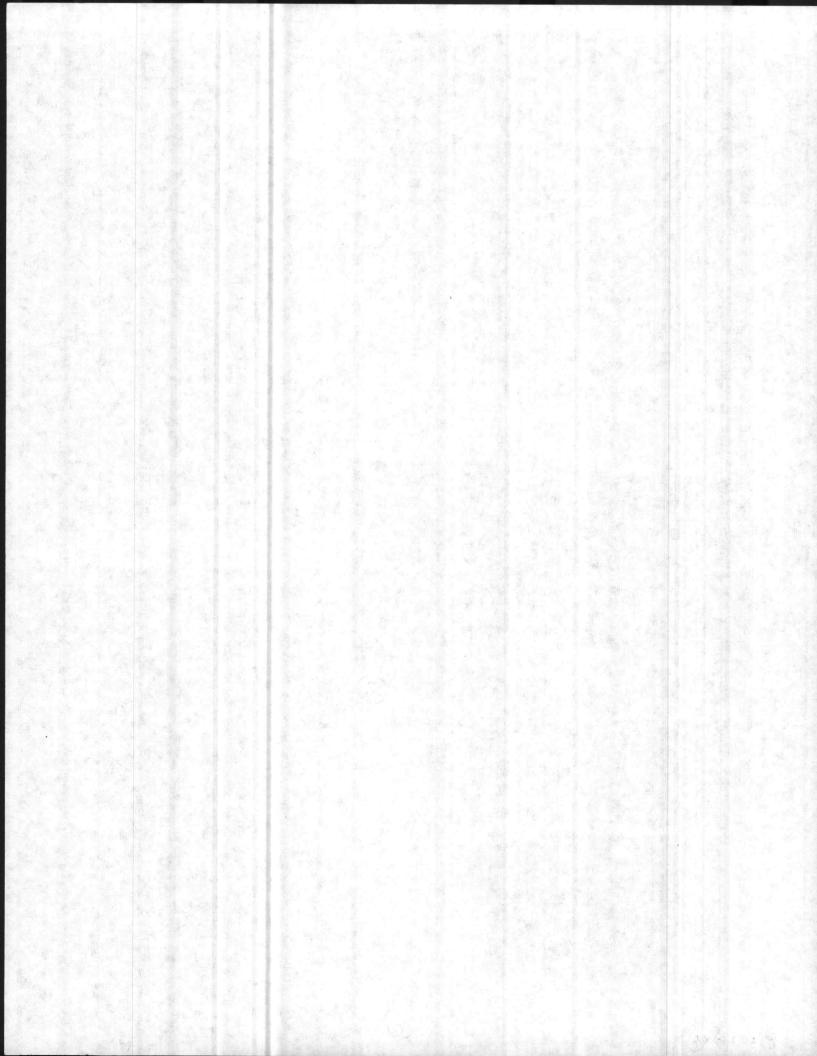
then. It it should, this info covers

what I advised them.

Y/R Aly



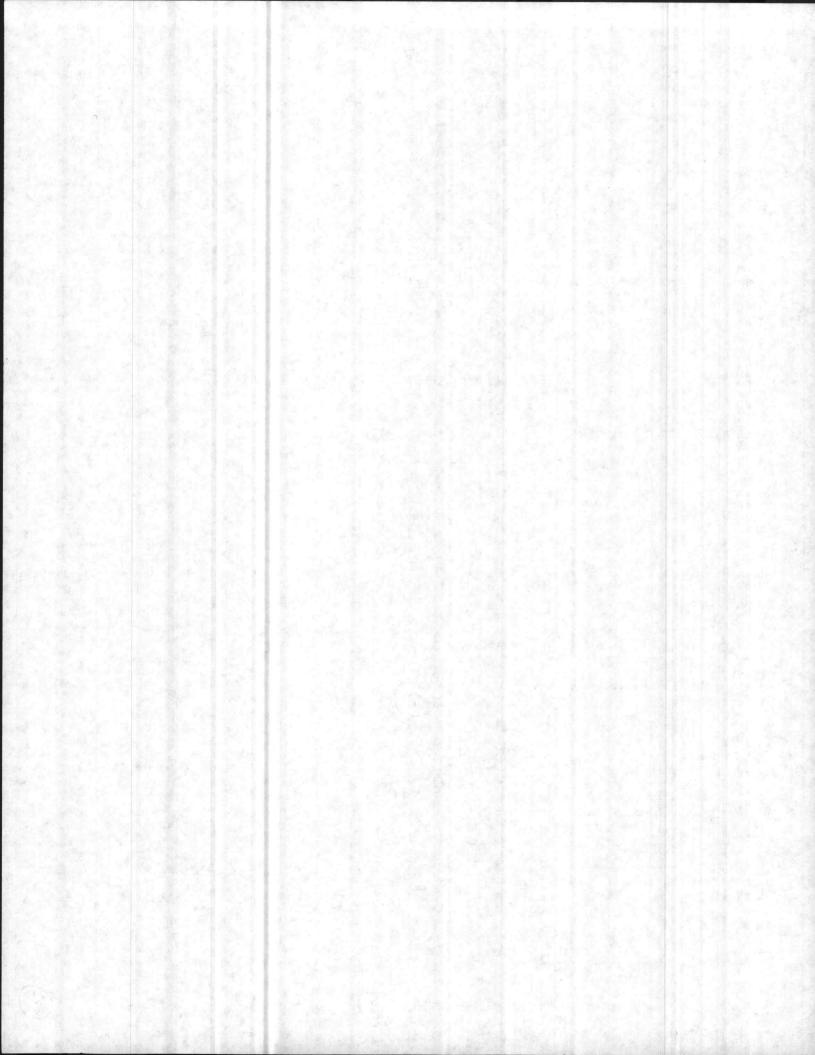




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B 20 = 10 +29





UNITED STATES MARINE CORPS MARINE CORPS BASE CAMP LEJEUNE, NORTH CAROLINA 28542

PWO:04:ELR:sj 11000 3 JAN 1984

From: Commanding General

Commander, Atlantic Division, Naval Facilities Engineering Command, To:

Norfolk, Virginia 23511

Subj: Fuel Oil Leakage

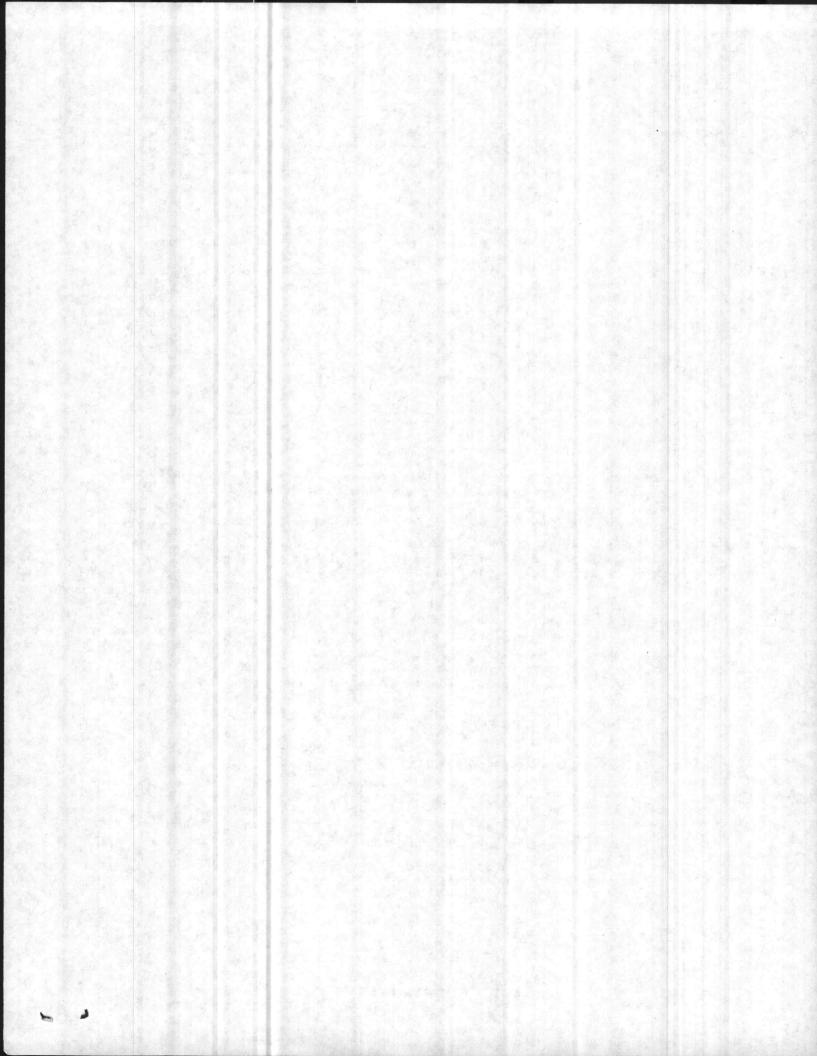
(a) FONECON bwtn Mr. Bailey, LANTDIV (Code 11) and Mr. Rouse, MCB, Camp Lejeune, NC on 13 Dec 1983

Encl: (1) Soil and Material Engineers, Inc., Study

- 1. As discussed during the reference, an underground fuel leakage of potentially significant quantities has occurred at Marine Corps Air Station (Helicopter), New River. This leakage is JP-5 aviation fuel pumped from the Fuel Farm to the Aircraft Direct Refueling Station day tanks, a distance of approximately one mile, and from the day tanks to the hydrants. These lines are in the process of being replaced.
- 2. The enclosure is a study conducted under contract N62470-82-C-7816 confirming significant amounts of fuel may exist in the ground. Accordingly, it is requested that a study be made to determine the quantity and location of fuel in the ground, develop any necessary containment procedures, and develop clean-up measures which may be required. It is further requested that a LANTDIV point of contact and milestones be provided. The Camp Lejeune point of contact is Mr. E. Rouse, Autovon 484-2213, or Mr. B. Alexander, Autovon 484-3034.

M. G. LILLEY By direction

Copy to: CMC (Code LFF) -) co, MCAS (H) (W/o encl)



4-Jan 1984

5-44 C

5064 C

5064 C

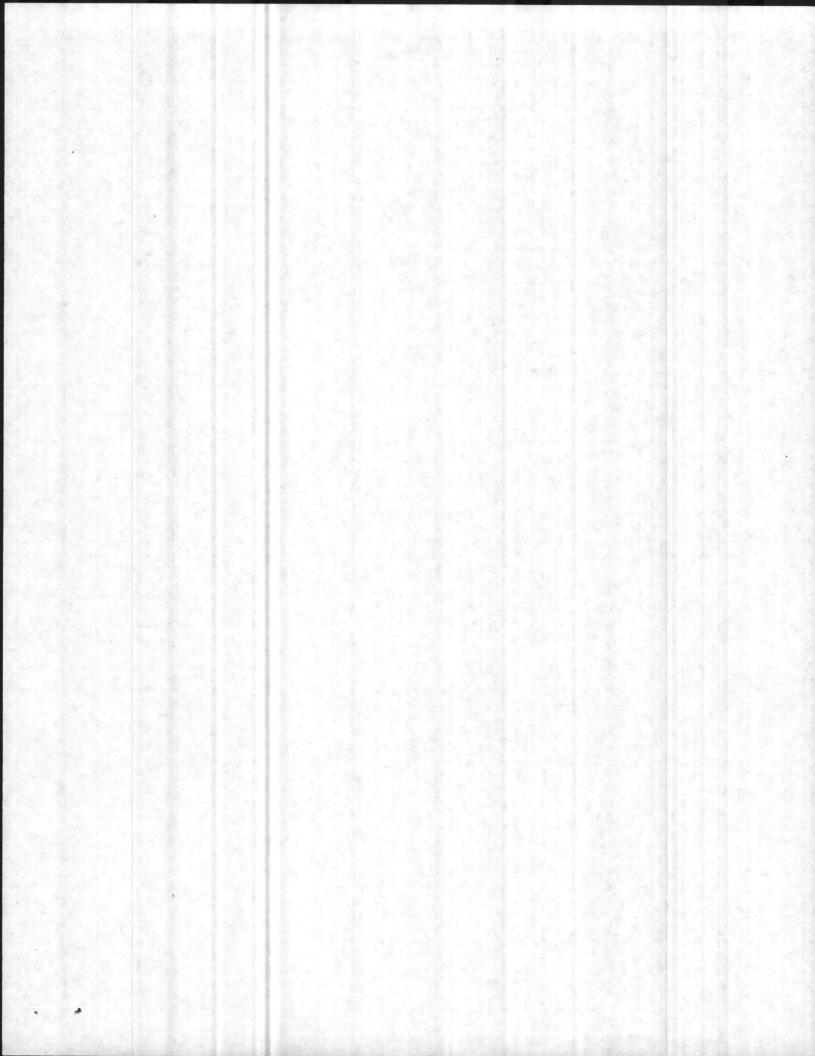
5064 C

5064 C

5066 C

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BASE MAINTENANCE DIVISION

Marine Corps Base Camp Lejeune, North Carolina 28542

> MAIN/RMD/dkm 11000 DCT D 7 1983

B will Comple

Base Maintenance Officer From: To: Public Works Officer

Soil Testing for the Rapid Jet Refueler Area, Marine Corps Air Sub.j:

Station (Helicopter), New River, North Carolina

(a) Soil & Material Engineers, Inc. Report on JP-5 Fuel Line Investigation at Marine Corps Air Station (Helicopter). Contract N62470-81-C-3763

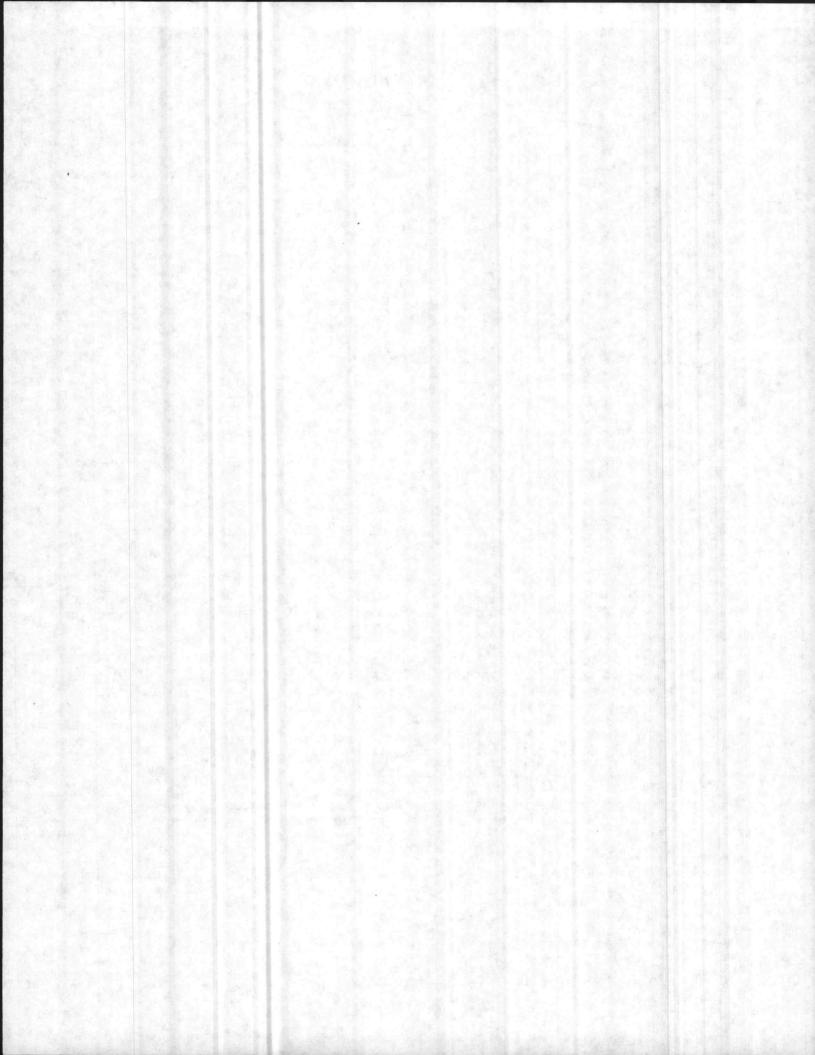
- 1. The reference reported serious fuel leaks in the subject area as determined by pressure testing of lines and soil borings adjacent to the lines. However, sufficient soil boring samples were not taken to determine the total area underground which has been contaminated by leaking fuel.
- 2. It is requested that a change order to the referenced contract be negotiated to perform additional testing by soil boring in order to determine the total area of underground contamination of the soil from fuel leaks.

J. T. MARSHALL

Copy to: CO, MCAS(H)

Mr Acorta required of us.

Art





UNITED STATES MARINE CORPS MARINE CORPS BASE CAMP LEJEUNE, NORTH CAROLINA 28542

IN REPLY REFER TO

PWO:04:ELR:sj

13 SEP 1983

From: Commanding General

To: Commanding Officer, Marine Corps Air Station (Helicopter), New River,

Jacksonville, North Carolina

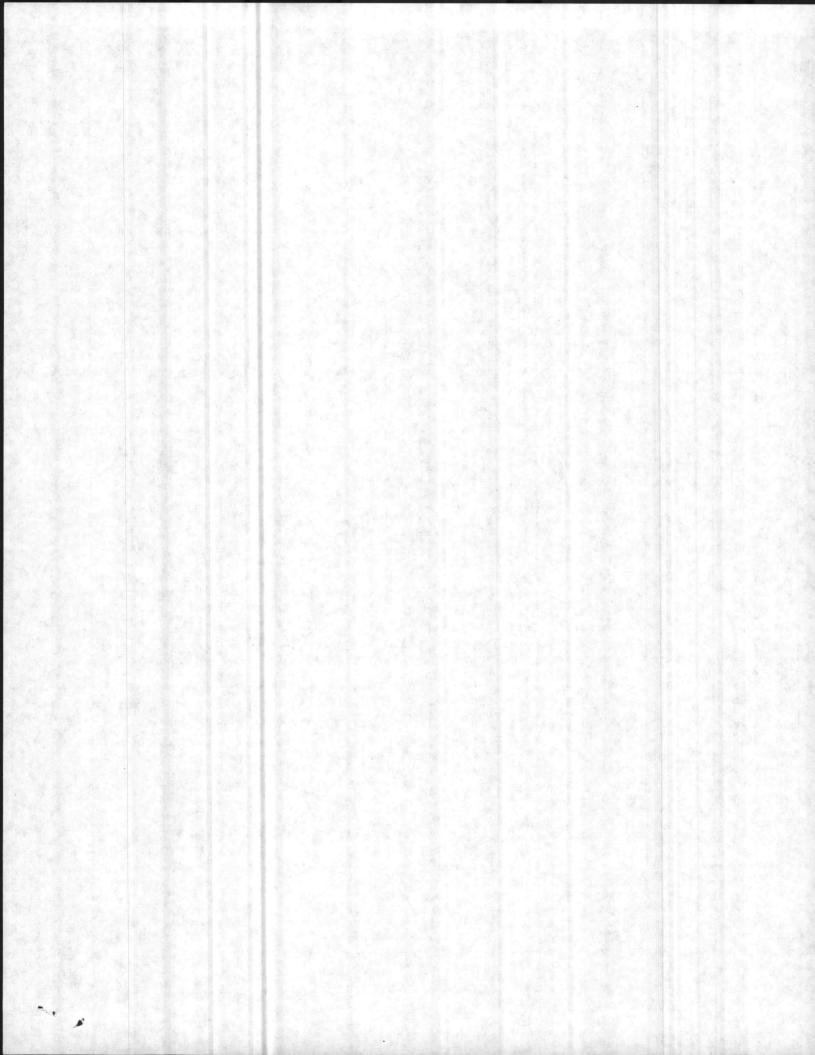
Subj: Aircraft Rapid Refueler Facility

Ref: (a) MCAS(H), New River NC 061901Z SEP 83

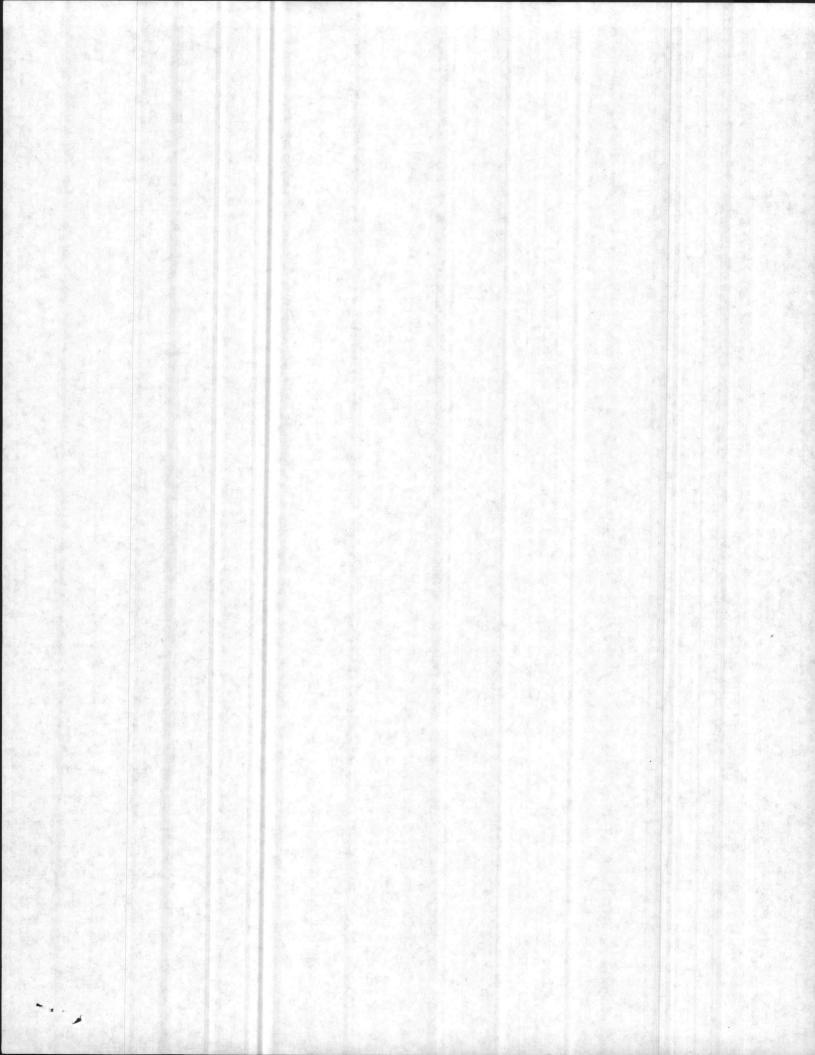
- 1. The reference set forth the status of the subject facility and temporary, expedient measures to continue operations. It further stated a requirement for urgent repairs.
- 2. The Camp Lejeune Public Works Office is designing, under highest priority, a repair to the system from the day tanks to the refueler units. Upon completion of the design, the Officer in Charge of Construction will negotiate a contract to accomplish the repairs. Under this contract the day tanks will be pressure tested for leaks. Should they prove defective, they will be replaced.
- 3. The fuel transfer line from the Fuel Farm to the refueling day tanks is also in need of replacement. This will be designed by A&E contract and accomplished by a Headquarters funded Facilities Project.
- 4. Marine Corps Base, Camp Lejeune, is and will continue to treat this as a high priority item. Every effort is being made to return the Aircraft Rapid Refueling Facility to the condition which will permit it to fulfill its intended purpose.

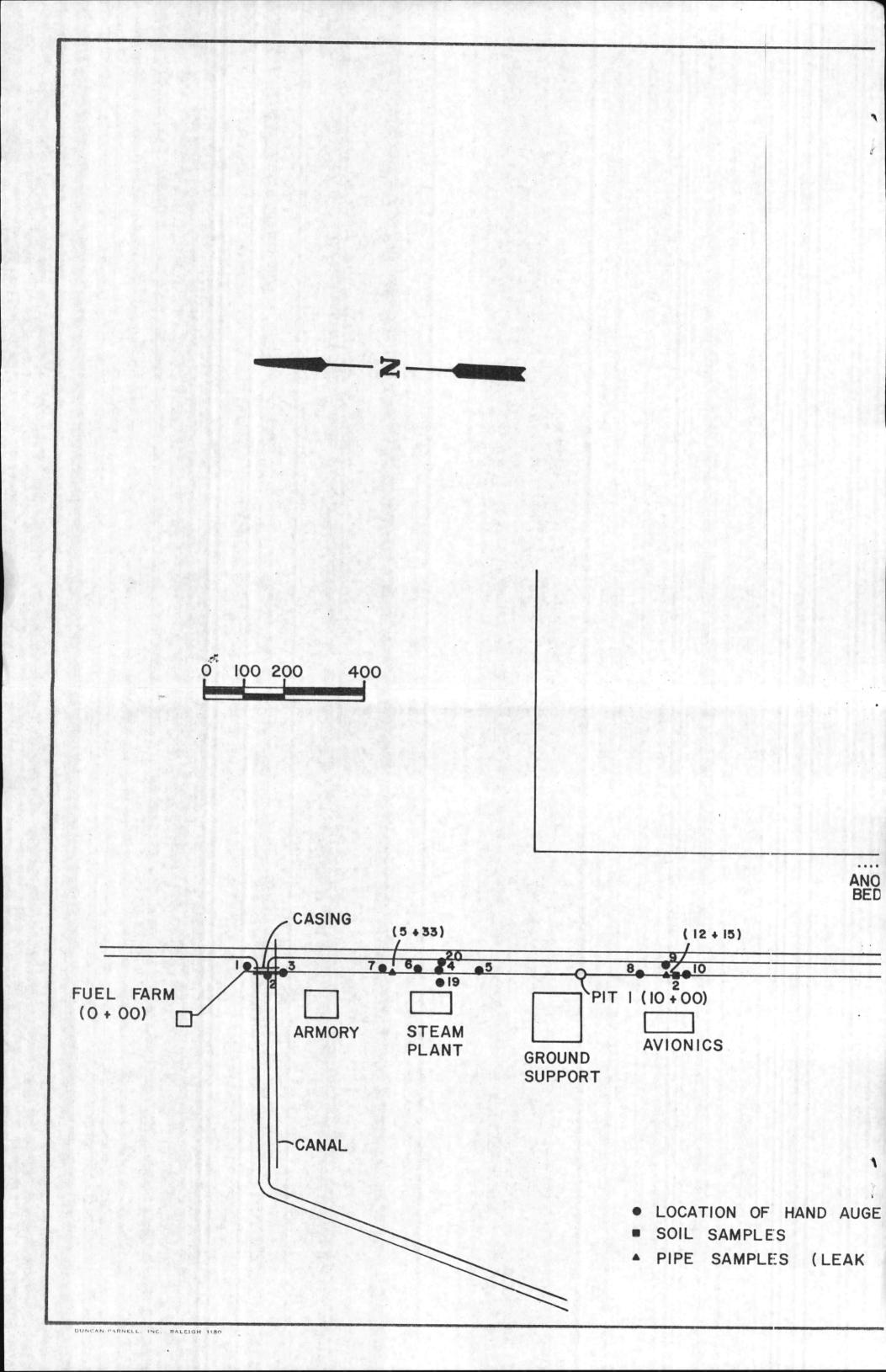
Copy to: CMC (LFF) COMCABEAST CG, 2d MAW

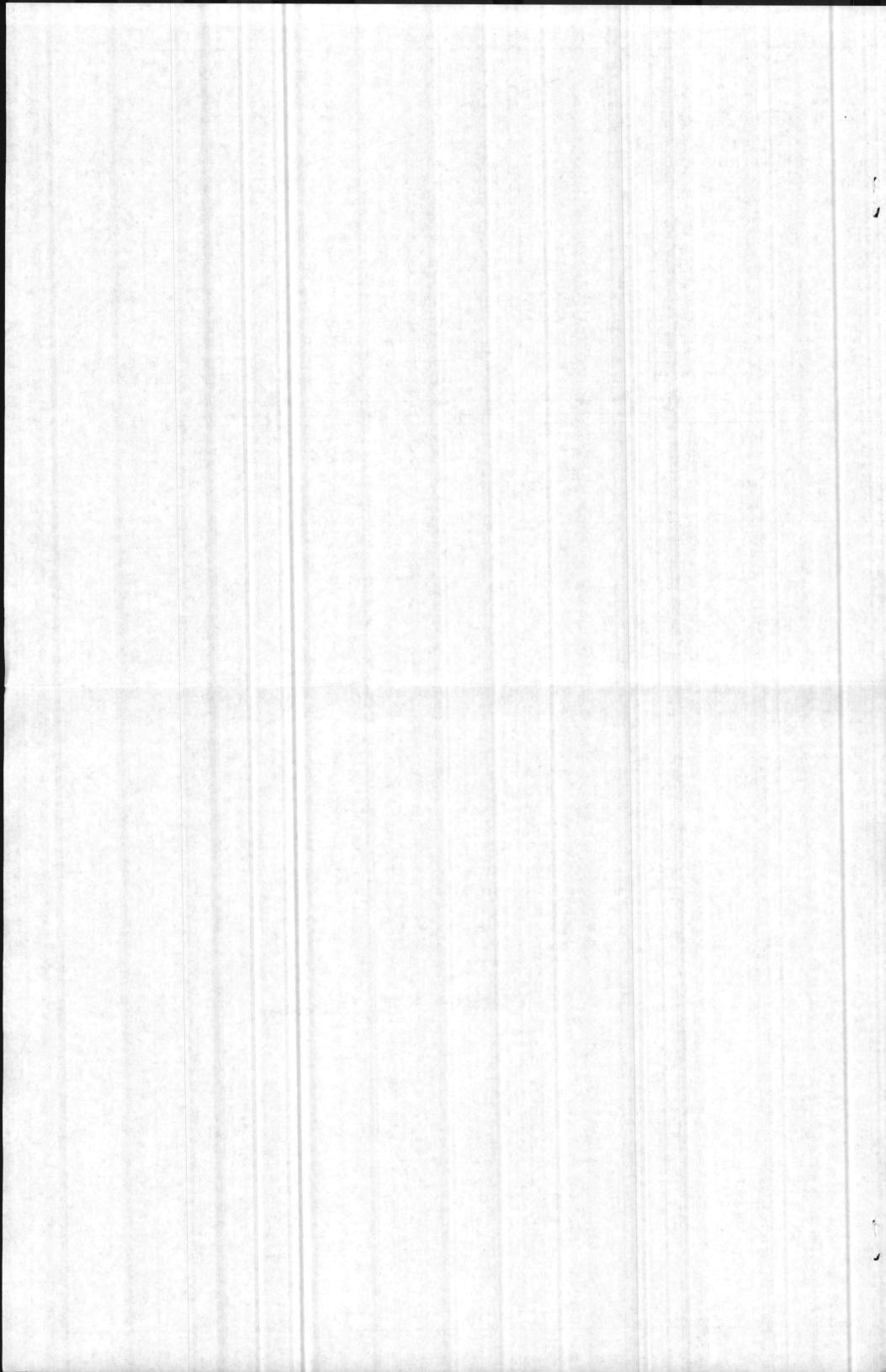
T. M. STOKES, JR. Chief of Staff

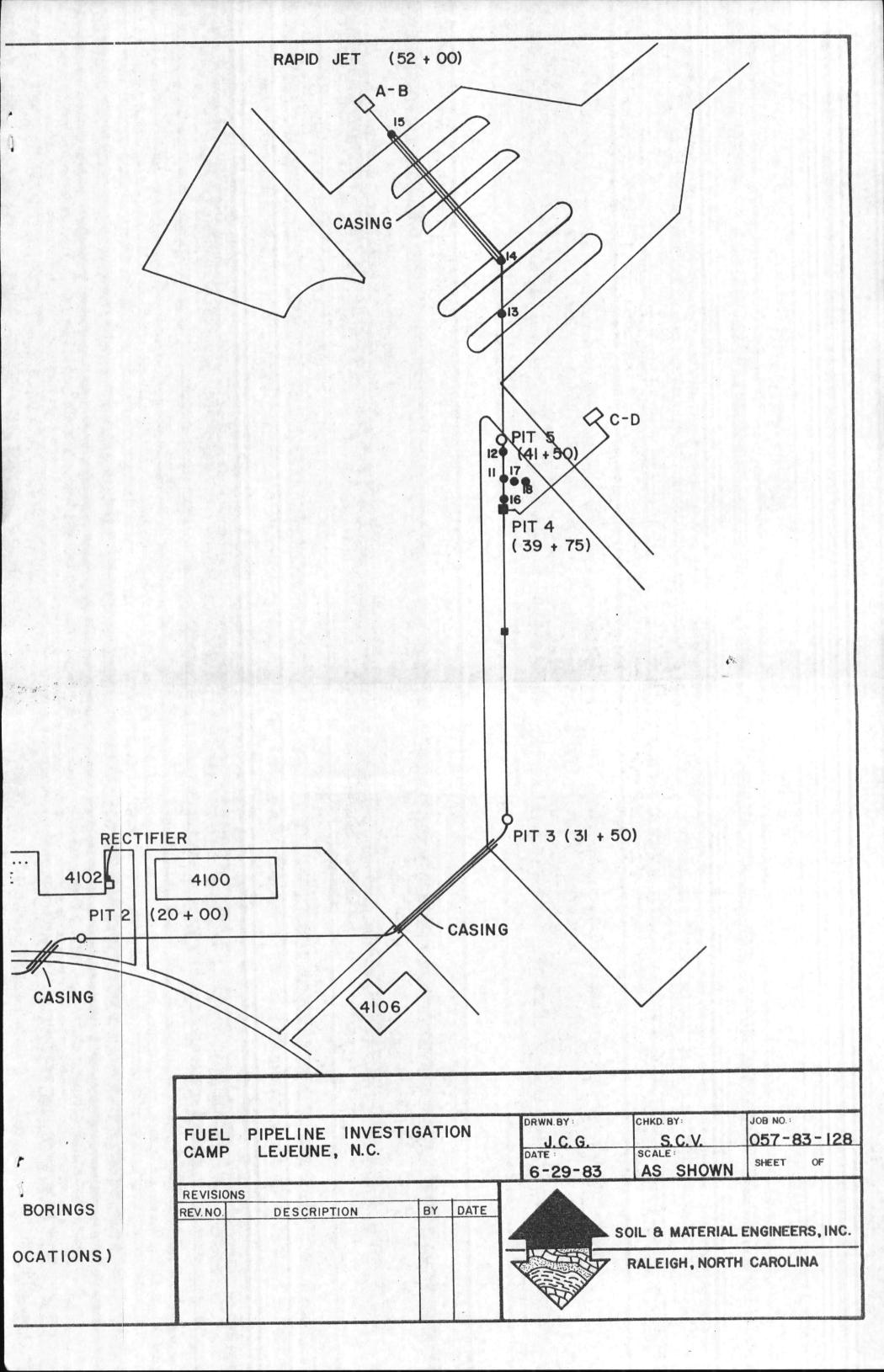


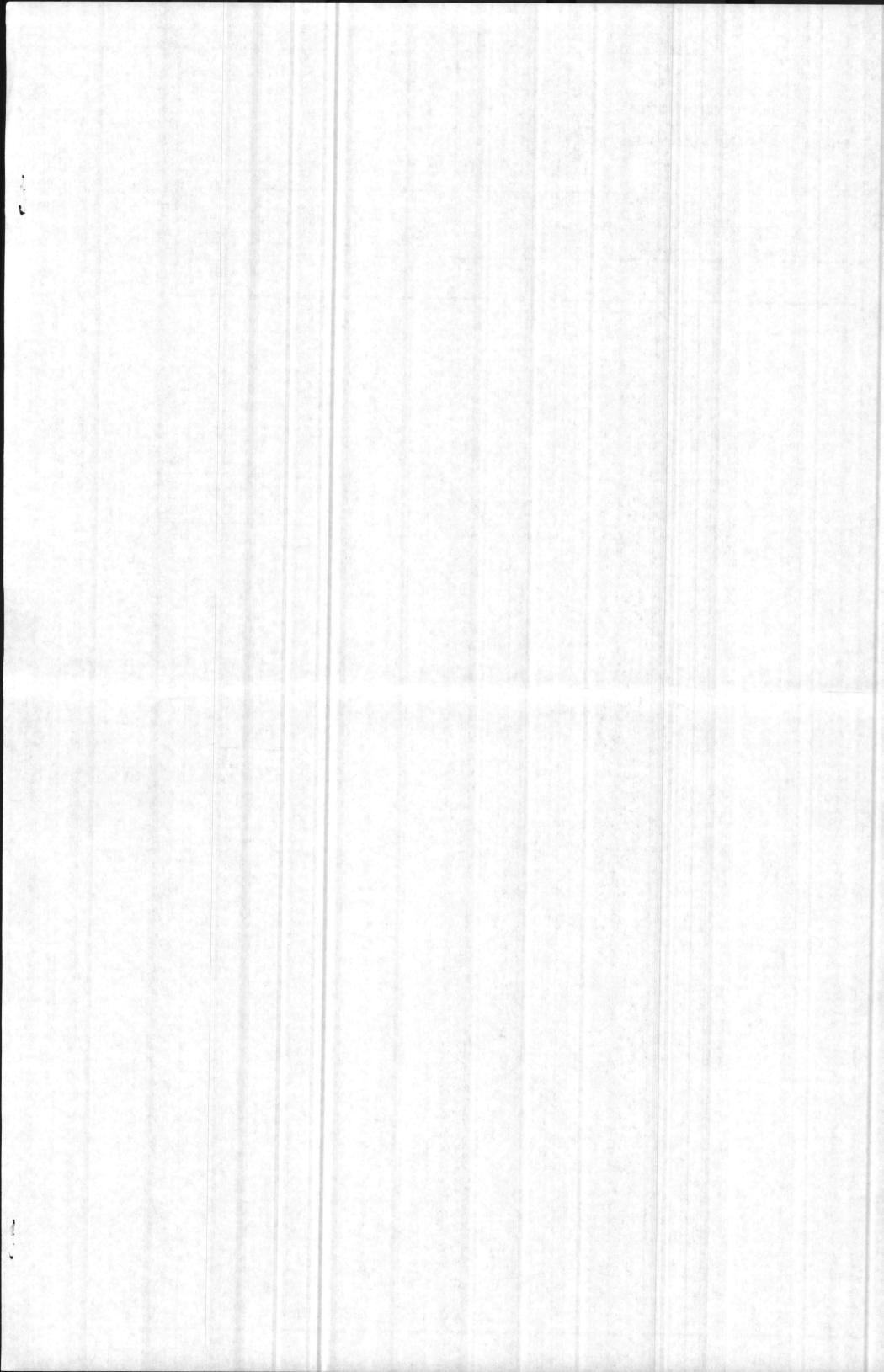
Rivery Reservoirs











UNITED STATES MARINE CORPS Marine Corps Base Camp Lejeune, North Carolina 28542



FAC/JGF/ed 11000 28 Feb 1983

FIRST ENDORSEMENT on CO, MCAS(H), NR 1tr 204:FEA:jw 11000 of 18 Feb 1983

From: Assistant Chief of Staff, Facilities

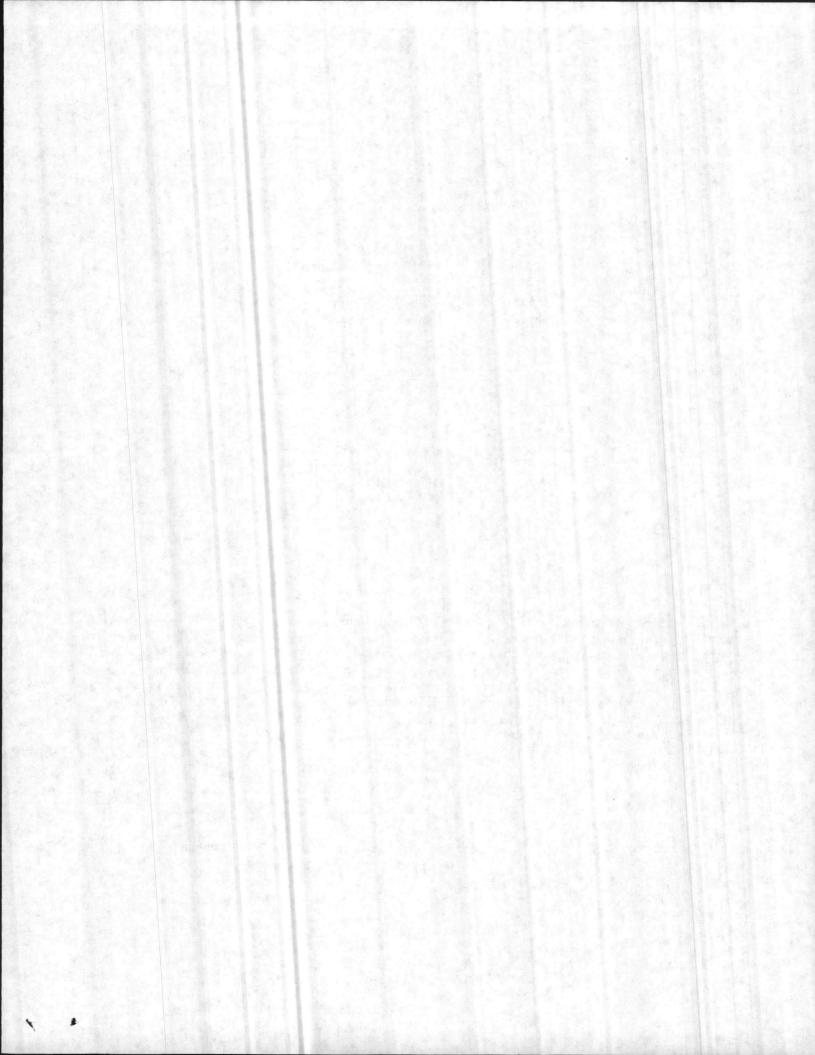
To: Base Maintenance Officer

Subj: Aviation Fuel Transfer Line Problems

1. Forwarded for action. It is requested that expeditious action be initiated to resolve the problems noted in this basic correspondence. With the current described situation, there is an ever present danger of fire resulting in possible personal injury and property destruction. Additionally, the current environmental regulations require the reporting of fuel discharges and outside agencies expect these matters to be promptly corrected. Please note that the Commanding Officer, Marine Corps Air Station (H), New River, has identified a source of possible expertise in paragraph 4 of the basic correspondence.

J. T. MARSHALL

Copy to: CO, MCAS(H), NR





UNITED STATES MARINE CORPS MARINE CORPS AIR STATION (HELICOPTER) NEW RIVER, JACKSONVILLE NORTH CAROLINA 28545

294:FEA:jw 11909

FEB 18 1993

From: Commanding Officer

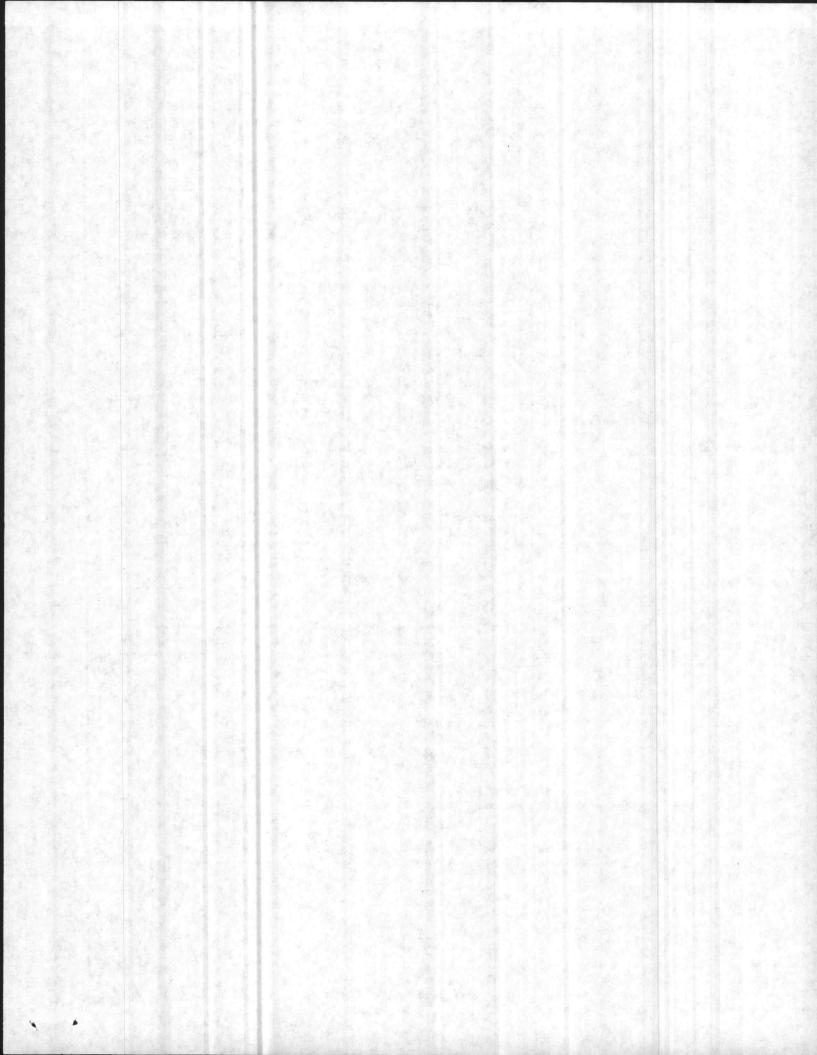
To: Commanding General, Marine Corps Base, Camp Lejeune, North Carolina

28542 (Attn: Assistant Chief of Staff, Facilities)

Subj: Aviation Fuel Transfer Line Problems

Ref: (a) Logistic Support Agreement dtd Mar 1977

- 1. The drainage ditch in the vicinity of White and Campbell Streets have recently been subjected to numerous fuel/oil spill incidents. Tests conducted by the fuels laboratory at Cherry Point, although inconclusive, indicate the possibility that the product could be JP-5. In an effort to isolate the source, the transfer line running from the Fuel Farm, along White Street and out to the Rapid Refueler System was placed under pressure and the loss measured. Two tests were conducted. The first resulted in a pressure drop of 54 PSI (from 104 to 50 PSI) in seven minutes. In the second test, the pressure was pumped up to 110 PSI, the valves closed at the inlet end, and pressure placed on the backside of the valve to assure that the loss was not occurring through leakage back to the Fuel Farm. The pressure reading dropped to 0 in 27 minutes. These tests though crude indicate leakage and a need for further investigation.
- 2. It is felt, given the pipeline's history, that the source of the present pollution may in fact be a result of deteriorated lines. The line is 12 to 13 years old. When initially installed, cathodic protection was incorporated but for some reason became inactive. As a result, the entire system until 1982, has for the most part of its life been without cathodic protection. In the spring of 1982, while replacing two of the Rapid Refueler day tanks (replaced because of irreparable corrosion), a significant leak was discovered under taxiway "Echo". The leak was repaired by inserting a sleeve into the existing six inch line. Earlier, in the Fall of 1980, a leak was discovered on White Street immediately in front of AS-4141. That section was found to be full of pin holes and was repaired by applying a "jacket clamp". In the Fuel Farm itself, significant corrosion problems were encountered resulting in fuel loss. Those lines have now been replaced and moved above ground.
- 3. As noted above, the cathodic protection over the years has been spotty at best. In February, 1982, contract number 81-3606 reestablished the protection. Even now, however, a portion of that line is still unprotected. Furthermore, it is felt that the damage has been done and the existing protection will only deter future corrosion.
- 4. The pressure tests, coupled with the line's recent history appears to indicate a serious leakage problem requiring immediate action. However, the line is over 1.5 miles long and may require sophisticated techniques to isolate leaks and determine the scope of work required. The Station Fuels



204: FEA: jw 11000 FEB 1 8 1983

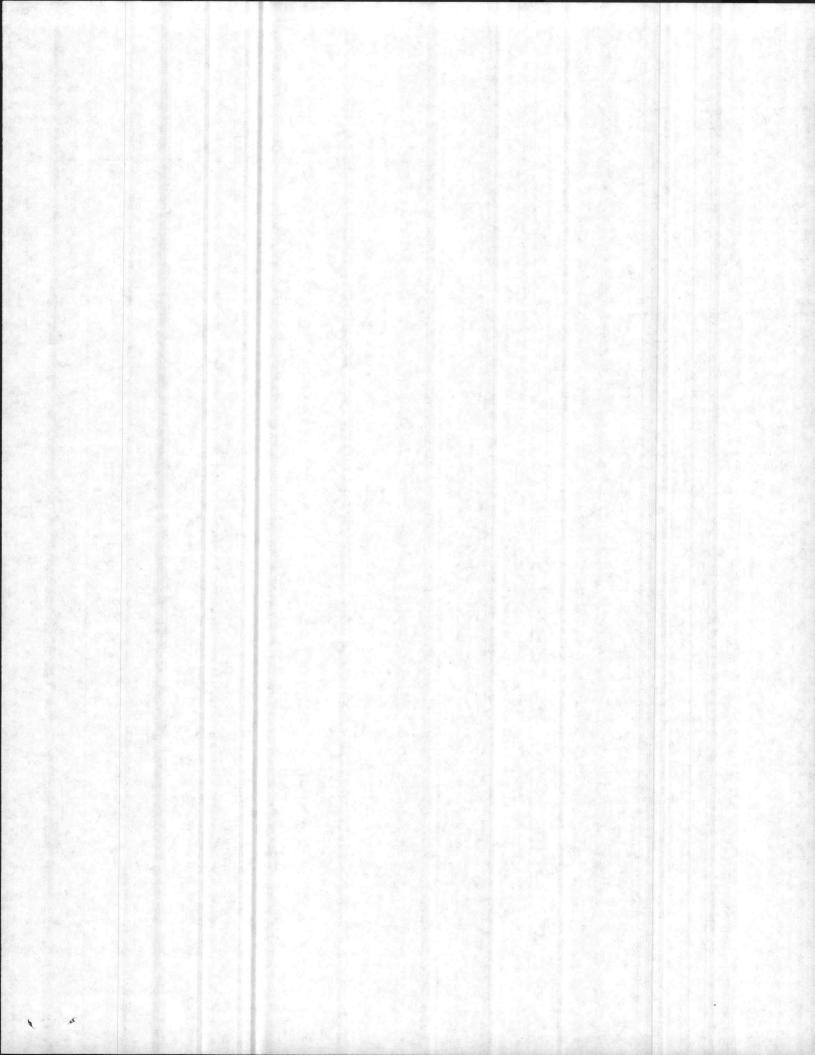
Officer has identified one source of expertise as Mr. Dick Lancaster from the Naval Petroleum Office. Cameron Station, Alexandria, Virginia (autovon 284-7293).

- 5. A companion problem to the leakage is our inability to accurately measure the inventory and consumption of aviation fuels. We have recently become aware of the fact that the dispensing meters appear to have never been calibrated and further that our fuel vessels have never been strapped. Without these, it is difficult to accurately determine loss; all measurements are approximations. Work request numbers 228-83 of 28 January 1983 and 2726-82 of 3 December 1982 have been forwarded to rectify those areas and should receive oriority handling.
- 6. Your assistance is requested in accordance with reference (a) to expeditiously determine the line's condition and have it returned to an efficient state. Any additional information required from the Air Station may be provided by Mr. F. E. ACOSTA, 455-6686 or WO GIBSON, 455-6694.

CHI Nilson D. W. NELSON

By direction

Copy to: Fuel Farm





UNITED STATES MARINE CORPS

MARINE CORPS AIR STATION (HELICOPTER) NEW RIVER, JACKSONVILLE NORTH CAROLINA 28545

IN REPLY REFER TO

207/RS/vcc 5040

11 FEB 1983

FIRST ENDORSEMENT on COMCABEAST, 1tr SUPR-plb/13 over 5040 dtd 8 Feb 1983

From: Commanding Officer

To: Supply Officer, MCAS(H)

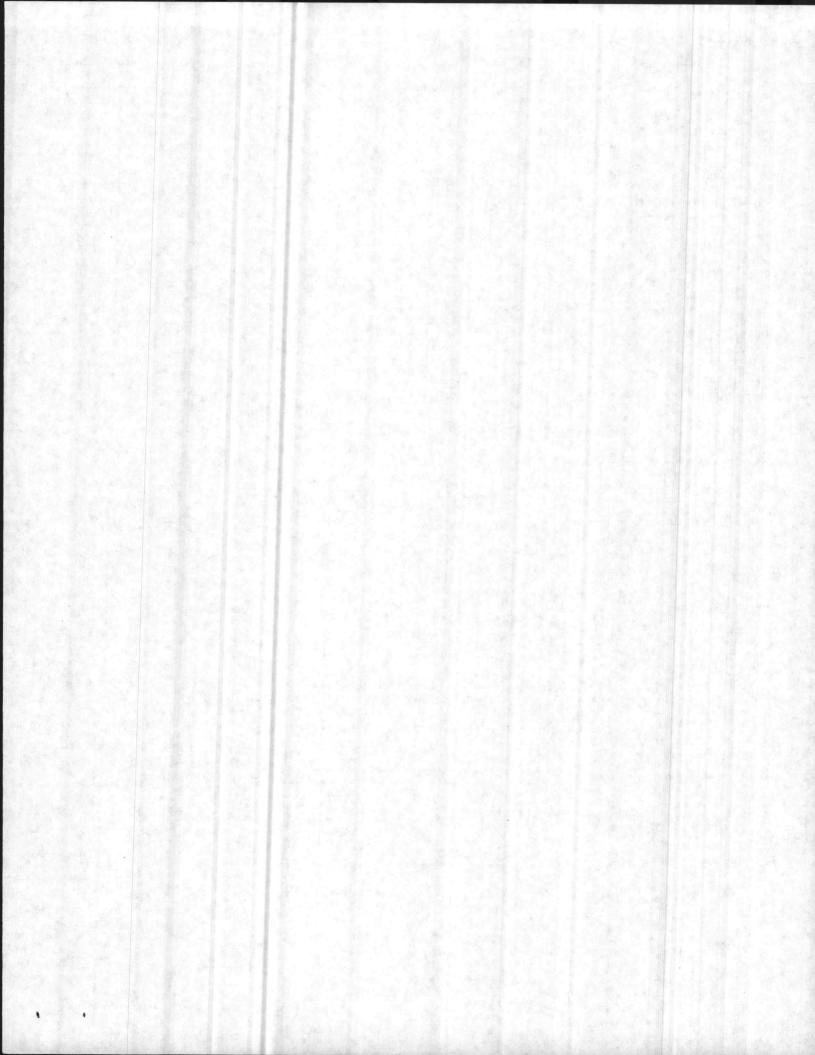
Subj: Command Inspection of the Supply Department, MCAS(H), New River

1. Forwarded. You are directed to take corrective action as indicated in the basic letter and notify this headquarters when action has been completed.

James E. VAN GORDER, JR.

Acting

Copy to: S-4







UNITED STATES MARINE CORPS MARINE CORPS AIR BASES, EASTERN AREA CHERRY POINT, NORTH CAROLINA 28533

SUPR-p1b/13 5040 8 Feb 1983

From: Commander

To: Commanding Officer, Marine Corps Air Station (Helicopter), New River,

Jacksonville, North Carolina 28545

Subj: Command inspection of the Supply Department, MCAS(H), New River

Ref: (a) CO MCAS(H) New River 1tr 221:RLL:s1t 5040 of 19 Nov 1982

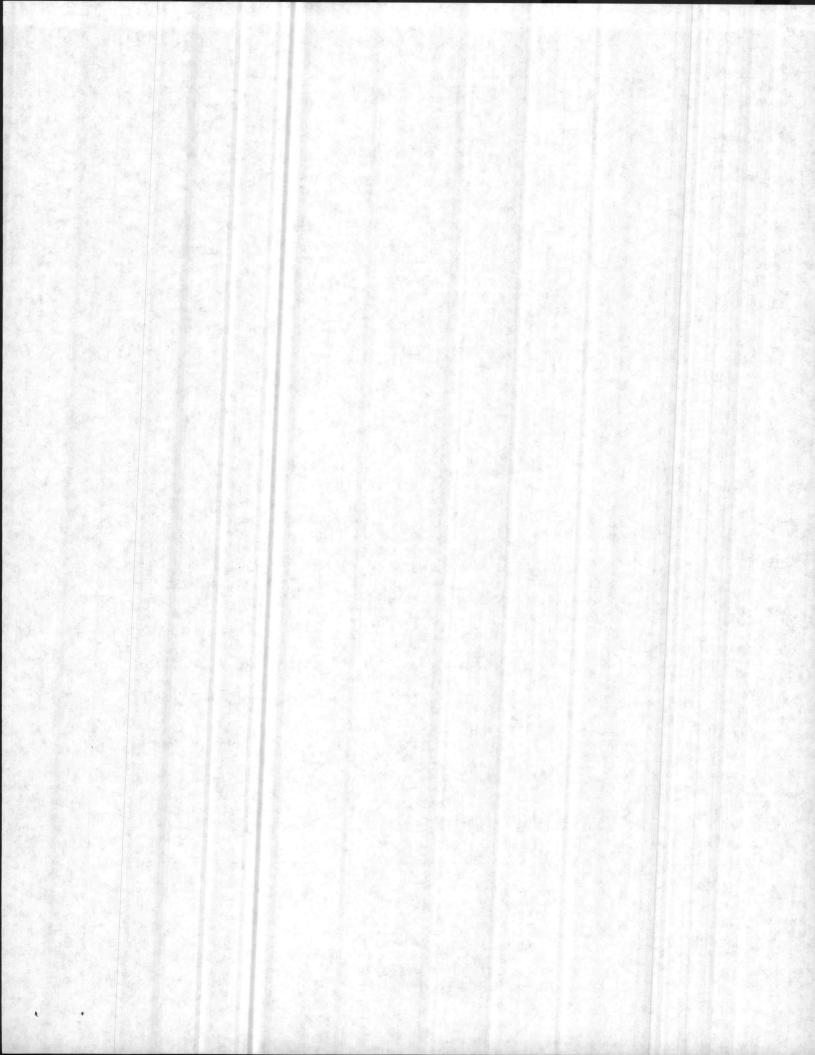
(b) COMCABEAST 1tr SUPR-plb/13 5040 of 16 Sep 1982

Encl: (1) Unresolved Findings

1. Corrective actions reported in reference (a), relative to inspection findings cited in reference (b), are satisfactory with the exception of findings addressed in the enclosure.

- 2. Functional grades assigned by reference (b) have been reevaluated. As a result, the evaluation assigned to the overall performance of the Supply Department is hereby upgraded to "Above Average."
- 3. A report of action taken or proposed on the findings addressed in the enclosure will be submitted to this Command (Code SU) within 30 days after receipt of this letter.

R. A. KUCI



UNRESOLVED FINDINGS

Functional Area: Fuel Division, Supply Department, MCAS(H) New River

Finding 2 (Tank Farm): One open pit contained a meter and electric pump motor which could be damaged by water in the pit.

Recommendation: Meter, pump, and motor should be connected to above ground piping and the pit covered.

MCAS(H) New River Response: On 17 February 1982, Work Request No. 4768Z was submitted. It was requested that all equipment and lines in the booster pit be moved above ground. S-4 advises that the work request was forwarded as an R-1 project for FY83, with a priority of 76.

MCABEAST Comments: In the event of an unusual accumulation of water in the pit, the electric pump would be ruined. Also, the present situation creates an eminent safety hazard, which should be corrected immediately. Request reprogramming R-1 priorities to have this item funded as soon as possible.

Finding 3 (Rapid Jet Systems): Shower facilities are not available in A and B Systems, Building 538. Safety regulations require that showers be available for fuel personnel who may become saturated with fuel.

Recommendation: Initiate a work request to have a shower installed in Building 538.

MCAS(H) New River Response: Decontamination/safety showers are not available in Building #AS-538. However, two safety showers/eye wash water areas are located within the hazard area. This permits expedient emergency washing of eyes and skin should refueling personnel become saturated with fuel.

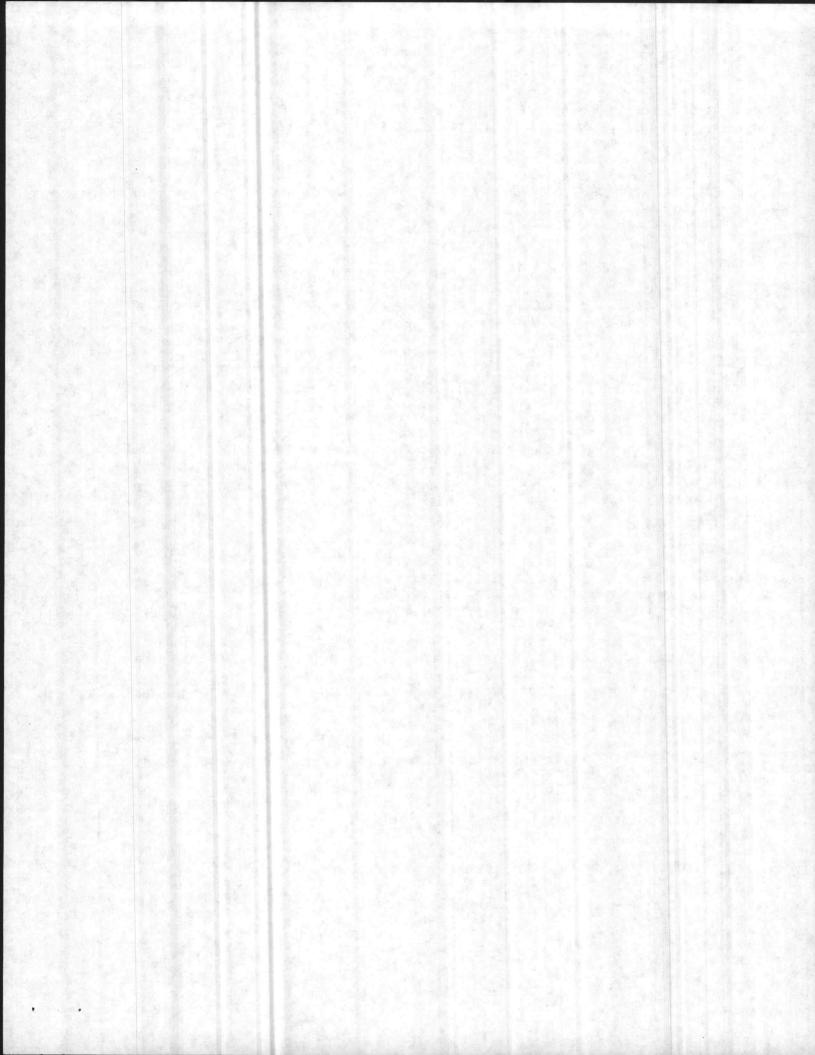
MCABEAST Comments: These showers are outside in the open and would be difficult to use in extremely cold weather. Showers/eye wash facilities should be located inside the building in close proximity to the fuel personnel.

<u>Finding 5 (Fuel Lab)</u>: The Fuel Lab has no air conditioning or fire exit door and the heating system is inadequate.

Recommendation: Take necessary action to provide adequate air conditioning and heating in the Fuel Lab, and to have a fire exit door installed in accordance with NAVAIR T.M. 06-5-502 and NAVFAC Maintenance Manual MO-230.

MCAS(H) New River Response: The fuel testing facility is a 9 X 12 building which is used to house limited field test equipment, and is used to perform daily quality analysis of aviation turbine fuel. The building has adequate heating and ventilation. A work request has been submitted for the installation of an air conditioner to meet the minimum standards for laboratories as outlined in NAVAIR T.M. 06-5-502.

<u>MCABEAST Comments</u>: New River's response does not address installation of a fire exit door in the Fuel Lab. This is a regulatory requirement and should be corrected immediately.



UNI) STATES MARINE CORPS
Marine Corps Air Station
(Helicopter)
Hew River, Jacksonville
Morth Carolina 28545

204:PEA:jw 11000 24 Feb 1983

10-10-11

From: Commanding Officer

PLANTE SPACERS

To: Commander, Marine Corps Air Bases, Eastern Area, Cherry Point, North Carolina 28533

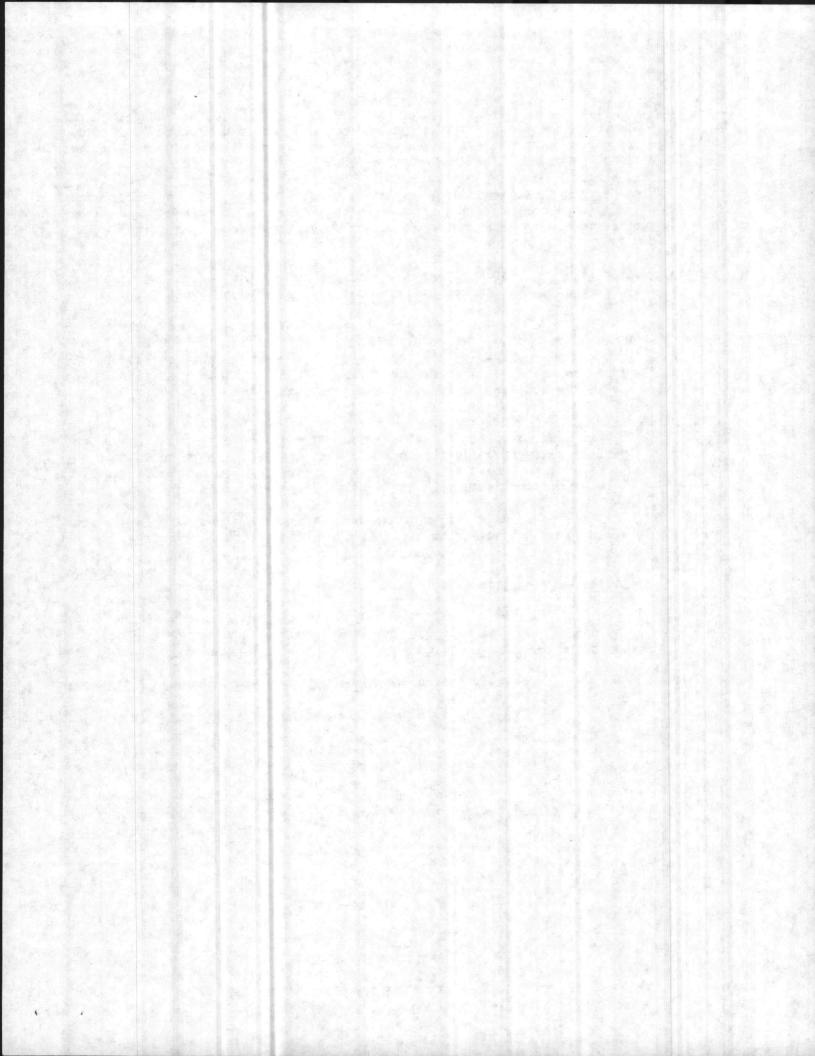
Subj: Unresolved Findings of COMCABEAST Inspection of MCAS (H). New
River Supply Department

Ref: (a) COMCABRAST ltr SUPE-plb/13 5040 of 8 Feb 1983

Encl: (1) Excerpt from WAVFAC Maintenance Manual MO-230

- 1. Reference (a) requested a report on action taken or proposed on unresolved findings noted as a result of a CONCABRAST inspection of the MCAS (H), New River Supply Department.
- 2. Three findings were noted as being unresolved. Action taken or proposed on each are as follows:
- a. Pinding 2 commented that due to water accumulation, an electric pump could be ruined. Also that an imminent safety hazard existed.
- (1) The Commanding General, Marine Corps Base, Camp Lejeune has been requested to program this modification as soon as possible.

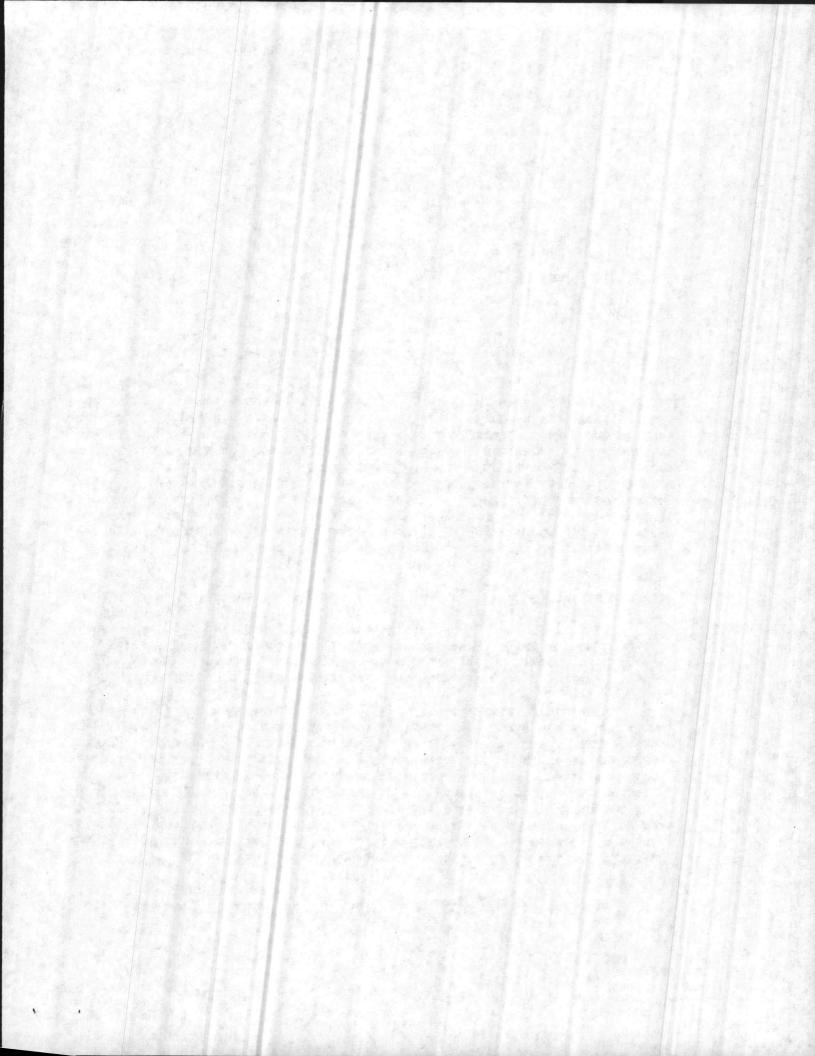
 The assignment of Priority 976 is already a high priority as priorities are numbered from 100 downward and not from one up as might have been assumed.
- (2) Exception is taken to the conclusion of the finding. The pump and meter in question are explosion and vapor proof fixtures and as such are sealed and water proof. They have been in service for approximately 12 years without problems. They are designed to operate in areas where there is a potential for submersion.
- b. Finding 3 indicated a need for a shower in building A3-538 and further that they were required by safety regulation in the event that personnel become saturated with fuel.
- (1) It is proposed that no action is warranted. Do not cencur with the required action as stated. AS-538 is not a building located at the A & B Rapid Refueler Site. It is a Power Check Pad approximately 2000 feet away. There is a building (AS-536) located adjacent to the Refueler Site and that may possibly be the building referred to. Its purpose, however, is to provide personnel with a waiting area out of the elements between assignments and also a space for minor administration and record keeping. There are no hazards in this building requiring emergency showers.



Subj: Unresolved Findings of COMCABEAST Inspection of MCAS (H), New River Supply Department

- (2) An emergency shower and eyewash station is already in place at the site of the potential hazard-near the fuel outlets—to handle the safe-ty problem described in the finding. It was installed based on a prior safe-ty inspection in years past. If, in fact, there is a potential hazard for personnel from fuel, then logic requires the remedy to be located at the same area. The most probable time for an accident to occur would be while the pits are full of mireraft being refuled with their engines on and rotors turning; one or more possibly moving. To have personnel moving across these lines, possibly half-blinded with fuel in their eyes would create additional and potentially a more serious hazard than the one being eliminated.
- (3) Although it is recognized that there is a cold period of approximately 60 days each year, safety and not comfort is the overriding factor. Once the energency is resolved, the individual can be taken to the hungar for a more leisurely hot shower and change of clothing.
- e. Finding 5 addresses the need for an additional exit door in the fuel lab.
- (1) It is proposed that no action should be taken regarding this finding. Although HAVFAC Maintenance Hanual MO-230 does refer to two exit doors (see enclosure (1)), it does not require two doors. It further relates to occupied buildings. The building in question (AS-522) is used only intermittently (approximately 10 hours per week). The facility is used each morning at the beginning of daily operations to check a small sample of fuel from the four day tanks and the refueler trucks for contamination. Additionally, the building is nine foot wide by twelve foot long with a work bench at one end which effectively makes the building 9' x 9'. Three steps away from the bench places a person out of the building. The risk involved does not justify the additional door.
- 3. For additional information, contact Mr. F. E. Acosta at MCAS (H), New River, S-4, autovon 486-8506/8518.

JAMES E. VAN GORDER, JR.



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ANIMATER
COMPLEX
COMPLEX

