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PHASE II ENVIRONMENTAL ASSESSMENT

Esselte-Pendaflex Company, Inc. 71 Clinton Road Garden City, New York 11530

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1.0 INTRODUCTION

This Phase II investigation (Phase II) was implemented by Norfolk Environmental (Norfolk) to assist Stewart & Clinton Co. LLC (S&C) in the evaluation of its proposed acquisition of property located at 71 Clinton Road, Garden City, New York (the Property). Norfolk conducted a Phase I Environmental Assessment (Phase I) at the Property in September 1995. The Phase I was conducted in accordance with ASTM Standard E 1527-94 Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process. The Phase I thoroughly addressed historical use of the Property and potential concerns with surrounding properties, and identified those areas requiring further investigation (Phase II). Accordingly, consistent with customary commercial practice, the scope of work conducted during the Phase II investigation was intended to confirm or refute the presence of suspected contamination identified during the Phase I. This report describes the work performed and results of the Phase II investigation.

The Phase I indicated that the Property has a long history of manufacturing since it was first developed in 1917 by the Curtiss Aeroplane and Motor Corporation (Curtiss). In addition to use by Curtiss into the 1940's, the Property was used by the Sperry Gyroscope Corporation during World War II. The Property was sold to the Oxford File Supply Corporation in 1948, which later became Esselte Pendaflex, and is the current occupant of the Property.

Norfolk identified eight potential areas of concern (AOCs) in the Phase I that required further investigation under the Phase II program. The scope of work developed for the Phase II investigation included sampling of soil and ground water at specific AOCs that were identified in the Phase I by historical review and on-site inspection activities. The objectives of the Phase II were to : (1) Determine if soil contamination currently exists at areas of the Property which represent the most significant potential to have been adversely impacted by operations over many years of industrial activity; (2) Assess existing ground

water quality underlying the Property from off-site sources; and (3) Evaluate the potential for on-site contribution to ground water contamination, if any.

The individual AOCs and the methods employed to investigate these areas are described more fully in Section 2.0 and Appendix A. A brief summary is provided below of the seven principal on-site AOCs and the potential impact of degraded regional ground water quality on the Property.

Former Drum Storage Area - The Property was cited in 1986 by the Nassau County Department of Health for the improper storage of chemical waste in drums along the railroad on the southern portion of the site. Phase II activities in this area, which was not sampled during the 1986 drum removal program, included sampling to determine if underlying soils or ground water were impaired.

<u>Underground Storage Tanks (USTs)</u> - The location of three current and former USTs were investigated to identify any impact to soils or ground water that may be attributable to historic underground storage and transfer activities at the Property.

<u>Former Septic System</u> - The Phase I investigation identified the presence of a former onsite septic system on the southern portion of the Property, between Building No. 6 and the railroad tracks. Sampling of soils/sediments and ground water was conducted to identify any contamination that may have resulted from discharge to this former septic system.

<u>Recharge Basins</u> - Stormwater from portions of the Property is currently discharged to a large recharge basin located at the eastern end of the Property. This earthen recharge basin is thought to have replaced a former basin that was located directly adjacent to the current northeast corner of Building No. 10. Soil and ground water sampling was conducted to identify any adverse environmental impacts that may have resulted from discharge into these recharge basins.

Former Sump and Dry Wells in Building No. 10 - Historical drawings indicate the presence of a 20' X 20' sump and three dry wells at the current location of Building No. 10, prior to its construction. The purpose of these structures, and the types of materials that may have been discharged into them, could not be determined through review of available information. Soil and ground water samples were collected from this area to identify any adverse environmental impact that may have resulted from discharge into these structures.

<u>Former Motor Testing Area</u> - Historical fire insurance drawings of the Property from the period of Curtiss's operation, indicate that a motor testing area had been located at the current location of Building No. 19/19A and the western end of Building No. 8. Phase II investigative activities were conducted in the former motor testing area to determine if residual VOC's and petroleum contaminants are present in underlying soils or ground water attributable to historical operations.

Undocumented Septic Field (North of Building No. 3A/3B)

On-site inspection activities identified the presence of a former leaching ring system in the grassy area north of Buildings No. 3A& 3B. It appears that the majority of the area was part of a sanitary septic system. Soil samples were collected from the former septic system area to determine if any adverse environmental impact resulted from historical discharge.

<u>Ground Water Quality</u> - A report prepared by the United States Geological Society (USGS) in 1989, using data generated in the early and mid 1980's, indicated that ground water underlying the Property was impacted by VOCs, primarily trichloroethylene (TCE) and tetrachloroethylene (PCE). The maximum concentration of any of these chemicals in the area surrounding the Property was 250 ug/l. The source of these contaminants was reported to be the former Roosevelt Field airfield, located directly upgradient from the subject Property (north). Phase II activities included ground water sampling at (1)

upgradient locations on the Property to determine if contaminants continue to migrate onto the Property from the Roosevelt Field plume, and (2) at on-site AOCs to determine if these areas are contributory sources to the regional ground water contamination.

Based upon the results of the Phase II investigation, soil contamination was identified in only three of the suspected on-site AOCs; (1) the active 20,000 gallon fuel oil UST, (2) the former septic system (southern portion of the Property) and (3) the former motor testing area. The impact of soil contamination at the former 20,000 gallon UST and former septic system appears to be contained, and limited excavation may be necessary. Only low levels of contamination were detected in the former motor testing area. This area represents minimal risk to human health or the environment and no additional action is recommended.

The Phase II demonstrated that low concentrations of TCE and PCE are present in ground water underlying the Property. These constituents were detected in ground water at locations upgradient of all historic on-site operations, indicating that some migration from the Roosevelt Field plume is moving onto the Property

No detectable concentrations of either TCE or PCE were present in any soil samples collected on the Property, indicating that none of the AOCs is a contributory source of these chemicals to the regional ground water contamination.

A small subsurface vessel was identified in the courtyard between Buildings No. 1 and No. 2. This vessel is out of service and should be properly closed. Closure should include characterization and appropriate disposal of tank contents, followed by excavation and appropriate management of the vessel and any contaminated soils that may be identified.

A leaching ring/dry well located south of the boiler room currently appears to receive discharge from the boiler should be evaluated for compliance with the federal Underground Injection Control (UIC) program and applicable local requirements. Based

on the current information, discharge from the boiler room to the leaching ring could constitute an unpermitted discharge to an underground injection well. As such, any discharge should be discontinued or properly permitted (if possible). If the discharge is discontinued, the leaching ring/dry well should be appropriately closed, in accordance with all applicable requirements. Closure would require sampling of the soils/sediments in the leaching ring/dry well, and appropriate management of such materials.

2.0 PHASE II SCOPE OF WORK

Phase II investigative activities consisted of installation of soil borings at 30 locations throughout the Property, collection of sediment and soil samples underlying two former septic system leaching rings, and collection of ground water samples at 15 locations. Sample locations are identified on Figure 1.

Sample locations were selected to investigate seven different AOCs identified through Phase I investigative activities, in addition to the impact of area-wide ground water contamination on this site. All sample collection activities were conducted with Geoprobe drilling and sampling apparatus including both Large Bore and Macro Core soil samplers, and stainless steel screen point ground water samplers. Soil samples were visually screened, characterized with respect to particle size, shape, color, sorting, uniformity and other properties, logged, and screened with a field Photoionization Detector. Select samples were analyzed in the field for TPH or benzene, toluene, ethylbenzene and xylenes (BTEX) using a Quantix immunoassay work station. Specific sample collection and field screening techniques are described in greater detail in Appendix A. All ground water samples, and select soil samples (based on field screening) were sent to Complete Environmental Testing Laboratories (CET) in Shelton, Connecticut for analysis. All laboratory results are discussed in the sections below. Complete laboratory reports and associated documentation are provided in Appendix B. Table 2-1 and Table 2-2, located at the end of this section, provide a summary of soil and ground water analytical results, respectively.

Each area of concern is discussed below, including a brief physical description, the rationale for its investigation, and investigative methods employed.

Figure 1 Sample Locations

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2.1 FORMER DRUM STORAGE AREA

The Property was cited in 1986 by the Nassau County Department of Health for the unauthorized storage of chemical waste in drums along the railroad in the southern portion of the site. Greater than 50 drums in poor condition were removed from the Property. These chemicals included waste flammable solids (reportedly adhesives), waste oils, and 2,000 gallons of waste organic liquids not listed under RCRA. Soil samples were not collected at the time of the drum removal to determine if impacts to underlying soils or ground water had occurred. There were no records of chemical waste disposal from the Property prior to, or subsequent to this event.

To determine whether impacts had occurred to this area from materials in the drums, three soil borings were advanced to a depth of 12 feet in the area where the waste drums were located. The borings, designated as DS-1, DS-2 and DS-3 on Figure 1 were approximately equally spaced from each other along the length of the drum storage area. Soil samples were collected from each of the three borings from the 0-4 foot, 4-8 foot and 8-12 foot depth intervals. Samples were visually inspected and screened with a PID. No evidence of soil contamination was identified through either visual inspection or PID screening.

One soil sample from each soil boring was sent to the laboratory and analyzed for volatile organic compounds (VOCs) and semi-volatile organic compounds (SVOCs). No compounds were detected in any of the soil samples collected from the former drum storage area at concentrations above the laboratory detection limits.

Four ground water samples were also collected from the former drum storage area. The ground water sample locations are designated as SP-1, SP-1D, SP-2 and SP-3 on Figure 1. Ground water samples were collected from two different depths at the SP-1 location. The shallow samples were collected from just below the surface of the water table,

approximately 30-32 feet below the ground surface. The deeper sample at SP-1D was collected from approximately 70-72 feet below the ground surface.

Because of the proximity of other AOCs to the drum storage area, SP-1 and SP-2 also provided information about potential impacts associated with other historical activities and conditions at the Esselte Property, in addition to the former drum storage area. SP-1 provided information regarding potential impacts from a former 10,000 gallon underground storage tank (UST) and from historical (and current) discharges from the boiler room into a leaching ring located just south of the boiler room (Building No. 7). SP-2 is located south of a 20,000 gallon fuel oil UST, and provided information about potential impacts from the UST, in addition to the drum storage area.

Each of the four ground water samples collected from the drum storage area were analyzed for VOCs and SVOCs. SP-2 and SP-3 were also analyzed for Total Petroleum Hydrocarbons (TPH).

Trichloroethylene (TCE) and tetrachloroethylene (PCE) were detected in the shallow ground water sample from SP-1 at 5.7 ug/l and 13.0 ug/l respectively. These concentrations each marginally exceed the New York State Ground Water criteria (5.0 ug/l for both TCE and PCE). Neither TCE nor PCE was present in the deeper ground water sample from the SP-1 location (SP-1D). Xylenes were detected at 1.3 ug/l in the deep sample at SP-1D, which is below New York State Ground Water criteria. No other compounds of concern were detected in any of the ground water samples collected from the former drum storage area. No compounds of concern were detected at concentrations above laboratory detection limits in either SP-2 or SP-3.

None of the VOCs that were identified in the ground water at SP-1 were identified in overlying soils in the former drum storage area. Both PCE and TCE are primary ground water contaminants of concern in the Roosevelt Field ground water contamination plume remediation project, and were not detected in any soil samples collected on the Property.

The existing data indicate that the source of TCE and PCE in ground water underlying the Property originate at an upgradient, off-site source, most likely the Roosevelt Field site. (See Section 2.8 for a more complete assessment of off-site source impacts.)

2.2 UNDERGROUND STORAGE TANKS (USTs)

Phase I investigative activities identified three known UST areas at the Property. These include (1) the location of a 20,000 gallon underground storage tank, just south of the west end of Building 10, (2) the former location of an excavated 10,000 gallon fuel oil UST adjacent to Building 6 on its southwest side and (3) a small undocumented UST adjacent to Building 2 (in the courtyard between Building 1 and Building 2).

2.2.1 20,000 Gallon Fuel Oil UST

The existing 20,000 gallon tank, which is actively used to store No. 2 fuel oil for heating of buildings at the Property was installed in 1982 to replace an older fuel oil UST that had occupied the same location. The condition of the former tank upon removal is unknown. No soil sampling was conducted in connection with the 1982 tank removal to determine soil conditions in the vicinity of this tank at that time. As discussed in greater detail below, sampling activities conducted during the current Phase II investigation indicate that soils may have been impacted by the former tank.

Three soil borings were conducted around the 20,000 gallon UST, which is oriented in an east/west direction, parallel with Building 10. Each boring was advanced to below the bottom elevation of the tank, with soil samples collected in 4 foot intervals from the ground surface. Each sample was visually inspected for evidence of petroleum and screened with a PID. Select samples were analyzed for TPH with a field imunoassay test. The first two borings, GC20K-1 and GC20K-2, were located on either side of the eastern

end of the tank. No evidence of significant release of fuel oil was identified in these two borings based on visual observation, PID reading or field TPH analysis.

The third boring, GC20K-3, was installed just off of the western end of the tank. Visual evidence and a strong odor of fuel oil was present from a depth of approximately 14 feet to 20 feet below the surface. Because of the obvious presence of fuel oil in soils in the samples from these depths, field TPH analysis was not conducted. Visual evidence of petroleum decreased by 23 feet below the surface, and PID readings also dropped. Field analysis of a soil sample from approximately 23 feet below the surface indicated the presence of 450 mg/kg TPH.

Investigative activities at 20K-3 indicated that petroleum concentrations had decreased significantly with increasing depth. A ground water sample was collected immediately downgradient from GC20K-3 to determine if fuel oil had migrated vertically to ground water. This sample, SP-2 (which is also located in a section of the former drum storage area above) was analyzed by the laboratory for VOCs, SVOCs and TPH. No compounds were detected at concentrations above the laboratory detection limits.

Petroleum contaminated soils appear to be limited to the area below and adjacent to the 20,000 gallon UST, primarily on its west end. Contaminated soils in this area extend from approximately 14 through 23 feet. The identified petroleum does not appear to have resulted in any impacts to ground water.

Esselte indicated that the UST is tested annually, and was found to be tight through the most recent test. Testing results had not been made available for review at the time of this writing. The observed petroleum in the soils adjacent to the 20,000 gallon UST could be the result of a number of conditions including, (1) an undetected leak from the tank body, (2) leakage from loose bungs, fill pipe or vent connections at the top of the tank when the UST is filled to capacity, (3) leakage from ancillary piping including the boiler feed line,

(4) overfilling or (5) historical releases that were not addressed at the time of removal from a former tank that previously occupied the same location.

2.2.2 Former 10,000 Fuel Oil UST

Plans from 1959 that were viewed at the Village of Garden City offices indicate that a 10,000 gallon fuel oil tank was to be either excavated or abandoned in place south of Building 6 at that time. Inspection of the former location of the UST, as depicted on several historical drawings of the Property, coupled with exploratory Geoprobe work, indicates that the tank was removed, not closed in place.

Two soil borings were installed directly through the former location of the 10,000 gallon UST. Borings were sampled continuously in four foot intervals from the ground surface to below the former bottom elevation of the tank. GC10K-1 was sampled to a depth of 16 feet below the ground surface and GC10K-2 to 18 feet. The upper four foot interval of each boring contained evidence of asphalt fragments and fill materials. Each of these upper (0-4 foot) samples reflected the presence of such materials through field TPH readings of 185 mg/kg in GC10K-1 and 620 mg/kg in GC10K-2. No evidence of significant release of petroleum was identified in either boring through visual inspection, PID reading or TPH analysis.

The table below presents the results of the Quantix TPH analyses conducted on samples from the former 10,000 gallon UST area. These results indicate that the TPH concentrations associated with asphalt and fill materials, at depths up to 8 feet below the surface, decreased to non-detectable concentrations at depths greater than 8 feet. The observed TPH in the upper samples are typical of surface soils at older industrial facilities, are not mobile and do not represent a risk to human health or the environment, especially since all such soils are currently covered by asphalt pavement.

The field analysis results were confirmed through laboratory analysis of two soil samples (GC10K-1, 8-12 feet & GC10K-2, 8-12 feet), each of which had non-detectable (< 50 mg/kg) TPH concentrations.

FIELD TPH RESULTS

SAMPLE LOCATION	DEPTH INTERVAL	TPH CONCENTRATION
		(MG/KG)
10K-1	0-4 FEET	185
	4-8 FEET	150
	8-12 FEET	<25
	12-16 FEET	<25
10K-2	0-4 FEET	620
	4-8 FEET	38
	8-12 FEET	56
	12-14 FEET	25
	16-18 FEET	<25

FORMER 10,000 GALLON FUEL OIL UST

2.2.3 Undocumented Vessel at Building No. 2

Phase I on-site inspection activities identified an apparent fill pipe adjacent to the western wall of Building No. 2, in the courtyard between Buildings No. 1 and No. 2. No documentation regarding the presence of a tank at this location was identified. A measuring stick was placed into the fill pipe of the vessel to determine its diameter and contents.

The vessel appears to be less than four feet in diameter with approximately 10 inches of liquid (apparently water).

Because of its small size, it is possible that the tank may have formerly stored fuel for a compressor located just inside the wall of Building No. 2 from the tank location. Geoprobe boring was made difficult due to the presence of underground fire water lines, a steam manhole and, potentially, other utilities. Two borings were installed immediately adjacent to the tank. Both borings encountered refusal at three feet below the ground surface, with evidence of concrete in the sampler tip. No evidence of petroleum in soils was observed in either boring to a depth of three feet.

documentations

Although no evidence of adverse environmental impact was identified through Phase II activities, the vessel is out of service, and should be emptied and excavated. At that time, the vessel and any contamination that may be identified should be appropriately managed in accordance with all applicable regulatory requirements.

2.3 FORMER SEPTIC SYSTEM

Historical Property drawings and municipal records indicate that a former septic system was located on the southern portion of the Property, south of Building 6. This system is thought to have received wastewater generated at the Property prior to connection to the municipal sewer system. Given the age and history of the site, it is possible that chemicals could have been discharged into this system. No information was available regarding operation or closure of this septic system.

Currently, two leaching rings occupy the location of the septic system, as indicated by historical review activities. It is not known if these existing leaching rings remain from the original septic system, or were installed later. The rings, designated as SS-1 and SS-2 on Figure 1, are approximately 22 feet and 21 feet respectively from the ground surface to the soil bottom of the ring. Each ring has a block riser that extends from the manhole at the

ground surface to the first leaching ring, approximately 8-10 feet below the surface. Several feet of standing water were present in each ring during field sampling activities.

Samples were collected from soil/sediments at the bottom of each ring, at 0-2 feet below the bottom of the ring, and at 2-4 feet below the bottom. Each sample was visually inspected, and screened with a PID. The 0-2 foot sample from each leaching ring contained blackish gray sludge at the surface and gray sediments below. Each 0-2 foot sample had a slight odor and an elevated PID reading. The 0-2 foot sample with the higher PID reading was sent to the laboratory for VOC and metals analysis to determine worst case contamination conditions, with respect to the chemicals present and associated concentrations.

Discoloration and odor decreased in each 2-4 foot sample, with PID readings dropping to just above background. Both of the deeper samples were sent to the laboratory for metals and VOC analysis to determine if significant concentrations of any chemicals that may be present in the upper two foot interval remain at greater depths, and could represent a potential source of contamination to ground water. If contaminants are confined to the upper samples, as indicated through the field screening, the deeper samples would be used to delineate the extent of material that may need to be excavated and disposed, if any.

The upper sample from SS-2 contained chlorobenzene at 150 ug/kg, ethyl benzene at 35 ug/kg, toluene at 77 ug/kg and xylenes at 240 ug/kg. None of these compounds, or any other VOCs, were detected in either 2-4 foot sample.

Zinc was detected in the 2-4 foot sample from both SS-1 and SS-2 at 60 mg/kg. Chromium was also present in SS -1 (0-2 feet) at 79 mg/kg. These concentrations are above site background concentrations, based on analyses conducted on samples collected at other locations throughout the property, and exceed the guidance values provided in NYSDEC's Technical and Administrative Guidance Memorandum: Determination of Soil Cleanup Objectives and Cleanup Levels (TAGM). Two ground water samples were also collected immediately outside of the leaching rings on their downgradient side (south). One ground water sample was collected from just below the surface of the water table at 30-32 feet below the ground surface (ST-1), and one was collected at 70-72 feet below the ground surface (ST-1D).

No metals were present in the shallow ground water sample at this location at concentrations above the laboratory detection limits (metals analyses were not conducted on the deeper ground water sample).

None of the VOCs that were present in the upper soils/sediment sample from SS-2 (chlorobenzene, ethyl benzene, toluene and xylenes) were present in ground water.

The sampling results at the former septic system indicate that historical discharges have resulted in contamination of the soils and sediments at the bottom of the leaching rings with VOCs and metals. Zinc and chromium concentrations exceed NYSDEC soil cleanup guidelines in the upper 4 feet below the leaching rings and should be appropriately addressed. However, none of the detected constituents has demonstrated significant vertical migration or resulted in impacts to ground water.

UIC Issues

TCE was detected in both the shallow and deep ground water samples collected at the septic system area, at 2.1 ug/l and 3.2 ug/l respectively, but was not detected in any of the overlying soil/sediment samples. Based on these results, it appears that the presence of TCE is likely to be attributable to migration from an off-site, upgradient source.

2.4 RECHARGE BASINS

Historical review activities indicate that plans were submitted to the Village of Garden City in 1959 for the construction of the existing recharge basin in the eastern portion of the Property, east of Building No. 10. This recharge basin is thought to have replaced a recharge basin that had formerly been located near the current location of the northeast corner of Building No. 10, but that had to be relocated when Building No. 10 was constructed.

The recharge basins at the Property are large earthen sumps, approximately 50 feet by 85 feet and 15 feet deep. The units were designed to collect stormwater runoff from the Property (including roof runoff) and allow it to recharge to the ground water. The units were not intended to receive any industrial wastewater discharges. However, given the long industrial history of the property, it is possible that spills or unauthorized discharges into the stormwater conveyance system could have occurred. The recharge basin areas were sampled to determine if any such releases that may have occurred may have impacted soil or ground water at these locations.

Investigative activities associated with both the existing and former recharge basins are discussed in this section. Investigation of potential former discharge locations inside the current location of Building No. 10 (prior to its construction) are discussed in Section 2.5.

Two soil borings, designated RB-1 and RB-2, were installed on the edges of the existing recharge basin, one upgradient and one downgradient. Soil samples were collected from each boring. A sample collected from the 30-32 foot depth interval of RB-1 contained 215 ppm TPH, as determined through field analysis.

Each boring was advanced to below the water table, and a ground water sample was collected from each for laboratory analysis. Ground water samples from the existing recharge basin were analyzed for VOCs, SVOCs and TPH. No constituents were present in either sample at concentrations above the laboratory detection limits.

One soil boring, identified as FS-1 on Figure 1, was conducted directly through the former recharge basin area at the northeast corner of Building No. 10. Soil samples were collected continuously from what is thought to be the approximate elevation of the former

recharge basin floor (12-14 feet below the ground surface) to a depth of 20 feet below the surface. Four two foot sample intervals were screened with a PID. No readings above background were recorded. The 18-20 foot sample contained <25 ppm TPH as determined through field analysis.

The soil sample from the 14-16 foot depth interval was sent to the laboratory for analysis for VOCs, metals and TPH. No VOCs or TPH results exceeded the laboratory detection limits. All metals were within site background concentrations.

The soil boring at FS-1 was advanced into the ground water, and a ground water sample was collected for laboratory analysis for metals, TPH and VOCs. Lead was reported to be present in the ground water sample at the laboratory detection limit, 0.10 mg/l. This concentration exceeds NYSDEC Ground Water Criteria for drinking water, 0.025 mg/l. However, lead was not detected in ground water at any other locations in the Phase II study area. The low detection at this location appears anomalous, and does not suggest the need for further investigation or remediation. No other constituents were detected at or above the laboratory detection limits.

2.5 FORMER SUMP AND DRY WELLS IN BUILDING NO. 10

Historical drawings of the Building No. 10 area indicate the possible existence of a sump that was to be pumped out and filled with clean fill prior to construction of the building. The sump was shown to be 20 feet by 20 feet. No information was available to confirm 1) that the sump actually existed, 2) what its purpose was, 3) when it existed, or 4) the types and quantities of any materials that may have been discharged into it. The 1959 plans also depict additional dry wells in the location of Building 10 that were to be pumped and filled prior to the construction of Building 10. One soil boring , identified as DW-1 on Figure 1,was installed directly through the area that is thought to have been the former sump location. Two soil samples were collected for laboratory analysis, from 19-21 feet and 23-25 feet below the floor of the building. It is thought that these samples were collected from native materials that would have been below the bottom of the former sump. Inspection of the samples (brownish yellow medium to coarse sand and gravel) supports this. Both of the samples sent to the laboratory were analyzed for metals, TPH, VOCs, and SVOCs. All metals were within background concentrations, and no VOCs, SVOCs or TPH constituents were present at concentrations above the laboratory detection limits.

The soil boring at DW-1 was extended into ground water, and a ground water sample was collected for laboratory analysis. The ground water sample from this location was analyzed for metals, TPH, VOCs and SVOCs. No constituents were present in the ground water sample at concentrations above the laboratory detection limits.

2.6 FORMER MOTOR TESTING AREA

Historical fire insurance drawings of the Property from the period of Curtiss's operation, indicate that a motor testing area had been located at the current location of Building No. 19/19A and the western end of Building No. 8. Previous experience with aviation motor testing areas suggests that large volumes of fuel or fuel substitutes would have been used in testing engines and ancillary equipment, and could possibly have resulted in quantities of spilled fuels and cleaning fluids. Phase II investigative activities were conducted in the former motor testing area to determine if residual VOC's and petroleum contaminants are present in underlying soils or ground water attributable to historical operations.

Three soil borings, MT-1, MT-2, and MT-3, were conducted in the former motor testing area. MT-1 was advanced to ground water, and MT-2 and MT-3 were advanced to a depth of 12 feet below the existing floor of Building No. 19/19A. Samples were collected in 4 foot intervals, visually inspected and screened with a PID.

Five soil samples from the former motor testing area were sent to the laboratory for TPH analysis. TPH was not present in any of the samples at concentrations above the laboratory detection limits.

Six soil samples were sent to the laboratory for VOC analysis. VOCs were detected in only one sample above laboratory detection limits. MT-3 (4-8 feet) contained 2 ppb benzene, 10 ppb toluene and 7.9 ppb xylenes. These concentrations are all well below the NYSDEC TAGM guidance values.

The ground water sample collected from MT-1, located directly downgradient from MT-3, was analyzed for VOCs, metals and TPH. No constituents were present at concentrations above the laboratory detection limits.

2.7 UNDOCUMENTED SEPTIC FIELD (NORTH OF BUILDING NO. 3A/3B)

On-site inspection activities identified the presence of a former leaching ring system in the grassy area north of Buildings No. 3A& 3B. It appears that the majority of the area was part of a sanitary septic system. A block leaching ring located at the east end of this area may still receive storm water runoff from the area.

Two soil borings were conducted in the area. GK-1 was located adjacent to what may have been a former sump, just east of the existing truck loading ramp. GK-2 was installed adjacent to, and downgradient from, the first component of the septic system.

GK-1 was advanced to a depth of 12 feet below the susrface. The upper 5 feet of soil in this boring contained dark brown fine silt and sand. Brownish yellow, medium to coarse sand, predominant throughout the entire study area was present from approximately 5 feet

below the surface to the extent of the boring, 12 feet. A sample was sent to the laboratory from approximately 8 feet below the surface for VOCs, TPH and metals analysis.

All metals were within site background concentrations. No TPH or VOCs were present at concentrations above the laboratory detection limits.

GK-2 was advanced to the depth of the ground water surface. Dark brown silt and fine sand was present to a depth of 3 feet below the surface, with brownish yellow and yellowish brown, medium to coarse sands present from 3 feet to the end of the boring at 30 feet below the surface. Soil samples were sent to the laboratory from the 4-8 foot and 28-30 foot depth intervals. Both samples were analyzed for VOCs, TPH and metals.

All metals were within site background concentrations. No TPH or VOCs were present at concentrations above the laboratory detection limits.

2.8 GROUND WATER QUALITY

As described in the Phase I, the Roosevelt Field New York State inactive hazardous waste site is located upgradient of the Property. It has been well documented that the direction of ground water flow in the area is to the south/southwest, placing the Property directly downgradient from the Roosevelt Field site. According to plume delineation maps contained in a report prepared by the USGS (Chlorinated Organic Compounds in Groundwater at Roosevelt Field, Nassau County, New York, USGS, 1989), the Property was within the western portion of both the Upper Glacial and Magothy aquifer contamination plumes in the 1980's. USGS's plume maps were based on data collected from several ground water monitoring wells surrounding, but not on, the Property.

The USGS report indicated that, in the 1980's, TCE concentrations in the area surrounding the Property ranged from 50 to 250 ug/l and PCE concentrations ranged from 2 to 100 ug/l.

The Phase II investigation indicated that low concentrations of TCE and PCE are currently present in ground water under the west side of the Property. TCE was identified in ground water upgradient of all historic on-site operations, indicating that low levels of TCE are currently migrating onto the Property from an upgradient off-site source. No onsite source of these materials was found to be present. These observations are supported by the Phase II soil investigation described in the preceding sections of this report, in conjunction with the Phase II ground water investigation described below.

The Phase II ground water investigation was designed to accomplish the following:

- Determine the quality of ground water migrating onto the property from upgradient contamination sources such as Roosevelt Field, located north of the Property.
- Investigate ground water quality underlying, and immediately downgradient from onsite AOCs. Ground water quality was compared to soil quality data and known historical practices at the AOCs to evaluate the potential for contribution by on-site sources of contamination.

The Property has been historically associated with the aircraft industry and paper conversion (printing inks, adhesives), and similar chemicals to those identified in the Roosevelt Field ground water contamination plumes may have historically been used at the Property. The above referenced USGS report documented, through sampling of monitoring wells surrounding (but not on) the Property, that the Property had been affected by the Roosevelt field plumes in the 1980's. However, no information was available from pre-Phase II data to indicate whether an on-site source has contributed to this contamination. Pre-Phase II ground water data in the vicinity of the Property is more

than 10 years old, and no wells were installed directly on the Property. Significant changes may have occurred to ground water quality due to regional ground water pumping and natural attenuation.

Ground water samples were collected from 15 different sample locations and depths throughout the Property. Samples were collected both from just below the ground water surface in the upper glacial aquifer, and from approximately 40 feet into the ground water. The shallower ground water samples, if coupled with detection of contamination in overlying soils, would help to identify any active source of contamination that may be present on site. Since the primary contaminants in the Roosevelt Field plume (TCE and PCE) are heavier than water and tend to sink in an aquifer over time, deeper samples were also collected to detect contaminatikinmigraquifefrower:pigreditedparusatepleatworay no longer be detectable at the ground water surface.

Figure 2 identifies the Phase II ground water sample locations, and summarizes findings. Table 2-2 provides a summary of the ground water investigation findings.

Investigation of Off-site Sources

Four ground water samples were collected along the upgradient northern perimeter of the Esselte Property. These samples included three shallow samples at NGP-1, NGP-2 and NGP-3 and one deeper sample at NGP-1D.

TCE was identified at 2.6 ug/l in the deep upgradient sample, NGP-1D, indicating that low levels of VOCs are migrating onto the Property from the Roosevelt Field plume at that depth. The fact that none of the shallower ground water samples on the upgradient property boundary contained detectable concentrations of VOCs may indicate (1) that the contaminant source strength at Roosevelt Field may be decreasing over time, (2) that pumping patterns in the area may be limiting contaminant migration onto the Property in

the upper regimes, (3) that residual ground water contamination underlying the Property, attributable to the upgradient off-site source is at greater depths than in the mid 1980's (TCE, PCE etc. are heavier than water and tend to sink over time, or (4) a combination of the above.

Investigation of On-site Sources

Of the nine ground water sample locations at, or downgradient from on-site AOCs, VOC contamination was only identified at two locations, the former southern septic system (ST-1, ST-1D) and at the westernmost end of the drum storage area (SP-1). SP-1 is also downgradient from an active leaching ring that currently appears to receive discharge from the boiler room in Building No. 7. Such discharge may include boiler water blowdown (water that is periodically flushed from the boilers to prevent the accumulation of solids) and possibly, incidental discharges of fuel oil and other maintenance chemicals to floor drains in the boiler room. SP-1 is also located downgradient from the former motor testing area.

Only the westernmost ground water sample locations on the southern portion of the Property contained detectable VOC contaminant concentrations. At the former septic system, the westernmost sample location along the southern property boundary, TCE was detected in both the shallow and deep ground water samples, at 2.1 ug/l in ST-1 and 3.2 ug/l at ST-1D. TCE was not detected in any of the soil/sediment samples collected from the former septic system suggesting that the source of TCE is located elsewhere. This is supported by the presence of TCE in the deep sample on the upgradient property boundary (NGP-1D) which indicates that low levels of TCE are migrating onto the Property from the Roosevelt Field plume. The source of the TCE identified at the septic system location is likely also to be from the Roosevelt Field plume.

Chlorobenzene (150 ug/kg), ethyl benzene (35 ug/kg), toluene (77 ug/kg) and xylenes (240 ug/kg) were present in the upper 2 feet of soil/sediments in the more heavily contaminated of the two septic system leaching rings (SS-2). These compounds were not present in deeper soil samples (2-4 feet) from either leaching ring, or in the ground water sample collected from adjacent to the former septic system, indicating that the leaching ring materials do not represent a ground water contamination source.

TCE (5.7 ug/l) and PCE (13 ug/l) were present in the shallower ground water sample collected at SP-1, on the western end of the former drum storage area. Each of these concentrations marginally exceeds the NYSDEC Ground Water Criteria, which is 5ug/l for both TCE and PCE. No VOCs (including TCE and PCE) were present in the soils overlying SP-1. SP-1 is also located directly downgradient from the boiler room and a leaching ring/dry well that appears to receive discharge from the boiler room, discussed above. Given the characteristics of boiler blowdown and other materials used in the boiler room, it is not expected that this discharge would be a source of TCE and PCE. The presence of these chemicals in ground water at this location is likely attributable to the upgradient Roosevelt Field source. However, discharge from the boiler room to the leaching ring/dry well could constitute an unpermitted discharge to an underground injection well. Additional information regarding the leaching ring/dry well's construction and the nature of the discharge is necessary to accurately assess compliance requirements. It is likely that the discharge should be discontinued or properly permitted in accordance with the federal Underground Injection Control (UIC) program and applicable local requirements (if possible). If the discharge is discontinued, the leaching ring/dry well should be appropriately closed, in accordance with all applicable requirements. Closure would require sampling of the soils/sediments in the leaching ring/dry well, and appropriate management of such materials.

TCE and PCE were not detected in the deeper ground water sample at SP-1, although 1.3 ug/l xylenes was detected. This concentration is well below NYSDEC Ground Water criteria. Xylenes were detected in soils at the former motor testing area, which is directly north of the boiler room, and upgradient from SP-1.

No VOCs, including TCE and PCE, were detected in any of the other 12 ground water samples collected on the Property.

Other than lead, which was reported to be present at the laboratory detection limit of 0.10 mg/l in FS-1 (off the northeast corner of Building No. 8), no detectable concentrations of metals, TPH or SVOCs were identified in ground water underlying the Property. The lead result reported at FS-1 appears anomalous, and although it exceeds the NYSDEC Ground Water Criteria of 0.025 mg/l (for class GA ground water), this isolated exceedance would not indicate a need for additional investigation or remediation associated with metals contamination of ground water.

Table 2-1

Esselte Pendaflex Garden City, Long Island															
Soil Results															
Sample I.D. DS-1 DS-2 DS-3 SS-1 SS-2 SS-2 MT-1 MT-1 MT-2 MT-2 MT-3 MT-3 DW-1 DW-1 GK-1 GK-2 GK-2 FS-1															
-8' 4'-8' 28'-30' 14'-1	23'-25' 4'-8'	19'-21'	4'-8'	0'-4'	8'-12'	4'-8'	12'-16'	4'-8'	2'-4'	0'-2'	2'-4'	4'-8'	4'-8'	4'-8'	Depth Below Grade
															Constituent Detected
															Metals (ppm)
4 15 3.7 8.4	9.2 14	13							60		60				Zinc
.6 11 4.6 2.1	4 8.6	4							3.1		79				Cromium
.9 6.8 2.1 1.9	2.8 7.9	7.8							12		2.9				Copper
.6 4.1 1.7 2.6	2.6 3.6	ND							1.4		3.3				Lead
.2 5.6 5.4 5.6	1.7 5.2	1.7							1.6		3				Nickle
															Volatile Organics (ppb)
D ND ND ND	ND ND	ND	2	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	Benzene
D ND ND ND	ND ND	ND	ND	ND	ND	ND	ND	ND	ND	150	ND	ND	ND	ND	Chlorobenzene
D ND ND ND	ND ND	ND	ND	ND	ND	ND	ND	ND	ND	35	ND	ND	ND	ND	Ethyl Benzene
D ND ND ND	ND ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	Tetrachloroethylene
D ND ND ND	ND ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	Trichloroethylene
D ND ND ND	ND ND	ND	10	ND	ND	ND	ND	ND	ND	77	ND	ND	ND	ND	Toluene
D ND ND ND	ND ND	ND	7.9	ND	ND	ND	ND	ND	ND	240	ND	ND	ND	ND	Xylenes
facility.	s at the Esselte facilit	n samples	etected in	stuents de	only consi	includes	This table				ples	atory sam	he labor	ected in t	ND=Non-Detect No Semi-Volatile Organics (ppb) were det
facility.	s at the Esselte facilit	•		stuents de	•										

No Total Petroleum Hydrocarbons (ppm) were detected in the laboratory samples

Complete laboratory results are included in Appendix B.

Table 2-2

Esselte Pendaflex Garden City, Long Island															
	Ground Water Results														
Sample I.D.	ST-1	ST-1D	SP-1	SP-1D	SP-2	SP-3	NGP-1	NGP-1D	NGP-2	NGP-3	MT-1	DW-1	RB-1	RB-2	FS-1
Depth Below Grade	30'-32'	70'-72'	30'-32'	70'-72'	30'-32'	30'-32'	43'-45'		43'-45'	43'-45'	30'-32'	30'-32'	30'-32'	30'-32'	30'-32
Constituent Detected															
Metals (ppm)															
Zinc	ND										ND	ND		1	ND
Cromium	ND										ND	ND			ND
Copper	ND										ND	ND			ND
Lead	ND										ND	ND			0.1
Nickle	ND										ND	ND			ND
Volatile Organics (ppb)															
Benzene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Chlorobenzene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Ethyl Benzene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Tetrachloroethylene	ND	ND	13	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Trichloroethylene	2.1	3.2	5.7	ND	ND	ND	ND	2.6	ND	ND	ND	ND	ND	ND	ND
Toluene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Xylenes	ND	ND	ND	1.3	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
ND=Non-Detect															
No Semi-Volatrile Organics (ppb) we	re detected in	the labora	tory samp	les			This table	e includes c	nly consis	tuents dete	ected in sa	mples at t	he Esselte	facility.	

No Total Petroleum Hydrocarbons (ppm) were detected in the laboratory samples

Complete laboratory results are included in Appendix B.

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3.0 SUMMARY OF FINDINGS AND CONCLUSIONS

The Phase I investigation had identified a total of eight potential AOCs at the Property in Garden City, New York. Based upon the results of the Phase II investigation, only three AOCs were identified as having environmental impacts associated with historical operations conducted at the property. Contamination was identified in soils at the following AOCs.

- Active 20,000 gallon fuel UST
- Former Septic System (southern portion of the Property)
- Former Motor Testing Area

The soil contamination detected at each of the three AOCs is confined both horizontally and vertically. There was no significant ground water contamination attributable to any on-site soil contamination.

In addition, low levels of TCE and PCE were detected in ground water samples underlying the western portion of the Property, both upgradient and downgradient of historical operational areas. The ground water results, coupled with the fact that no TCE or PCE was detected in any on-site soil samples, suggest that some low levels of contamination from the Roosevelt Field plume are migrating under the Property.

A small subsurface vessel was identified in the courtyard between Buildings No. 1 and No. 2. This vessel is out of service and should be properly closed. Closure should include characterization and appropriate disposal of tank contents, followed by excavation and appropriate management of the vessel and any contaminated soils that may be identified. A leaching ring/dry well located south of the boiler room currently appears to receive discharge from the boiler should be evaluated for compliance with the federal Underground Injection Control (UIC) program and applicable local requirements. Based on the current information, discharge from the boiler room to the leaching ring could constitute an unpermitted discharge to an underground injection well. As such, any discharge should be discontinued or properly permitted (if possible). If the discharge is discontinued, the leaching ring/dry well should be appropriately closed, in accordance with all applicable requirements. Closure would require sampling of the soils/sediments in the leaching ring/dry well, and appropriate management of such materials.

The findings at each of the impacted AOCs is discussed below.

3.1 ACTIVE 20,000 GALLON FUEL OIL UST FINDINGS

The Phase II identified petroleum in soils at the west end of the active 20,000 gallon fuel oil UST. The petroleum appears to be confined to soils from a depth of approximately 14 feet to 23 feet below the surface, and has not resulted in any impact to ground water. The fuel oil contaminated soil should be addressed in accordance with NYSDEC requirements for such contamination.

If it is determined that it is feasible for the 20,000 gallon UST to remain is service (given potential soil excavation requirements), it should be confirmed through appropriate testing that no component of the entire tank system is currently leaking. If current testing determines that the tank system is not leaking, and can remain in service, Nassau County will require that a new owner register the UST in its name, continue to conduct annual tightness testing and remove the tank within a maximum of 9 years. If the federal exemption for underground storage tanks that store fuel oil for on-site heating is repealed, substantial modifications could be required in a shorter time period.

3.2 FORMER SEPTIC SYSTEM (SOUTHERN PORTION OF THE PROPERTY)

VOCs and metals were detected in the septic system soils and sediments. These materials are confined to the unsaturated materials directly below the leaching rings and have not migrated to ground water. The concentrations of zinc and chromium exceed the guidance values presented in NYSDEC's Technical and Administrative Guidance Memorandum: Determination of Soil Cleanup Objectives and Cleanup Levels (TAGM), and should be appropriately remediated.

The current function, if any, of the two leaching rings at the former septic system location should be determined. If the rings are not used as part of the active stormwater management system, appropriate closure requirements should be determined and implemented. Removal and appropriate disposal of contaminated soils/sediments from below the leaching rings should be incorporated into closure activities, if applicable.

3.3 FORMER MOTOR TESTING AREA

VOCs were detected in one of three soil samples collected from the former motor testing area. MT-3 contained 2 ug/kg benzene, 10 ug/kg toluene and 7.9 ug/kg xylenes in soil collected from the 4-8 foot depth interval. The identified compounds may be attributable to historical fuel spillage from testing of motors during Curtiss's period of operation at the Property.

The concentrations identified through Phase II activities are all well below the NYSDEC TAGM guidance values. The apparent age of the potential release, coupled with the absence of significant concentrations of the identified VOCs in ground water downgradient from the motor testing area (1.3 ug/l xylenes were present in SP-1D) and the fact that the impacted soil is completely capped by a building further minimizes the potential concern associated with this finding.

3.4 GROUND WATER QUALITY

Phase II ground water investigative activities identified the presence of TCE in ground water underlying the western half of the Property, both upgradient and downgradient of historical operational areas of the Property. TCE is the primary contaminant present in the ground water contamination plumes originating at the Roosevelt Field inactive hazardous waste site, and was demonstrated by USGS to have been present in ground water surrounding the Property as early as the early 1980's.

TCE was detected in only 4 of 15 ground water samples collected during the Phase II. Concentrations ranged from 2.6 ug/l to 5.7 ug/l, and averaged 3.4 ug/l in ground water samples that had TCE detections. (The site-wide average, taking into account all of the samples collected, is much lower.

TCE was identified at 2.6 ug/l in the deep upgradient sample, NGP-1D, indicating that low levels of VOCs are migrating onto the Property from the Roosevelt Field plume.

Ground water VOC contamination was only identified at two downgradient AOC locations on the Property, at the former southern septic system (ST-1, ST-1D) and at a location in the drum storage area (SP-1).

At the former septic system, the westernmost sample location along the southern property boundary, TCE was detected in both the shallow and deep ground water samples, at 2.1 ug/l in ST-1 and 3.2 ug/l at ST-1D. TCE (5.7 ug/l) and PCE (13 ug/l) were present in the shallower ground water sample collected at SP-1, at the western end of the former drum storage area. Since neither TCE nor PCE was detected in soil samples anywhere on the Property, the presence of these compounds in ground water appears to be attributable to the Roosevelt Field plume.

Xylenes were detected in the deeper ground water sample at SP-1 at 1.3 ug/l. Xylenes were detected in soils at the former motor testing area, which is directly north of the boiler room, and upgradient from SP-1. However, the xylenes concentration present in both the soil and ground water are well below NYSDEC cleanup guidance values.

No VOCs, including TCE and PCE were detected at any other ground water sample locations on the Property.

Other than lead, which was reported to be present at the laboratory detection limit of 0.10 mg/l in FS-1 (off the northeast corner of Building No. 8), no detectable concentration of metals, TPH or SVOCs were identified in ground water underlying the Property.

The lead result reported at FS-1 appears anomalous, and although it exceeds the NYSDEC Ground Water Criteria of 0.025 mg/l (for class GA ground water), this isolated exceedance would not indicate a need for additional investigation or remediation associated with metals contamination of ground water.

APPENDIX A SAMPLE COLLECTION AND FIELD SCREENING PROCEDURES

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Soil and Ground Water Sampling Procedures

Two geoprobe units supplied and operated by Zebra Environmental were mobilized December 18th, 19th, and 20th in order to collect soil and/or ground water samples. One geoprobe was mounted on an all terrain vehicle (ATV). This unit was used primarily for collection of shallow soil samples outdoors, and all indoor sample locations. The second geoprobe was mounted on the back of a pick-up truck, and was utilized for the deeper soil borings and locations from which ground water samples were collected.

Soil Sample Collection

Where Zebra's pick-up mounted Geoprobe unit was utilized for sample collection, a blind probe was driven to the depth directly above the desired sampling elevation. Subsequent to opening a probe hole or drilling a hole through pavement (if necessary), a clean Large Bore (LB) sampler was driven to the desired sampling depth(s) and a soil core approximately 22 inches long and $1^{1}/_{16}$ inches in diameter was collected. The LB sampler remains completely enclosed while it is being driven to depth, and is opened upon reaching the desired depth below grade by releasing a stop pin from the surface. Removal of the stop pin allows a piston to retract into the sample tube as it is being displaced by the soil core.

At sample locations where Zebra's ATV mounted Geoprobe was utilized, a clean Macro Core (MC) sampler was used. The Macro Core sample is approximately 44 inches long and $1^{1}/_{2}$ inches in diameter.

Each of the samplers used were fitted with an dedicated acetate linear prior to use to facilitate sample collection and inspection, and to prevent cross contamination.

At two locations, (GCSS-1 and -2), Zebra collected samples below the bottom grade of two septic system dry wells. Collection of these samples required the use of galvanized pipe to guide and support the Geoprobe drive rods through the 20 to 25 feet of open air space between the top and bottom of the dry well.

At the four sample locations that required boring inside of buildings (MT-1, -2, -3, and DW-1), Zebra utilized a core drill to penetrate the concrete floors.

Ground Water Collection

In order to collect ground water samples, a dedicated Geoprobe screen point sampler was driven to the desired depth below the water table. The sampling tube was then retracted approximately two feet, and a stainless steel screen was pushed into the resulting void using chase rods from the surface.

The design of the Geoprobe groundwater sampler allows the stainless steel screen to remain retracted within the probe rods until it is driven to the desired sampling depth. The

screen is held in place by a sacrificial point fitted with a watertight "O" ring seal. Once the desired depth is reached, chase rods are inserted down the inside of the probe rod and the screen is pushed out of the protective sheath. The sacrificial point is displaced and lost.

Once the screen had been exposed, a dedicated section of clean $^{3}/_{8}$ inch diameter polyethylene tubing was fitted with a stainless steel bottom check valve and inserted down through the probe rods to the water table. The polyethylene tubing was oscillated up and down to drive a column of water to the surface. Three to five volumes of water were purged from each sample location prior to sample collection for laboratory analysis.

After the sample collection was completed, the samples were taken to a central work station where the sample was logged and prepared for laboratory and field analysis, as necessary. Field analyses included head space analysis of the soil samples with a PID, and Quantix field test analysis for BTEX and/or total petroleum hydrocarbons (TPH).

All probe rods and samplers were steam cleaned at a contained decontamination pad between sample locations. All boreholes were sealed with bentonite and capped with blacktop or cement prior to leaving the site.

Headspace Analysis

Fifty nine of the sixty three soil samples collected were screened for the the presence of VOC vapors using a photo ionization detector (PID). After a soil sample was collected in the field, the soil core in an acetate linear was taken to the designated work area where the tubes containing the samples were emptied into two laboratory soil collection jars. One jar was filled completely for future laboratory analysis if needed and the second jar was filled partially, approximately half of the possible volume. The jar was then sealed with aluminum foil and capped. In all cases, the soil samples were allowed to warm to approximately room temperature prior to reading with the PID. The soil samples screened on Monday (12/18) were allowed to warm in Norfolk's Fairfield office before readings were taken. The soil samples which were screened on Tuesday (12/18) and Wednesday morning (12/19) were allowed to warm next to the boiler in the work station area. The remaining soil samples collected late Wednesday afternoon were allowed to equilibrate to room temperature in the warehouse prior to screening. The samples were vigorously shaken for 10 seconds both at the beginning and end of the headspace development period and then uncapped, while being careful not to disturb the foil cover on top. The end of the PID meter was then forced through the aluminum foil to collect a headspace reading. Peak VOC vapor readings were recorded. The PID was equipped with an 11.8eV UV lamp, capable of detecting most chlorinated and aromatic compounds.

Quantix Field Test Kit

Using the Quantix portable workstation immunoassay detectors, 32 soil samples were analyzed for TPH, 3 soil samples for BTEX, and 3 water samples for BTEX. Following the collection of a sample in the field, the soil core or water sample was taken to the

designated work area, where a portion of the soil core or water sample was used to run a test for BTEX and/or TPH. Once the appropriate quantity of soil/water had been removed from the field sample and placed in a designated Quantix prepared test tube, each test was run following the directions for chemical addition in the Quantix manual. After confirmation was made that the test was valid, the QuantiMeter was used to identify the presence, or lack of the consistituents for which the samples were being screened. The quantimeter is a refelctometer which measures the amount of light which is refected from the surface Quantix detector. The quantimeter was calibrated prior to each group (five or less) of samples which were run simultaneously.

APPENDIX B LABORATORY RESULTS



911 Bridgeport Avenue 900 Shelton Plaza Shelton, CT 06484

Tel: (203) 925-1133 Fax: (203) 925-1140

January 20, 1996

Mr. Mike Cody Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 4 water samples collected 1/16/96. PROJECT #: 95.028, Garden City CET #: 96-124

The samples were analyzed per EPA methods 8010 and 8020. The results are on the following pages in ppb.

Please call us if you have any questions.

David Ditta Laboratory Director

EPA METHOD 8010A HALOGENATED VOLATILE ORGANICS

			DETECTION	-
CLIENT: Norfolk Environmental PROJECT #: 95.028 CET #: 96-124	MATRIX: wat UNITS: ppb DATE ANALYZED: 1/18		ppb	

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			DETECTION
	Trip Blk	NGP-1D	LIMIT
BROMOBENZENE	ND	ND	F 0
BROMODICHLOROMETHANE	ND	ND	5.0
BROMOFORM	ND	ND	1.0
BROMOMETHANE	ND	ND	5.0
CARBON TETRACHLORIDE	ND	ND	10
CHLOROBENZENE	ND	ND	1.0
CHLOROETHANE	ND	ND	1.0
2-CHLOROETHYL VINYL ETHER	ND	ND	10
CHLOROFORM	ND		10
CHLOROMETHANE	ND	ND	1.0
DIBROMOCHLOROMETHANE	ND	ND	10
DIBROMOMETHANE	ND	ND	1.0
1,2-DICHLOROBENZENE	ND	ND	5.0
1,3-DICHLOROBENZENE	ND	ND	1.0
1,4-DICHLOROBENZENE	ND	ND	1.0
DICHLORODIFLUROMETHANE	ND	ND	1.0
1,1-DICHLOROETHANE	ND .	ND	10
1,2-DICHLOROETHANE	ND	ND	1.0
1, 1-DICHLOROETHENE	ND	ND	1.0
trans-1,2-DICHLOROETHENE	ND	ND	1.0
DICHLOROMETHANE	ND	ND	1.0
1,2-DICHLOROPROPANE	ND	ND	5.0
cis-1,3-DICHLOROPROPENE	ND	ND	1.0
trans-1, 3-DICHLOROPROPENE	ND	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	1.0
TETRACHLOROETHENE	ND ND	ND	1.0
1,1,1-TRICHLOROETHANE	ND ND	ND	1.0
1,1,2-TRICHLOROETHANE	ND ND	ND	1.0
TRICHLOROETHENE		ND	1.0
TRICHLOROFLUOROMETHANE	ND	2.6	1.0
1,2,3-TRICHLOROPROPANE	ND	ND	10
VINYL CHLORIDE	ND	ND	1.0
ATMIR CUPOKIDE	ND	ND	2.0

EPA METHOD 8020A AROMATIC VOLATILE ORGANICS

CLIENT: Norfolk Enviror PROJECT #: 95.028 CET #: 96-124	nmental	MATRIX: UNITS: DATE ANALYZED:	ppb
	Trip Blk	NGP-1D	DETECTION LIMIT
BENZENE	ND	ND	1.0
1,2 DICHLOROBENZENE	ND	ND	5.0
1,3 DICHLOROBENZENE	ND	ND	5.0
1,4 DICHLOROBENZENE	ND	ND	5.0
ETHYL BENZENE	ND	ND	1.0
TOLUENE	ND	ND	1.0
XYLENES	ND	ND	1.0

EPA METHOD 8010A HALOGENATED VOLATILE ORGANICS

CLIENT: Norfolk EnvironmentalMATRIX: waterPROJECT #: 95.028UNITS: ppbCET #: 96-124DATE ANALYZED: 1/18/96

	SP-1D	ST-1D	DETECTION LIMIT
BROMOBENZENE	ND	ND	5.0
BROMODICHLOROMETHANE	ND	ND	1.0
BROMOFORM	ND	ND	5.0
BROMOMETHANE	ND	ND	10
CARBON TETRACHLORIDE	ND	ND	1.0
CHLOROBENZENE	ND	ND	1.0
CHLOROETHANE	ND	ND	10
2-CHLOROETHYL VINYL ETHER	ND	ND	10
CHLOROFORM	ND	ND	1.0
CHLOROMETHANE	ND	ND	10
DIBROMOCHLOROMETHANE	ND	ND	· 1.0
DIBROMOMETHANE	ND	ND	5.0
1,2-DICHLOROBENZENE	ND	ND	1.0
1,3-DICHLOROBENZENE	ND	ND	1.0
1,4-DICHLOROBENZENE	ND	ND	1.0
DICHLORODIFLUROMETHANE	ND	ND	10
1,1-DICHLOROETHANE	ND	ND	1.0
1,2-DICHLOROETHANE	ND	ND	1.0
1,1-DICHLOROETHENE	ND	ND	1.0
trans-1,2-DICHLOROETHENE	ND	ND	1.0
DICHLOROMETHANE	ND	ND	5.0
1,2-DICHLOROPROPANE	ND	ND	1.0
cis-1,3-DICHLOROPROPENE	ND	ND	1.0
trans-1,3-DICHLOROPROPENE	ND	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	1.0
TETRACHLOROETHENE	ND	ND	1.0
1,1,1-TRICHLOROETHANE	ND	ND	1.0
1,1,2-TRICHLOROETHANE	ND	ND	1.0
TRICHLOROETHENE	ND	3.2	1.0
TRICHLOROFLUOROMETHANE	ND	ND	10
1,2,3-TRICHLOROPROPANE	ND	ND	1.0
VINYL CHLORIDE	ND	ND	2.0

EPA METHOD 8020A AROMATIC VOLATILE ORGANICS

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CLIENT: Norfolk Environmental	MATRIX: water
PROJECT #: 95.028	UNITS: ppb
CET #: 96-124	DATE ANALYZED: 1/18/96
	DETECTION

	SP-1D	ST-1D	LIMIT
BENZENE	ND	ND	1.0
1,2 DICHLOROBENZENE	ND	ND	5.0
1,3 DICHLOROBENZENE	ND	ND	5.0
1,4 DICHLOROBENZENE	ND	ND	5.0
ETHYL BENZENE	ND	ND	1.0
TOLUENE	ND	ND	1.0
XYLENES	1.3	ND	1.0

COMPLETE ENVIRONMENTAL TESTING, INC.

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911 Bridgeport Avenue 900 Shelton Plaza Shelton, CT 06484

Tel: (203) 925-1133 Fax: (203) 925-1140

January 6, 1996

Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 2 soil and 2 water samples received 12/22/95. PROJECT #: 95.031, Garden City CET #: 95-3959

The samples were analyzed for the parameters listed on the following pages.

Please call us if you have any questions.

Timothy Fusco Laboratory Manager

PRIORITY POLLUTANTS METALS

<u>Total Metals:</u>	DW-1-19-21	DW-1 23-25
Sb	ND<5.0	ND<5.0
As	ND<1.0	ND<1.0
Cđ	ND<1.0	ND<1.0
Ве	ND<5.0	ND<5.0
Zn	13	9.2
Cr	4.0	4.0
Cu	7.8	2.8
Pb	ND<1.0	2.6
Hg	ND<0.50	ND<0.50
Ni	1.7	1.7
Se	ND<1.0	ND<1.0
Ag	ND<1.0	ND<1.0
ТĨ	ND<10	ND<10
TPH (418.1)	<50	<50
Total Metals:	GCST-1	GCDW-1
Sb	ND<0.50	ND<0.50
As	ND<0.10	ND<0.10
Cđ	ND<0.10	ND<0.10
Ве	ND<0.50	ND<0.50
Zn	ND<0.10	ND<0.10
Cr	ND<0.10	ND<0.10
Cu	ND<0.10	ND<0.10
Pb	ND<0.10	ND<0.10
Hg	ND<0.05	ND<0.05
Ni	ND<0.10	ND<0.10
Se	ND<0.10	ND<0.10
Ag	ND<0.10	ND<0.10
Tl	ND<1.0	ND<1.0
TPH (418.1)	<1.0	<1.0

Results are in ppm.

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3959		MATRIX: soil UNITS: ppb DATE ANALYZED: 12/23/95	
י. סע	W-1 19-21	DW-1 23-25	DETECTION LIMIT
ACETONE	ND	ND	100
ACRYLONITRILE	ND	ND	50
BENZENE	ND	ND	5.0
BROMODICHLOROMETHANE	ND	ND	5.0
BROMOFORM	ND	ND	10
BROMOMETHANE	ND	ND	25
2-BUTANONE	ND	ND	50
CARBON DISULFIDE	ND	ND	10
CARBON TETRACHLORIDE	ND	ND	5.0
CHLOROBENZENE	ND	ND	5.0
CHLORODIBROMOMETHANE	ND	ND	5.0
CHLOROETHANE	ND	ND	25
2-CHLOROETHYL VINYL ETHER	ND	ND	25
CHLOROMETHANE	ND	ND	25
CHLOROFORM	ND	ND	5.0
1,2-DIBROMO-3-CHLOROPROPANE	ND	ND	10
1,2-DIBROMOETHANE	ND	ND	5.0
DIBROMOMETHANE	ND	ND	10
1,4-DICHLORO-2-BUTANE	ND	ND	10
DICHLORODIFLUOROMETHANE	ND	ND	25
1,1-DICHLOROETHANE	ND	ND	5.0
1,2-DICHLOROETHANE	ND	ND	5.0
1,1-DICHLOROETHYLENE	ND	ND	5.0
trans-1,2-DICHLOROETHYLENE	ND	ND	5.0
1,2-DICHLOROPROPANE	ND	ND	5.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	5.0
trans-1,3-DICHLOROPROPYLENE	ND	ND	5.0
ETHYL BENZENE	ND	ND	5.0

EPA METHOD 8240

VOLATILE ORGANICS BY GC/MS

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3959

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/23/95

99	DW-1 19-21	DW-1 23-25	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	5.0
2-HEXANONE	ND	ND	50
IODOMETHANE	ND	ND	25
METHYLENE CHLORIDE	ND	ND	10
METHYL METHACRYLATE	ND	ND	5.0
4-METHYL-2-PENTANONE	ND	ND	50
STYRENE	ND	ND	5.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	5.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	5.0
TETRACHLOROETHYLENE	ND	ND	5.0
TOLUENE	ND	ND	5.0
1,1,1-TRICHLOROETHANE	ND	ND	5.0
1,1,2-TRICHLOROETHANE	ND	ND	5.0
TRICHLOROETHYLENE	ND	ND	5.0
TRICHLOROFLUOROMETHANE	ND	ND	50
1,2,3-TRICHLOROPROPANE	ND	ND	5.0
VINYL ACETATE	ND	ND	25
VINYL CHLORIDE	ND	ND	10
XYLENES	ND	ND	5.0

EPA METHOD 8270 BASE/NEUTRALS, ACID EXTRACTABLES

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3959		MATRIX: soil UNITS: ppb DATE ANALYZED: 12/27/95	
	DW-1 19-21	DW-1 23-25	DETECTION LIMIT
ACENAPHTHENE	ND	ND	100
ACENAPHTHYLENE	ND	ND	100
ANTHRACENE	ND	ND	100
BENZIDINE	ND	ND	330
BENZO(a)ANTHRACENE	ND	ND	100
BENZO(b)FLUORANTHENE	ND	ND	100
BENZO (k) FLUORANTHENE	ND	ND	100
BENZO(g,h,i)PERYLENE	ND	ND	100
BENZO(a)PYRENE	ND	ND	100
Bis(2-CHLOROETHOXY)METHANE	ND	ND	330
Bis(2-CHLOROETHYL)ETHER	ND	ND	330
Bis(2-CHLOROISOPROPYL)ETHE	R ND	ND	500
Bis(2-ETHYLHEXYL) PHTHALAT	E ND	ND	330
4-BROMOPHENYL PHENYL ETHER	ND	ND	330
BUTYL BENZYL PHTHALATE	*ND	ND	330
4-CHLORO-3-METHYLPHENOL	ND	ND	330
2-CHLORONAPHTHALENE	ND	ND	330
2-CHLOROPHENOL	ND	ND	. 330
4-CHLOROPHENYL PHENYL ETHE	R ND	ND	330
CHRYSENE	ND	ND	100
DIBENZO(a,h)ANTHRACENE	ND	ND	100
DI-n-BUTYL PHTHALATE	ND	ND	330
1,2-DICHLOROBENZENE	ND	ND	330
1,3-DICHLOROBENZENE	ND	ND	330
1,4-DICHLOROBENZENE	ND	ND	330
3,3'-DICHLOROBENZIDINE	ND	ND	330
2,4-DICHLOROPHENOL	ND	ND	330
DIETHYL PHTHALATE	ND	ND	330
2,4-DIMETHYLPHENOL	ND	ND	330

EPA METHOD 8270 BASE/NEUTRALS ACID EXTRACTABLES

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3959

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/27/95

	DW-1 19-21	DW-1 23-25	DETECTION LIMIT
DIMETHYL PHTHALATE	ND	ND	330
2,4-DINTROPHENOL	ND	ND	330
2,6-DINITROTOLUENE	ND	ND	330
2,4-DINITROTOLUENE	ND	ND	330
1,2-DIPHENYLHYDRAZINE	ND	ND	330
DI-n-OCTYL PHTHALATE	ND	ND	330
FLUORANTHENE	ND	ND	100
FLUORENE	ND	ND	100
HEXACHLOROBENZENE	ND	ND	330
HEXACHLOROBUTADIENE	ND	ND	330
HEXACHLOROCYCLOPENTADIENE	ND	ND	330
HEXACHLOROETHANE	ND	ND	330
INDENO(1,2,3-cd)PYRENE	ND	ND	100
ISOPHORONE	ND	ND	330
2-METHYL-4,6-DINITROPHENOL	ND	ND	500
NAPHTHALENE	ND	ND	100
NITROBENZENE	ND	ND	330
2-NITROPHENOL	ND	ND	330
4-NITROPHENOL	ND	ND	330
N-NITROSODIMETHYLAMINE	ND	ND	330
N-NITROSODIPHENYLAMINE	ND	ND	330
N-NITROSO-DI-n-PROPYLAMINE	ND	ND	330
PENTACHLOROPHENOL	ND	ND	330
PHENANTHRENE	ND	ND	100
PHENOL	ND	ND	330
PYRENE	ND	ND	100
1,2,4-TRICHLOROBENZENE	ND	ND	330
2,4,6-TRICHLOROPHENOL	ND	ND	330

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET#: 95-3959

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MATRIX: water UNITS: ppb DATE ANALYZED: 12/23/95

	GCST-1	GCDW-1	DETECTION LIMIT
ACETONE	ND	ND	50
ACRYLONITRILE	ND	ND	25
BENZENE	ND	ND	1.0
BROMODICHLOROMETHANE	ND	ND	1.0
BROMOFORM	ND	ND	5.0
BROMOMETHANE	ND	ND	10
2-BUTANONE	ND	ND	25
CARBON DISULFIDE	ND	ND	5.0
CARBON TETRACHLORIDE	ND	ND	1.0
CHLOROBENZENE	ND	ND	1.0
CHLORODIBROMOMETHANE	ND	ND	1.0
CHLOROETHANE	ND	ND	10
2-CHLOROETHYL VINYL ETHER	ND	ND	10
CHLOROMETHANE	ND	ND	10
CHLOROFORM	ND	ND	1.0
1,2-DIBROMO-3-CHLOROPROPANE	ND	ND	5.0
1,2-DIBROMOETHANE	ND	ND	1.0
DIBROMOMETHANE	ND	ND	5.0
1,4-DICHLORO-2-BUTANE	ND .	ND	5.0
DICHLORODIFLUOROMETHANE	ND	ND	10
1,1-DICHLOROETHANE	ND	ND	1.0
1,2-DICHLOROETHANE	ND	ND	1.0
1,1-DICHLOROETHYLENE	ND	ND	1.0
trans-1,2-DICHLOROETHYLENE	ND	ND	1.0
1,2-DICHLOROPROPANE	ND	ND	1.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	1.0
trans-1,3-DICHLOROPROPYLENE	ND	ND	1.0
ETHYL BENZENE	ND	ND	1.0

CLIENT: Norfolk Environmental	MATRIX: water
PROJECT #: 95.031	UNITS: ppb
CET#: 95-3959	DATE ANALYZED: 12/23/95

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	GCST-1	GCDW-1	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	1.0
2-HEXANONE	ND	ND	25
IODOMETHANE	ND	ND	10
METHYLENE CHLORIDE	ND	ND	5.0
METHYL METHACRYLATE	ND	ND	1.0
4-METHYL-2-PENTANONE	ND	ND	25
STYRENE	ND	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	1.0
TETRACHLOROETHYLENE	ND	ND	1.0
TOLUENE	ND	ND	1.0
1,1,1-TRICHLOROETHANE	ND	ND	1.0
1,1,2-TRICHLOROETHANE	ND	ND	1.0
TRICHLOROETHYLENE	2.1	ND	1.0
TRICHLOROFLUOROMETHANE	ND	ND	25
1,2,3-TRICHLOROPROPANE	ND	ND	1.0
VINYL ACETATE	ND	ND	10
VINYL CHLORIDE	ND	ND	2.0
XYLENES	ND	ND	1.0

EPA METHOD 8270 BASE/NEUTRALS, ACID EXTRACTABLES

CLIENT: Norfolk EnvironmentalMATRIX: waterPROJECT #: 95.031UNITS: ppbCET #: 95-3959DATE ANALYZED: 12/27/95

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	GCST-1	GCDW-1	DETECTION LIMIT
ACENAPHTHENE	ND	ND	25
ACENAPHTHYLENE	ND	ND	25
ANTHRACENE	ND	ND	25
BENZIDINE	ND	ND	75
BENZO(a)ANTHRACENE	ND	ND	25
BENZO (b) FLUORANTHENE	ND	ND	25
BENZO (k) FLUORANTHENE	ND	ND	25
BENZO(g,h,i)PERYLENE	ND	ND	. 25
BENZO(a)PYRENE	ND	ND	25
Bis(2-CHLOROETHOXY)METHANE	ND	ND	75
Bis(2-CHLOROETHYL)ETHER	ND	ND	75
Bis(2-CHLOROISOPROPYL)ETHER	ND	ND	110
Bis(2-ETHYLHEXYL)PHTHALATE	ND	ND	100
4-BROMOPHENYL PHENYL ETHER	ND	ND	75
BUTYL BENZYL PHTHALATE	ND	ND	75
4-CHLORO-3-METHYLPHENOL	ND	ND	75
2-CHLORONAPHTHALENE	ND	ND	75
2-CHLOROPHENOL	ND	ND	75
4-CHLOROPHENYL PHENYL ETHER	ND	ND	75
CHRYSENE	ND	ND	25
DIBENZO(a,h)ANTHRACENE	ND	ND	25
DI-n-BUTYL PHTHALATE	ND	ND	75
1,2-DICHLOROBENZENE	ND	ND	75
1,3-DICHLOROBENZENE	ND	ND	75
1,4-DICHLOROBENZENE	ND	ND	75
3,3'-DICHLOROBENZIDINE	ND	ND	75
2,4-DICHLOROPHENOL	ND	ND	75
DIETHYL PHTHALATE	ND	ND	75
2,4-DIMETHYLPHENOL	ND	ND	75

EPA METHOD 8270 BASE/NEUTRALS ACID EXTRACTABLES

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CLIENT: Norfolk Environmental	MATRIX: water
PROJECT #: 95.031	UNITS: ppb
CET #: 95-3959	DATE ANALYZED: 12/27/95

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	GCST-1	GCDW-1	DETECTION LIMIT
DIMETHYL PHTHALATE	ND	ND	75
2-METHYL-4,6-DINITROPHENOL	ND	ND	110
2,4-DINTROPHENOL	ND	ND	75
2,6-DINITROTOLUENE	ND	ND	75
2,4-DINITROTOLUENE	ND	ND	75
1,2-DIPHENYLHYDRAZINE	ND	ND	75
Di-n-OCTYL PHTHALATE	ND	ND	75
FLUORANTHENE	ND	ND	25
FLUORENE	ND	ND	25
HEXACHLOROBENZENE	ND	ND	75
HEXACHLOROBUTADIENE	ND	ND	75
HEXACHLOROCYCLOPENTADIENE	ND	ND	75
HEXACHLOROETHANE	ND	ND	75
INDENO(1,2,3-cd)PYRENE	ND	ND	25
ISOPHORONE	ND	ND	75
NAPHTHALENE	ND	ND	25
NITROBENZENE	ND	ND	75
2-NITROPHENOL	ND	ND	75
4-NITROPHENOL	ND	ND	75
N-NITROSODIMETHYLAMINE	ND	ND	75
N-NITROSODIPHENYLAMINE	ND	ND	75
N-NITROSO-DI-n-PROPYLAMINE	ND	ND	75
PENTACHLOROPHENOL	ND	ND	75
PHENANTHRENE	ND	ND	25
PHENOL	ND	ND	25
PYRENE	ND	ND	25
1,2,4-TRICHLOROBENZENE	ND	ND	75
2,4,6-TRICHLOROPHENOL	ND	ND	75



911 Bridgeport Avenue 900 Shelton Plaza Shelton, CT 06484

Tel: (203) 925-1133 Fax: (203) 925-1140

December 23, 1995

Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 2 soil samples collected 12/18/95. PROJECT #: 95.031, Garden City CET #: 95-3962

GC10K-1-8-12 GC10K-2-8-12 <u>TPH (418.1)</u> <50 <50

Results are in ppm.

Please call us if you have any questions.

Timothy Fusco

Timothy Fusco Laboratory Manager



911 Bridgeport Avenue 900 Shelton Plaza Shelton, CT 06484

Tel: (203) 925-1133 Fax: (203) 925-1140

January 6, 1996

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Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 4 soil and 2 water samples received 12/22/95. PROJECT #: 95.031, Garden City CET #: 95-3958

The samples were analyzed for the papameters listed on the following pages.

Please call us if you have any questions.

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Timothy Fusco Laboratory Manager

PRIORITY POLLUTANTS METALS

			GK
Total Metals:	<u>GCGK-1-4-8</u>	GCGK-2-4-8	GCFV8-2-28-30
Sb	ND<5.0	ND<5.0	ND<5.0
As	ND<1.0	ND<1.0	ND<1.0
Cd	ND<1.0	ND<1.0	ND<1.0
Be	ND<5.0	ND<5.0	ND<5.0
Zn	14	15	3.7
Cr	8.6	11	4.6
Cu	7.9	6.8	2.1
Pb	3.6	4.1	1.7
Hg	ND<0.50	ND<0.50	ND<0.50
Ni	5.2	5.6	5.4
Se	ND<1.0	ND < 1.0	ND<1.0
Ag	ND<1.0	ND<1.0	ND<1.0
Tl	ND<10	ND<10	ND<10
TPH (418.1)	<50	<50	<50
<u>Total Metals:</u>	<u>GCFS-1-14-16</u>	GCFS-1	GCMT-1
Sb	ND<5.0	ND<0.50	ND<0.50
As	ND<1.0	ND<0.10	ND<0.10
Cd	ND<1.0	ND<0.10	ND<0.10
Be	ND<5.0	ND<0.50	ND<0.50
Zn	8.4	ND<0.10	ND<0.10
Cr	2.1	ND<0.10	ND<0.10
Cu	1.9	ND<0.10	ND<0.10
Pb	2.6	0.10	ND<0.10
Hg	ND<0.50	ND<0.05	ND<0.05
Ni	5.6	ND<0.10	ND<0.10
Se	ND<1.0	ND<0.10	ND<0.10
Ag	ND<1.0	ND<0.10	ND<0.10
T1	ND<10	ND<1.0	ND<1.0
TPH (418.1)	<50	<1.0	<1.0

Results are in ppm.

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3958		MATRIX: soil UNITS: ppb DATE ANALYZED: 12/23/95	
G	GCGK-1-4-8	GCGK-2-4-8	DETECTION LIMIT
ACETONE	ND	ND	100
ACRYLONITRILE	ND	ND	50
BENZENE	ND	ND	5.0
BROMODICHLOROMETHANE	ND	ND	5.0
BROMOFORM	ND	ND	10
BROMOMETHANE	ND	ND	25
2-BUTANONE	ND	ND	50
CARBON DISULFIDE	ND	ND	10
CARBON TETRACHLORIDE	ND	ND	5.0
CHLOROBENZENE	ND	ND	5.0
CHLORODIBROMOMETHANE	ND	ND	5.0
CHLOROETHANE	ND	ND	25
-CHLOROETHYL VINYL ETHER	ND	ND	25
HLOROMETHANE	ND	ND	25
HLOROFORM	ND	ND	5.0
,2-DIBROMO-3-CHLOROPROPANE	ND	ND	10
,2-DIBROMOETHANE	ND	ND	5.0
IBROMOMETHANE	ND	ND	10
,4-DICHLORO-2-BUTANE	ND	ND	10
ICHLORODIFLUOROMETHANE	ND	ND	25
,1-DICHLOROETHANE	ND	ND	5.0
,2-DICHLOROETHANE	ND	ND	5.0
,1-DICHLOROETHYLENE	ND	ND	5.0
rans-1,2-DICHLOROETHYLENE	ND	ND	5.0
,2-DICHLOROPROPANE	ND	ND	5.0
is-1,3-DICHLOROPROPYLENE	ND	ND	5.0
ans-1,3-DICHLOROPROPYLENE	ND	ND	5.0
CHYL BENZENE	ND	ND	5.0

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3958

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/23/95

	GCGK-1-4-8	GCGK-2-4-8	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	
2-HEXANONE	ND	ND	5.0
IODOMETHANE	ND	ND	50
METHYLENE CHLORIDE	ND	ND	25
METHYL METHACRYLATE	ND	ND	10
4-METHYL-2-PENTANONE	ND	ND	5.0
STYRENE	ND	ND	50
1,1,1,2-TETRACHLOROETHANE	ND	ND	5.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	5.0
TETRACHLOROETHYLENE	ND	ND ND	5.0
TOLUENE	ND	ND	5.0
1,1,1-TRICHLOROETHANE	ND		5.0
1,1,2-TRICHLOROETHANE	ND	ND	5.0
TRICHLOROETHYLENE	ND	ND	5.0
TRICHLOROFLUOROMETHANE	ND	ND	5.0
1,2,3-TRICHLOROPROPANE	ND	ND	50
VINYL ACETATE	ND	ND	5.0
VINYL CHLORIDE	ND	ND	25
XYLENES	ND ND	ND	10
	TT 11	ND	5.0

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3958

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/23/95

	GCGK-2-28-30	GCFS-1-14-16	DETECTION LIMIT
ACETONE	ND	ND	100
ACRYLONITRILE	ND	ND	100
BENZENE	ND	ND	50
BROMODICHLOROMETHANE	ND	ND	5.0
BROMOFORM	ND	ND	5.0
BROMOMETHANE	ND	ND	10
2-BUTANONE	ND	ND	25
CARBON DISULFIDE	ND	ND	50
CARBON TETRACHLORIDE	ND	ND	10
CHLOROBENZENE	'nD	ND	5.0
CHLORODIBROMOMETHANE	ND	ND	5.0
CHLOROETHANE	ND	ND	5.0
2-CHLOROETHYL VINYL ETHER	'ND	ND	25
CHLOROMETHANE	ND	ND	25
CHLOROFORM	ND	ND	25
1,2-DIBROMO-3-CHLOROPROPANE	"ND	ND	5.0
1,2-DIBROMOETHANE	ND	ND	10
DIBROMOMETHANE	ND	ND	5.0
1,4-DICHLORO-2-BUTANE	'ND	ND	10
DICHLORODIFLUOROMETHANE	ND	ND	10
1,1-DICHLOROETHANE	ND	ND	25
1,2-DICHLOROETHANE	'ND	ND	5.0
1,1-DICHLOROETHYLENE	ND		5.0
trans-1,2-DICHLOROETHYLENE	ND	ND	5.0
1,2-DICHLOROPROPANE	'ND	ND	5.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	5.0
trans-1,3-DICHLOROPROPYLENE	ND	ND	5.0
ETHYL BENZENE	ND ND	ND	5.0
		ND	5.0

EPA METHOD 8240

VOLATILE ORGANICS BY GC/MSCLIENT: Norfolk EnvironmentalMATRIX: soilPROJECT #: 95.031UNITS: ppbCET #: 95-3958DATE ANALYZED: 12/23/95

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	GCGK2-28-30	GCFS-1-14-16	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	5.0
2-HEXANONE	ND	ND	50
IODOMETHANE	ND	ND	25
METHYLENE CHLORIDE	ND	ND	10
METHYL METHACRYLATE	ND	ND	5.0
4-METHYL-2-PENTANONE	ND	ND	50
STYRENE	ND	ND	5.0
1,1,1,2-TETRACHLOROETHANE	E ND	ND	5.0
1,1,2,2-TETRACHLOROETHANE	ND ND	ND	5.0
TETRACHLOROETHYLENE	ND	ND	5.0
TOLUENE	ND	ND	5.0
1,1,1-TRICHLOROETHANE	ND	ND	5.0
1,1,2-TRICHLOROETHANE	ND	ND	5.0
TRICHLOROETHYLENE	ND	ND	5.0
TRICHLOROFLUOROMETHANE	ND	ND	50
1,2,3-TRICHLOROPROPANE	ND	ND	5.0
VINYL ACETATE	ND	ND	25
VINYL CHLORIDE	ND	ND	10
XYLENES	ND	ND	5.0

COMPLETE ENVIRONMENTAL TESTING, INC.

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET#: 95-3958		MATRIX: water UNITS: ppb DATE ANALYZED: 12/23/95	
	GCFS-1	GCMT-1	DETECTION LIMIT
ACETONE	ND	ND	50
ACRYLONITRILE	ND	ND	25
BENZENE	ND	ND	1.0
BROMODICHLOROMETHANE	ND	ND	1.0
BROMOFORM	ND	ND	5.0
BROMOMETHANE	ND	ND	10
2-BUTANONE	ND	ND	25
CARBON DISULFIDE	ND	ND	5.0
CARBON TETRACHLORIDE	ND	ND	1.0
CHLOROBENZENE	ND	ND	1.0
CHLORODIBROMOMETHANE	ND	ND	1.0
CHLOROETHANE	ND ·	ND	10
2-CHLOROETHYL VINYL ETHER	ND	ND	10
CHLOROMETHANE	ND	ND	10
CHLOROFORM	ND	ND	1.0
1,2-DIBROMO-3-CHLOROPROPANE	ND	ND	5.0
1,2-DIBROMOETHANE	ND	ND	1.0
DIBROMOMETHANE	ND .	ND	5.0
1,4-DICHLORO-2-BUTANE	ND	ND	5.0
DICHLORODIFLUOROMETHANE	ND	ND	10
1,1-DICHLOROETHANE	ND	ND	1.0
1,2-DICHLOROETHANE	ND	ND	1.0
1,1-DICHLOROETHYLENE	ND	ND	1.0
trans-1,2-DICHLOROETHYLENE	ND	ND	1.0
1,2-DICHLOROPROPANE	ND	ND	1.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	1.0
trans-1,3-DICHLOROPROPYLENE	ND	ND	1.0
ETHYL BENZENE	ND	ND	1.0

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET#: 95-3958

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MATRIX: water UNITS: ppb DATE ANALYZED: 12/23/95

	GCFS-1	GCMT-1	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	1.0
2-HEXANONE	ND	ND	25
IODOMETHANE	ND	ND	10
METHYLENE CHLORIDE	ND	ND	5.0
METHYL METHACRYLATE	ND	ND	1.0
4-METHYL-2-PENTANONE	ND	ND	25
STYRENE	ND	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	1.0
TETRACHLOROETHYLENE	ND	ND	1.0
TOLUENE	ND	ND	1.0
1,1,1-TRICHLOROETHANE	ND	ND	1.0
1,1,2-TRICHLOROETHANE	ND	ND	1.0
TRICHLOROETHYLENE	ND	ND	1.0
TRICHLOROFLUOROMETHANE	ND	ND	25
1,2,3-TRICHLOROPROPANE	ND	ND	1.0
VINYL ACETATE	ND	ND	10
VINYL CHLORIDE	ND	ND	2.0
XYLENES	ND	ND	1.0

COMPLETE ENVIRONMENTAL TESTING, INC.



911 Bridgeport Avenue 900 Shelton Plaza Shelton, CT 06484

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Tel: (203) 925-1133 Fax: (203) 925-1140

December 27, 1995

Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 2 soil and 3 water samples received 12/21/95. PROJECT #: 95.031, Garden City CET #: 95-3964

The samples were analyzed per EPA method 8240. The results are on the following pages in ppb.

Please call us if you have any questions.

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Timothy Fusco Laboratory Manager

CLIENT: Norfolk EnvironmentalMATRIX: waterPROJECT #: 95.031UNITS: ppbCET #: 95-3964DATE ANALYZED: 12/26/95

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	GCNGP-1	GCNGP-2	GCNGP-3	DETECTION LIMIT
ACETONE	ND	ND	ND	50
ACRYLONITRILE	ND	ND	ND	25
BENZENE	ND	ND	ND	1.0
BROMODICHLOROMETHANE	ND	ND	ND	1.0
BROMOFORM	ND	ND	ND	5.0
BROMOMETHANE	ND	ND	ND	10
2-BUTANONE	ND	ND	ND	25
CARBON DISULFIDE	ND	ND	ND	5.0
CARBON TETRACHLORIDE	ND	ND	ND	1.0
CHLOROBENZENE	ND	ND	ND	1.0
CHLORODIBROMOMETHANE	ND	ND	ND	1.0
CHLOROETHANE	ND	ND	ND	10
2-CHLOROETHYL VINYL ETHER	ND	ND	ND	10
CHLOROMETHANE	ND	ND	ND	10
CHLOROFORM	ND	ND	ND	1.0
1,2-DIBROMO-3-CHLOROPROPAN	E ND	ND	ND	5.0
1,2-DIBROMOETHANE	ND	ND	ND	1.0
DIBROMOMETHANE	ND	ND	ND	5.0
1,4-DICHLORO-2-BUTANE	ND	ND	ND	5.0
DICHLORODIFLUOROMETHANE	ND	ND	ND	10
1,1-DICHLOROETHANE	ND	ND	ND	1.0
1,2-DICHLOROETHANE	ND	ND	ND *	1.0
1,1-DICHLOROETHYLENE	ND	ND	ND	1.0
trans-1,2-DICHLOROETHYLENE	ND	ND	ND	1.0
1,2-DICHLOROPROPANE	ND	ND	ND	1.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	ND	1.0
trans-1,3-DICHLOROPROPYLEN	E ND	ND	ND	1.0
ETHYL BENZENE	ND	ND	ND	1.0

COMPLETE ENVIRONMENTAL TESTING, INC.

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EPA METHOD 8240

VOLATILE ORGANICS BY GC/MS

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3964

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MATRIX: water UNITS: ppb DATE ANALYZED: 12/26/95

	GCNGP-1	GCNGP-2	GCNGP-3	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	ND	1.0
2-HEXANONE	ND	ND	ND	25
IODOMETHANE	ND	ND	ND	10
METHYLENE CHLORIDE	ND	ND	ND	5.0
METHYL METHACRYLATE	ND	ND	ND	1.0
4-METHYL-2-PENTANONE	ND	ND	ND	25
STYRENE	ND	ND	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	ND	1.0
TETRACHLOROETHYLENE	ND	ND	ND	1.0
TOLUENE	ND	ND	ND	1.0
1,1,1-TRICHLOROETHANE	ND	ND	ND	1.0
1,1,2-TRICHLOROETHANE	ND	ND	ND	1.0
TRICHLOROETHYLENE	ND	ND	ND	1.0
TRICHLOROFLUOROMETHANE	ND	ND	ND	25
1,2,3-TRICHLOROPROPANE	ND	ND	ND	1.0
VINYL ACETATE	ND	ND	ND	10
VINYL CHLORIDE	ND	ND	ND	2.0
XYLENES	ND	ND	ND	1.0

CLIENT: Norfolk EnvironmentalMATRIX: soilPROJECT #: 95.031UNITS: ppbCET #: 95-3964DATE ANALYZED: 12/26/95

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	GCSS-2 0-2	GCMT-3 0-4	DETECTION LIMIT
ACETONE	ND	ND	100
ACRYLONITRILE	ND	ND	50
BENZENE	ND	ND	5.0
BROMODICHLOROMETHANE	ND	ND	5.0
BROMOFORM	ND	ND	10
BROMOMETHANE	ND	ND	25
2-BUTANONE	ND	ND	50
CARBON DISULFIDE	ND	ND	10
CARBON TETRACHLORIDE	ND	ND	5.0
CHLOROBENZENE	150	ND	5.0
CHLORODIBROMOMETHANE	ND	ND	5.0
CHLOROETHANE	ND	ND	25
2-CHLOROETHYL VINYL ETHER	ND	ND	25
CHLOROMETHANE	ND	ND	25
CHLOROFORM	ND	ND	5.0
1,2-DIBROMO-3-CHLOROPROPAN	E ND	ND	10
1,2-DIBROMOETHANE	ND	ND	5.0
DIBROMOMETHANE	ND	ND	10
1,4-DICHLORO-2-BUTANE	ND	ND	10
DICHLORODIFLUOROMETHANE	ND	ND	25
1,1-DICHLOROETHANE	ND	ND	5.0
1,2-DICHLOROETHANE	ND	ND	5.0
1,1-DICHLOROETHYLENE	ND	ND	5.0
trans-1,2-DICHLOROETHYLENE	ND	ND	5.0
1,2-DICHLOROPROPANE	ND	ND	5.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	5.0
trans-1,3-DICHLOROPROPYLEN	E ND	ND	5.0
ETHYL BENZENE	35	ND	5.0

VOLATILE ORGANICS BY GC/MS				
CLIENT: Norfolk Environmen PROJECT #: 95.031		MATRIX: soil UNITS: ppb		
CET #: 95-3964		DATE ANALYZED:		

	GCSS-2 0-2	GCMT-3 0-4	DETECTION LIMIT	
ETHYL METHACRYLATE	ND	ND	5.0	
2-HEXANONE	ND	ND	50	
IODOMETHANE	ND	ND	25	
METHYLENE CHLORIDE	ND	ND	10	
METHYL METHACRYLATE	ND	ND	5.0	
4-METHYL-2-PENTANONE	ND	ND	50	
STYRENE	ND	ND	5.0	
1,1,1,2-TETRACHLOROETHANE	ND	ND	5.0	
1,1,2,2-TETRACHLOROETHANE	ND	ND	5.0	
TETRACHLOROETHYLENE	ND	ND	5.0	
TOLUENE	77	ND	5.0	
1,1,1-TRICHLOROETHANE	ND	ND	5.0	
1,1,2-TRICHLOROETHANE	ND	ND	5.0	
TRICHLOROETHYLENE	ND	ND	5.0	
TRICHLOROFLUOROMETHANE	ND	ND	50	
1,2,3-TRICHLOROPROPANE	ND	ND	5.0	
VINYL ACETATE	ND	ND	25	
VINYL CHLORIDE	ND	ND	10	
XYLENES	240	ND	5.0	

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COMPLETE ENVIRONMENTAL TESTING, INC.

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Tel: (203) 925-1133 Fax: (203) 925-1140

December 27, 1995

Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 5 soil and 1 water samples received 12/21/95. PROJECT #: 95.031, Garden City CET #: 95-3965

		<u>TPH (418.1)</u>
GCMT-1	4-8	< 50
GCMT-1	12-16	< 50
GCMT-2	4-8	< 50
GCMT-2	8-12	< 50
GCMT-3	4-8	< 50
GCSP-2		<1.0

Results are in ppm.

In addition, the samples were analyzed per EPA method 8240. The results are on the following pages in ppb.

Please call us if you have any questions.

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Timothy Fusco Laboratory Manager

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3965

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/26/95

	GCMT-1 4-8	GCMT-1 12-16	GCMT-2 4-8	DETECTION LIMIT
ACETONE	ND	ND	ND	100
ACRYLONITRILE	ND	ND	ND	50
BENZENE	ND	ND	ND	5.0
BROMODICHLOROMETHANE	ND	ND	ND	5.0
BROMOFORM	ND	ND	ND	10
BROMOMETHANE	ND	ND	ND	25
2-BUTANONE	ND	ND	ND	50
CARBON DISULFIDE	ND	ND	ND	10
CARBON TETRACHLORIDE	ND	ND	ND	5.0
CHLOROBENZENE	ND	ND	ND	5.0
CHLORODIBROMOMETHANE	ND	ND	ND	5.0
CHLOROETHANE	ND	ND	ND	25
2-CHLOROETHYL VINYL ETHER	ND	ND	ND	25
CHLOROMETHANE	ND	ND	ND	25
CHLOROFORM	ND	ND	ND	5.0
1,2-DIBROMO-3-CHLOROPROPANE	ND	ND	ND	10
1,2-DIBROMOETHANE	ND	ND	ND	5.0
DIBROMOMETHANE	ND	ND	ND	10
1,4-DICHLORO-2-BUTANE	ND	ND	ND	10
DICHLORODIFLUOROMETHANE	ND	ND	ND	25
1,1-DICHLOROETHANE	ND	ND	ND	5.0
1,2-DICHLOROETHANE	ND	ND	' ND	5.0
1,1-DICHLOROETHYLENE	ND	ND	ND	5.0
trans-1,2-DICHLOROETHYLENE	ND	ND	ND	5.0
1,2-DICHLOROPROPANE	ND	ND	ND	5.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	ND	5.0
trans-1,3-DICHLOROPROPYLENE	ND	ND	ND	5.0
ETHYL BENZENE	ND	ND	ND	5.0

VOLATILE ORGANICS BY GC/MS

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3965

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/26/95

	GCMT-1 4-8	GCMT-1 12-16	GCMT-2 4-8	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	ND	5.0
2-HEXANONE	ND	ND	ND	50
IODOMETHANE	ND	ND	ND	25
METHYLENE CHLORIDE	ND	ND	ND	10
METHYL METHACRYLATE	ND	ND	ND	5.0
4-METHYL-2-PENTANONE	ND	ND	ND	50
STYRENE	ND	ND	ND	5.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	ND	5.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	ND	5.0
TETRACHLOROETHYLENE	ND	ND	ND	5.0
TOLUENE	ND	ND	ND	5.0
1,1,1-TRICHLOROETHANE	ND	ND	ND	5.0
1,1,2-TRICHLOROETHANE	ND	ND	ND	5.0
TRICHLOROETHYLENE	ND	ND	ND	5.0
TRICHLOROFLUOROMETHANE	ND	ND	ND	50
1,2,3-TRICHLOROPROPANE	ND	ND	ND	5.0
VINYL ACETATE	ND	ND	ND	25
VINYL CHLORIDE	ND	ND	ND	10
XYLENES	ND	ND	ND	5.0

CLIENT: Norfolk Environmental MATRIX: soil PROJECT #: 95.031 UNITS: ppb CET #: 95-3965 DATE ANALYZED: 12/26/95 GCMT-2 GCMT-3 DETECTION 8-12 4-8 LIMIT ACETONE ND ND 100 ACRYLONITRILE ND ND 50 BENZENE ND 2.0 5.0 BROMODICHLOROMETHANE ND ND 5.0 BROMOFORM ND ND 10 BROMOMETHANE ND ND 25 **2-BUTANONE** ND ND 50 CARBON DISULFIDE ND ND 10 CARBON TETRACHLORIDE ND ND 5.0 CHLOROBENZENE ND ND 5.0 CHLORODIBROMOMETHANE ND ND 5.0 CHLOROETHANE ND ND 25 2-CHLOROETHYL VINYL ETHER ND ND 25 CHLOROMETHANE ND ND 25 CHLOROFORM ND ND 5.0 1,2-DIBROMO-3-CHLOROPROPANE ND ND 10 1,2-DIBROMOETHANE ND ND 5.0 DIBROMOMETHANE ND ND 10 1,4-DICHLORO-2-BUTANE ND ND 10 DICHLORODIFLUOROMETHANE ND ND 25 1,1-DICHLOROETHANE ND ND 5.0 1,2-DICHLOROETHANE ND ND 5.0 1,1-DICHLOROETHYLENE ND ND 5.0 trans-1,2-DICHLOROETHYLENE ND ND 5.0 1,2-DICHLOROPROPANE ND ND 5.0 cis-1,3-DICHLOROPROPYLENE ND ND 5.0 trans-1,3-DICHLOROPROPYLENE ND ND 5.0 ETHYL BENZENE ND ND 5.0

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3965

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/26/95

	GCMT-2 8-12	GCMT-3 4-8	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	5.0
2-HEXANONE	ND	ND	50
IODOMETHANE	ND	ND	25
METHYLENE CHLORIDE	ND	ND	10
METHYL METHACRYLATE	ND	ND	5.0
4-METHYL-2-PENTANONE	ND	ND	50
STYRENE	ND	ND	5.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	5.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	5.0
TETRACHLOROETHYLENE	ND	ND	5.0
TOLUENE	ND	10	5.0
1,1,1-TRICHLOROETHANE	ND	ND	5.0
1,1,2-TRICHLOROETHANE	ND	ND	5.0
TRICHLOROETHYLENE	ND	ND	5.0
TRICHLOROFLUOROMETHANE	ND	ND	50
1,2,3-TRICHLOROPROPANE	ND	ND	5.0
VINYL ACETATE	ND	ND	25
VINYL CHLORIDE	ND	ND	10
XYLENES	ND	7.9	5.0

COMPLETE ENVIRONMENTAL TESTING, INC.

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3965	MATRIX: water UNITS: ppb DATE ANALYZED: 12/26/95		
	GCSP-2	DETECTION LIMIT	
ACETONE	ND	50	
ACRYLONITRILE	ND	25	
BENZENE	ND	1.0	
BROMODICHLOROMETHANE	ND	1.0	
BROMOFORM	ND	5.0	
BROMOMETHANE	ND	10	
2-BUTANONE	ND	25	
CARBON DISULFIDE	ND	5.0	
CARBON TETRACHLORIDE	ND	1.0	
CHLOROBENZENE	ND	1.0	
CHLORODIBROMOMETHANE	ND	1.0	
CHLOROETHANE	ND	10	
2-CHLOROETHYL VINYL ETHER	ND	10	
CHLOROMETHANE	ND	10	
CHLOROFORM	ND	1.0	
1,2-DIBROMO-3-CHLOROPROPANE	ND	5.0	
1,2-DIBROMOETHANE	ND	1.0	
DIBROMOMETHANE	ND	5.0	
1,4-DICHLORO-2-BUTANE	ND	5.0	
DICHLORODIFLUOROMETHANE	ND	10	
1,1-DICHLOROETHANE	ND	1.0	
1,2-DICHLOROETHANE	ND	1.0	
1,1-DICHLOROETHYLENE	ND	1.0	
trans-1,2-DICHLOROETHYLENE	ND	1.0	
1,2-DICHLOROPROPANE	ND	1.0	
cis-1,3-DICHLOROPROPYLENE	ND	1.0	
trans-1,3-DICHLOROPROPYLENE	ND	1.0	
ETHYL BENZENE	ND	1.0	

VOLATILE ORGANICS BY GC/MS

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3965

MATRIX: water UNITS: ppb DATE ANALYZED: 12/26/95

	GCSP-2	DETECTION LIMIT
ETHYL METHACRYLATE	ND	1.0
2-HEXANONE	ND	25
IODOMETHANE	ND	10
METHYLENE CHLORIDE	ND	5.0
METHYL METHACRYLATE	ND	1.0
4-METHYL-2-PENTANONE	ND	25
STYRENE	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	1.0
TETRACHLOROETHYLENE	ND	1.0
TOLUENE	ND	1.0
1,1,1-TRICHLOROETHANE	ND	1.0
1,1,2-TRICHLOROETHANE	ND	1.0
TRICHLOROETHYLENE	ND	1.0
TRICHLOROFLUOROMETHANE	ND	25
1,2,3-TRICHLOROPROPANE	ND	1.0
VINYL ACETATE	ND	10
VINYL CHLORIDE	ND	2.0
XYLENES	ND	1.0

COMPLETE ENVIRONMENTAL TESTING, INC.



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Tel: (203) 925-1133 Fax: (203) 925-1140

December 28, 1995

Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 3 water samples received 12/21/95. PROJECT #: 95.031, Garden City CET #: 95-3960

GCRB-1	
GCRB-2	
SP-3	

<u>TPH (418.1)</u> <1.0 <1.0 <1.0

Results are in ppm.

In addition, the samples were analyzed for TTO volatiles and semi-volatiles. The results are on the following pages in ppb.

Please call us if you have any questions.

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Timothy Fusco Laboratory Manager

CLIENT: Norfolk EnvironmentalMAPROJECT #: 95.031UNCET #: 95-3960DATE ANALY

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> MATRIX: water UNITS: ppb DATE ANALYZED: 12/26/95

	GCRB-1	GCRB-2	SP-3	DETECTION LIMIT
ACETONE	ND	ND	ND	50
ACRYLONITRILE	ND	ND	ND	25
BENZENE	ND	ND	ND	1.0
BROMODICHLOROMETHANE	ND	ND	ND	1.0
BROMOFORM	ND	ND	ND	5.0
BROMOMETHANE	ND	ND	ND	10
2-BUTANONE	ND	ND	ND	25
CARBON DISULFIDE	ND	ND	ND	5.0
CARBON TETRACHLORIDE	ND	ND	ND	1.0
CHLOROBENZENE	ND	ND	ND	1.0
CHLORODIBROMOMETHANE	ND	ND	ND	1.0
CHLOROETHANE	ND	ND	ND	10
2-CHLOROETHYL VINYL ETHER	ND	ND	ND	10
CHLOROMETHANE	ND	ND	ND	10
CHLOROFORM	ND	ND	ND	1.0
1,2-DIBROMO-3-CHLOROPROPANE	ND	ND	ND	5.0
1,2-DIBROMOETHANE	ND	ND	ND	1.0
DIBROMOMETHANE	ND	ND	ND	5.0
1,4-DICHLORO-2-BUTANE	ND	ND	ND	5.0
DICHLORODIFLUOROMETHANE	ND	ND	ND	10
1,1-DICHLOROETHANE	ND	ND	ND	1.0
1,2-DICHLOROETHANE	ND	ND	ND	1.0
1,1-DICHLOROETHYLENE	ND	ND	ND	1.0
trans-1,2-DICHLOROETHYLENE	ND	ND	ND	1.0
1,2-DICHLOROPROPANE	ND	ND	ND	1.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	ND	1.0
trans-1,3-DICHLOROPROPYLENE	ND	ND	ND	1.0
ETHYL BENZENE	ND	ND	ND	1.0

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3960

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MATRIX: water UNITS: ppb DATE ANALYZED: 12/26/95

	GCRB-1	GCRB-2	SP-3	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	ND	1.0
2-HEXANONE	ND	ND	ND	25
IODOMETHANE	ND	ND	ND	10
METHYLENE CHLORIDE	ND	ND	ND	5.0
METHYL METHACRYLATE	ND	ND	ND	1.0
4-METHYL-2-PENTANONE	ND	ND	ND	25
STYRENE	ND	ND	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	ND	1.0
TETRACHLOROETHYLENE	ND	ND	ND	1.0
TOLUENE	ND	ND	ND	1.0
1,1,1-TRICHLOROETHANE	ND	ND	ND	1.0
1,1,2-TRICHLOROETHANE	ND	ND	ND	1.0
TRICHLOROETHYLENE	ND	ND	ND	1.0
TRICHLOROFLUOROMETHANE	ND	ND	ND	25
1,2,3-TRICHLOROPROPANE	ND	ND	ND	1.0
VINYL ACETATE	ND	ND	ND	10
VINYL CHLORIDE	ND	ND	ND	2.0
XYLENES	ND	ND	ND	1.0

EPA METHOD 8270 BASE/NEUTRALS, ACID EXTRACTABLES

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3960		MATRIX: water UNITS: ppb DATE ANALYZED: 12/28/95		
	GCRB-1	GCRB-2	SP-3	DETECTION LIMIT
ACENAPHTHENE	ND	ND	ND	25
ACENAPHTHYLENE	ND	ND	ND	25
ANTHRACENE	ND	ND	ND	25
BENZIDINE	ND	ND	ND	75
BENZO(a)ANTHRACENE	ND	ND	ND	25
BENZO(b)FLUORANTHENE	ND	ND	ND	25
BENZO (k) FLUORANTHENE	ND	ND	ND	25
BENZO(g,h,i)PERYLENE	ND	ND	ND	25
BENZO(a)PYRENE	ND	ND	ND	25
Bis(2-CHLOROETHOXY)METHANE	ND	ND	ND	75
Bis(2-CHLOROETHYL)ETHER	ND	ND	ND	75
Bis(2-CHLOROISOPROPYL)ETHER	ND	ND	ND	110
Bis(2-ETHYLHEXYL)PHTHALATE	ND	ND	ND	100
4-BROMOPHENYL PHENYL ETHER	ND	ND	ND	75
BUTYL BENZYL PHTHALATE	ND	ND	ND	75
4-CHLORO-3-METHYLPHENOL	ND	ND	ND	75
2-CHLORONAPHTHALENE	ND	ND	ND	75
2-CHLOROPHENOL	ND	ND	ND	75
4-CHLOROPHENYL PHENYL ETHER	ND	ND	ND	75
CHRYSENE	ND	ND	ND	25
DIBENZO(a,h)ANTHRACENE	ND	ND	ND	25
DI-n-BUTYL PHTHALATE	ND	ND	ND	75
1,2-DICHLOROBENZENE	ND	ND	ND	75
1,3-DICHLOROBENZENE	ND	ND	ND	75
1,4-DICHLOROBENZENE	ND	ND	ND	75
3,3'-DICHLOROBENZIDINE	ND	ND	ND	75
2,4-DICHLOROPHENOL	ND	ND	ND	75
DIETHYL PHTHALATE	ND	ND	ND	75
2,4-DIMETHYLPHENOL	ND	ND	ND	75

EPA METHOD 8270 BASE/NEUTRALS ACID EXTRACTABLES

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3960

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MATRIX: water UNITS: ppb DATE ANALYZED: 12/28/95

	GCRB-1	GCRB-2	SP-3	DETECTION LIMIT
DIMETHYL PHTHALATE	ND	ND	ND	75
2-METHYL-4,6-DINITROPHENOL	ND	ND	ND	110
2,4-DINTROPHENOL	ND	ND	ND	75
2,6-DINITROTOLUENE	ND	ND	ND	75
2,4-DINITROTOLUENE	ND	ND	ND	75
1,2-DIPHENYLHYDRAZINE	ND	ND	ND	75
Di-n-OCTYL PHTHALATE	ND	ND	ND	75
FLUORANTHENE	ND	ND	ND	25
FLUORENE	ND	ND	ND	25
HEXACHLOROBENZENE	ND	ND	ND	75
HEXACHLOROBUTADIENE	ND	ND	ND	75
HEXACHLOROCYCLOPENTADIENE	ND	ND	ND	75
HEXACHLOROETHANE	ND	ND	ND	75
INDENO(1,2,3-cd)PYRENE	ND	ND	ND	25
ISOPHORONE	ND	ND	ND	75
NAPHTHALENE	ND	ND	ND	25
NITROBENZENE	ND	ND	ND	75
2-NITROPHENOL	ND	ND	ND	75
4-NITROPHENOL	ND	ND	ND	75
N-NITROSODIMETHYLAMINE	ND	ND	ND	75
N-NITROSODIPHENYLAMINE	ND	ND	ND	75
N-NITROSO-DI-n-PROPYLAMINE	ND	ND	ND	75
PENTACHLOROPHENOL	ND	ND	ND	75
PHENANTHRENE	ND	ND	ND	25
PHENOL	ND	ND	ND	25
PYRENE	ND	ND	ND	25
1,2,4-TRICHLOROBENZENE	ND	ND	ND	75
2,4,6-TRICHLOROPHENOL	ND	ND	ND	75



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Tel: (203) 925-1133 Fax: (203) 925-1140

January 6, 1996

Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 2 soil samples received 12/22/95. PROJECT #: 95.031, Garden City CET #: 95-3963

<u>Total Metals:</u>	<u>GCSS-1-2-4</u>	<u>GCSS-2-2-4</u>
Sb	ND<5.0	ND<5.0
As	ND<1.0	ND<1.0
Cd	ND<1.0	ND<1.0
Ве	ND<5.0	ND<5.0
Zn	60	60
Cr	79	3.1
Cu	2.9	12
Pb	3.3	1.4
Hg	ND<0.50	ND<0.50
NĪ	3.0	1.6
Se	ND<1.0	ND<1.0
Ag	ND<1.0	ND<1.0
TĪ	ND<10	ND<10

Results are in ppm.

In addition, the samples were analyzed per EPA methods 8240 and 8270. The results are on the following pages in ppb.

Please call us if you have any questions.

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Timothy Fusc**o** Laboratory Manager

CLIENT: Norfolk Environmental	MATRIX: soil
PROJECT #: 95.031	UNITS: ppb
CET #: 95-3963	DATE ANALYZED: 12/23/95

	GCSS-1-2-4	GCSS-2-2-4	DETECTION LIMIT
ACETONE	ND	ND	100
ACRYLONITRILE	ND	ND	50
BENZENE	ND	ND	5.0
BROMODICHLOROMETHANE	ND	ND	5.0
BROMOFORM	ND	ND	10
BROMOMETHANE	ND	ND	25
2-BUTANONE	ND	ND	50
CARBON DISULFIDE	ND	ND	10
CARBON TETRACHLORIDE	ND	ND	5.0
CHLOROBENZENE	ND	ND	5.0
CHLORODIBROMOMETHANE	ND	ND	5.0
CHLOROETHANE	ND	ND	25
2-CHLOROETHYL VINYL ETHER	ND	ND	25
CHLOROMETHANE	ND	ND	25
CHLOROFORM	ND	ND	5.0
1,2-DIBROMO-3-CHLOROPROPAN	NE ND	ND	10
1,2-DIBROMOETHANE	ND	ND	5.0
DIBROMOMETHANE	ND	ND	10
1,4-DICHLORO-2-BUTANE	ND	ND	10
DICHLORODIFLUOROMETHANE	ND	ND	25
1,1-DICHLOROETHANE	ND	ND	5.0
1,2-DICHLOROETHANE	ND	ND	5.0
1,1-DICHLOROETHYLENE	ND	ND	5.0
trans-1,2-DICHLOROETHYLEN	E ND	ND	5.0
1,2-DICHLOROPROPANE	ND	ND	5.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	5.0
trans-1,3-DICHLOROPROPYLE	IE ND	ND	5.0
ETHYL BENZENE	ND	ND	5.0

VOLATILE ORGANICS BY GC/MS

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3958

MATRIX: soil UNITS: ppb DATE ANALYZED: 12/23/95

	GCSS-1-2-4	GCSS-2-2-4	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	5.0
2-HEXANONE	ND	ND	50
IODOMETHANE	ND	ND	25
METHYLENE CHLORIDE	ND	ND	10
METHYL METHACRYLATE	ND	ND	5.0
4-METHYL-2-PENTANONE	ND	ND	50
STYRENE	ND	ND	5.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	5.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	5.0
TETRACHLOROETHYLENE	ND	ND	5.0
TOLUENE	ND	ND	5.0
1,1,1-TRICHLOROETHANE	ND	ND	5.0
1,1,2-TRICHLOROETHANE	ND	ND	5.0
TRICHLOROETHYLENE	ND	ND	5.0
TRICHLOROFLUOROMETHANE	ND	ND	50
1,2,3-TRICHLOROPROPANE	ND	ND	5.0
VINYL ACETATE	ND	ND	25
VINYL CHLORIDE	ND	ND	10
XYLENES	ND	ND	5.0

EPA METHOD 8270 BASE/NEUTRALS, ACID EXTRACTABLES

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3963		MATRIX: soil UNITS: ppb DATE ANALYZED: 12/27/95			
G	CSS-1-2-4	GCSS-2-2-4	DETECTION LIMIT		
ACENAPHTHENE	ND	ND	100		
ACENAPHTHYLENE	ND	ND	100		
ANTHRACENE	ND	ND	100		
BENZIDINE	ND	ND	330		
BENZO(a)ANTHRACENE	ND	ND	100		
BENZO (b) FLUORANTHENE	ND	ND	100		
BENZO (k) FLUORANTHENE	ND	ND	100		
BENZO(g,h,i)PERYLENE	ND	ND	100		
BENZO(a)PYRENE	ND	ND	100		
Bis(2-CHLOROETHOXY)METHANE	ND	ND	330		
Bis(2-CHLOROETHYL)ETHER	ND	ND	330		
Bis(2-CHLOROISOPROPYL)ETHER	ND	ND	500		
Bis(2-ETHYLHEXYL) PHTHALATE	ND	ND	330		
4-BROMOPHENYL PHENYL ETHER	ND	ND	330		
BUTYL BENZYL PHTHALATE	ND	ND	330		
4-CHLORO-3-METHYLPHENOL	ND	ND	330		
2-CHLORONAPHTHALENE	ND	ND	330		
2-CHLOROPHENOL	ND	ND	330		
4-CHLOROPHENYL PHENYL ETHER	ND	ND	330		
CHRYSENE	ND	ND	100		
DIBENZO(a,h)ANTHRACENE	ND	ND	100		
DI-n-BUTYL PHTHALATE	ND	ND	330		
1,2-DICHLOROBENZENE	ND	ND	330		
1,3-DICHLOROBENZENE	ND	ND	330		
1,4-DICHLOROBENZENE	ND	ND	330		
3,3'-DICHLOROBENZIDINE	ND	ND	330		
2,4-DICHLOROPHENOL	ND	ND	330		
DIETHYL PHTHALATE	ND	ND	330		
2,4-DIMETHYLPHENOL	ND	ND	330		

EPA METHOD 8270 BASE/NEUTRALS ACID EXTRACTABLES

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CLIENT: Norfolk Environmental	MATRIX: soil
PROJECT #: 95.031	UNITS: ppb
CET #: 95-3963	DATE ANALYZED: 12/27/95

	GCSS-1-2-4	GCSS-2-2-4	DETECTION LIMIT
DIMETHYL PHTHALATE	ND	ND	330
2,4-DINTROPHENOL	ND	ND	330
2,6-DINITROTOLUENE	ND	ND	330
2,4-DINITROTOLUENE	ND	ND	330
1,2-DIPHENYLHYDRAZINE	ND	ND	330
DI-n-OCTYL PHTHALATE	ND	ND	330
FLUORANTHENE	ND	ND	100
FLUORENE	ND	ND	100
HEXACHLOROBENZENE	ND	ND	330
HEXACHLOROBUTADIENE	ND	ND	330
HEXACHLOROCYCLOPENTADIENE	ND	ND	330
HEXACHLOROETHANE	ND	ND	330
INDENO(1,2,3-cd)PYRENE	ND	ND	100
ISOPHORONE	ND	ND	330
2-METHYL-4,6-DINITROPHENOL	ND	ND	500
NAPHTHALENE	ND	ND	100
NITROBENZENE	ND	ND	330
2-NITROPHENOL	ND	ND	330
4-NITROPHENOL	ND	ND	330
N-NITROSODIMETHYLAMINE	ND	ND	330
N-NITROSODIPHENYLAMINE	ND	ND	330
N-NITROSO-DI-n-PROPYLAMINE	ND	ND	330
PENTACHLOROPHENOL	ND	ND	330
PHENANTHRENE	ND	ND	100
PHENOL	ND	ND	330
PYRENE	ND	ND	100
1,2,4-TRICHLOROBENZENE	ND	ND	330
2,4,6-TRICHLOROPHENOL	ND	ND	330



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December 28, 1995

Mr. Bob Ehlers Norfolk Environmental 1583 Post Road Fairfield, CT 06430

RE: Analysis of 3 soil and 1 water samples received 12/21/95. PROJECT #: 95.031, Garden City CET #: 95-3961

The samples were analyzed for TTO volatiles and semi-volatiles. The results are on the following pages in ppb.

Please call us if you have any questions.

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Timothy Fusco Laboratory Manager

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3965	DATE	MATRIX: UNITS: ANALYZED:	ppb	
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	SP-1	DETECTION LIMIT
ACETONE	ND	50
ACRYLONITRILE	ND	25
BENZENE	ND	1.0
BROMODICHLOROMETHANE	ND	1.0
BROMOFORM	ND	5.0
BROMOMETHANE	ND	10
2-BUTANONE	ND	25
CARBON DISULFIDE	ND	5.0
CARBON TETRACHLORIDE	ND	1.0
CHLOROBENZENE	ND	1.0
CHLORODIBROMOMETHANE	ND	1.0
CHLOROETHANE	ND	10
2-CHLOROETHYL VINYL ETHER	ND	10
CHLOROMETHANE	ND	10
CHLOROFORM	ND	1.0
1,2-DIBROMO-3-CHLOROPROPANE	ND	5.0
1,2-DIBROMOETHANE	ND	1.0
DIBROMOMETHANE	ND	5.0
1,4-DICHLORO-2-BUTANE	ND	5.0
DICHLORODIFLUOROMETHANE	ND	10
1,1-DICHLOROETHANE	ND	1.0
1,2-DICHLOROETHANE	ND	1.0
1,1-DICHLOROETHYLENE	ND	1.0
trans-1,2-DICHLOROETHYLENE	ND	1.0
1,2-DICHLOROPROPANE	ND	1.0
cis-1,3-DICHLOROPROPYLENE	ND	1.0
trans-1,3-DICHLOROPROPYLENE	ND	1.0
ETHYL BENZENE	ND	1.0

VOLATILE ORGANICS BY GC/MS

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3961

MATRIX: water UNITS: ppb DATE ANALYZED: 12/26/95

	SP-1	DETECTION LIMIT
ETHYL METHACRYLATE	ND	1.0
2-HEXANONE	ND	25
IODOMETHANE	ND	10
METHYLENE CHLORIDE	ND	5.0
METHYL METHACRYLATE	ND	1.0
4-METHYL-2-PENTANONE	ND	25
STYRENE	ND	1.0
1,1,1,2-TETRACHLOROETHANE	ND	1.0
1,1,2,2-TETRACHLOROETHANE	ND	1.0
TETRACHLOROETHYLENE	13	1.0
TOLUENE	ND	1.0
1,1,1-TRICHLOROETHANE	ND	1.0
1,1,2-TRICHLOROETHANE	ND	1.0
TRICHLOROETHYLENE	5.7	1.0
TRICHLOROFLUOROMETHANE	ND	25
1,2,3-TRICHLOROPROPANE	ND	1.0
VINYL ACETATE	ND	10
VINYL CHLORIDE	ND	2.0
XYLENES	ND	1.0

COMPLETE ENVIRONMENTAL TESTING, INC.

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3961

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/26/95

	GCDS-1 4-8	GCDS-2 4-8	GCDS-3 4-8	DETECTION LIMIT
ACETONE	ND	ND	ND	100
ACRYLONITRILE	ND	ND	ND	50
BENZENE	ND	ND	ND	5.0
BROMODICHLOROMETHANE	ND	ND	ND	5.0
BROMOFORM	ND	ND	ND	10
BROMOMETHANE	ND	ND	ND	25
2-BUTANONE	ND	ND	ND	50
CARBON DISULFIDE	ND	ND	ND	10
CARBON TETRACHLORIDE	ND	ND	ND	5.0
CHLOROBENZENE	ND	ND	ND	5.0
CHLORODIBROMOMETHANE	ND	ND	ND	5.0
CHLOROETHANE	ND	ND	ND	25
2-CHLOROETHYL VINYL ETHER	ND	ND	ND	25
CHLOROMETHANE	ND	ND	ND	25
CHLOROFORM	ND	ND	ND	5.0
1,2-DIBROMO-3-CHLOROPROPANE	ND	ND	ND	10
1,2-DIBROMOETHANE	ND	ND	ND	5.0
DIBROMOMETHANE	ND	ND	ND	10
1,4-DICHLORO-2-BUTANE	ND	ND	ND	10
DICHLORODIFLUOROMETHANE	ND	ND	ND	25
1,1-DICHLOROETHANE	ND	ND	ND	5.0
1,2-DICHLOROETHANE	ND	ND	ND	5.0
1,1-DICHLOROETHYLENE	ND	ND	ND	5.0
trans-1,2-DICHLOROETHYLENE	ND	ND	ND	5.0
1,2-DICHLOROPROPANE	ND	ND	ND	5.0
cis-1,3-DICHLOROPROPYLENE	ND	ND	ND	5.0
trans-1,3-DICHLOROPROPYLENE	ND	ND	ND	5.0
ETHYL BENZENE	ND	ND	ND	5.0

VOLATILE ORGANICS BY GC/MS

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3961

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MATRIX: soil UNITS: ppb DATE ANALYZED: 12/26/95

	GCDS-1 4-8	GCDS-2 4-8	GCDS-3 4-8	DETECTION LIMIT
ETHYL METHACRYLATE	ND	ND	ND	5.0
2-HEXANONE	ND	ND	ND	50
IODOMETHANE	ND	ND	ND	25
METHYLENE CHLORIDE	ND	ND	ND	10
METHYL METHACRYLATE	ND	ND	ND	5.0
4-METHYL-2-PENTANONE	ND	ND	ND	50
STYRENE	ND	ND	ND	5.0
1,1,1,2-TETRACHLOROETHANE	ND	ND	ND	5.0
1,1,2,2-TETRACHLOROETHANE	ND	ND	ND	5.0
TETRACHLOROETHYLENE	ND	ND	ND	5.0
TOLUENE	ND	ND	ND	5.0
1,1,1-TRICHLOROETHANE	ND	ND	ND	5.0
1,1,2-TRICHLOROETHANE	ND	ND	ND	5.0
TRICHLOROETHYLENE	ND	ND	ND	5.0
TRICHLOROFLUOROMETHANE	ND	ND	ND	50
1,2,3-TRICHLOROPROPANE	ND	ND	ND	5.0
VINYL ACETATE	ND	ND	ND	25
VINYL CHLORIDE	ND	ND	ND	10
XYLENES	ND	ND	ND	5.0

EPA METHOD 8270 BASE/NEUTRALS, ACID EXTRACTABLES

CLIENT: Norfolk Environmental MATRIX: soil PROJECT #: 95.031 UNITS: ppb CET #: 95-3961 DATE ANALYZED: 12/28/95 GCDS-1 GCDS-2 GCDS-3 DETECTION 4 - 84-8 4-8 LIMIT ACENAPHTHENE ND ND ND 100 ACENAPHTHYLENE ND ND ND 100 ANTHRACENE ND ND ND 100 BENZIDINE ND ND ND 330 **BENZO(a)**ANTHRACENE ND ND ND 100 **BENZO(b)FLUORANTHENE** ND ND ND 100 BENZO(k)FLUORANTHENE ND ND ND 100 BENZO(g,h,i)PERYLENE ND ND ND 100 BENZO(a)PYRENE ND ND ND 100 Bis(2-CHLOROETHOXY)METHANE ND ND ND 330 Bis(2-CHLOROETHYL)ETHER ND ND ND 330 Bis(2-CHLOROISOPROPYL)ETHER ND ND ND 500 Bis(2-ETHYLHEXYL) PHTHALATE ND ND ND 330 4-BROMOPHENYL PHENYL ETHER ND ND ND 330 BUTYL BENZYL PHTHALATE ND ND ND 330 4-CHLORO-3-METHYLPHENOL ND ND ND 330 2-CHLORONAPHTHALENE ND ND ND 330 2-CHLOROPHENOL ND ND ND 330 4-CHLOROPHENYL PHENYL ETHER ND ND ND 330 CHRYSENE ND ND ND 100 DIBENZO(a, h)ANTHRACENE ND ND ND 100 DI-n-BUTYL PHTHALATE ND ND ND 330 1,2-DICHLOROBENZENE ND ND ND 330 1,3-DICHLOROBENZENE ND ND ND 330 1,4-DICHLOROBENZENE ND ND ND 330 3,3'-DICHLOROBENZIDINE ND ND ND 330 2,4-DICHLOROPHENOL ND ND ND 330 DIETHYL PHTHALATE ND ND ND 330 2,4-DIMETHYLPHENOL ND ND ND 330

EPA METHOD 8270 BASE/NEUTRALS ACID EXTRACTABLES

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3961		D.	MATRIX: soil UNITS: ppb DATE ANALYZED: 12/28/9		
	GCDS-1 4-8	GCDS-2 4-8	GCDS-3 4-8	DETECTION LIMIT	
DIMETHYL PHTHALATE	ND	ND	ND	330	
2,4-DINTROPHENOL	ND	ND	ND	330	
2,6-DINITROTOLUENE	ND	ND	ND	330	
2,4-DINITROTOLUENE	ND	ND	ND	330	
1,2-DIPHENYLHYDRAZINE	ND	ND	ND	330	
DI-n-OCTYL PHTHALATE	ND	ND	ND	330	
FLUORANTHENE	ND	ND	ND	100	
FLUORENE	ND	ND	ND	100	
HEXACHLOROBENZENE	ND	ND	ND	330	
HEXACHLOROBUTADIENE	ND	ND	ND	330	
HEXACHLOROCYCLOPENTADIENE	ND	ND	ND	330	
HEXACHLOROETHANE	ND	ND	ND	330	
INDENO(1,2,3-cd)PYRENE	ND	ND	ND	100	
ISOPHORONE	ND	ND	ND	330	
2-METHYL-4,6-DINITROPHENOL	ND	ND	ND	500	
NAPHTHALENE	ND	ND	ND	100	
NITROBENZENE	ND	ND	ND	330	
2-NITROPHENOL	ND	ND	ND	330	
4-NITROPHENOL	ND	ND	ND	330	
N-NITROSODIMETHYLAMINE	ND	ND	ND	330	
N-NITROSODIPHENYLAMINE	ND	ND	ND	330	
N-NITROSO-DI-n-PROPYLAMINE	ND	ND	ND	330	
PENTACHLOROPHENOL	ND	ND	ND	330	
PHENANTHRENE	ND	ND	ND	100	
PHENOL	ND	ND	ND	330	
PYRENE	ND	ND	ND	100	
1,2,4-TRICHLOROBENZENE	ND	ND	ND	330	
2,4,6-TRICHLOROPHENOL	ND	ND	ND	330	

EPA METHOD 8270 BASE/NEUTRALS, ACID EXTRACTABLES

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CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 05.2061		MATRIX: water UNITS: ppb DATE ANALYZED: 12/28/95		
CET #: 95-3961		DATE ANALYZED:	12/28/95	
	SP-1		DETECTION LIMIT	
ACENAPHTHENE	ND		25	
ACENAPHTHYLENE	ND		25	
ANTHRACENE	ND		25	
BENZIDINE	ND		75	
BENZO (a) ANTHRACENE	ND		25	
BENZO (b) FLUORANTHENE	ND		25	
BENZO(k)FLUORANTHENE	ND		25	
BENZO(g,h,i)PERYLENE	ND		25	
BENZO(a)PYRENE	ND		25	
Bis(2-CHLOROETHOXY)METHANE	ND		75	
Bis(2-CHLOROETHYL)ETHER	ND		75	
Bis(2-CHLOROISOPROPYL)ETHER	ND		110	
Bis(2-ETHYLHEXYL)PHTHALATE	ND		100	
4-BROMOPHENYL PHENYL ETHER	ND		75	
BUTYL BENZYL PHTHALATE	ND		75	
4-CHLORO-3-METHYLPHENOL	ND		75	
2-CHLORONAPHTHALENE	ND		75	
2-CHLOROPHENOL	ND		75	
4-CHLOROPHENYL PHENYL ETHER	ND		75	
CHRYSENE	ND		25	
DIBENZO(a,h)ANTHRACENE	ND		25	
DI-n-BUTYL PHTHALATE	ND		75	
1,2-DICHLOROBENZENE	ND		75	
1,3-DICHLOROBENZENE	ND		75	
1,4-DICHLOROBENZENE	ND		75	
3,3'-DICHLOROBENZIDINE	ND		75	
2,4-DICHLOROPHENOL	ND		75	
DIETHYL PHTHALATE	ND		75	
2,4-DIMETHYLPHENOL	ND		75	

EPA METHOD 8270 BASE/NEUTRALS ACID EXTRACTABLES

CLIENT: Norfolk Environmental PROJECT #: 95.031 CET #: 95-3961

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MATRIX: water UNITS: ppb DATE ANALYZED: 12/28/95

	SP-1	DETECTION LIMIT
DIMETHYL PHTHALATE	ND	75
2-METHYL-4,6-DINITROPHENOL	ND	110
2,4-DINTROPHENOL	ND	75
2,6-DINITROTOLUENE	ND	75
2,4-DINITROTOLUENE	ND	75
1,2-DIPHENYLHYDRAZINE	ND	75
Di-n-OCTYL PHTHALATE	ND	75
FLUORANTHENE	ND	25
FLUORENE	ND	25
HEXACHLOROBENZENE	ND	75
HEXACHLOROBUTADIENE	ND	75
HEXACHLOROCYCLOPENTADIENE	ND	75
HEXACHLOROETHANE	ND	75
INDENO(1,2,3-cd)PYRENE	ND	25
ISOPHORONE	ND	75
NAPHTHALENE	ND	25
NITROBENZENE	ND	75
2-NITROPHENOL	ND	75
4-NITROPHENOL	ND	75
N-NITROSODIMETHYLAMINE	ND	75
N-NITROSODIPHENYLAMINE	ND	75
N-NITROSO-DI-n-PROPYLAMINE	ND	75
PENTACHLOROPHENOL	ND	75
PHENANTHRENE	ND	25
PHENOL	ND	25
PYRENE	ND	25
1,2,4-TRICHLOROBENZENE	ND	75
2,4,6-TRICHLOROPHENOL	ND	75