ARCADIS GERAGHTY & MILLER

Part 373 Closure Plan

Former Unisys Facility
Great Neck, New York

PREPARED FOR

Lockheed Martin Corporation

ARCADIS GERAGHTY & MILLER

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Disclosure Statement

The laws of New York State require that the corporations, which render engineering services in New York, be owned by individuals licensed to practice engineering in the State. ARCADIS Geraghty & Miller, Inc. cannot meet that requirement. Therefore, all engineering services rendered to Lockheed Martin Corporation in New York are being performed by GM Consulting Engineers, P.C., a New York professional corporation qualified to render professional engineering in New York. There is no surcharge or extra expense associated with the rendering of professional services by GM Consulting Engineers, P.C.

ARCADIS Geraghty & Miller, Inc. is performing all those services, which do not constitute professional engineering and is providing administrative and personnel support to GM Consulting Engineers, P.C. All matters relating to the administration of the contract with Lockheed Martin Corporation are being performed by ARCADIS Geraghty & Miller, Inc. pursuant to its Amended and Restated Services Agreement with GM Consulting Engineers, P.C. All communications should be referred to the designated project manager at ARCADIS Geraghty & Miller.

1. Introduction

1.1 Scope and Objective

The purpose of this closure plan is to outline closure procedures for the identified "hazardous waste management units" (HWMU) and areas of potential concern (AOPC) at the Former Unisys facility, located at 365 Lakeville Road, Nassau County, New York. The areas to be closed were, or may have been, used for hazardous waste storage or management or exhibit evidence of a hazardous waste release. This plan was prepared in conformance with Title 6 of the New York Code of Rules and Regulations (6NYCRR), Part 373 – Hazardous Waste Management Facilities and is a revision to the "Part 373 Closure Plan, Lockheed Martin, Great Neck, New York"; prepared by H2M Group (H2M) dated May 1998.

The activities described in this Closure Plan will eliminate post-closure maintenance of the hazardous waste management facilities and ensures that there will be no post-closure release of hazardous waste to the environment. 6NYCRR, Part 373 – Hazardous Waste Management Facilities, regulates all Treatment, Storage and Disposal (TSD) facilities as well as large quantity hazardous waste generators in the State of New York. Closure requirements under 6NYCRR Part 373-3.7 are applicable to the former Unisys facility because more than 1,000 kilograms of hazardous waste were generated in a calendar month while the facility was in operation, and the facility is located over a sole source aquifer in Nassau County, Long Island, New York.

1.2 Overview

H2M prepared a "Phase I Environmental Assessment Report" (EA) for Lockheed Martin Corporation (LMC), dated August 1997, which identified 40 areas of potential concern at the site. Two reports, identified in H2M's EA, include Eagle Industrial Hygiene Associates', "Final Report for Decontamination and Decommissioning at Great Neck Manufacturing Facility", dated July 1995 and Loral Corporation's Due Diligence Sampling Plan, dated July 1995. In November 1997, Emcon completed a Facilities Investigation (FA) to identify, quantify, and document materials of environmental concern at the facility. Results from the FA are included in Section 3 of this Closure Plan.

H2M and New York State Department of Environmental Conservation (NYSDEC) determined that four of the 40 areas identified in the EA should be included in the Part 373 Closure program. H2M then prepared a Closure Plan for the site, dated May 1998,

which was conditionally approved by the NYSDEC. Four of the 40 AOPC were identified by the NYSDEC as HWMU and two areas are included in the State Superfund Record of Decision (ROD) for Operable Unit 1 (OU-1), dated March 1997. In the summer and fall of 1998, after the submission and conditional NYSDEC approval of the May 1998 Closure Plan, Emcon was contracted to undertake a soil investigation and prepared a report entitled "Phase I Site Soil Investigation" dated October 8, 1998.

NYSDEC reviewed Emcon's October, 1998 soil investigation report and informally indicated that several additional areas should be addressed in the Part 373 Closure Plan. On January 13, 2000, NYSDEC project manager, Shaun Snee met with ARCADIS Geraghty & Miller, Inc. and LMC. At the meeting, NYSDEC provided a memorandum from Fanning, Phillips and Molnar Group (FPM), dated May 11, 1999, which, based on interviews of former employees, purported to document releases in several areas that had not been previously identified. NYSDEC then prepared a letter regarding "Facility Closure", dated February 14, 2000 that expanded on the May 11, 1999 FPM memorandum. Five additional AOPC were identified in the May 11, 1999 Fanning, Phillips & Molnar memorandum; one additional AOPC was identified in the February 14, 2000 NYSDEC letter.

Each AOPC identified is listed, along with a description of its historical operation and any applicable investigation results, in Table 1. The rationale and justifications for including areas where additional investigation is warranted are also listed in Table 1 and described in Section 3 of this Closure Plan. Analytical results for two soil borings, advanced by ARCADIS Geraghty & Miller, Inc. in February 2000, are summarized in Table 2. A site location map is included as Figure 1, the facility site plan is included as Figure 2, and Figure 3 depicts AOPC, locations of soil borings, and areas where additional work is warranted. The four HWMU discussed in previous versions of this report are listed as Areas 7, 8, 13, and 17, and the two areas covered under the OU-1 ROD and addressed by an Administrative Order on Consent (AOC) are listed as Areas 19 and 23 in Table 1. The rationale and justifications for concluding that any AOPC does not require any additional investigation are also provided in Table 1.

The procedures for addressing the HWMU and AOPC are given in Section 4 of this closure plan. In general, if a building is to be reused and not demolished, the area for future occupation by workers will be decontaminated but final closure will be deferred. An activity and use limitation (AUL) will be imposed on the area if investigation and remediation under the slab will be required. If a building is to be demolished, the procedures in Section 4 will result in final closure.

2. Facility Description

2.1 General Facility Information

Facility Name:	Former Unisys Facility
Facility Address:	365 Lakeville Road Great Neck, Nassau County, New York
Contact:	Robert McMullen (303) 971-1532
Owner:	i.park Lake Success
Owner Contact:	Joseph Cotter, i.park Lake Success, LLC (203) 661-0055
EPA ID. No.:	NYD075796037
Part 373 Status:	Generator (Over Sole-Source Aquifer)

2.2 Site Location

The former Unisys facility is located at 365 Lakeville Road in Nassau County, New York (see Figure 1, Site Location Map) and consists of approximately 94 acres. A portion of the site is situated in the Village of Lake Success and the remaining portion is in the Town of North Hempstead. The property is identified on the Nassau County Land and Tax Map as Section 8, Block B-18, Lots 300H and 300K and is bordered by Marcus Avenue to the north, Union Turnpike to the south and to the west by Lakeville Road. Immediately to the east of the site is the Triad Business Park. Queens County, New York is located less than 1/8-mile southwest of the facility, and the Northern State Parkway is approximately 1/8-mile north of the facility.

2.3 Facility Description

Activities at the site, which was in operation between 1941 and 1998, included manufacturing and designing a wide range of defense-related products. Originally designed by the United States Government, the facility was operated under contract by the Sperry Gyroscope Company, a division of Sperry Rand Company (Sperry), from 1941 until 1951. In 1951, the government sold the property to Sperry, which later merged with Burroughs Corporation in 1986 to form Unisys. In May 1995, Loral Corporation acquired the assets of Unisys Defense Systems, a division of Unisys

Corp., and in March of 1996, Lockheed Martin Corporation acquired the electronics and systems integration businesses of Loral Corporation.

The property consists of the main building and six (6) smaller buildings located immediately south of the main building (see Figure 2, Site Plan). The main building encompasses the administration building, service building, and manufacturing building. The administration building formerly housed the executive and administrative offices, while the service building housed the cafeteria, computer center, and other support services. The manufacturing building, which is the largest of the three buildings, was used for manufacturing operations that included plating, painting, metal finishing, machining, and milling; assembly; systems integration, testing, research and development; hazardous materials storage; engineering; and program management.

Approximately 160,000 square feet of the northeast corner of the manufacturing building was leased to Penn-Plax Plastics, a distributor of pet supplies, between March 1996 and February 1998 for warehousing, repackaging and distribution of pet supplies. Products stored by Penn-Plax consisted of mostly plastic goods.

The smaller site buildings include the Foundry building, Environmental Testing (EV) building, Boiler building, Garage, Maintenance Shop, and Lakehouse building. The various site buildings collectively total approximately 1.5 million square feet.

The buildings cover nearly half of the site with the majority of the balance being paved for use as parking lots and driveways. Three (3) storm water recharge basins are located in the southwest corner of the site. The recharge basins historically and currently receive storm water runoff from the property, and formerly received water from the foundry building, boiler building, and non-contact cooling water. Other site structures include a 500,000-gallon elevated water tower, an inactive incinerator and coal silo, a facility-owned electrical sub-station, and several pump houses and guardhouses.

3. Facility Operations & Investigation Results

Operations at the site involved the design and manufacturing of a wide range of defense-related products including navigational systems for Navy nuclear submarines (Trident Program), navigational sonar equipment, radar tracking systems (North Warning System), and weather radar systems (NEXRAD) was performed at the Former Unisys facility. Past manufacturing processes at the facility have included

metal casting, chemical etching, degreasing, plating, painting, metal finishing, machining, printed circuit board manufacturing, and assembly. Chemicals used in these manufacturing processes included halogenated and non-halogenated hydrocarbon solvents, cutting oil, paints, acids, caustics, and metal plating compounds. These manufacturing operations are no longer conducted at the facility. At present, the current owner, i.park Lake Success, LLC (i.park), occupies the facility and is renovating it for future use as a high-tech center.

Detailed descriptions of each HWMU and AOPC warranting additional work was obtained from historical reports and is summarized below. Specifically, of the total 46 AOPC identified, 18 are included in this Closure Plan and are discussed below. As such, this section reflects a focused summary of the data that led to the closure actions included as part of this Closure Plan. Identified AOPC that clearly do not warrant further action are not summarized below. The reader is referred to Table 1 and the various Emcon reports documenting the Facility Assessment and/or Phase I Site Soil Investigation for a description of activities and summary of results for those areas. In addition, the selection process and data summaries provided below allow for a focused review of pertinent data for purposes of this Closure Plan. AOPC identified during H2M Group's EA that are located in areas currently addressed by an interim remedial measure (IRM) are also not included below. Futhermore, Area 19 [underground storage tanks (USTs) in Southeast Corner of Manufacturing Building] and Area 23 [Dry Well Area] are being addressed by the Operable Unit 1 Soil-Vapor Extraction [SVE] remedy and are not addressed as part of this closure plan.

During the soil boring investigation in Area 9, the Former Plating Area, tarpaper was encountered below the slab. Borings performed in Areas 12, 13, 17, 28, 31, and 34 were performed near the exterior walls of the manufacturing building, adjacent to areas covered by asphalt paving. Furthermore, borings performed in exterior Areas 15, 16, 21, 26, 35, 36, and 39 were performed in areas with asphalt pavements or in close proximity to areas with asphalt pavements. In all of the aforementioned areas semi-volatile organic compounds, primarily the polycyclic aromatic hydrocarbons (PAHs), such as benzo(a)pyrene, benzo(a,h)anthracene, and chrysene, were detected in soil samples above the closure performance standards. However, historic operations included the use of cutting oils, which do not contain PAHs. Tarpaper and asphalt do contain PAHs, such as benzo(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, chrysene, dibenz(a,h)anthracene, fluoranthene, and phenanthrene. The only semivolatile organic compounds detected above closure performance standards are the PAHs listed above, which may be attributed to asphalt or tar in the areas of the borings or may be present in bedding material under the slab as a result of fill material brought

in during construction. Several of the aforementioned areas are included for additional investigation for reasons other than semivolatile organic compound exceedances. Because PAHs are probably related to other sources besides site operations, areas where only PAHs exceed the closure performance standards have not been included in any additional proposed work at the site.

3.1 Hazardous Waste Management Units

This Closure Plan addresses the closure of HWMU as defined in 6NYCRR Part 373-3.7. The HWMU identified at the Lockheed Martin Great Neck facility, based on historical operations and negotiations with NYSDEC, are described below and are shown on Figure 3-Areas of Potential Concern, Figure 4-Manufacturing Building Layout, and Figure 5-Emcon Facility Assessment & Soil Sample Investigation. The following subsections provide an operational history of each area and summarize the results of Emcon's FA and Phase I Site Soil Investigation. Table 3 includes a summary of closure performance standards (CPS), as defined in Section 5.0 of this Closure Plan. Table 4 includes a summary of the soil borings with concentrations above the CPS.

3.1.1 Paint Storage Room (Manufacturing Building, Column Q18, Area 7)

The Paint Room is located west of the southeast truck-loading bay (see Figure 3). Containers of paints in 1 to 5 gallon containers, mostly for general building use, were historically stored in this area on shelving. Prior to construction of the Article XI-permitted Hazardous Waste Storage Facility, the Paint Storage Room was utilized for hazardous materials storage. A concrete sump is located in the northwest corner of the Paint Storage Room, and a sealed floor drain is located in the center of the room. Both the sump and floor drain line was connected to a dry well located outside of the Paint Storage Room (west of the loading bay and south of column line Q18). This dry well was removed by Integrated Technical Services in June 1998, under the direction of H2M as part of the activities performed under the AOC. The dry well area is now the subject of continued source area and groundwater remediation under OU-1 of the site New York State Superfund program. The floor of the paint room was covered with patches of cured paint, which, based on earlier testing described below contains lead (1,010 mg/kg) and chromium (87.9 mg/kg). The metals may be attributed to pigments used in the paints.

Previously, the paint storage room was used for Varsol, a petroleum based cleaner, storage and collection. Varsol had been stored in USTs located outside this room and was pumped into the Varsol room for distribution elsewhere within the facility for use.

Waste Varsol was brought back to this room where it was drained into an outside waste UST located next to the virgin Varsol USTs. The virgin and waste Varsol tanks were removed in 1989. Soils in the area of the former Varsol USTs have been investigated as part of the OU-1 Remedial Investigation conducted under NYSDEC oversight.

One "residue" sample (GN-RS-07) was collected by Emcon during the FA from the floor of the Paint Storage Room and analyzed for metals, Volatile Organic Compounds (VOCs) and Semi-Volatile Organic Compounds (SVOCs). Compounds detected include: total xylenes (0.68 J mg/kg), phenanthrene (9 mg/kg), anthracene (6.6 mg/kg), di-n-butylphthalate (43 mg/kg), butylbenzylphthalate (17 mg/kg), napthalene (1.2 J mg/kg), fluoranthene (6.9 mg/kg), pyrene (6 mg/kg), chrysene (1.7 J mg/kg), barium (300 mg/kg), cadmium (2.1 mg/kg), chromium (7.3 mg/kg), lead (56 mg/kg), and mercury (1.5 mg/kg).

Two concrete chip samples with cured paint residue were collected and analyzed for and were found to contain chromium and lead at concentrations of 87.9 mg/kg and 1,010 mg/kg, respectively. No other information was available.

Emcon advanced two soil borings (7A and 7B) in the Paint Storage Room to depths of 15 and 30 feet below ground surface. Soil samples were analyzed for the full Target Compound List (TCL) (including [VOCs, SVOCs, and Polychlorinated biphenyls (PCBs)] and Priority Pollutant Metals (PPM) list. VOCs were not detected in the soil samples collected, with the exception of methylene chloride. Methylene chloride was detected in several samples at concentrations up to 11 ug/kg; however, detections of methylene chloride, in general, were characterized as laboratory contamination. Trace levels of several SVOCs were detected in the surficial sample (0 to 2 feet below ground surface) collected from boring 7A. PCBs were not detected in any of the soil samples collected. Of the inorganic elements (i.e., metals) analyzed for, varying concentrations of arsenic, beryllium, chromium, copper, lead, mercury, nickel, and zinc were detected. However, no pattern of elevated inorganics was noted. Although some residual contamination may have been identified in soil samples collected, analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than the CPS, as defined in Section 5.0 of this Closure Plan.

3.1.2 Oil Storage and Pump Rooms (Manufacturing Building, Column N19, Area 8)

The Oil Storage and Pump Rooms are located south of the Hazardous Materials Storage Room and were used to store containers of new and used cutting oils in 55-gallon drums. The Pump Room also served as a transfer point for cutting oils that were

pumped from the former exterior USTs and distributed for use within the main building. Pipe trenches for the former oil USTs are still evident in the southeastern section of the Pump Room. There are also two (2) floor drains located in the center of the room. The drains were connected to the dry well system located outside the southeast corner of the building as shown in Figure 5. Soil surrounding this dry well system is being remediated by the SVE IRM system under an AOC, and therefore, is not included in this Closure Plan. Both floor drains have been sealed.

The Oil Storage Room is located immediately north of the Pump Room and is no longer being used. Prior to the mid-1980s, and before the construction of the Article XI permitted Hazardous Materials Storage Facility, the Oil Storage Room had been used for storage of hazardous waste and paints. No floor drains or sumps were visually observed in this room or shown on building plans. However, there is a drain line that traverses under the room, the same line that is connected to the two, abandoned floor drains in the adjacent Pump Room.

Located outside to the south of the Oil Storage and Pump Rooms is a Chemical Storage Container that was formerly used for container storage of hazardous materials.

Two concrete chip samples (GN-CC-02 and GN-CC-05) were collected in the Oil Storage and Pump Rooms and analyzed for PCBs, metals, and total petroleum hydrocarbons (TPH). Sample GN-CC-02 was collected from the Pump Room and GN-CC-05 was collected from the floor of the Oil Storage Room (near column N19). GN-CC-02 was found to be no-detect for these parameters, except for TPH, which was reported as 310 mg/kg (as diesel). GN-CC-05 was found to contain Aroclor 1260 at 0.072 mg/kg, barium at 140 mg/kg, cadmium at 2.4 mg/kg, chromium at 19 mg/kg, lead at 140 mg/kg, and TPHs as diesel at 79 mg/kg.

A "residue" sample was collected from the floor of the Oil Storage Room (GN-RS-14) and analyzed for PCBs, metals, TPH, VOCs and SVOCs. The following compounds were detected in this sample: phenanthrene (18 J mg/kg), di-n-butylphthalate (27 mg/kg), Aroclor 1254 (16 mg/kg), barium (79 mg/kg), cadmium (2.3 mg/kg), chromium (63 mg/kg), lead (140 mg/kg), mercury (5.6 mg/kg) and TPHs as diesel (12,000 mg/kg).

A wipe sample (GN-W-17) was collected from the floor of the Pump Room and analyzed for PCBs. This sample was found to contain Aroclor 1260 at 0.0091 ug/ft^2. Two wipe samples (GN-W-15 and GN-W-16) were collected from the floor of the Chemical Storage Container located outside the entrance of the Oil Storage Room.

These wipe samples were analyzed for metals and PCBs respectively. Sample GN-W-15 was found to contain barium at 110 ug/cm ft^2, cadmium at 13 ug/cm ft^2, chromium at 65 ug/cm ft^2, lead at 230 ug/cm ft^2, mercury at 5.8 ug/cm ft^2, and silver at 7.5 ug/cm ft^2. Sample GN-W-16 was non-detect for PCBs, except for Aroclor 1254 at 0.062 ug/cm ft^2. In addition, a residue sample was collected from the floor of the Chemical Storage Container (GN-RS-13) and analyzed for metals. Sample GN-RS-13 was found to contain arsenic at 25 mg/kg, barium at 400 mg/kg, cadmium at 48 mg/kg, chromium at 560 mg/kg, lead at 3,500 mg/kg, mercury at 37 mg/kg, and silver at 43 mg/kg.

Emcon advanced three soil borings by hand in Area 8 all to a depth of two feet below ground surface (8A, 8B, and 8C). Soil samples were analyzed for the full TCL (including VOCs, SVOCs, and PCBs) and PPM list. VOCs were not detected in the soil samples collected, with the exception of methylene chloride, trichloroethene, and tetrachloroethene. These VOCs were detected in the surficial (0 to 2 feet below ground surface) sample collected from boring 8A at concentrations ranging from 8.9 to 25 ug/kg. Methylene chloride was also detected in the surficial sample collected from boring 8B at a concentration of 6.9 ug/kg. As mentioned previously, detections of methylene chloride, in general, were characterized as laboratory contamination. Several SVOCs were detected, primarily at trace levels, in the samples collected from all three borings. PCBs were not detected in any of the soil samples collected. Of the inorganic elements (i.e., metals) analyzed for, varying concentrations of arsenic, chromium, copper, lead, nickel, silver, and zinc were detected. However, no pattern of elevated inorganics was noted. Although some residual contamination may have been identified in soil samples collected, analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan.

3.1.3 Hazardous Materials Storage Facility (Manufacturing Building, Column N19, Area 13)

Hazardous materials, other than those that were actively used in processing, were stored in the facility's designated Hazardous Materials Storage Facility, which also served as the facility's 90-day storage facility for hazardous waste. This storage area is located near the southeast corner of the main building. The Hazardous Materials Storage Facility is separated into three (3) spill containment zones for container storage of flammables, oxiders and corrosives. The zones were designed to segregate incompatible materials. The storage area was constructed in the mid-1980's and is permitted with the Nassau County Department of Health (NCDOH) in accordance with Article XI of the Nassau County Sanitary Code. Hazardous wastes were stored in containers of 55-gallons or smaller.

The Hazardous Materials Storage Facility encompasses approximately 2,800 square feet and was designed to maintain at least thirty percent (30%) of the total volume of hazardous materials stored in portable containers at any given time. The floor and containment walls of each storage zone are constructed with a concrete berm and chemical-resistant epoxy coating for liquid tight, secondary spill containment. The coating was designed to minimize damage incurred to the concrete and masonry surfaces in the event of a release. The entrance to each containment zone is also elevated so that any spill could be contained within the segregated storage zone.

An inventory was maintained at all times of hazardous materials placed into and removed from the Hazardous Materials Storage Facility. The storage area was inspected daily to ensure that any accidental discharges were detected. Additionally, the storage area was kept locked at all times except when containers of hazardous materials were being moved into or out of the storage area. Employees were required to sign for any chemicals added to or removed from the storage areas to aid in monitoring.

Since the termination of manufacturing operations at the facility, only small quantities of waste materials are typically stored in the Hazardous Materials Storage Facility. All hazardous materials will be removed during closure and will be properly handled.

A wipe sample was collected from the floor of each of the Flammable (GN-W-03), Oxider (GN-W-04), and Corrosive (GN-W-05) Storage Rooms and analyzed for PCBs and metals during the FA. Chip samples were not collected to preserve the integrity of the spill containment areas. Both of these samples were non-detect for PCBs. Sample GN-W-03 contained low levels of the following metals: barium (51 ug/cm ft^2), chromium (13 ug/cm ft^2), lead (48 ug/cm ft^2), and mercury (0.037 ug/cm ft^2). Sample GN-W-04 contained low levels of barium (62 ug/cm ft^2), cadmium (2.1 ug/cm ft^2), chromium (21 ug/cm ft^2), lead (51 ug/cm ft^2), and mercury (0.049 ug/cm ft^2). Sample GN-W-05 contained barium (45 ug/cm ft^2), chromium (11 ug/cm ft^2), lead (31 ug/cm ft^2), and mercury (0.052 ug/cm ft^2).

Emcon advanced one soil boring to a depth of 15 feet (13A) and two soil borings depths of two feet (13B and 13C) below ground surface in Area 13 to depths of two feet (13B and 13C) below ground surface. Soil samples were analyzed for the full TCL (including VOCs, SVOCs, and PCBs) and PPM list. VOCs were not detected in the soil samples collected, with the exception of methylene chloride. Methylene chloride was detected in one sample at a concentration of 19 ug/kg. As mentioned previously, detections of methylene chloride, in general, were characterized as

laboratory contamination. Several samples (primarily the surficial samples) collected from each of the three borings were characterized by varying concentrations of SVOCs. Of the SVOCs detected, benzo(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, chrysene, dibenz(a,h)anthracene, and fluoranthene were detected at concentrations exceeding the CPSs of 8,280 ug/kg, 183 ug/kg, 3,300 ug/kg, 1,200 ug/kg, 42 ug/kg, and 50,000 ug/kg respectively, as defined in Section 5.0 of this Closure Plan. These exceedances (at concentrations of up to 34,000 ug/kg [benzo(a)anthracene], 29,000 ug/kg [benzo(a)pyrene], and 53,000 ug/kg [benzo(b)fluoranthene], 29,000 ug/kg [chrysene], 4,800 ug/kg [dibenz(a,h)anthracene], and 57,000 ug/kg [fluoranthene]) were identified in the two surficial samples collected from borings 13B and 13C. Carbazol, which does not have an available CPS, was detected in two samples at concentrations up to 6,900 ug/kg. PCBs were not detected in any of the soil samples collected. Of the inorganic elements (i.e., metals) analyzed for, varying concentrations of arsenic, beryllium, chromium, copper, lead, nickel, selenium, silver, and zinc were detected. For most of these metals, no pattern of elevated inorganics was noted. However, chromium was detected at a concentration exceeding the closure performance standard of 50 mg/kg. As defined in Section 5.0 of this Closure Plan. Chromium was detected at a concentration of 243 mg/kg in the surficial sample collected from boring 3C. Silver was detected at concentrations of 11.5 and 6.53 mg/kg in the surficial samples collected from borings 13B and 13C, respectively. In addition to the summary review of soil quality results noted above, review of the boring program in Area 13 indicates that the vertical extent of soil impacts by compounds with concentrations greater than CPSs has not been fully determined at boring locations 13B and 13C.

3.1.4 Reclamation Room (Manufacturing Building, Column Q19, Area 17)

The former Reclamation Room is located at the southeast corner of the manufacturing building. The Reclamation Room was formerly used for solvent reclamation and chip extraction. Cutting oils and solvents mixed with water were sent through a centrifuge to separate out the water. The water was discharged via the drain line to the below grade oil/water separator located in the southeast corner of the room. The floor drains in the Pump Room also connected to this oil/water separator. Cutting oil from the oil/water separator was collected in a 60-gallon steel UST, while the wastewater was piped to the three (3) dry wells located outside. The 60-gallon UST was removed in May 1995 under NCDOH oversight. The dry well area is being remediated, in part utilizing an SVE system implemented under an AOC and operating under NYSDEC oversight. Therefore, soils in the area of the dry well system (Areas 19 and 23) will not be addressed in this Closure Plan.

The Reclamation Room currently houses the mechanical and treatment equipment for the SVE remediation system. The Reclamation Room has been sectioned into two (2) rooms with the SVE equipment occupying the larger of the two rooms (eastern side). A floor drain, a sump, and an inactive oil/water separator are located in the SVE room. The western room was most recently used for storage of miscellaneous equipment. A capped standpipe connected to the floor drain line is located adjacent to the west wall. The floor of this room was covered with patches of dried paint, while the floor of the SVE equipment room had no significant visible stains.

Two wipe samples were collected from the floor of the Reclamation Room and analyzed for PCBs (GN-W-13) and for metals (GN-W-14). GN-W-13 was not-detect for PCBs, except for Aroclor 1254 at 0.0023 ug/cm ft^2, and GN-W-14 which contained barium at 150 ug/cm ft^2, cadmium at 4.8 ug/cm ft^2, chromium at 36 ug/cm ft^2, lead at 220 ug/cm ft^2, and mercury at 0.35 ug/cm ft^2.

Two concrete chip samples (GN-CC-03 and GN-CC-04) were also collected from the floor of the Reclamation Room and analyzed for PCBs, metals, and total petroleum hydrocarbons (TPHs). Sample GN-CC-03 was collected near column line P19 and sample GN-CC-04 was collected from the center of the Reclamation Room. Sample GN-CC-03 was found to contain Aroclor 1254 (0.88 mg/kg), arsenic (12 mg/kg), barium (260 mg/kg), cadmium (34 mg/kg), chromium (67 mg/kg), lead (340 mg/kg), mercury (1.9 mg/kg), silver (14 mg/kg), and TPHs as diesel (160 mg/kg). Similarly, sample GN-CC-04 contained the following compounds: Aroclor 1254 (at 0.21 mg/kg), barium (at 83 mg/kg), chromium (27 mg/kg), lead (28 mg/kg), mercury (1.6 mg/kg), and TPHs as diesel (120 mg/kg).

One of the four soil borings proposed in Area 17 was advanced to a depth of two feet below ground surface (17D), and terminated due to shallow refusal. The remaining three soil borings (17A, 17B, and 17C), originally proposed in Area 17 to target depths of 15 feet below ground surface, were cancelled due to possible interference with the recovery well operation. The surficial (0 to 2 feet below ground surface) soil sample from boring 17D was analyzed for the full TCL (including VOCs, SVOCs, and PCBs) and PPM list. VOCs were not detected in the soil sample collected, with the exception of methylene chloride. However, as mentioned previously, detections of methylene chloride, in general, were characterized as laboratory contamination. Trace levels of several SVOCs were detected in the surficial sample (0 to 2 feet below ground surface) collected from boring 17D. PCBs were not detected in the soil sample collected. Of the inorganic elements (i.e., metals) analyzed for, varying concentrations of arsenic, chromium, copper, lead, nickel, and zinc were detected. However, no pattern of

elevated inorganics was noted. Although some residual contamination may have been identified in the soil sample collected, analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan. In addition to the summary review of soil quality results noted above, review of the boring program in Area 17 indicates that the soil investigation was not considered to be complete, apparently due to shallow refusal and cancellation of three of the four originally proposed soil borings designed to identify the presence, if any, of residual contamination.

One soil boring was advanced to a total depth of 50 feet on June 21 and 22, 1999 in the SVE equipment room as a part of the "SVE Pilot Study Report", performed by ARCADIS Geraghty & Miller, dated July 20, 1999. The location of the boring is shown on Figures 3, 4, and 5. Soil samples, collected from four intervals in the boring (0 to 4 feet, 28 to 30 feet, 38 to 40 feet, and 46 to 48 feet), were analyzed for and exhibited low levels of VOCs (below CPSs). From a review of the boring program in the SVE room, it can be concluded that the extent of the VOC source area related to the dry wells does not extend to the area below the SVE equipment room.

3.2 Areas of Potential Concern

This Closure Plan addresses AOPC where additional investigation is warranted based on historical operations and previous investigation results. Emcon FA and Soil Investigation results are summarized below for AOPC where; (1) storage or management of hazardous waste or hazardous materials can be documented, (2) there is evidence of a hazardous material or hazardous waste release; (3) there is a history of the use of hazardous materials or hazardous waste in an area but there is insufficient data to determine if a release occurred, and/or (4) surface decontamination is required. The AOPC and sampling locations are shown on Figure 3, Areas of Potential Concern, Figure 4 and Manufacturing Building Layout and information concerning each area is summarized in Table 1.

3.2.1 Thin Film Lab (EV Building, Area 1)

The EV Building, built in the early 1950's and formerly used for testing of meteorological equipment, contained a printed circuit board manufacturing area, located in the northwest corner of the building. The printed circuit board manufacturing area consisted of the Thin Film Lab, printed wiring room, and electrochemical lab. Acids, caustic and plating chemistry were used in this area.

wide, and the east vault was 40 feet long by 52.5 feet wide. The center vault measured 44 feet long by 38 feet wide. The three vaults are depicted on Figure 7, Old Plating Area Process Schematic.

Aluminum parts were anodized with chrome in the west and center vaults and dip tanks and water rinse tanks were located above the vaults. A degreasing tank was located in the southeast corner of the west vault. The eastern vault was used for metal (copper, cadmium, nickel, chromium, and tin) plating along with cyanide dipping, and acid and caustic treatment.

The three vaults drained to a neutralization pit located in the southwest corner of the center vault that overflowed to a sump pit and then to the sanitary sewer. Closure of the area included removal of all process tanks, cleaning of concrete vaults, backfilling with sand, and placement of a 6-inch slab of concrete. The area was most recently used as a machine shop.

One "residue" sample (GN-RS-03) was collected from this area and analyzed for metals, PCBs and TPH. Chromium and mercury were detected at 2,400 mg/kg and 0.460 mg/kg, respectively. These concentrations exceed the CPS of 50 mg/kg for chromium and 0.2 mg/kg for mercury.

During the first phase of the soil investigation in this area, Emcon advanced two soil borings (9A and 9B) to depths of five feet below ground surface, which were terminated due to shallow refusal. During the second phase, Emcon advanced three soil borings (9A, 9B, and 9C) to depths varying from 14 to 17 feet below ground surface, and were terminated before target depths of 30 feet were reached due to refusal. The remaining four soil borings (9D, 9E, 9F, and 9G) originally proposed for this area, were not attempted in second phase because Emcon's review of data from Soil Borings 9A through 9C, which generally indicated absence of contamination. Soil samples were analyzed for the full TCL (including VOCs, SVOCs, and PCBs [for the majority of samples]), PPM list, and total cyanide. Analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan, with the exception of mercury and benzo(a)pyrene. Mercury was detected at a concentration of 0.493 mg/kg in the first phase sampling at Boring 9B, specifically in the sample collected from 3 to 5 feet interval below ground surface. This concentration exceeds the CPSs of 0.2 mg/kg for mercury. Mercury was not detected during the second phase sampling results for Boring 9B for the sample collected from a similar depth interval. Benzo(a)pyrene was detected at a concentration of 810 ug/kg in Boring 9B,

specifically in the sample collected from 3 to 5 feet interval below ground surface. This concentration exceeds the CPSs of 183 ug/kg for benzo(a)pyrene. The vertical extents of these elevated impacts were defined by the analytical soil results from at least one deeper sample.

ARCADIS Geraghty & Miller advanced Borings 9E and 9F to a depth of 37 feet below ground surface on February 25, and 26, 2000. Locations of the borings are shown on Figure 3 and analytical results are summarized in Table 2-Summary of Analytical Results for Soil Borings 9E & 9F. Analytical results for Borings 9E and 9F are included as Appendix A. Soil samples were analyzed for VOCs, PPM list, and total cyanide. Analytical results indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan, with the exception of antimony, nickel, cyanide, cadmium, chromium. Antimony was detected at concentrations up to 2 mg/kg. All of the antimony concentrations in borings 9E and 9F were detected between the instrument detection limit and the contract required detection limit. A CPS is not available for antimony. Nickel was detected in boring 9E from the 10 to 12 feet and 30 to 32 feet intervals at concentrations of 87.6 mg/kg and 41.0 mg/kg, respectively, and boring 9F from the 15 to 17 feet interval at a concentration of 30.7 mg/kg. These concentrations exceed the CPS of 28.5 mg/kg. Cyanide was detected at 6.61 mg/kg and 0.85 mg/kg (CPS is non-detect) in boring 9E from the 10 to 12 feet and 30 to 32 feet intervals, respectively. The 10 to 12 feet interval of boring 9E exhibited a concentration of cadmium (CPS is 10 mg/kg) of 16.6 mg/kg. Chromium (CPS is 50 mg/kg) was detected at 55.8 mg/kg in the 10 to 12 feet interval of boring 9F. The vertical extent of the impacted soils was defined by the analytical soil results from at least one deeper sample with the exception of antimony.

3.2.4 Process Photo Laboratory (Service Building, Area 11)

Photographic development processes were historically performed in the darkroom of Area 11. Waste fixer and developer materials used in the process were collected and stored in 55-gallon drums for off-site disposal. Several sinks used in the developing process are located in the area along with a concrete floor sump.

A "water" and "sediment" samples (265461 and 265462, respectively) were collected from the sump, located in Area 11, on July 28, 1995 and analyzed for metals as a part of Loral Corporation's Due Diligence Sampling Plan. The samples exhibited concentrations of silver at concentrations up to 323 mg/kg.

One "sediment" sample (GN-RS-02) was collected from the Process Photo Laboratory sump and analyzed for VOCs, SVOCs, and PCBs. Sample GN-RS-02 was found to contain trace concentrations of methylene chloride (a common laboratory contaminant), phenanthrene, di-n-butylphthalate, butylbenzylphthalate, fluoranthene, and chrysene. The sample was non-detect for PCBs, except for Aroclor-1254 at 0.12 mg/kg. The one proposed soil boring, located in Area 11, was cancelled due to access constraints.

3.2.5 Lime Neutralization Pit (Along Eastern Side of Manufacturing Building at Column L19, Area 15)

The L19 Lime Neutralization Pit used to pre-treat wastewater was removed in May 1995. Soil sampling was not performed after the chamber was removed and there was no regulatory involvement.

Emcon advanced one soil boring (15A) to a depth of 30 feet below ground surface. Soil samples were analyzed for the full TCL (including VOC, SVOC, and PCBs) and PPM list. Analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan, with the exception of the SVOCs chrysene, benzo(a)pyrene, and dibenz(a,h)anthracene and chromium, mercury, and zinc. The detected concentrations exceeding CPSs for chrysene (1,200 ug/kg), chromium (50 mg/kg), mercury (0.2 mg/kg) and zinc (55.7 mg/kg) were in the surficial (0 to 2 feet below ground surface) sample and a deeper sample (9 to 11 feet below ground surface) collected from boring 15A. Chromium, mercury, and zinc were detected in the surficial sample at concentrations of 59.2 mg/kg, 1.22 mg/kg, and 80.1 mg/kg, respectively. The vertical extents of these elevated impacts were defined by the analytical soil results from at least one deeper sample. Benzo(a)pyrene, chrysene, and dibenz(a,h)anthracene, which are PAH compounds, were detected in this boring at a concentrations up to 1,600 ug/kg, 1,900 ug/kg, and 450 ug/kg, respectively.

3.2.6 Foundry Building USTs (Exterior Area South of Foundry Building, Area 21)

The two, 15,000-gallon Fuel Oil and one, 10,000-gallon Core Oil UST's, located on the south side of the Foundry Building, were removed in 1990. No other information is available.

Emcon advanced two soil borings (21A and 21C) to depths of 30 feet and one soil boring (21B) to a depth of 5 feet below ground surface in the area of the former 2,

15,000-gallon and one, 10,000-gallon oil USTs. Soil boring 21B was terminated before reaching its target depth of 30 feet due to shallow refusal (possible foundation). Soil samples were analyzed for the full TCL (including VOCs and SVOCs), except for PCBs, and PPM list. Analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan, with the exception of four SVOCs (benzo(a)pyrene, chrysene benzo[b]fluoranthene, and dibenz(a,h)anthracene), and copper and zinc. The detected concentrations exceeding CPSs for benzo(a)pyrene (183 ug/kg), chrysene (1,200 ug/kg), benzo(b)fluoranthene (3,300 ug/kg), and dibenz(a,h)anthracene (42 ug/kg) were found in 21A (0 to 2 and 9 to 11 feet below ground surface) 21B (3 to 5 feet below ground surface) and 21C 9 to 11 and 13 to 15 feet below ground surface). As mentioned in Section 3, PAHs detected during the soil investigation may be attributed to sub-flooring or other bedding material placed below the concrete or asphalt that may have contained PAHs. The concentrations exceeding the CPSs for copper (50 mg/kg) were detected in several samples at all three boring locations with maximum detected concentrations of 157 mg/kg (in 21A), 272 mg/kg (in 21B), and 297 mg/kg (in 21C). The detected concentrations exceeding the CPSs for zinc (55.7 mg/kg) were limited to one sample from boring 21B (at 66.5 mg/kg) and one sample from boring 21C (at 149 mg/kg). Generally, the vertical extents of these elevated impacts were defined by the analytical soil results from at least one deeper sample.

A "pipe collapse" was reported in the area of the former underground storage tanks (USTs), located south of the foundry building (Area 21). Mr. R.A. Gibbons, Facilities Manager, reported that the 12-inch underground storm water pipe, located in this area, was damaged during USTs removal. Approximately 10 feet of the storm water pipe was then replaced.

3.2.7 Substation/Transformers (South of Boiler Building, Area 24)

The facility owned and operated electrical substation is located south of the boiler building and has been in operation since 1941. The equipment currently located in this area reportedly does not contain PCB containing materials. One soil sample (out of a total of four) collected during Loral's due diligence investigation contained PCB concentrations in exceedance of the CPS (1 total mg/kg in surface sample).

Thee borings, proposed during the Phase 1 Site Soil Investigation, were cancelled due to the electrical hazard.

3.2.8 Cooling Tower Area (Exterior Areas 26A, 26B, & 26D)

Water from recovery wells was stored in five cooling towers at the site. Chromium containing biocides were historically added to the cooling towers to control biological growth. A sediment sample obtained from abandoned Cooling Tower No. 1 (Area 26A), located at the northeast corner of the Administrative Building, and contained chromium at 690 mg/kg. Abandoned Cooling Towers No. 2 (Area 26B), 3 (Area 26E), and 4 (Area 26C) have not been sampled. Cooling Tower No. 5 was dismantled and removed from the site (Area 26D) after a "sediment" sample (GN-RS-10) was collected from the tower during the facility assessment and analyzed for PPM list. Sample GN-RS-10 contained detectable levels of arsenic, barium, cadmium, chromium, lead and mercury.

Emcon advanced five soil borings in the area of each cooling tower to depths of 15 feet below ground surface. Soil samples were analyzed for full TCL (including VOC and SVOC) and PPM list. Analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPS, as defined in Section 5 of this Closure Plan, with the exception of PAHs in the surficial samples of 26B, and the following inorganics in 26A, 26B and 26D, arsenic, copper, mercury, and zinc. Emcon noted that PAHs detected during the soil investigation were restricted to the most surficial samples [Chrysene, benzo(b)fluoranthene, and benzo(a)pyrene were detected at concentrations of 4,100 ug/kg, 7,100 ug/kg, and 3,600 ug/kg respectively (CPSs are 1,200 ug/kg, 3,300 ug/kg, and 183 ug/kg)]. Carbazol, which does not have an available CPS, was also detected. Arsenic was detected above the CPS 12 mg/kg from the 0 to 2 foot and 3 to 5 feet intervals of boring 26B at concentrations of 11.6 mg/kg and 20.4 mg/kg, respectively. Copper was detected in the 0 to 2 feet interval of borings 26B and 26D at concentrations of 56.3 mg/kg and 73.2 mg/kg, respectively (CPS is 50 mg/kg). The 0-2 feet interval of boring 26D exhibited a concentration of mercury (CPS is 0.2 mg/kg) of 0.222 mg/kg and zinc (CPS is 55.7 mg/kg) of 203 mg/kg. Zinc was also detected in the 0 to 2 feet interval of boring 26A at a concentration of 59.6 mg/kg. The vertical extent of the impacts were defined by the analytical soil results from at least one deeper sample.

3.2.9 A/C Room Sump (Manufacturing Building, Column A11, Area 28)

The A/C Room Sump was used to collect condensate discharge from the air conditioning equipment. The sump is inactive; however, it has not been decontaminated. A "sediment" sample was collected from the sump and analyzed for

aluminum and total halide. Aluminum was detected at a concentration of 38,300 mg/kg and total organic halide was present at a concentration of 873 mg/kg.

Emcon advanced one soil boring by hand in Area 28 to a depth of two feet below ground surface (28). A soil sample was analyzed for the full TCL (including VOCs, SVOCs, and PCBs, and PPM list. Analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs. Silver was detected at a concentration of 6.58 mg/kg (CPS is not available). The extent of the silver impacted soil was not delineated with one deeper sample.

3.2.10 Short Order Machine Shop (Manufacturing Building, Column B11, Area 30)

Manufacturing operations were conducted throughout the main building. Although all manufacturing operations have been discontinued and machining equipment has been removed, two sumps remain in the Short Order Machine Shop. Both sumps have steel covers and the larger of the two sumps had piping entering the pit on the north side. Former operations in this area are not known.

One composite "residue" sample (GN-RS-01) was collected from the two sumps located in the former Short Order Machine Shop and analyzed for metals and PCBs. The sample had a total PCB concentration of 72 mg/kg, and the following concentrations of heavy metals; cadmium (29 mg/kg), chromium (880 mg/kg), lead (540 mg/kg), and mercury (14 mg/kg).

Emcon advanced one soil boring (30) to a depth of 11 feet below ground surface. Soil samples were analyzed for the full TCL (including VOC and SVOC) and PPM list. Analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan.

3.2.11 Basement Sump (Foundry Building, Area 31)

As stated in Section 3.2.3 of this report, the Foundry Building housed a casting foundry for metal parts. Raw materials were historically delivered to the site by trucks and then transferred into the basement through hoppers for storage in the basement. Non-sanitary wastewater from the floor drains in the building collected in a sump, located along the south wall of the Foundry Building basement. Water from the sump was pumped to the stormwater basins.

One sludge sample (GN-RS-04) was collected from the Foundry Sump during the FA and was analyzed for metals, VOCs, SVOCs, and PCBs. The sample had a total PCB concentration of 4600 mg/kg, and the following concentrations of metals; barium (170 mg/kg), cadmium (42 mg/kg), chromium (290 mg/kg), lead (870 mg/kg), mercury (23 mg/kg), and silver (18 mg/kg).

Emcon advanced one soil boring (31A) to a depth of 26 feet below ground surface. The boring was located directly outside of the Foundry Building in the area of the basement sump. The soil samples were analyzed for the full TCL (including VOCs, SVOCs, and PCBs) and PPM list. Analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan, with the exception of copper, mercury, and zinc. The concentration exceeding the CPSs for copper (50 mg/kg), mercury (0.2 mg/kg), and zinc (55.7 mg/kg) were detected in the surficial sample collected from Boring 31A at a concentration of 49.7mg/kg, 0.325 mg/kg and 148 mg/kg, respectively. Generally, the vertical extents of these elevated impacts were defined by the analytical soil results from at least one deeper sample.

3.2.12 Blue Print Area (East of Service Building, FPM-1)

Two blue print rooms were located at the site, one each in the Administration and Service Buildings. An interview with site personnel indicates that the blue print room in the Service Building was only used for storage. A vent line was directed towards the eastern side of the Administration Building and is still apparent. No other information is available.

3.2.13 Soil Storage Area (North of Boiler Building, FPM-8)

FPM's May 11, 1999, "Review of Phase I Site Soil Investigation Report" letter and NYSDEC's February 14, 2000 "Facility Closure" letter indicated that contaminated soil excavated from the Old Plating Room, located in the Manufacturing Building, was historically staged in the blue stone area north of the Boiler Building.

Tetra Tech prepared the report entitled "Soil Gas Survey, Lockheed Martin Tactical Defense Systems, 365 Lakeville Road, Great Neck, New York" to determine whether VOCs were present in the soil beneath the facility. Several soil gas sample points were located in the driveway area north of the Boiler House. No VOCs were reported in this area above 10 *u*g/L.

3.2.14 Potential Disposal Chemical Area (South of Manufacturing Building, FPM-19)

FPM's May 11, 1999, memorandum entitled "Review of Phase I Site Soil Investigation Report" and the NYSDEC's February 14, 2000 "Facility Closure" letter indicated that chemicals and/or chemical residues were dumped along the blue stone south of the manufacturing building between column lines Q4 and Q8.

Several soil gas sample points were located in this area in the driveway. No VOCs were reported in this area above 10 *ug*/L.

4. Site Closure Activities

This Closure Plan is designed to ensure that the HWMU and AOPC will be closed and will require no further maintenance and controls following facility closure of hazardous waste activities and following final closure of the facility. The plan is intended to eliminate actual and potential risks to human health and the environment under 6NYCRR Part 373-3.7.

A general description of closure activities is provided in Section 4.1 below; detailed closure activities for each area are described in Sections 4.2 and 4.3 of this plan, and are summarized in Table 5. The FA identifies and quantifies hazardous materials located in the facility. Lockheed Martin Corporation will coordinate the removal and proper disposal of remaining hazardous waste from the building. Any work related to underground storage tanks would be coordinated with Ms. Marlena Hamann of the Nassau County Department of Health, Bureau of Environmental Management.

4.1 Site Closure Strategy

The closure strategy contains two key considerations: (1) whether or not the building where the areas are located will be demolished in the near future; and (2) whether the area is outdoors. The first step of site closure will be to survey the locations of each of the areas where additional investigation is warranted so that the areas may be located in the future. A licensed surveyor surveyed the boundaries of the areas requiring additional investigation based on longitude and latitude in July 2000. The second step is to place the sites into one of three categories, as follows:

Scenario 1: Interior area that will be left in place for future use.

No immediate investigation of soil under the flooring will be proposed. Instead, any further investigation will be deferred until the building is ultimately demolished. As long as the concrete slab remains intact, there is no risk of exposure, and contaminants below the slab will remain immobilized. Under this scenario a complete exposure pathway (i.e., from contaminant to receptor) does not exist; therefore, a risk assessment is not warranted.

Under this scenario, floors and sumps within the identified areas will be decontaminated, if needed. An electric 2.7-gallon per minute cold water pressure washer with soap injection capability or equivalent will be used to clean the area. Water generated from the pressure washing process will be collected and analyzed for the contaminants of concern (COC) listed in Table 1 and then disposed of in accordance with applicable regulations. The techniques that will be used to contain and collect water generated during the pressure washing process includes the use of temporary containment berms to collect wash water which will be pumped or vacuumed into 55-gallon drums for waste profiling and disposal.

The new owner i.park Lake Success, LLC, (i.park) proposes to install new flooring in the HWMU areas, prior to a new tenant's occupation of the area. A new floor covering will immobilize contaminants and prevent exposure.

The new owner, i.park has removed the wood block flooring, located throughout portions of the former manufacturing building, during renovation activities. The underlying concrete floor slab was inspected by ARCADIS Geraghty & Miller, as an agent for Lockheed Martin, and Shaun Snee from the NYSDEC on Friday, December 22, 2000, for indications of potential hazardous materials releases. Areas where there is a potential for a hazardous materials release were inspected for deterioration or cracking. There was no evidence of a hazardous materials release found during the inspection.

Because there is the potential for construction workers to breach the floor during future site upgrades, a temporary activity and use limitation (AUL) will be imposed on some areas to assure that future work done beneath the slab will be conducted in accordance with the correct health and safety precautions. Any waste generated during future work in these areas will be managed in accordance with applicable regulations and the slab will be re-established after the work is finished. Under this scenario, the use of the interior areas of the site will not be prohibited or restricted in any way.

Further investigation and/or remediation of contaminated soils in areas with an AUL will be reserved until such time that the slab is removed. The soil investigation planned in areas restricted by an AUL will take place within three months of the demolition of the slab in accordance with a plan approved by NYSDEC. In the event the concrete slab is breached in an area restricted by an AUL, consideration will be given to performing sampling activities as described in the detailed Closure Work Plan included under separate cover.

Scenario 2: Redevelopment (including demolition) is proposed for interior closure area.

To ensure adequate closure, demolition wastes in the closure areas, including process equipment, debris and rubble will be tested, decontaminated and/or removed for off-site disposal in accordance with applicable waste regulations. For example, areas where contaminants were detected on the floor during the FA sampling program will be swept clean and pressure washed. Then either the concrete slab or the concrete debris from these areas will be tested by the Toxicity Characteristic Leaching Procedure (TCLP) or some other method to determine whether or not the concrete material, when removed, should be managed as a hazardous waste or a non-hazardous construction and demolition (C&D) waste. All hazardous wastes will be properly segregated and disposed of off-site.

After demolition is completed, the remaining soil beneath the foundation will be investigated (if necessary) as outlined in the detailed Closure Work Plan included under separate cover. Any drain lines that are uncovered during demolition activities will be inspected for evidence of potential hazardous materials releases.

Once the extent of contamination has been properly defined, any necessary remediation of contaminated soils will be proposed in a separate plan submitted to NYSDEC for review and approval.

Scenario 3. Area is an exterior area.

Soils in AOPC outside the buildings will be investigated to determine the extent of soil contamination in accordance with the Closure Work Plan submitted under separate cover.

Initially, a primary grid of borings will be advanced in each AOPC. Figures depicting approximate locations of proposed soil borings in the primary grid are included in the

detailed Closure Work Plan for soil sampling. Table 5 provides the number of previously completed borings and proposed primary grid borings in each area requiring additional soil investigation along with the total square footage of each area. Table 5 summarizes the analytical methods proposed for the soil samples collected from each area. A schedule is provided as Appendix B and establishes a time frame for the exterior soil investigation. The proposed borings will be advanced to 15 feet, unless otherwise noted. Soil samples will be collected from intervals of 1 ft, 5 ft, 10 ft, and 15 ft below grade and submitted for analysis.

In the event that the analytical results for a soil sample exceed the CPS, a secondary grid will be used to define the extent of contamination. The secondary grid involves advancing additional soil borings in four compass directions from the impacted boring in a 5 to ten foot square grid (depending on the levels of contaminants) to define the limits of the contamination. However, secondary borings will not be advanced if proposed location is close to a previous sampling location.

Once the extent of contamination has been properly defined, necessary remediation of contaminated soils will be proposed in a separate plan submitted to NYSDEC for review and approval. The plan may involve proposals for excavation, the use of in-situ remedial technologies, or closure in-place (including institutional controls, such as deed restrictions).

4.2 "Hazardous Waste Management Units" Closure Activities

Proposed closure activities for the "Hazardous Waste Management Units" (HWMU) discussed in Section 3.1 of this plan are described below.

4.2.1 Paint Storage Room (Manufacturing Building, Column Q18, Area 7)

Residues on the floor of this room may include total xylenes, phenanthrene, anthracene, di-n-butylphthalate, butylbenzylphthalate, napthalene, fluoranthene, pyrene, chrysene, barium, cadmium, chromium, lead, and mercury. The floor of the room will be swept with a wire brush and then pressure washed to remove residues. The owner plans to install new flooring or paint the area with an epoxy based sealant, or equivalent. A temporary AUL will be imposed on the area.

Although some residual contamination may have been identified in soil samples collected during previous investigations, analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs,

as defined in Section 5.0 of this Closure Plan. Construction workers who may breach the floor in Area 7 during any future work will be required to take the correct health and safety precautions. Hazardous waste generated during future work in these areas will be managed in accordance with applicable hazardous waste regulations and the slab will be re-established after the work is finished. In the event the room is to be demolished, concrete samples will be collected during to demolition to determine how the C&D waste will be handled. Soil borings will be advanced in accordance with the Closure Work Plan in the area and soil samples will then be collected to verify that soils below the slab were not impacted above the CPSs. In the event contaminants are detected above CPSs, the soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan.

4.2.2 Oil Storage and Pump Rooms (Manufacturing Building, Column N19, Area 8)

The pipe trenches in this area will be swept clean with a wire brush or equivalent cleaning equipment and then pressure washed along with the floor of the room. The Chemical Storage Container, which was formerly used for container storage of hazardous materials, will be pressure washed and then properly removed and disposed of in accordance with applicable regulations. Aroclor 1260, barium, cadmium, chromium, lead, and TPHs as diesel were found in concrete chip samples collected in Area 8 and phenanthrene, di-n-butylphthalate, Aroclor 1254, barium, cadmium, chromium, lead, mercury and TPHs as diesel were detected in a residue samples from Area 8. The owner intends to install a new floor or paint the area with an epoxy based sealant, or equivalent. A temporary AUL will then be imposed on the area.

Although some residual contamination may have been identified in soil samples collected, analytical results for soils summarized by Emcon indicate that compounds were not detected at concentrations greater than CPSs, as defined in Section 5.0 of this Closure Plan. Construction workers who may breach the floor in Area 7 during future work will be required to take the correct health and safety precautions. Hazardous waste generated during future work in these areas will be managed in accordance with applicable regulations and the slab will be re-established after the work is finished.

In the event the room is to be demolished, concrete samples will be collected during demolition to determine how the C&D waste will be handled. Soil borings will be advanced in the area and soil samples will then be collected to verify that soils below the slab were not impacted above the CPSs, in accordance with the Closure Work Plan, submitted under separate cover. In the event contaminants are detected above CPSs,

the soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan.

4.2.3 Hazardous Materials Storage Facility (Manufacturing Building, Column N19, Area 13)

A wipe sample collected in this area contained low levels of the following metals: barium, chromium, lead, mercury, cadmium, and mercury. As a result, the area will be swept with a wire brush and then pressure washed. The owner plans to install a new floor or paint the area with an epoxy based sealant, or equivalent. A temporary AUL will be imposed on the area.

Several samples collected below the slab were characterized by varying concentrations of SVOCs. Of the SVOCs detected, benzo(a)anthracene, chrysene, and benzo(b)fluoranthene were detected at concentrations exceeding the CPSs. Of the inorganic elements (i.e., metals) analyzed, chromium was detected at a concentration exceeding the CPSs. Silver was also detected. Construction workers who may breach the floor in Area 13 during future work will be required to take the correct health and safety precautions. Hazardous waste generated during future work in these areas will be managed in accordance with applicable regulations and the slab will be re-established after the work is finished. In the event the room is to be demolished, concrete samples will be collected during demolition to determine how the C&D waste will be handled. Soil borings will be advanced in the area and soil samples will then be collected to verify that soils below the slab were not impacted above the CPSs, in accordance with the Closure Work Plan, submitted under separate cover. The soil will be excavated or remediated in some other fashion, if needed, in accordance with an NYSDEC approved plan.

4.2.4 Reclamation Room (Manufacturing Building, Column Q19, Area 17)

As mentioned in Section 3.1.4, the Reclamation Room currently houses the mechanical and treatment equipment for the SVE remediation system. The Reclamation Room has been sectioned into two (2) rooms with the SVE equipment occupying the larger of the two rooms (eastern side). The eastern side of the Reclamation Room will be addressed once the SVE system has been removed from the area (scheduled for June 2001). The western side of the Reclamation Room will be addressed along with the other areas of concern listed in this section. A temporary AUL will be imposed on the area.

Two wipe samples collected from the floor of the Reclamation Room exhibited concentrations of Aroclor 1254, barium, cadmium, chromium, lead, and mercury.

Sediment from the floor drain, sump, and inactive oil/water separator will be removed and the structures will be pressure washed. The entire room will be pressure washed and any fluids generated during this process will be screened and managed in accordance with appropriate hazardous waste regulations. The owner intends to install a new floor or the area will be paint the area with an epoxy based sealant. A temporary AUL will be imposed on the area.

Workers who breach the floor in Area 17 during any future work will take the correct health and safety precautions. Hazardous waste generated during future work in this area will be managed in accordance with applicable regulations and the slab will be re-established after the work is finished.

Concrete chip samples contained Aroclor 1254, arsenic, barium, cadmium, chromium, lead, mercury, silver, and TPHs as diesel. As a result, in the event demolition is proposed in the area, concrete core samples will be determine how the C&D waste will be handled. Soil borings will be advanced in the area and soil samples will then be collected to verify that soils below the slab were not impacted above the CPSs, in accordance with the Closure Work Plan, submitted under separate cover. The soil will be excavated or remediated in some other fashion, if needed in accordance with an NYSDEC approved plan.

4.3 Other Areas of Potential Concern Closure Activities

Proposed closure activities for the other areas of potential concern discussed in Section 3.2 of this plan are described below.

4.3.1 Thin Film Lab (EV Building, Area 1)

Decontamination of this area was completed during 1994 and 1995. Construction workers who may breach the floor in Area 1 during future work will be required to take the correct health and safety precautions. Hazardous waste generated during future work in these areas will be managed in accordance with applicable regulations and the slab will be re-established after the work is finished. For this reason a temporary AUL will be imposed on the approximately 1,500 square foot area.

In the event demolition is proposed in the area, concrete samples will be collected to determine how the C&D waste generated in the area will be handled. Copper and mercury were detected at concentrations exceeding the CPSs in the soil below the slab. As a result, the horizontal extent of the contaminants will be determined through a soil

sampling program, in accordance with the Closure Work Plan, submitted under separate cover. The vertical extent of impacted soil was defined by the analytical soil results from at least one deeper sample during Emcon's soil investigation. If contaminants are found above the CPSs during the sampling program, the soil will be excavated or remediated in some fashion in accordance with an NYSDEC approved plan.

4.3.2 Chemistry Lab (EV Building, Area 2)

"Wipe" samples collected from the shaker table/vacuum table exhibited concentrations of PCBs and metals. The area will be swept and then pressure washed to remove surficial contaminants. The area will be certified as closed after the decontamination procedures are complete.

4.3.3 Old Plating Area (Manufacturing Building, Column G10, Area 9)

One residue sample collected from this area exhibited chromium and lead concentrations. The area will be swept and then pressure washed to remove surficial contaminants. Construction workers who may breach the floor in Area 9 during future work will be required to take the correct health and safety precautions. Hazardous waste generated during future work in these areas will be managed in accordance with applicable regulations and the slab will be re-established after the work is finished. A temporary AUL will be imposed on the approximately 9,100 square foot area.

In the event demolition is proposed in the area, concrete core samples will be collected to determine how the C&D waste generated in the area will be handled. Mercury, nickel, cyanide, cadmium, and chromium were detected in soil below the slab at concentrations exceeding the CPSs. As a result, the horizontal extent of the contaminants will be determined during a soil sampling program, in accordance with the Closure Work Plan, submitted under separate cover. The vertical extent of impacted soil was defined during previous investigations from at least one deeper sample. Soil borings will be performed and soil samples will then be collected to verify that compounds with concentrations greater than CPSs have not impacted the area. If contaminants are found above CPSs during the sampling program, the soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan

4.3.4 Photo Process Lab (Service Building, Area 11)

One residue sample collected from this area exhibited silver contamination. The area will be swept and then pressure washed to remove surficial contaminants. Construction workers who may breach the floor in Area 11 during future work will be required to take the correct health and safety precautions. Hazardous waste generated during future work in these areas will be managed in accordance with applicable regulations and the slab will be re-established after the work is finished. A temporary AUL will be imposed on the area.

Soil below the slab was not analyzed to determine if there were any exceedances of the CPSs. As a result, the soil will be investigated during a soil sampling program in the event the slab is removed, in accordance with the Closure Work Plan, submitted under separate cover. Soil samples will be collected to verify that compounds with concentrations greater than CPSs have not impacted the area. If contaminants are found above CPSs during the sampling program, the soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan.

4.3.5 Lime Neutralization Pit (Along Eastern Side of Manufacturing Building at Column L19, Exterior Area 15)

The L19 Lime Neutralization Pit was removed, however, soil samples collected in Area 15 indicated that chrysene, copper, mercury, and zinc compounds were detected at concentrations above CPSs. The vertical extent of impacted soil was defined by the analytical soil results from at least one deeper sample. Soil borings will be advanced in this area and soil samples will be collected and analyzed for the compounds detected in previous samples collected in the area to determine the extent of any impacted soil, in accordance with the Closure Work Plan, submitted under separate cover. The soil impacted above CPSs will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan.

4.3.6 Foundry Building USTs (Exterior Area South of Foundry Building Area 21)

The two, 15,000-gallon Fuel Oil & one, 10,000-gallon Core Oil underground storage tanks (UST's), located on the south side of the Foundry Building, were removed in 1990. Soil samples collected in the area of the former location of the USTs during previous investigations exceeded CPS for copper and zinc. Mercury was detected above CPSs in Area 31, directly adjacent to Area 21. Soil borings will be advanced in the area to determine the extent of any contaminated soil, in accordance with the

Closure Work Plan, submitted under separate cover. The collapsed storm water drain line will be investigated during the additional work in Area 21. Contaminated soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan

4.3.7 Substation/Transformers (South of Boiler Building, Exterior Area 24)

A soil sample collected in from Area 24 exceeded the CPSs for PCBs. Hand dug shallow (one foot) soil samples will be collected to characterize the area, in accordance with the Closure Work Plan, submitted under separate cover. Contaminated soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan.

4.3.8 Cooling Tower Area (Exterior Areas 26A, 26B, & 26D)

Sediment samples obtained from abandoned cooling tower No. 1 (Area 26A), located at the northeast corner of the Administrative Building, contained chromium. Sediment will be removed from all of the cooling towers located at the site prior to demolition and the sediment will be properly disposed of in accordance with regulations. Previous investigations revealed that the soil below cooling towers 26A, 26B and 26D contained arsenic, copper, mercury, and zinc above CPSs. The vertical and horizontal extent of the impacted soils will be determined during a soil boring investigation, in accordance with the Closure Work Plan, submitted under separate cover and impacted soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan.

4.3.9 A/C Room Sump (Manufacturing Building, Column A11, Area 28)

Metals were detected in residue samples collected from the sump. The area will be decontaminated and certified as closed.

4.3.10 Short Order Machine Shop (Manufacturing Building, Column B11, Area 30)

A composite sediment sample, collected from the two sumps located in Area 30 contained PCBs and cadmium, chromium, lead, and mercury. The sediment will be removed from the sump and properly disposed of in accordance with applicable regulations. After the sediment has been removed, the sumps will be pressure washed. Once the pressure washing has been completed that area will be certified as closed.

4.3.11 Basement Sump (Foundry Building, Area 31)

As discussed in Section 4.2.4, any soil impacted outside of Area 31 will be addressed during activities in Area 21 as a result of the proximity of the areas. Generally, the vertical extents of these elevated impacts were defined by the analytical soil results from at least one deeper sample. Specifically one soil boring will be advanced along the exterior of the Foundry building directly outside of the sump area to at least the depth of the bottom of the sump to determine the extent of any contamination.

A sludge sample collected from the sump exhibited PCBs and metals. Free standing fluid and sediment will be removed and properly disposed of in accordance with applicable regulations. A temporary AUL will be imposed on this area.

In the event demolition is proposed in building, concrete core samples will be collected from the sump to determine now the C&D waste generated in this area will be handled. Soil borings will be advanced and soil samples will then be collected to verify that soils below the slab were not impacted above the CPSs, in accordance with the Closure Work Plan, submitted under separate cover. In the event contaminants are detected above CPSs, the soil will be excavated or remediated in some other fashion in accordance with an NYSDEC approved plan.

4.3.12 Blue Print Emissions Area (East of Administration Building, Area FPM-1)

Two soil borings will be advanced in this area to determine if the soils were impacted by the process, in accordance with the Closure Work Plan, submitted under separate cover. One soil boring will be advanced at the side door entrance to the service building, and the other in the area under the former pipe outside of the administration building. Analytical results will determine if further action is necessary.

4.3.13 Soil Storage Area (North of Boiler Building, FPM-8)

Soil borings will be advanced in the blue stone area north of the Boiler Building and soil samples will be collected and analyzed for full TCL (including VOCs and SVOCs) and PPM list. Analytical results will determine if further action is necessary.

4.3.14 Potential Chemical Disposal Area (South of Manufacturing Building, FPM-19)

Soil borings will be advanced in the blue stone area south of the manufacturing building near the entrances between column lines Q4 and Q8, in accordance with the

Closure Work Plan, submitted under separate cover, and soil samples will be collected and analyzed for full TCL (including VOCs and SVOCs) and PPM list. Analytical results will determine if further action is necessary.

5. Closure Performance Standards

When available and applicable, federal, state, and local environmental quality standards are to be used to determine the adequacy of closure. Where promulgated standards do not exist, informal closure performance guidelines will be used.

For the purposes of this closure, soil samples collected during the Preliminary Site Investigation were evaluated against the recommended soil cleanup objectives determined using procedures outlined in the NYSDEC Technical and Administrative Guidance Memorandum (TAGM) # HWR-94-4046 entitled "Determination of Soil Cleanup Objectives and Cleanup Levels, Revised 5/95." CPSs for organic compounds were based on an organic fraction in soil (Foc) of three percent (3%), as established during the Remedial Investigation of the site. CPSs for inorganics are the highest of either site specific background concentrations, Eastern US background concentrations or NYSDEC-recommended soil cleanup objectives from TAGM 94-4046. Table 3 is a summary of the CPSs.

6. Notification

Lockheed Martin will notify the NYSDEC of its intent to close its four HWMU and AOPC at the Great Neck facility under separate cover. The notification will be made prior to the actual anticipated date of closure.

7. Maximum Hazardous Waste Inventory

For the purposes of this Closure Plan, it is assumed that the entire chemical inventory in the Hazardous Materials Storage Facility has been removed by Lockheed Martin. Therefore, the only hazardous wastes requiring off-site disposal are wastes generated from the closure activities, if any.

8. Certification of Closure

Upon the completion of closure of the site, Lockheed Martin and an independent New York State licensed Professional Engineer will submit to the NYSDEC, a certification

documenting that the facility was closed in accordance with the procedures outlined in this plan.

9. Schedule

A schedule for closing the Former Unisys facility is provided as Appendix B.

10. Future Monitoring

Future monitoring at the site will be completed as a part of the overall groundwater monitoring plan for the site and will be submitted under separate cover.

11. References

H2M Group, Totowa, New Jersey, "Part 373 Closure Plan, Lockheed Martin, Great Neck, New York", May, 1998.

H2M Group, Totowa, New Jersey, "Phase I Environmental Site Assessment Report, Lockheed Martin Tactical Defense Systems, Great Neck, New York", August, 1997.

H2M Group, Totowa, New Jersey, "Supplemental Remedial Investigation Report, Lockheed Martin Tactical Defense Systems (Former Unisys Corp. Site), Great Neck, New York", December 1996

Emcon, Mahwah, New Jersey, "Draft Work Plan, Phase I Site Soil Investigation, Lockheed Martin Tactical Defense Systems, Great Neck, New York", November 1997.

Emcon, Mahwah, New Jersey, "Draft Facility Assessment Report, Lockheed Martin Tactical Defense Systems, Great Neck, New York", November 1997.

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NYSDEC, Division of Environmental Remediation, Record of Decision, Lockheed Martin Tactical Systems, Inc. Site, Operable Unit 1, Lake Success and Town of North Hempstead, Nassau County, Site Number 1-30-045", March 1997.

NYSDEC, Division of Environmental Enforcement, Tarrytown, New York, "Order on Consent, Unisys Corporation Site #1-30-045, Order #W1-0787-96-12", November 1997.

NYSDEC, Division of Solid and Hazardous Materials, "6NYCRR, Part 373 – Hazardous Waste Management Facilities", effective November 28, 1998.

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Tetra Tech, Pasadena, California, "Final Report, Soil Gas Survey Report, Lockheed Martin Tactical Defense Systems, 365 Lakeville Road, Great Neck, New York", September, 1997.

FPM, Ronkonkoma, New York, "Review of Phase I Site Soil Investigation Report, Lockheed Martin Corporation, Great Neck, New York", May 1999.

NYSDEC, Division of Soil and Hazardous Materials, Region One, Stony Brook, New York, "Facility Closure Letter, Lockheed Martin Corporation, Great Neck, New York, EPA ID#: NYD 075 796 037", February 2000.

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ARCADIS GERAGHTY&MILLER

Table 1. Hazardous Waste Management Units and Areas of Potential Concern, Former Unisys Facility, Great Neck, New York.

1.1 Hazardous Waste Management Units

Area	Location	Description of Area	Operations/History	Facility and Soil Investigation Results	Designation
7	Q18	Paint Storage Room	4, Paint was most recently stored in area. Varsol, a degreasing solvent, was historically stored in room. One concrete sump and a sealed floor drain are located in room.	5, 6, Compounds detected above CPSs in the residue sample included VOCs and mercury. Two soil borings were advanced to depths of 15 and 30 feet; no contaminants exceeded CPSs in soil borings.	Hazardous Waste Management Unit, A, B
8	N19	Oil Storage/Pump Room	Pump and oil storage rooms were most recently used for storage of 55-gallon drums of new and used oils. The pump room was formerly used as a transfer point for cutting oils. Piping trenches are located in pump room.	5, 6, Two concrete chip samples collected did not exhibit any concentration above CPSs. Residue samples exhibited di-n-butylphthalate, PCBs, arsenic, barium, cadmium, chromium, lead, mercury and silver. Emcon advanced three soil borings by hand to depth of two feet; no contaminants exceeded CPSs in soil borings.	Hazardous Waste Management Unit, A, B
13	N19	Haz. Mat. Storage Facility	Area served as 90-day storage room. Three rooms were designated for flammables, oxidizers and corrosives and had secondary containment.	5, 6, No CPSs were exceeded during the FA. One soil boring was advanced to a depth of 15 feet (13A) and two soil borings were advanced to depths of two feet. Chromium, and select SVOCs were detected at concentrations exceeding the CPSs in the soil borings. Silver was also detected.	Hazardous Waste Management Unit, A, B
17	Q19	Reclamation Room	Room was formerly used for solvent reclamation. A sump and oil/water separator remain in room.	5, 6, 9, Concrete chip samples contained arsenic, cadmium, chromium, mercury, and silver above CPSs. Wipe samples did not exhibit concentrations above CPSs. One soil boring was advanced to a depth of two feet. One soil boring was advanced to 50 feet. Compounds were not detected at concentrations greater than CPSs.	Hazardous Waste Management Unit, A, B

1.2 Areas of Potential Concern

Area	Location	Description of Area	Operations/History	Facility and Soil Investigation Results	Additional Work Warranted?	Reason (7)
1	Environmental Laboratory (EV Building)	Thin Film Lab	4, Acids, caustics, & plating chemistry (copper, tin, lead, nickel, gold, cadmium, aluminum, chromium, zinc, and magnesium) were used. Major process equip was removed. Decontamination was performed. Exterior lime neut. tank was removed in December 1996, NFA issued by NYSDEC.	6, Three borings were completed to target depths. Copper and mercury were detected in boring 1A above CPSs.	YES	B
2	EV Building	Chemistry Lab	Metallurgical and chemical testing of materials was performed in area.	6, Two borings were completed to target depths. No contaminants exceeded CPSs. Shaker table and vacuum chamber wipe samples had concentrations of PCBs and metals	YES	E

Table 1. Hazardous Waste Management Units and Areas of Potential Concern, Former Unisys Facility, Great Neck, New York.

1.2 Areas of Potential Concern

Area	Location	Description of Area	Operations/History	Facility and Soil Investigation Results	Additional Work Warranted?	Reason (7)
3	Foundry Bldg.	Hi Power Lab	Electrical equipment located in room.	5, 6, One boring completed to target depth. No contaminants exceeded CPSs. Other boring not completed on account of electrical hazard. Wipe samples collected during FA were non-detect for PCBs.	NO	C
4	Foundry Bldg.	Basement	Building housed a casting foundry for metal parts. Basement provided area for raw material storage.	5, 6, Two borings were not completed because of access problems. See Area 31 for additional information.	NO	C
5	Maint. Building	Concrete Floor & Walls	Area used as wood shop, sheet metal shop, and for general facilities maintenance. General deterioration of concrete floor and walls was noted along with staining.	6, One boring completed to target depth. No contaminants exceeded CPSs.	NO	C
6	S of Boiler House	Coal Silo & Ash Pit	Asbestos-brick incinerator and stack previously used for burning papers. High sulfur coal was stored in silo, ash was stored in pit.	6, Two borings advanced, one to target depth other hit refusal at 16 (target depth was 30'). No contaminants exceeded CPSs.	NO	C
9	G10 (2)	Old Plating Area	Three large below-grade 8-inch concrete vaults sealed with mastic were used for chrome anodizing aluminum parts and other metals plating. The vaults drained to neutralization pit and sanitary sewer. All process tanks were removed, backfilled and covered with a 6-inch layer of concrete in late 1960's.	5, 6, Residue sample was reportedly collected from a channel during FA, Chromium and Mercury exceeded CPSs. Two borings were advanced to 5 feet in first phase (target depth=30 feet). Three borings were advanced to 14, 17, and 17 feet. Two borings were advanced to 37 feet. SVOCs, Mercury, Nickel, Cyanide, Cadmium and Chromium were contaminants which exceeded CPSs. PAHs attributed to tarpaper. Analytical results for Borings 9E and 9F are included as Table 2.	YES	B
10	A4	Publishing Photo Lab	Waste chemicals used in the lab were collected and then transferred to the haz. waste storage room.	None.	NO	C
11	Service Building	Process Photo Lab	4, Waste chemicals used in the lab were collected and then transferred to the haz. waste storage room.	5, Silver was detected during FA. Soil boring proposed but was not performed during soil investigation on account of building access problems.	YES	D
12	A12	Plating & Paint Shop	3, & 4, Aluminum anodizing using chromic acid solutions performed in area. Floor troughs present. Exterior lime tank was removed in December 1996, NYSDEC issued a no further action letter for tank.	6, One boring completed to target depth of 15 feet. Two borings with target depths of 30 feet were completed to 11 feet. SVOCs exceeded CPSs and may be attributed to asphalt pavements and or subgrade materials.	NO	C
14	Boiler House	Fuel Oil Equipment Room	4, The building contains major mechanical systems for the facility. Stains were observed in the fuel oil equipment room.	5, 6, Residue sample was collected during FA from pipe chase channel. Lead exceeded the CPSs. One boring was advanced to 2 feet (target depth was 15 feet) during soil investigation. No contaminants exceeded CPSs.	NO	C

Table 1. Hazardous Waste Management Units and Areas of Potential Concern, Former Unisys Facility, Great Neck, New York.

1.2 Areas of Potential Concern

Area	Location	Description of Area	Operations/History	Facility and Soil Investigation Results	Additional Work Warranted?	Reason (7)
15	Outside Mfg. Bldg. at column L19	Lime Neutralization Pit	Pit was formerly used to pre-treat rinse waters. Tank was removed in 1995, no regulatory involvement.	6, One boring advanced to 30 feet target depth. Organics and inorganics were detected above CPSs at 0-2 feet in boring. Vertical extent defined, horizontal extent is not defined.	YES	B
16	South of EV Bldg.	Former Oil Bladder AST	Tank was removed.	6, One boring was advanced to a target depth of 30 feet. Organics were detected above CPSs at 0-2 and 3-5 feet in boring and can be attributed to asphalt pavement.	NO	C
18	Garage	2-Oil Water Separators	No records available on removal.	5, 6, One wipe sample and one concrete chip sample were collected during the FA. Two borings were partially completed during soil investigation to 16 and 2 feet (target depths = 30'). No contaminants exceeded CPSs.	NO	C
20	Outside of Manf. Bldg.	Former Gas 10,000-Gal. UST	Removed in 1990, no post-excavation sampling was performed. The 10,000-gallon UST replaced a 2,000 gallon UST. No other information was available.	6, One boring was advanced to a target depth of 30 feet. No contaminants exceeded CPSs.	NO	C
21	SE of Foundry Bldg.	Two-15,000-gallon and one-10,000-gallon oil USTs	Tanks were removed, no other information was available.	6, Two out of the three proposed borings were advanced to the target depths of 30 feet. The third boring was advanced to 5 feet. PAHs were detected in 0-2' samples and copper was detected in all three borings above CPSs. Copper and zinc detected in 21C above CPSs. PAHs attributed to asphalt pavement. Area 31 will be included in the additional investigative work for this area. Collasped pipe will be investigated during additional work in this area.	YES	B
22	N of Foundry Bldg.	Dielectric Oil UST	Tank were removed, no other information was available.	6, Boring complete to target depth of 30 feet. No contaminants exceeded CPSs.	NO	C
24	South of Boiler Building	Substation/Transformers	4, Electrical transformers are located in area. Oil samples collected from the units exhibited PCB concentrations above CPSs.	6 One of four soil samples had PCB concentrations which exceeded CPSs.	YES	B
25	A8	Clean Room Sump & Tanks	4, Three above-grade collection sumps (in narrow hallways) were used to collect water from sink drains in rooms. Water pumped to sanitary sewers. Sample collected in 1995 exhibited VOCs. No decon. was performed.	6, No samples were collected on account of access problems, however, all sumps drained to sanitary sewers. Compounds were not detected at concentrations greater than CPSs.	NO	C

Table 1. Hazardous Waste Management Units and Areas of Potential Concern, Former Unisys Facility, Great Neck, New York.

1.2 Areas of Potential Concern						
Area	Location	Description of Area	Operations/History	Facility and Soil Investigation Results	Additional Work Warranted?	Reason (7)
26	Exterior locations. See Figure 5	Five Cooling Tower Areas	4, Biocides containing chromium were used in towers to prevent biological growth. Water samples from inside the tank contain 233 mg/kg total chromium, and sediment samples from inside the water tank contain 690 mg/kg total chromium.	5, 6, Residue samples were collected from tower behind foundry tower during FA. Five borings were completed to 15-foot target depth. Zinc was detected in 25A at 0-2 feet, copper at 0-2 feet and arsenic at 3-5 feet were detected in 25B, and zinc, copper, and arsenic were detected 25C at 0-2 feet above CPSs.	YES	B
27	C12	Sheet Metal Sump	4, Sump located in this area was formally associated with machining operations. Sump residue samples indicated the presence of metals. The sump has been filled and covered with concrete.	6, One boring was partially completed at 15 feet (target depth was 30 feet). No contaminants exceeded CPSs.	NO	C
28	A11	A/C Room Sump	3, 4, Sump located in this area was formally associated with machining operations. Sump residue samples indicated the presence of metals. The sump has been filled and covered with concrete.	6, One boring was partially completed at 2 feet (target depth was 15 feet). Silver was detected.	YES	E
29	O13	Clean Room Sumps	Above-grade collection sumps (in narrow hallways) were used to collect water from sink drains in rooms. Water was pumped to sanitary sewers.	6, One boring was partially completed to 11 feet (target depth was 15 feet). Other boring was not completed. No contaminants exceeded CPSs.	NO	C
30	B11	Short Order Machine Shop	Two sumps, covered with steel plates, are located in area. The purpose of the sumps was not known.	5, 6, One composite sediment sample was collected from 2 sumps. Sample had metals contamination above CPSs One boring was partially completed to 11 feet (target depth was 15 feet). No contaminants exceeded CPSs.	YES	E
31	Foundry Bldg.	Basement Sump	Non-sanitary wastewater from the building collected in sump, located in basement, and was pumped to on-site recharge basins by facility personnel.	5, 6, A sediment sample was collected during FA from sump. Metals were detected above CPSs. One boring advanced during soil investigation to 26 feet (target depth was 30 feet). Shallow sample exceeded CPSs for mercury and will be addressed with Area 21.	YES	B, E
32	O2	Air Conditioning Sump	A 5x5x2 foot air conditioning unit sump with no drain lines was located in this area. There was no evidence of hazardous materials.	6, Boring was not performed on account of classified nature of area.	NO	C
33	O10	Shipping and Receiving	A sump (with an unknown purpose) was located in this area. The sump has been filled and covered with concrete.	6, One boring was completed to target depth of 30 feet. Carbazole was detected but is not regulated in the 0-2 feet and 3-5 feet samples.	NO	C

Table 1. Hazardous Waste Management Units and Areas of Potential Concern, Former Unisys Facility, Great Neck, New York.

1.2 Areas of Potential Concern						
Area	Location	Description of Area	Operations/History	Facility and Soil Investigation Results	Additional Work Warranted?	Reason (7)
34	G19	Heat Treat Pit	A large concrete pit was used to collect water from a former heat treating pit. The pit has been filled and sealed. No other contaminants exceeded CPSs.	6, Two borings were advanced to 15 feet (target depth was 30 feet for both borings). SVOCs were detected above CPSs and are attributed to aphalt pavements and/or subgrade materials.	NO	C
35	Lakehouse	Grease Trap & Lime Neutralization Tank	AKA Special Test Facility, formerly used for testing of sonar equipment. Trap and tank accepted flow from sidewalks.	6, Boring was completed to target depth of 30 feet. No contaminants exceeded CPSs.	NO	C
36	Around Manf. Building	Former 100-gallon UST	Four tanks were removed in 1980's, no other information was available.	6, Four borings were completed to target depths of 30 feet. SVOCs exceeded CPSs; however, SVOCs have been attributed to asphalt pavements.	NO	C
37	West of Boiler Building	Former 275-gallon UST	Gasoline tank was removed in 1980's, no other information was available.	6, boring was completed to target depth of 30 feet. No contaminants exceeded CPSs.	NO	C
38	SW of Boiler Bldg.	275-gallon AST	Gasoline tank was not removed.	6, boring was advanced to 2 feet (target depth was 15 feet). No contaminants exceeded CPSs.	NO	C
39	E of Manf Bldg.	6000-gallon AST	Former ethylene glycol tank was removed.	6, One boring was advanced to target depth of 15 feet. SVOCs were detected in shallow sample. No other concerns were noted. SVOCs may be attributed to asphalt pavement.	NO	C
40	Garage	Hydraulic Lift	The system includes an underground reservoir.	6, One boring was partially completed to 2 feet (target depth is 15 feet).	NO	C
FPM-1	E of Admin. Bldg.	Potential Blue Print Discharge Area	The blue print room was located in the eastern section of the administration building. Alcohol was used in the process.	No other information is available	YES	B
FPM-3	H19	Bubble in floor	The bubbles in the wooden floor are attributed to water damage.	None.	NO	C
FPM-8	N of Boiler Bldg.	Soil Storage	Soil was stockpiled in area. No other information is available.	None. Soil is no longer in this area.	YES	B
FPM-19	S of Mfg. Bldg. Between Q4 and Q8	Chemical Dumping	Chemicals in 55-gallon drums were reportedly dumped in the area. No other information is available.	None.	YES	B
FPM-20	M10	Wave Solder Area	Process similart to welding. There is no evidence of hazardous materials.	None.	NO	C

Table 1. Hazardous Waste Management Units and Areas of Potential Concern, Former Unisys Facility, Great Neck, New York.

1.2 Areas of Potential Concern						
NYSDEC-5	K12	Customer Service Area	Historical central degreasing operation, however, there was no evidence of hazardous materials.	None	NO	C
1.3 Areas Covered Under State Superfund						
Area	Location	Description of Area	Operations/History	Facility and Soil Investigation Results	Designation	
19	SE of Manf. Bldg.	USTs	During RI activities all of the USTs were reportedly removed.	No sampling was performed in this area as part of the EMCON scope because included in RI.	Exterior area Included in OU-I ROD	
23	S of Manf. Bldg.	Dry Well Area	During RI activities all of the USTs were reportedly removed.	No sampling was performed in this area as part of the EMCON scope because included in RI.	Exterior area Included in OU-I ROD	

Table 1. Hazardous Waste Management Units and Areas of Potential Concern, Former Unisys Facility, Great Neck, New York.

Notes

1. Areas 1-40 from Section 6, Summary of Findings, "Phase I Environmental Assessment Report", dated August 1997, performed by H2M Group. FPM areas from "Review of Phase I Site Soil Investigation Report", dated May 11, 1999, performed by Fanning, Philips, and Molnar.
2. Manufacturing Building areas located with column numbers.
3. Areas included in "Final Report for Decontamination and Decommissioning at the Great Neck Manufacturing Facility", performed by Eagle Industrial Hygiene Associates, Horsham, Pennsylvania dated July 15, 1995.
4. Sampling activities performed during Loral Corporation's July 1995 due diligence investigation.
5. Area included in draft, "Facility Assessment Report, Lockheed Martin Corporation, Great Neck, New York", dated November 1997.
6. Area included in, "Phase I Site Soil Investigation, Lockheed Martin Corporation, Great Neck, New York", prepared by EMCON, dated October 8, 1998.
7. Reasons for YES or NO - Additional Investigation Warranted
   A. Storage, management, and/or use of hazardous waste or hazardous materials.
   B. Potential for or evidence of release of hazardous waste or hazardous materials.
   C. No evidence of release and/or hazardous waste management.
   D. Insufficient data to determine potential for release.
   E. Surface decontamination required.
8. Area included in "Soil Gas Survey Report, Lockheed Martin Tactical Defense Systems, 365 Lakeville Road, Great Neck, New York", performed by Tetra Tech, dated September 19, 1997.
9. Area included in " SVE Pilot Study Report, Former Lockheed Martin Corporation, Great Neck, New York", prepared by ARCADIS Geraghty & Miller, dated July 20, 1999.

FPM	Fanning Phillips & Molnar
CPS	Closure Performance Standards (Listed in Table 3)
NFA	No Further Action
NYSDEC	New York State Department of Environmental Conservation
UST	Underground Storage Tank.
AST	Aboveground Storage Tank.
OU-1	Operable Unit 1
ROD	Record of Decision
SVOC	Semi-Volatile Organic Compounds

Table 2. Summary of Analytical Results for Soil Borings 9E and 9F, Former Unisys Facility, Great Neck, New York

	SITE:	9E	9E	9E	9E
	SAMPLE ID:	9E 1-3	9E 5-7	9E 10-12	9E 25-27
	DATE:	2/26/00	2/26/00	2/26/00	2/26/00
CONSTITUENT:	DEPTH in ft:	1-3	5-7	10-12	25-27
VOCs in ug/kg					
Methylene chloride		< 5	< 5	< 5	< 5
1,1-Dichloroethylene		< 5	< 5	< 5	< 5
cis-1,2-Dichloroethene		< 5	< 5	< 5	< 5
trans-1,2-Dichloroethene		< 5	< 5	< 5	< 5
1,1,1-Trichloroethane		< 5	< 5	< 5	< 5
Trichloroethene		< 5	0.4 J	0.5 J	< 5
Benzene		< 5	< 5	< 5	< 5
Tetrachloroethene		< 5	< 5	< 5	< 5
Toluene		< 5	< 5	0.5 J	< 5
Chlorobenzene		< 5	< 5	< 5	< 5
Ethylbenzene		< 5	< 5	0.1 J	< 5
Xylene (total)		< 5	< 5	1 J	< 5
Total Metals in mg/kg					
Antimony		0.85 B	1.2 B	1.1 B	0.82 B
Arsenic		1.6 B	2.4	2.9	1.2 B
Beryllium		< 0.25	< 0.21	< 0.21	< 0.21
Cadmium		< 0.25	< 0.21	16.2	< 0.21
Chromium		6.8	12.6	49	10.2
Copper		4.6 B	4.3 B	46.8	9.1
Lead		4.4	8.6	19.1	3.6
Mercury		0.0091	0.0092	0.012	< 0.0028
Nickel		3 B	3.3 B	87.6	16.2
Selenium		< 0.75	< 0.63	< 0.63	0.73 B
Silver		< 0.25	< 0.21	0.31 B	< 0.21
Thallium		< 1	< 0.84	< 0.84	< 0.84
Zinc		20.2	20.6	34.5	19.2
Cyanide, total		< 0.63	< 0.52	6.61	< 0.53
Soil pH					
pH		11.6	11.1	11.5	9.13

Footnotes on last page.

Table 2. Summary of Analytical Results for Soil Borings 9E and 9F, Former Unisys Facility, Great Neck, New York

CONSTITUENT:	SITE: / SAMPLE ID: / DATE: / DEPTH in ft:	9E 9E 30-32 2/26/00 30-32	9E 9E 35-37 2/26/00 35-37	9F 9F 2-3 2/25/00 2-3	9F 9F 5-7 2/25/00 5-7
VOCs in ug/kg					
Methylene chloride		< 6	< 6	< 5	< 5
1,1-Dichloroethylene		< 6	< 6	< 5	< 5
cis-1,2-Dichloroethene		< 6	< 6	< 5	< 5
trans-1,2-Dichloroethene		< 6	< 6	< 5	< 5
1,1,1-Trichloroethane		< 6	< 6	< 5	< 5
Trichloroethene		0.9 J	0.5 J	< 5	< 5
Benzene		< 6	< 6	< 5	< 5
Tetrachloroethene		< 6	< 6	< 5	< 5
Toluene		< 6	< 6	< 5	< 5
Chlorobenzene		< 6	< 6	< 5	< 5
Ethylbenzene		< 6	< 6	< 5	< 5
Xylene (total)		< 6	< 6	< 5	< 5
Total Metals in mg/kg					
Antimony		1.3 B	1.9 B	0.71 B	0.65 B
Arsenic		3.4	2.8	1.6 B	2 B
Beryllium		< 0.21	< 0.22	< 0.21	< 0.21
Cadmium		2.4	1.3	< 0.21	< 0.21
Chromium		25	22.3	8.5	9.6
Copper		20.6	15.2	4.4 B	6.2
Lead		8.5	8.4	4	10
Mercury		0.0086	0.015	0.0058 B	0.012
Nickel		41	25	3.9 B	3.9 B
Selenium		< 0.64	< 0.67	< 0.62	< 0.63
Silver		< 0.21	< 0.22	< 0.21	< 0.21
Thallium		< 0.85	< 0.89	< 0.83	< 0.84
Zinc		42.1	32.8	17.9	29.3
Cyanide, total		0.85	< 0.56	< 0.51	< 0.53
Soil pH					
pH		10.2	9.05	11.7	8.46

Footnotes on last page.

Table 2. Summary of Analytical Results for Soil Borings 9E and 9F, Former Unisys Facility, Great Neck, New York

CONSTITUENT:	SITE: / SAMPLE ID: / DATE: / DEPTH in ft:	9F 9F 10-12 2/25/00 10-12	9F 9F 15-17 2/25/00 15-17	9F 9F 20-22 2/25/00 20-22	9F 9F 25-27 2/26/00 25-27
VOCs in ug/kg					
Methylene chloride		< 5	< 5	< 5	< 5
1,1-Dichloroethylene		< 5	< 5	< 5	< 5
cis-1,2-Dichloroethene		0.8 J	< 5	< 5	< 5
trans-1,2-Dichloroethene		< 5	< 5	< 5	< 5
1,1,1-Trichloroethane		< 5	< 5	< 5	< 5
Trichloroethene		7	0.6 J	0.3 J	< 5
Benzene		< 5	< 5	< 5	< 5
Tetrachloroethene		< 5	< 5	< 5	< 5
Toluene		5	< 5	< 5	< 5
Chlorobenzene		< 5	< 5	< 5	< 5
Ethylbenzene		2 J	< 5	< 5	0.3 J
Xylene (total)		10	< 5	< 5	2 J
Total Metals in mg/kg					
Antimony		1.1 B	1.5 B	1.3 B	1 B
Arsenic		3.5	2.5	1.4 B	1.4 B
Beryllium		< 0.2	< 0.21	< 0.2	< 0.21
Cadmium		< 0.2	< 0.21	< 0.2	< 0.21
Chromium		55.8	40.2	15.2	12.9
Copper		17.6	14.2	7.5	8.6
Lead		36.6	7.5	3.4	2.8
Mercury		0.038	0.0062	0.004 B	< 0.0034
Nickel		21	30.7	14.2	14.8
Selenium		< 0.62	< 0.62	< 0.61	< 0.63
Silver		0.89 B	< 0.21	< 0.2	< 0.21
Thallium		< 0.82	< 0.83	< 0.82	< 0.84
Zinc		27	35.2	21.5	18.3
Cyanide, total		< 0.5	< 0.51	< 0.5	< 0.53
Soil pH					
pH		10.2	10.2	9.04	6.87

Footnotes on last page.

Table 2. Summary of Analytical Results for Soil Borings 9E and 9F, Former Unisys Facility, Great Neck, New York

CONSTITUENT:	SITE:	9F		9F	
	SAMPLE ID:	9F 30-32		9F 35-37	
	DATE:	2/26/00		2/26/00	
	DEPTH in ft:	30-32		35-37	
VOCs in ug/kg					
Methylene chloride		1	J	< 6	
1,1-Dichloroethylene		< 6		< 6	
cis-1,2-Dichloroethene		< 6		< 6	
trans-1,2-Dichloroethene		< 6		< 6	
1,1,1-Trichloroethane		< 6		< 6	
Trichloroethene		2	J	1	J
Benzene		< 6		< 6	
Tetrachloroethene		< 6		< 6	
Toluene		< 6		< 6	
Chlorobenzene		< 6		< 6	
Ethylbenzene		< 6		< 6	
Xylene (total)		< 6		< 6	
Total Metals in mg/kg					
Antimony		1.3	B	2	B
Arsenic		2.3		2.6	
Beryllium		< 0.23		< 0.22	
Cadmium		< 0.23		< 0.22	
Chromium		19.1		21.5	
Copper		17.8		16.6	
Lead		4.7		6.2	
Mercury		0.004	B	0.0058	B
Nickel		18.6		20	
Selenium		< 0.68		0.75	B
Silver		< 0.23		< 0.22	
Thallium		< 0.91		< 0.9	
Zinc		45.6		45.6	
Cyanide, total		< 0.57		< 0.57	
Soil pH					
pH		6.9		7.2	

Footnotes on last page.

Table 2. Summary of Analytical Results for Soil Borings 9E and 9F, Former Unisys Facility, Great Neck, New York

Analysis Performed by: Severn Tren Laboratories, Monroe, CT.

VOCs	Volatile Organic Compounds.
ug/kg	Micrograms per liter.
mg/kg	Milligrams per liter.
J	Estimated value.
B in VOCs	Detected in associated blank.
B in metals	Detected between the IDL and CRDL.
IDL	Instrument detection limit.
CRDL	Contract required detection limit.

Table 3. Closure Performance Standards (mg/kg), Former Unisys Facility, Great Neck, New York.

Parameters	Closure Performance Standard (A)	RI Background Sample (B)	Eastern U.S. Background
Semi-Volatile Organic Compounds			
Acenaphthene	50	NA	NA
Acenaphthylene	50	NA	NA
Anthracene	50	0.023J	NA
Benzo(a)anthracene	8.28	0.190J	NA
Benzo(a)pyrene (F)	MDL	0.096J	NA
Benzo(b)fluoranthene	3.3	0.260J	NA
Benzo(g,h,i)perylene	50	0.020J	NA
Benzo(k)fluoranthene	3.3	0.200J	NA
bis(2-ethylhexy)phthalate	50	0.053J	NA
Butylbenzylphlate	50	NA	NA
Carbazole	NA	NA	NA
Chrysene	1.2	0.340J	NA
Dibenzo(a,h)anthracene	0.042	NA	NA
Dibenzofuran	18.6	NA	NA
1,2-Dichlorobenzene	23.97	ND	NA
1,3-Dichlorobenzene	4.65	ND	NA
1,4-Dichlorobenzene	25.5	ND	NA
2,4-Dimethylphenol	NA	ND	NA
Di-n-butylphthalate	24.3	0.018J	NA
2,6-Dinitrotoluene	3		
Fluoranthene	50	0.42	NA
Fluorene	50	ND	NA
Indeno(1,2,3-cd)pyrene	9.6	0.110J	NA
Isophorone	13.2	NA	NA
2-Methylnaphthalene	50	ND	NA
4-Methylphenol	2.55	ND	NA
Napthalene	39	ND	NA
3-Nitroaniline	1.5	NA	NA
Nitrobenzene	0.6	NA	NA
Phenanthrene	50	0.34J	NA
Phenol	0.33	ND	NA
Pyrene	50	0.52	NA
1,2,4-Trichlorobenzene	10.05	ND	NA
Total PCB's (C)			
Surface	1	NA	NA
Subsurface	10	NA	NA

Footnotes on last page.

Table 3. Closure Performance Standards (mg/kg), Former Unisys Facility, Great Neck, New York.

Parameters	Closure Performance Standard (A)	RI Background Sample (B)	Eastern U.S. Background
Volatile Organic Compounds			
Benzene	0.174	ND	NA
Chlorobenzene	4.95	ND	NA
1,1-Dichloroethene	0.975	NA	NA
1,2-Dichlotoethene (total)	0.885	ND	NA
Ethylbenzene	.10	ND	NA
Methylene chloride	0.3	NA	NA
sec-Butylbenzene	NA	NA	NA
Tetrachloroethene	4.155	ND	NA
Toluene	4.5	ND	NA
1,1,1-Trichlotoethane	2.28	ND	NA
Trichlorethene	1.89	ND	NA
Xylene (total)	3.6	ND	NA

Footnotes on last page.

Table 3. Closure Performance Standards (mg/kg), Former Unisys Facility, Great Neck, New York.

Parameters	Closure Performance Standard (A)	RI Background Sample (B)	Eastern U.S. Background	Rec. Soil Clean-up Objectives (A)
Metals				
Aluminum	33,000	21,000	33,000	SB
Antimony	NA	0.83 B (D)	NA	SB
Arsenic	12	8.8	3-12	7.5 or SB
Barium	600	63.9	15-600	300 or SB
Beryllium	1.75	0.77B	0-1.75	0.16 or SB
Cadmium	10	ND	0.1-1	10
Chromium	50	23.9	1.5-40	50
Cobalt	60	7B	2.5-60	30 or SB
Copper	50	NA	1-50	25 or SB
Cyanide	ND	ND	NA	Site-Specific
Lead	500	82.3	200-500	400(E)
Magnesium	5,000	2290	100-5000	SB
Manganese	5,000	379	50-5000	SB
Mercury	0.2	0.06B	0.001-0.2	0.1
Nickel	28.5	28.5	0.5-25	13 or SB
Selenium	3.9	0.83B	0.1-3.9	2 or SB
Silver	NA	ND	NA	SB
Thallium	NA	1.1 B (D)	NA	SB
Vanadium	300	50.9	1-300	150 or SB
Zinc	55.7	55.7	9-50	20 or SB

(A) Closure Performance Standards for organic compounds are based on NYSDEC Recommended Soil Cleanup Objectives using a organic fraction in soil of 3%, Closure Performance Standards for inogranics are the highest of either site specific background levels, Eastern U.S. Background levels or NYSDEC recommended soil clean-up objectives from TAGM 94-4046.

(B) Developed in accordance with March 1997 Record of Decision for Lockheed Martin OU-1, Site No. 1-30-045 (unless otherwise noted).

(C) Subsurface = greater than 18 inches below ground, surface = 18 inches or less below ground.

(D) From "Supplementary Remedial Investigation Report", prepared by H2M Group, dated December, 1996.

(F) If the method detection limit for a given sample falls below 0.061 mg/Kg, then 0.061 mg/Kg will be used.

(E) The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 mg/kg.

B Compound detected in either field blank, trip blank and/or laboratory blank.

J Value is estimated compound detected below pratical quantitation limit.

NA Not available.

ND Not detected.

SB Site Background.

Table 4. Summary of Closure Performance Standard Exceedances in Soil Samples (mg/kg), Former Unysis Facility, Great Neck, New York

CONSTITUENT:	CLOSURE PERFORMANCE STANDARD	SAMPLE NUMBER:	1	2	3	4	5	6	7	8	9
		SITE:	1A	1A	9B	9B	9B	9E	9E	9E	9E
		SAMPLE ID:	1A 0-2	1A 3-5	9B 0-2	9B 3-5	9B 5-7	9E 1-3	9E 5-7	9E 10-12	9E 30-32
		DATE:	12/18/97	12/18/97	12/23/97	12/23/98	3/5/98	2/26/00	2/26/00	2/26/00	2/26/00
		DEPTH in ft:	0-2	3-5	0-2	3-5	5-7	1-3	5-7	10-12	30-32
VOCs in mg/kg											
SVOCs in mg/kg											
Benzo(a)anthracene	8.28		--	--	--	--	--	--	--	--	--
Benzo(a)pyrene	MDL (0.170)		--	--	--	--	0.81	--	--	--	--
Benzo(b)fluoranthene	3.3		--	--	--	--	--	--	--	--	--
Carbazole	NA		--	--	--	--	.130 J	--	--	--	--
Chrysene	1.2		--	--	--	--	--	--	--	--	--
Dibenz(a,h)anthracene	0.042		--	--	--	--	.120 J	--	--	--	--
Fluoranthene	50		--	--	--	--	--	--	--	--	--
Phenanthrene	50		--	--	--	--	--	--	--	--	--
Total PCBs in mg/kg	1, 10		--	--	--	--	--	--	--	--	--
Metals in mg/kg											
Antimony	NA		--	--	--	--	--	.85 B	1.2 B	1.1 B	1.3 B
Arsenic	12		--	--	--	--	--	--	--	--	--
Cadmium	10		--	--	--	--	--	--	--	16.2	--
Chromium	50		--	--	--	--	--	--	--	--	--
Copper	50		547	81.2	--	--	--	--	--	--	--
Cyanide, total	ND		--	--	--	--	--	--	--	6.61	0.85
Mercury	0.2		0.279	--	0.955	0.493	--	--	--	--	--
Nickel	28.5		--	--	--	--	--	--	--	87.6	41
Selenium	3.9		--	--	--	--	--	--	--	--	--
Silver	NA		--	--	--	--	--	--	--	--	--
Zinc	55.7		--	--	--	--	--	--	--	--	--

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Table 4. Summary of Closure Performance Standard Exceedances in Soil Samples (mg/kg), Former Unysis Facility, Great Neck, New York

CONSTITUENT:	CLOSURE PERFORMANCE STANDARD	SAMPLE NUMBER:	10	11	12	13	14	15	16	17	18
		SITE:	9E	9F	9F	9F	9F	9F	9F	12B	12B
		SAMPLE ID:	9E 35-37	9F 10-12	9F 15-17	9F 20-22	9F 25-27	9F 30-32	9F 35-37	12B 0-2	12B 9-11
		DATE:	2/26/00	2/25/00	2/25/00	2/25/00	2/26/00	2/26/00	2/26/00	12/31/97	12/31/97
		DEPTH in ft:	35-37	10-12	15-17	20-22	25-27	30-32	35-37	0-2	9-11
VOCs in mg/kg											
SVOCs in mg/kg											
Benzo(a)anthracene	8.28		--	--	--	--	--	--	--	--	--
Benzo(a)pyrene	MDL (0.170)		--	--	--	--	--	--	--	0.24	0.38
Benzo(b)fluoranthene	3.3		--	--	--	--	--	--	--	--	--
Carbazole	NA		--	--	--	--	--	--	--	--	--
Chrysene	1.2		--	--	--	--	--	--	--	--	--
Dibenz(a,h)anthracene	0.042		--	--	--	--	--	--	--	.078 J	.140 J
Fluoranthene	50		--	--	--	--	--	--	--	--	--
Phenanthrene	50		--	--	--	--	--	--	--	--	--
Total PCBs in mg/kg	1, 10		--	--	--	--	--	--	--	--	--
Metals in mg/kg											
Antimony	NA		1.9 B	1.1 B	1.5 B	1.3 B	1 B	1.3 B	2 B	--	--
Arsenic	12		--	--	--	--	--	--	--	--	--
Cadmium	10		--	--	--	--	--	--	--	--	--
Chromium	50		--	55.8	--	--	--	--	--	--	--
Copper	50		--	--	--	--	--	--	--	--	--
Cyanide, total	ND		--	--	--	--	--	--	--	--	--
Mercury	0.2		--	--	--	--	--	--	--	--	--
Nickel	28.5		--	--	30.7	--	--	--	--	--	--
Selenium	3.9		--	--	--	--	--	--	--	--	--
Silver	NA		--	--	--	--	--	--	--	--	--
Zinc	55.7		--	--	--	--	--	--	--	--	--

Footnotes on last page.

Table 4. Summary of Closure Performance Standard Exceedances in Soil Samples (mg/kg), Former Unysis Facility, Great Neck, New York

	SAMPLE NUMBER:	19	20	21	22	23	24	25	26	27
	SITE:	12C	13B	13C	15	15	16	16	17D	21A
CLOSURE	SAMPLE ID:	12C 0-2	13B 0-2	13C 0-2	15 0-2	15 9-11	16 0-2	16 3-5	17D 0-2	21A 0-2
PERFORMANCE	DATE:	1/2/98	1/15/98	1/15/98	12/16/97	12/16/97	12/15/97	12/15/97	12/18/97	12/19/97
CONSTITUENT: STANDARD	DEPTH in ft:	0-2	0-2	0-2	0-2	9-11	0-2	3-5	0-2	0-2
VOCs in mg/kg										
SVOCs in mg/kg										
Benzo(a)anthracene 8.28		--	9.4	34	--	--	--	--	--	--
Benzo(a)pyrene MDL (0.170)		0.52	8	29	1.6	0.34	1.3	1.7	--	2.2
Benzo(b)fluoranthene 3.3		--	17	53	--	--	--	--	--	3.9
Carbazole NA		--	1.600 J	6.9	--	--	--	--	--	--
Chrysene 1.2		--	8.8	29	1.9	--	1.4	1.8	--	2.1
Dibenz(a,h)anthracene 0.042		.160 J	1.100 J	4.8	0.45	.099 J	0.39	0.32	.051 J	0.43
Fluoranthene 50		--	--	57	--	--	--	--	--	--
Phenanthrene 50		--	--	--	--	--	--	--	--	--
Total PCBs in mg/kg 1, 10		--	--	--	--	--	--	--	--	--
Metals in mg/kg										
Antimony NA		--	--	--	--	--	--	--	--	--
Arsenic 12		--	--	--	--	--	--	--	--	--
Cadmium 10		--	--	--	--	--	--	--	--	--
Chromium 50		--	--	243	59.2	--	--	--	--	--
Copper 50		--	--	--	--	--	--	--	--	105
Cyanide, total ND		--	--	--	--	--	--	--	--	--
Mercury 0.2		--	--	--	1.22	--	--	--	--	--
Nickel 28.5		--	--	--	--	--	--	--	--	--
Selenium 3.9		--	--	--	--	--	--	--	--	--
Silver NA		--	11.5	6.53	--	--	--	--	--	--
Zinc 55.7		--	--	--	80.1	--	--	--	--	--

Footnotes on last page.

Table 4. Summary of Closure Performance Standard Exceedances in Soil Samples (mg/kg), Former Unysis Facility, Great Neck, New York

CONSTITUENT:	CLOSURE PERFORMANCE STANDARD	SAMPLE NUMBER:	28	29	30	31	32	33	34	35	36
		SITE:	21A	21A	21A	21B	21B	21C	21C	26A	26B
		SAMPLE ID:	21A 9-11	21A 13-15	21A 24-26	21B 0-2	21B 3-5	21C 9-11	21C 13-15	26A 0-2	26B 0-2
		DATE:	12/19/97	12/19/97	12/19/97	12/19/97	12/19/97	12/19/97	12/19/97	12/16/97	12/17/97
		DEPTH in ft:	9-11	13-15	24-26	0-2	3-5	9-11	13-15	0-2	0-2
VOCs in mg/kg											
SVOCs in mg/kg											
Benzo(a)anthracene	8.28		--	--	--	--	--	--	--	--	--
Benzo(a)pyrene	MDL (0.170)		0.21	--	--	--	0.31	0.42	0.48	--	3.6
Benzo(b)fluoranthene	3.3		--	--	--	--	--	--	--	--	7.1
Carbazole	NA		--	--	--	--	--	--	--	--	--
Chrysene	1.2		--	--	--	--	--	--	--	--	4.1
Dibenz(a,h)anthracene	0.042		.051 J	--	--	--	--	--	.150 J	--	1.5
Fluoranthene	50		--	--	--	--	--	--	--	--	--
Phenanthrene	50		--	--	--	--	--	--	--	--	--
Total PCBs in mg/kg	1, 10		--	--	--	--	--	--	--	--	--
Metals in mg/kg											
Antimony	NA		--	--	--	--	--	--	--	--	--
Arsenic	12		--	--	--	--	--	--	--	--	11.6
Cadmium	10		--	--	--	--	--	--	--	--	--
Chromium	50		--	--	--	--	--	--	--	--	--
Copper	50		157	122	136	57.4	272	297	52.9	--	56.3
Cyanide, total	ND		--	--	--	--	--	--	--	--	--
Mercury	0.2		--	--	--	--	--	--	--	--	--
Nickel	28.5		--	--	--	--	--	--	--	--	--
Selenium	3.9		--	--	--	--	--	--	--	--	--
Silver	NA		--	--	--	--	--	--	--	--	--
Zinc	55.7		--	--	--	--	66.5	149	--	59.6	--

Footnotes on last page.

Table 4. Summary of Closure Performance Standard Exceedances in Soil Samples (mg/kg), Former Unysis Facility, Great Neck, New York

		SAMPLE NUMBER:	37	38	39	40	41	42	43	44	45
		SITE:	26B	26D	28	31	33	33	33	34A	34B
	CLOSURE	SAMPLE ID:	26B 3-5	26D 0-2	28 0-2	31 0-2	33 0-2	33 3-5	33 28-30	34A 0-2	34B 0-2
	PERFORMANCE	DATE:	12/17/97	12/22/97	1/15/98	12/19/97	12/30/97	12/30/97	12/30/97	1/2/98	1/2/98
CONSTITUENT:	STANDARD	DEPTH in ft:	3-5	0-2	0-2	0-2	0-2	3-5	28-30	0-2	0-2
VOCs in mg/kg											
SVOCs in mg/kg											
Benzo(a)anthracene	8.28		--	--	--	--	--	--	--	--	--
Benzo(a)pyrene	MDL (0.170)		--	--	0.18	0.25	--	--	--	0.45	0.39
Benzo(b)fluoranthene	3.3		--	--	--	--	--	--	--	--	--
Carbazole	NA		--	--	--	--	.086 J	.082 J	--	--	--
Chrysene	1.2		--	--	--	--	--	--	--	--	--
Dibenz(a,h)anthracene	0.042		--	--	.056 J	.077 J	--	--	--	.140 J	.120 J
Fluoranthene	50		--	--	--	--	--	--	--	--	--
Phenanthrene	50		--	--	--	--	--	--	--	--	--
Total PCBs in mg/kg	1, 10		--	--	--	--	--	--	--	--	--
Metals in mg/kg											
Antimony	NA		--	--	--	--	--	--	0.565	--	--
Arsenic	12		20.4	--	--	--	--	--	--	--	--
Cadmium	10		--	--	--	--	--	--	--	--	--
Chromium	50		--	--	--	--	--	--	--	--	--
Copper	50		--	73.2	--	49.7	--	--	--	--	--
Cyanide, total	ND		--	--	--	--	--	--	--	--	--
Mercury	0.2		--	0.222	--	0.325	--	--	--	--	--
Nickel	28.5		--	--	--	--	--	--	--	--	--
Selenium	3.9		--	--	--	--	--	--	--	--	--
Silver	NA		--	--	6.58	--	--	--	--	--	--
Zinc	55.7		--	203	--	148	--	--	--	--	--

Footnotes on last page.

Table 4. Summary of Closure Performance Standard Exceedances in Soil Samples (mg/kg), Former Unysis Facility, Great Neck, New York

		SAMPLE NUMBER:	46	47	48	49	50	51	52
		SITE:	34B	35	36A	36D	39	39	24 Bank 2 (Transformer Area)
	CLOSURE	SAMPLE ID:	34B 3-5	35 0-2	36A 0-2	36D 0-2	39 0-2	39 3-5	265452
	PERFORMANCE	DATE:	1/2/98	12/16/97	12/23/97	12/23/97	12/16/97	12/16/97	7/27/95
CONSTITUENT:	STANDARD	DEPTH in ft:	3-5	0-2	0-2	0-2	0-2	3-5	S
VOCs in mg/kg									
SVOCs in mg/kg									
Benzo(a)anthracene	8.28		--	--	--	--	--	--	--
Benzo(a)pyrene	MDL (0.170)		2.7	0.31	.190 J	0.78	3	0.66	--
Benzo(b)fluoranthene	3.3		5	--	--	--	58	--	--
Carbazole	NA		--	--	--	--	--	--	--
Chrysene	1.2		3.2	--	--	--	3.2	--	--
Dibenz(a,h)anthracene	0.042		0.81	--	--	--	0.68	.140 J	--
Fluoranthene	50		--	--	--	--	--	--	--
Phenanthrene	50		--	--	--	--	--	--	--
Total PCBs in mg/kg	1, 10		--	--	--	--	--	--	2.7
Metals in mg/kg									
Antimony	NA		--	--	--	--	--	--	
Arsenic	12		--	--	--	--	--	--	--
Cadmium	10		--	--	--	--	--	--	--
Chromium	50		--	--	--	--	--	--	--
Copper	50		--	--	--	--	--	--	--
Cyanide, total	ND		--	--	--	--	--	--	--
Mercury	0.2		--	--	--	--	--	--	--
Nickel	28.5		--	--	--	--	--	--	--
Selenium	3.9		--	--	--	--	--	--	--
Silver	NA		--	--	--	--	--	--	--
Zinc	55.7		--	--	--	--	--	--	--

Footnotes on last page.

Entries above represent concentrations above closure performance standards summarized in Table 4.
Samples 1-5 and 17-51 Performed by: EMCON between December 1997 to March 1998.
Analysis Performed by: Industrial Corrosion Management, Inc., Randolph, NJ.
Samples 6-16 Performed by: Arcadis Geraghty & Miller on Feb. 25-26, 2000.
Analysis Performed by: Severnt Tren Laboratories, Monroe, CT.
Sample 52 Performed by: H2M Group on July 27, 1995.
Analysis Performed by: Inchcape Testing Services, Colchester, VT.

VOCs	Volatile Organic Compounds
SVOCs	Semi-Volatile Organic Compounds.
PCBs	Polychlorinated biphenyls
ug/kg	Micrograms per liter.
mg/kg	Milligrams per liter.
J	Estimated (values below the quantitation limit were flagged by the laboratory as estimated).
B in VOCs and SVOCs	Detected in associated blank
B in metals	Detected between the instrument detection limit and the contract required detection limit.
S	No sample depth given. Assumed to be a surficial sample.
--	Not analyzed for or detected below the Closure Performance Standard.
NA	Not available.

Table 5: Closure Activities, Former Unisys Facility, Great Neck, New York.

INTERNAL AREAS

HAZARDOUS WASTE MANAGEMENT UNITS

Area	Location	Description of Area	Closure Activities (see footnotes)	Area (ft^2)	Number of Completed Soil Borings	Number of Proposed Soil Borings	Proposed Depths of Soil Samples in each boring (feet Below Floor or Ground Surface)	Analyses [3]
7	Manufacturing Building Column Q18	Paint Storage Room	C	500	2	4	1 ft, 5 ft, 10 ft, 15ft	PPM, VOC, SVOC
8	Manufacturing Building Column N19	Oil Storage/Pump Room	C	2,400	0	6	1 ft, 5 ft, 10 ft, 15ft	PPM, SVOC, PCB
13	Manufacturing Building Column N19	Hazardous Materials Storage Facility	C	1,000	1	5	1 ft, 5 ft, 10 ft, 15ft	SVOC, Cr, Ag
17	Manufacturing Building Column Q19	Reclamation Room	C	1,900	1	5	1 ft, 5 ft, 10 ft, 15ft	SVOC

INTERNAL AREAS OF POTENTIAL CONCERN

Area	Location	Description of Area	Closure Activities (see footnotes)	Area (ft^2)	Number of Completed Soil Borings	Number of Proposed Soil Borings	Proposed Depths of Soil Samples in each boring (feet Below Floor or Ground Surface)	Analyses [3]
1	Environmental Building	Thin Film Lab	A	1,500	3	3	1 ft, 5 ft	Cu, Hg
2	Environmental Building	Chemistry Lab	E	2,920	None	None	--	--
9	Manufacturing Building Column G10	Old Plating Area	B	9,100	5	1	1 ft, 5 ft, 10 ft, 15ft	SVOC, Cd, Cr, Cn, Hg, Ni, Sb
11	Service Building	Process Photo Lab	B	1,600	0	6	1 ft, 5 ft, 10 ft, 15ft	PPM, SVOC, VOC
28	Manufacturing Building Column A11	A/C Room Sump	E	NA	None	None	--	--
30	Manufacturing Building Column B11	Short Order Machine Shop	E	NA	None	None	--	--
31	Foundry Building	Basement Sump	B	120	0[1]	6	1 ft, 5 ft, 10 ft, 15ft	VOC, SVOC PPM, PCB

Footnotes on last page.

Table 5. Closure Activities, Former Unisys Facility, Great Neck, New York.

EXTERNAL AREAS OF POTENTIAL CONCERN							
Area	Location	Description of Area	Closure Activities (see footnotes)	Number of Completed Soil Borings	Number of Proposed Soil Borings	Depths of Soil Samples Below Ground Surface	Analyses [3]
15	Outside Manufacturing Building Column L19	Lime Neutralization Pit	D	1	3	1 ft, 5 ft, 10 ft, 15ft	SVOC, Cr, Hg, Zn
21	Southeast of Foundry Building	Two, 15,000-gallon and one, 10,000-gallon oil USTs, reported pipe collapse	D	3	3	1 ft, 5 ft, 10 ft, 15 ft	SVOC, Cu, Zn
24	South of Boiler Building	Substation/Transformers	D	0[2]	6	0 to 6 inches	PCB
26	Exterior locations (See Figure 5).	Three cooling tower areas (26A, 26B, and 26D)	D	1 in each area	3 in each area	1 ft, 5 ft	26A - Zn 26B - As, Cu 26D - Cu, Hg, Zn
FPM-1	East of Administration and Service Buildings	Potential Blue Print Emissions Area	D	0	2	1 ft, 5 ft, 10 ft	Ammonia Nitrite/Nitrate
FPM-8	North of Boiler Building	Soil Storage	D	0	5	1 ft, 5 ft, 10 ft, 15ft	VOC, SVOC PPM
FPM-19	South of Manufacturing Building Between Columns Q4 and Q8	Chemical Dumping	D	0	10	1 ft, 5 ft, 10 ft, 15ft	VOC SVOC PPM

Footnotes on last page.

Footnotes:

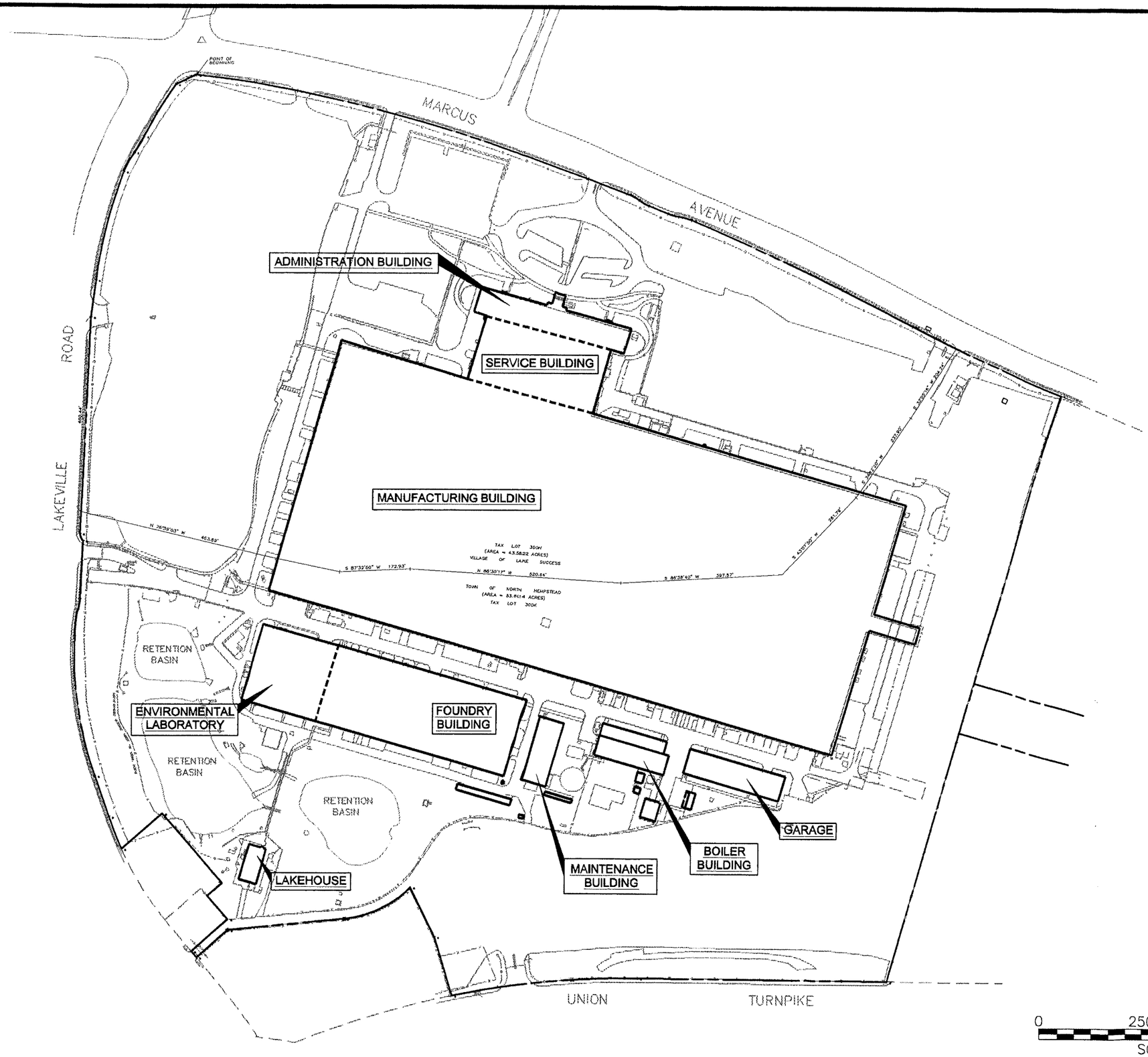
A.	Defer final closure and implement temporary AUL.
B.	Pressure wash area, defer final closure, and implement temporary AUL.
C.	Pressure wash (at 4 gallons per ft^2, defer final closure, owner seal area with epoxy based paint, (or equivalent), or install a new floor, and implement temporary AUL.
D.	Implement Closure Work Plan.
E.	Pressure wash area and certify final closure.
NA	Not available.
VOC	Volatile Organic Compounds. (USEPA Methods 8240 and 8021)
SVOC	Semi-Volatile Organic Compounds. (USEPA Method 8270)
PCB	Poychlorinated Biyphenols. (USEPA Method 8080)
PPM	Priority Pollutant Metals (USEPA Methods 6010/7060/7740/7471)
Ag	Silver (USEPA Method 6010)
As	Arsenic (USEPA Method 6010)
Cd	Cadmium (USEPA Method 6010)
Cn	Cyanide (USEPA Method 6010)
Cr	Chromium (USEPA Method 6010)
Cu	Copper (USEPA Method 6010)
Hg	Mercury (USEPA Method 7471)
Sb	Antimony (USEPA Method 6010)
Zn	Zinc (USEPA Method 6010)
COC	Contaminants of Concern.
1	One boring was performed by EMCON outside of the building and is not included.
2	One soil sample was taken by EMCON, however, the location is unknown and therefore not included.
3	Current USEPA Method will be used.

Footnotes on last page.

SOURCE:
U.S.G.S. 7.5 MINUTE QUADRANGLE, LYNBROOK, N.Y. AND SEA CLIFF, N.Y., REVISED 1979.

SCALE: 1"=2000'-0"

CLIENT: LOCKHEED MARTIN CORPORATION	ARCADIS GERAGHTY & MILLER	DRAWN A.G.	DATE 11/4/99	PROJECT MANAGER C. SAN GIOVANNI 10/99	DEPARTMENT MANAGER
NO. | DATE | REVISION DESCRIPTION | BY CKD		SITE LOCATION MAP		LEAD DESIGN PROF.	CHECKED
		FORMER UNISYS FACILITY GREAT NECK, NEW YORK		PROJECT NUMBER NY001227.0005	FIGURE 1



ENGINEERING DESIGN:
ALL PROFESSIONAL ENGINEERING SERVICES DEPICTED ON THIS DRAWING HAVE BEEN PERFORMED FOR ARCADIS GERAGHTY & MILLER, INC. BY GM CONSULTING ENGINEERS, P.C. A PROFESSIONAL CORPORATION QUALIFIED TO PERFORM SUCH SERVICES IN THE STATE OF NEW YORK.

NO.	DATE	REVISION DESCRIPTION	BY / CKD

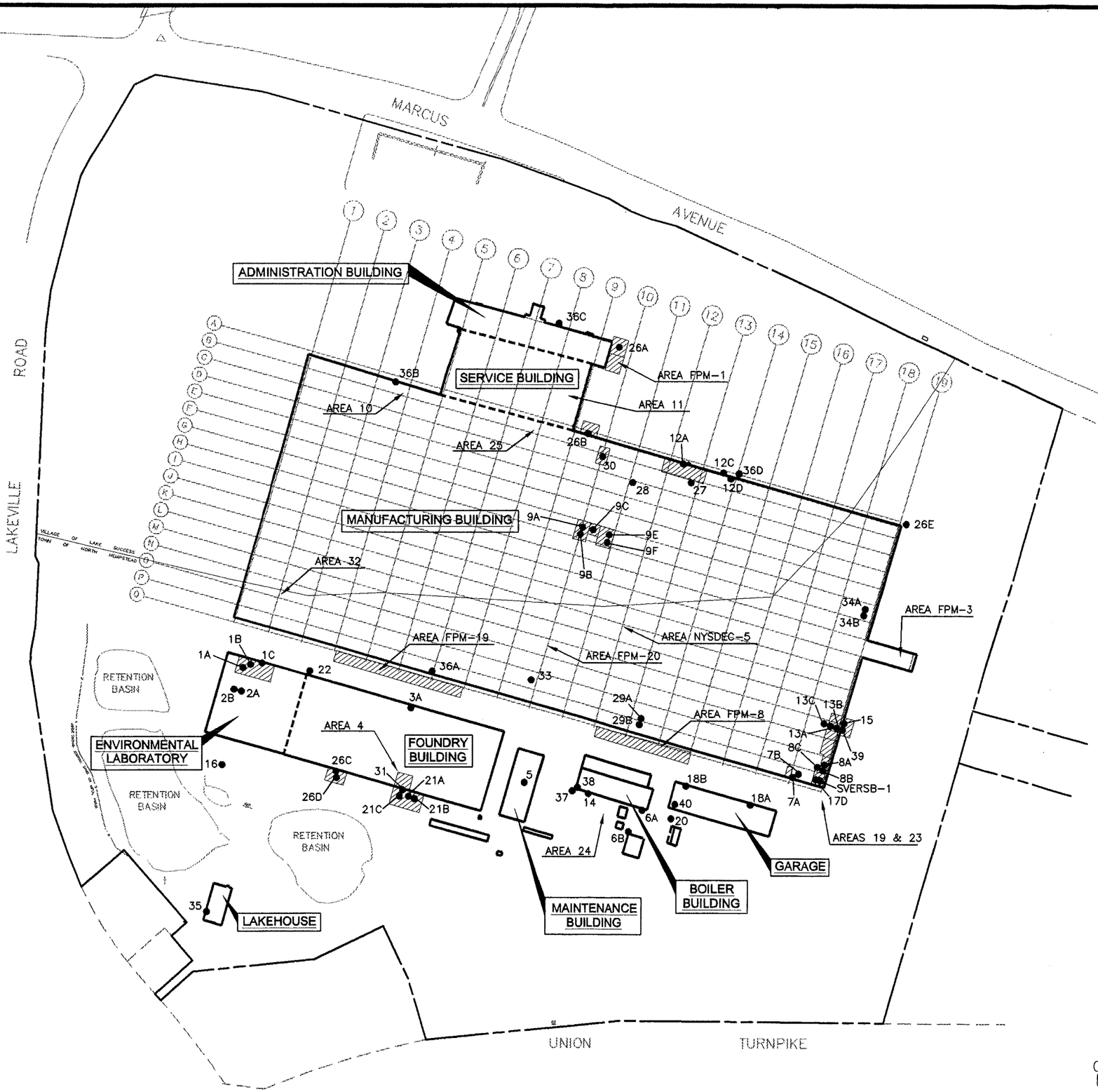
FORMER UNISYS FACILITY
GREAT NECK, NEW YORK

SITE PLAN

ARCADIS
GERAGHTY & MILLER
88 Duryea Road
Melville, New York 11747
Tel: 516/249-7600 Fax: 516/249-7610

PROJECT MANAGER C. SAN GIOVANNI	DEPARTMENT MANAGER T. LOBASSO
LEAD DESIGN PROF. C. BERARDI TUOHY	CHECKED
DRAWN AG	DATE 02/07/00
PROJECT NUMBER NY01227.017.01	FIGURE 2

C:\APROJECT\LOCKHEED_MARTIN\GREAT NECK\OUT\ABOVE GRADE\CADD\SITE PLAN.DWG 1=1



AREAS OF POTENTIAL CONCERN

1–THIN FILM LAB
2–CHEMISTRY LAB
3–HIGH POWER LAB
4–FOUNDRY BASEMENT
5–MAINTENANCE BUILDING
6–COAL SILO/ASH PIT & INCINERATOR
7–PAINT STORAGE ROOM (Q18)
8–OIL STORAGE/PUMP ROOM (N19)
9–OLD PLATING AREA (G10)
10–PUBLISHING PHOTO LAB (A4)
11–PROCESS PHOTO LAB
12–PLATING/PAINT SHOP (A12)
13–HAZ. MATERIALS STORATGE FACILITY (N19)
14–BOILER HOUSE
15–LIME NEUTRALIZATION PIT (L19 OUTSIDE BUILDING)
16–FORMER OIL BLADDER AST
17–RECLAMATION ROOM (Q19)
18–OIL/WATER SEPARATORS (2) IN GARAGE
19–USTs IN SE CORNER OF MANUFACTURING BUILDING
20–FORMER GASOLINE UST
21–FOUNDRY USTs
22–FOUNDRY DIELECTRIC UST
23–DRYWELL LOCATIONS
24–TRANSFORMER SUB–STATION
25–CLEAN ROOM SUMPS & TANK(S) (A8)
26–ABANDONED COOLING TOWERS (5)
27–SHEET METAL SUMP (C12)
28–TEMPERATURE CONTROL ROOM SUMP (C9)
29–CLEAN ROOM SUMPS (013)
30–SHORT ORDER MACHINE SHOP SUMPS (2) (B11)
31–FOUNDRY SUMP
32–A/C CONDENSATE SUMP (02)
33–SUMP (013)
34–HEAT TREAT PIT (G19)
35–LAKEHOUSE LIME NEUTRALIZATION TANK
36–FORMER 100 GALLON GASOLINE USTs (1)
37–FORMER 275 GALLON GASOLINE UST (REMOVED)
38–275 GALLON AST (IN SERVICE)
39–FORMER ETHYLENE GLYCOL AST
40–HYDRAULIC LIFT IN GARAGE
FPM–1–BLUEPRINT AREA EAST OF ADMIN. BLDG.
FPM–3–BUBBLE IN FLOOR OF MANUF. BLDG.
FPM–8–FORMER SOIL STORAGE NORTH OF BOILER BLDG.
FPM–19–REPORTED CHEMICAL DUMPING NORTH OF FOUNDRY BLDG.
FPM–20–WAVE SODER AREA IN MANUFACTURING BUILDING (M10)
NYSDEC–5 CUSTOMER SERVICE AREA (K12)

NOTES:

1. INFORMATION ON THIS FIGURE IS FROM DRAWING NO. 1, "LOCKHEED MARTIN CORP., PHASE I SITE SOIL INVESTIGATION, GREAT NECK, NEW YORK", PREPARED BY EMCON, ISSUED APRIL 1998.
2. BORINGS 9E AND 9F WERE PERFORMED ON FEBRUARY 25 AND 26, 2000 BY ARCADIS GERAGHTY & MILLER.
3. BORING SVERSB–1 LOCATION FROM DRAWING NO. 2 "SITE PLAN, FORMER LOCKHEED MARTIN CORPORATION, GREAT NECK, NEW YORK", PREPARED BY ARCADIS GERAGHTY & MILLER, DATED JULY 13, 1999.

0 250 500 750
SCALE IN FEET

LEGEND

ADDITIONAL INVESTIGATION WARRANTED

18A ● SOIL BORING TAKEN IN AREA 18

ENGINEERING DESIGN: ALL PROFESSIONAL ENGINEERING SERVICES DEPICTED ON THIS DRAWING HAVE BEEN PERFORMED FOR ARCADIS GERAGHTY & MILLER, INC. BY GM CONSULTING ENGINEERS, P.C. A PROFESSIONAL CORPORATION QUALIFIED TO PERFORM SUCH SERVICES IN THE STATE OF NEW YORK.

NO.	DATE	REVISION DESCRIPTION	BY / CKD

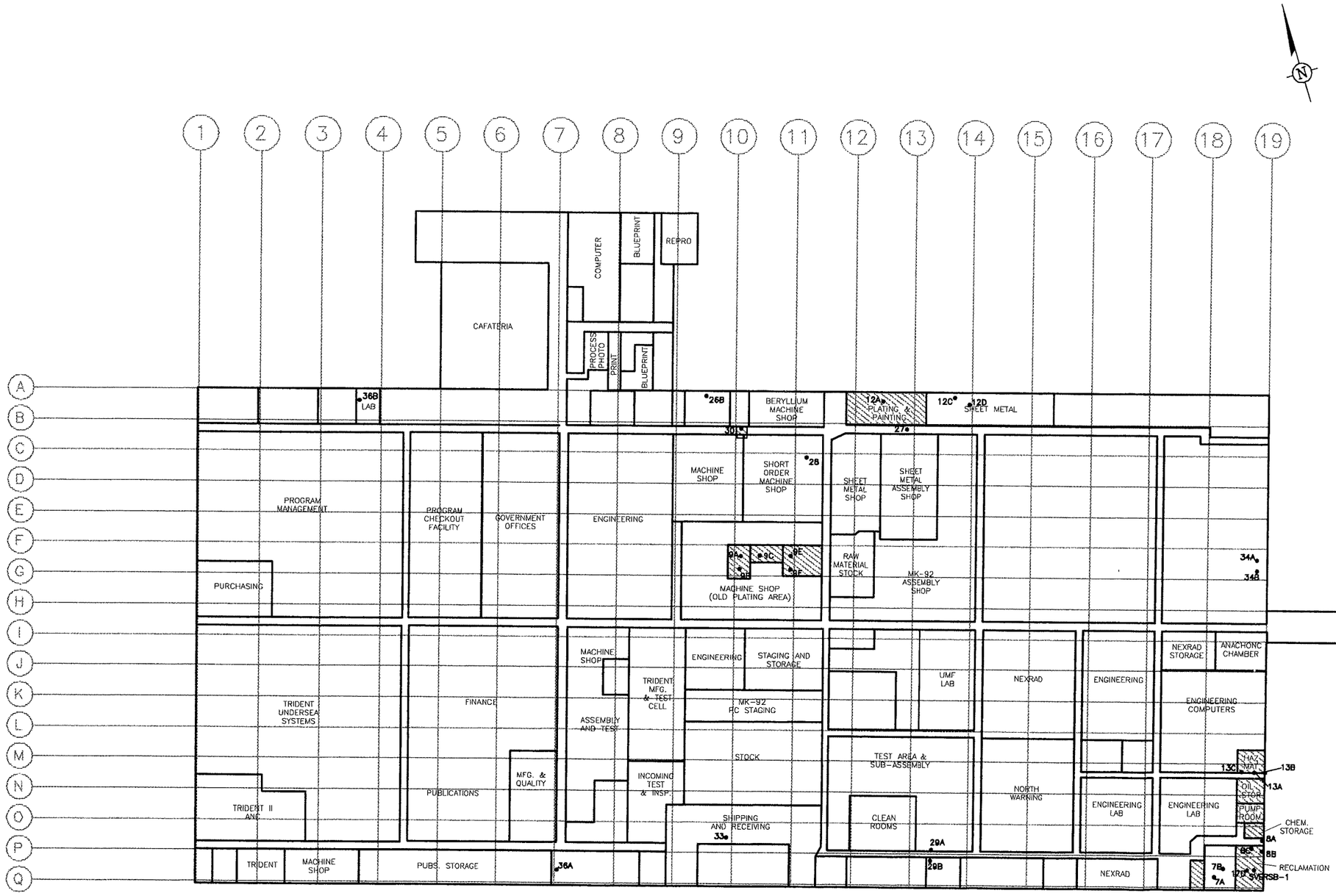
FORMER UNISYS FACILITY GREAT NECK, NEW YORK

AREAS OF POTENTIAL CONCERN

ARCADIS GERAGHTY & MILLER
88 Duryea Road
Melville, New York 11747
Tel: 516/249-7600 Fax: 516/249-7610

PROJECT MANAGER C. SAN GIOVANNI	DEPARTMENT MANAGER T. LOBASSO
LEAD DESIGN PROF. C. BERARDI TUOHY	CHECKED
DRAWN AG	DATE 02/07/00
PROJECT NUMBER NY01227.017.01	FIGURE 3

G:\APROJECT\LOCKHEED_MARTIN\GREAT NECK\OU1\ABOVE GRADE\CADD\AOC.DWG 1=1



NOTES:

1. INFORMATION ON THIS DRAWING IS FROM FIGURE 3, "MANUFACTURING PLANT LAYOUT, LOCKHEED MARTIN, GREAT NECK, N.Y.", PREPARED BY H2M GROUP, DATED JULY 14, 1997.
2. BORINGS 9E AND 9F WERE PERFORMED ON FEBRUARY 25 AND 26, 2000 BY ARCADIS GERAGHTY & MILLER.
3. BORING SVERSB-1 LOCATION FROM DRAWING NO. 2 "SITE PLAN, FORMER LOCKHEED MARTIN CORPORATION, GREAT NECK, NEW YORK", PREPARED BY ARCADIS GERAGHTY & MILLER, DATED JULY 13, 1999.

LEGEND

- ADDITIONAL INVESTIGATION WARRANTED
- 34A SOIL BORING

ENGINEERING DESIGN: ALL PROFESSIONAL ENGINEERING SERVICES DEPICTED ON THIS DRAWING HAVE BEEN PERFORMED FOR ARCADIS GERAGHTY & MILLER, INC. BY GM CONSULTING ENGINEERS, P.C. A PROFESSIONAL CORPORATION QUALIFIED TO PERFORM SUCH SERVICES IN THE STATE OF NEW YORK.

NO.	DATE	REVISION DESCRIPTION	BY / CKD

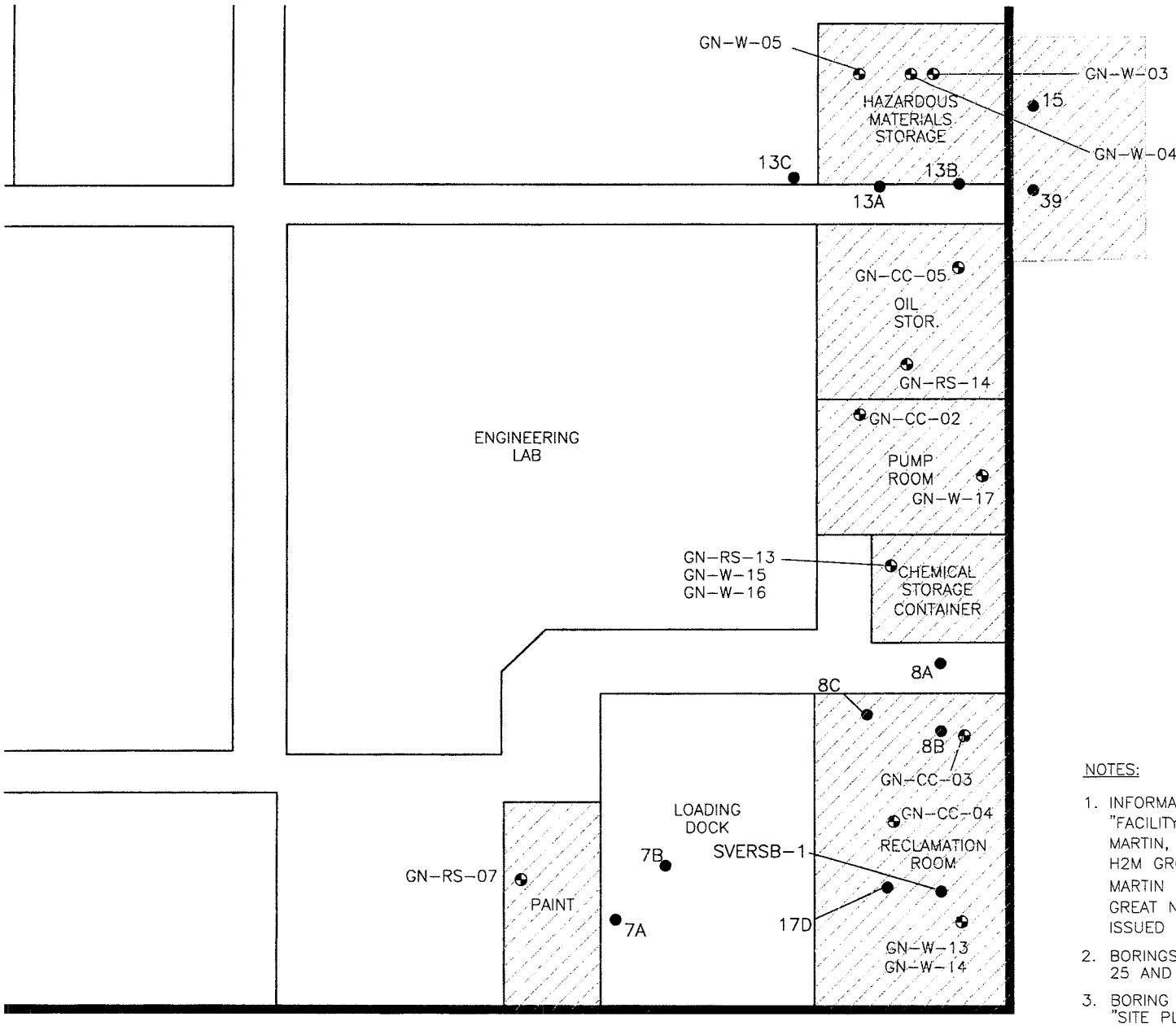
FORMER UNISYS FACILITY GREAT NECK, NEW YORK

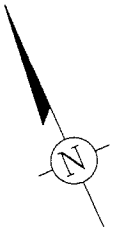
MANUFACTURING BUILDING LAYOUT

ARCADIS GERAGHTY & MILLER
88 Duryea Road
Melville, New York 11747
Tel: 516/249-7600 Fax: 516/249-7610

PROJECT MANAGER: C. SAN GIOVANNI	DEPARTMENT MANAGER: T. LOBASSO
LEAD DESIGN PROF.: C BERARDI TUOHY	CHECKED:
DRAWN: AG	DATE: 02/07/00
PROJECT NUMBER: NY01227.017.01	FIGURE: 4

G:\APROJECT\LOCKHEED MARTIN\OU1\ABOVEGRADE\CADD\RCRA WORKPLAN\BLDG LAYOUT.DWG





LEGEND

- SAMPLE LOCATION
- W WIPE SAMPLE
- RS RESIDUE/SEDIMENT SAMPLE
- CC CONCRETE SHIP SAMPLE
- SOIL BORING
- ADDITIONAL INVESTIGATION WARRANTED

NOTES:

1. INFORMATION ON THIS DRAWING IS FROM FIGURE 4, "FACILITY ASSESSMENT SAMPLE LOCATIONS, LOCKHEED MARTIN, GREAT NECK, NEW YORK", PREPARED BY H2M GROUP AND DRAWING NO. 1, "LOCKHEED MARTIN CORP., PHASE 1 SITE SOIL INVESTIGATION, GREAT NECK, NEW YORK", PREPARED BY EMCON, ISSUED 1998.
2. BORINGS 9E AND 9F WERE PERFORMED ON FEBRUARY 25 AND 26, 2000 BY ARCADIS GERAGHTY & MILLER.
3. BORING SVERSB-1 LOCATION FROM DRAWING NO. 2 "SITE PLAN, FORMER LOCKHEED MARTIN CORPORATION, GREAT NECK, NEW YORK", PREPARED BY ARCADIS GERAGHTY & MILLER, DATED JULY 13, 1999.

SCALE: 1"=30'-0"

NO.	DATE	REVISION DESCRIPTION	BY / CKD

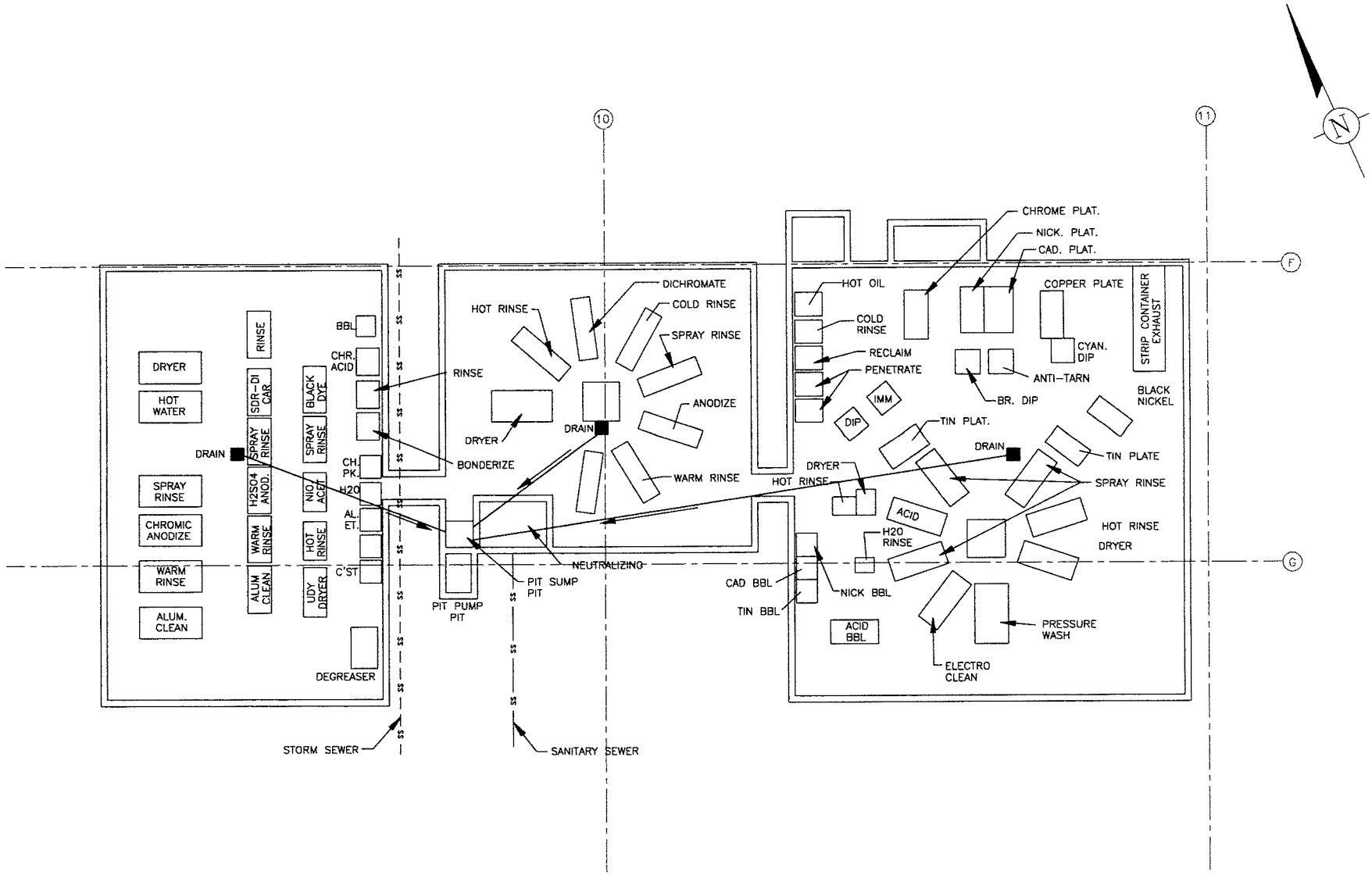
ARCADIS GERAGHTY & MILLER

DRAWN	DATE	PROJECT MANAGER	DEPARTMENT MANAGER
A.G.	02/07/00	C. SAN GIOVANNI	T. LOBASSO

EMCON FACILITY ASSESSMENT & SOIL SAMPLE INVESTIGATION

FORMER UNISYS FACILITY
GREAT NECK, NEW YORK

LEAD DESIGN PROF.	CHECKED
C. BERARDI TUOHY	
PROJECT NUMBER	FIGURE
NY01227.017.01	5



SCALE: 1"=20'-0"

NO.	DATE	REVISION DESCRIPTION	BY / CKD

ARCADIS GERAGHTY & MILLER

DRAWN	DATE	PROJECT MANAGER	DEPARTMENT MANAGER
A.G.	02/07/00	C. SAN GIOVANNI	T. LOBASSO
		LEAD DESIGN PROF. C. BERARDI TUOHY	CHECKED

OLD PLATING AREA
PROCESS SCHEMATIC

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GREAT NECK, NEW YORK

PROJECT NUMBER	FIGURE
NY01227.017.01	6

Appendix A

Analytical Data for Borings 9E and 9F

Committed To *Your* Success

March 07, 2000

Severn Trent Laboratories
200 Monroe Turnpike
Monroe, Connecticut 06468

Tel: (203) 261-4458
Fax: (203) 268-5346
www.stl-inc.com

Ms. Christina Berardi Tuohy
ARCADIS/GERAGHTY & MILLER
88 Duryea Road
Melville, NY 11747

Dear Ms. Berardi Tuohy :

Please find enclosed the analytical results of 18 sample(s) received at our laboratory on February 26-28, 2000. This report contains sections addressing the following information at a minimum:

- sample summary
- analytical methodology
- state certifications
- definition of data qualifiers and terminology
- analytical results
- chain-of-custody

STL Report #7000-0422A	Purchase Order #NY001227.0017.00001
Project ID: LOCKHEED MARTIN-RCRA SOIL	

Copies of this analytical report and supporting data are maintained in our files for a minimum of five years unless special arrangements have been made. Unless specifically indicated, all analytical testing was performed at this laboratory location and no portion of the testing was subcontracted.

We appreciate your selection of our services and welcome any questions or suggestions you may have relative to this report. Please contact your customer service representative at (203) 261-4458 for any additional information. Thank you for utilizing our services; we hope you will consider us for your future analytical needs.

I have reviewed and approved the enclosed data for final release.

Very truly yours,

Jeffrey C. Curran
Laboratory Manager

JCC

7000-0422A
ARCADIS GERAGHTY & MILLER

Case Narrative

Sample Receipt – All samples were received in good condition and at the proper temperature.

Classical Chemistry - Listed below are the wet chemistry analyte methods and references for the samples analyzed in this SDG. No analytical problems were encountered and all holding times were met.

Analyte	Method	Reference
Cyanide - Total	9012	1
pH	9040	1
pH	9045	1

References:

1. Test Methods for the Evaluation of Solid Wastes, SW846, 3rd ed., 1986.

Volatile Organics – Volatile organics were determined by purge and trap GC/MS using guidance provided in Method 5030B/8260B. The instrumentation used was a Tekmar Model 2000/2016 Concentrator interfaced with a Hewlett Packard Model 5970A GC/MS/DS.

Sample 9F 10-12 was analyzed twice due to results having surrogate recoveries above criteria limits.

Metals – ICAP metals were determined using a JA61E trace ICAP; mercury was determined by cold vapor technique using a Leeman Labs mercury analyzer; following guidance provided in SW846 according to methods: ICAP – 3010A, 3050B/6010B; mercury-7470A, 7471A.

Antimony failed the controls for spike recovery analysis of sample 9F 5-7 resulting in one "N" flag.

No other problems occurred during analysis. All appropriate protocols were employed. All data appears to be consistent.

TABLE VO-1.0 Aqueous
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

All values are ug/L.

Client Sample I.D.	Method Blank	FB 9F22500	TB 9F22500	Quant. Limits with no Dilution
Lab Sample I.D.	VBLKLM	000422A-06	000422A-07	
Method Blank I.D.	VBLKLM	VBLKLM	VBLKLM	
Quant. Factor	1.00	1.00	1.00	
Chloromethane	U	U	U	10
Bromomethane	U	U	U	10
Vinyl Chloride	U	U	U	10
Chloroethane	U	U	U	10
Methylene Chloride	U	U	U	5.0
Acetone	U	U	U	10
Carbon Disulfide	U	U	U	5.0
Vinyl Acetate	U	U	U	10
1,1-Dichloroethene	U	U	U	5.0
1,1-Dichloroethane	U	U	U	5.0
cis-1,2-Dichloroethene	U	U	U	5.0
trans-1,2-Dichloroethene	U	U	U	5.0
Chloroform	U	U	U	5.0
1,2-Dichloroethane	U	U	U	5.0
2-Butanone	U	U	U	10
1,1,1-Trichloroethane	U	U	U	5.0
Carbon Tetrachloride	U	U	U	5.0
Bromodichloromethane	U	U	U	5.0
1,2-Dichloropropane	U	U	U	5.0
cis-1,3-Dichloropropene	U	U	U	5.0
Trichloroethene	U	U	U	5.0
Dibromochloromethane	U	U	U	5.0
1,1,2-Trichloroethane	U	U	U	5.0
Benzene	U	U	U	5.0
trans-1,3-Dichloropropene	U	U	U	5.0
Bromoform	U	U	U	5.0
4-Methyl-2-Pentanone	U	U	U	10
2-Hexanone	U	U	U	10
Tetrachloroethene	U	U	U	5.0
Toluene	U	U	U	5.0
1,1,2,2-Tetrachloroethane	U	U	U	5.0
Chlorobenzene	U	U	U	5.0
Ethylbenzene	U	U	U	5.0
Styrene	U	U	U	5.0
Xylene (total)	U	U	U	5.0
Date Received		02/26/00	02/26/00	
Date Extracted	N/A	N/A	N/A	
Date Analyzed	02/26/00	02/26/00	02/26/00	

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.1
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

Aqueous

All values are ug/L.

Client Sample I.D.	Method Blank	FB 9F22600	TB 9F22600	Quant. Limits with no Dilution
Lab Sample I.D.	VBLKLP	000422A-08	000422A-09	
Method Blank I.D.	VBLKLP	VBLKLP	VBLKLP	
Quant. Factor	1.00	1.00	1.00	
Chloromethane	U	U	U	10
Bromomethane	U	U	U	10
Vinyl Chloride	U	U	U	10
Chloroethane	U	U	U	10
Methylene Chloride	U	U	U	5.0
Acetone	U	U	U	10
Carbon Disulfide	U	U	U	5.0
Vinyl Acetate	U	U	U	10
1,1-Dichloroethene	U	U	U	5.0
1,1-Dichloroethane	U	U	U	5.0
cis-1,2-Dichloroethene	U	U	U	5.0
trans-1,2-Dichloroethene	U	U	U	5.0
Chloroform	U	U	U	5.0
1,2-Dichloroethane	U	U	U	5.0
2-Butanone	U	U	U	10
1,1,1-Trichloroethane	U	U	U	5.0
Carbon Tetrachloride	U	U	U	5.0
Bromodichloromethane	U	U	U	5.0
1,2-Dichloropropane	U	U	U	5.0
cis-1,3-Dichloropropene	U	U	U	5.0
Trichloroethene	U	U	U	5.0
Dibromochloromethane	U	U	U	5.0
1,1,2-Trichloroethane	U	U	U	5.0
Benzene	U	U	U	5.0
trans-1,3-Dichloropropene	U	U	U	5.0
Bromoform	U	U	U	5.0
4-Methyl-2-Pentanone	U	U	U	10
2-Hexanone	U	U	U	10
Tetrachloroethene	U	U	U	5.0
Toluene	U	U	U	5.0
1,1,2,2-Tetrachloroethane	U	U	U	5.0
Chlorobenzene	U	U	U	5.0
Ethylbenzene	U	U	U	5.0
Styrene	U	U	U	5.0
Xylene (total)	U	U	U	5.0
Date Received		02/28/00	02/28/00	
Date Extracted	N/A	N/A	N/A	
Date Analyzed	02/29/00	02/29/00	02/29/00	

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.2
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

Soil

All values are ug/Kg dry weight basis.

Client Sample I.D.	Method Blank	9F 5-7	9F 2-3	Quant. Limits with no Dilution
Lab Sample I.D.	VBLKKG	000422A-01	000422A-02	
Method Blank I.D.	VBLKKG	VBLKKG	VBLKKG	
Quant. Factor	1.00	1.08	1.03	
Chloromethane	U	U	U	10
Bromomethane	U	U	U	10
Vinyl Chloride	U	U	U	10
Chloroethane	U	U	U	10
Methylene Chloride	U	U	U	5.0
Acetone	4J	7JB	9JB	10
Carbon Disulfide	U	U	U	5.0
Vinyl Acetate	U	U	U	10
1,1-Dichloroethene	U	U	U	5.0
1,1-Dichloroethane	U	U	U	5.0
cis-1,2-Dichloroethene	U	U	U	5.0
trans-1,2-Dichloroethene	U	U	U	5.0
Chloroform	U	U	U	5.0
1,2-Dichloroethane	U	U	U	5.0
2-Butanone	2J	U	4JB	10
1,1,1-Trichloroethane	U	U	U	5.0
Carbon Tetrachloride	U	U	U	5.0
Bromodichloromethane	U	U	U	5.0
1,2-Dichloropropane	U	U	U	5.0
cis-1,3-Dichloropropene	U	U	U	5.0
Trichloroethene	U	U	U	5.0
Dibromochloromethane	U	U	U	5.0
1,1,2-Trichloroethane	U	U	U	5.0
Benzene	U	U	U	5.0
trans-1,3-Dichloropropene	U	U	U	5.0
Bromoform	U	U	U	5.0
4-Methyl-2-Pentanone	U	U	U	10
2-Hexanone	U	U	U	10
Tetrachloroethene	U	U	U	5.0
Toluene	U	U	U	5.0
1,1,2,2-Tetrachloroethane	U	U	U	5.0
Chlorobenzene	U	U	U	5.0
Ethylbenzene	U	U	U	5.0
Styrene	U	U	U	5.0
Xylene (total)	U	U	U	5.0
Date Received		02/26/00	02/26/00	
Date Extracted	N/A	N/A	N/A	
Date Analyzed	02/26/00	02/26/00	02/26/00	

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.3
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

Soil

All values are ug/Kg dry weight basis.

Client Sample I.D.	9F 10-12	9F 10-12 RE	9F 15-17	Quant. Limits with no Dilution
Lab Sample I.D.	000422A-03	000422A-03RE	000422A-04	
Method Blank I.D.	VBLKKG	VBLKKG	VBLKKG	
Quant. Factor	1.03	1.03	1.02	
Chloromethane	U	U	U	10
Bromomethane	U	U	U	10
Vinyl Chloride	U	U	U	10
Chloroethane	U	U	U	10
Methylene Chloride	U	U	U	5.0
Acetone	17B	14B	12B	10
Carbon Disulfide	U	U	U	5.0
Vinyl Acetate	U	U	U	10
1,1-Dichloroethene	U	U	U	5.0
1,1-Dichloroethane	U	U	U	5.0
cis-1,2-Dichloroethene	.8J	.5J	U	5.0
trans-1,2-Dichloroethene	U	U	U	5.0
Chloroform	U	U	U	5.0
1,2-Dichloroethane	U	U	U	5.0
2-Butanone	6JB	5JB	4JB	10
1,1,1-Trichloroethane	U	U	U	5.0
Carbon Tetrachloride	U	U	U	5.0
Bromodichloromethane	U	U	U	5.0
1,2-Dichloropropane	U	U	U	5.0
cis-1,3-Dichloropropene	U	U	U	5.0
Trichloroethene	7	6	.6J	5.0
Dibromochloromethane	U	U	U	5.0
1,1,2-Trichloroethane	U	U	U	5.0
Benzene	U	U	U	5.0
trans-1,3-Dichloropropene	U	U	U	5.0
Bromoform	U	U	U	5.0
4-Methyl-2-Pentanone	U	U	U	10
2-Hexanone	U	U	U	10
Tetrachloroethene	U	U	U	5.0
Toluene	5	5	U	5.0
1,1,2,2-Tetrachloroethane	U	U	U	5.0
Chlorobenzene	U	U	U	5.0
Ethylbenzene	2J	2J	U	5.0
Styrene	U	U	U	5.0
Xylene (total)	10	10	U	5.0
Date Received	02/26/00	02/26/00	02/26/00	
Date Extracted	N/A	N/A	N/A	
Date Analyzed	02/26/00	02/26/00	02/26/00	

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.4 Soil
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

All values are ug/Kg dry weight basis.

Client Sample I.D.	9F 20-22			Quant. Limits with no Dilution
Lab Sample I.D.	000422A-05			
Method Blank I.D.	VBLKKG			
Quant. Factor	1.02			
Chloromethane	U			10
Bromomethane	U			10
Vinyl Chloride	U			10
Chloroethane	U			10
Methylene Chloride	U			5.0
Acetone	8JB			10
Carbon Disulfide	U			5.0
Vinyl Acetate	U			10
1,1-Dichloroethene	U			5.0
1,1-Dichloroethane	U			5.0
cis-1,2-Dichloroethene	U			5.0
trans-1,2-Dichloroethene	U			5.0
Chloroform	U			5.0
1,2-Dichloroethane	U			5.0
2-Butanone	4JB			10
1,1,1-Trichloroethane	U			5.0
Carbon Tetrachloride	U			5.0
Bromodichloromethane	U			5.0
1,2-Dichloropropane	U			5.0
cis-1,3-Dichloropropene	U			5.0
Trichloroethene	.3J			5.0
Dibromochloromethane	U			5.0
1,1,2-Trichloroethane	U			5.0
Benzene	U			5.0
trans-1,3-Dichloropropene	U			5.0
Bromoform	U			5.0
4-Methyl-2-Pentanone	U			10
2-Hexanone	U			10
Tetrachloroethene	U			5.0
Toluene	U			5.0
1,1,2,2-Tetrachloroethane	U			5.0
Chlorobenzene	U			5.0
Ethylbenzene	U			5.0
Styrene	U			5.0
Xylene (total)	U			5.0
Date Received	02/26/00			
Date Extracted	N/A			
Date Analyzed	02/26/00			

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.5
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

Soil

All values are ug/Kg dry weight basis.

Client Sample I.D.	Method Blank	9F 25-27	9F 30-32	Quant. Limits with no Dilution
Lab Sample I.D.	VBLKKI	000422A-10	000422A-11	
Method Blank I.D.	VBLKKI	VBLKKI	VBLKKI	
Quant. Factor	1.00	1.06	1.12	
Chloromethane	U	U	U	10
Bromomethane	U	U	U	10
Vinyl Chloride	U	U	U	10
Chloroethane	U	U	U	10
Methylene Chloride	U	U	1J	5.0
Acetone	10	19B	12B	10
Carbon Disulfide	U	U	U	5.0
Vinyl Acetate	U	U	U	10
1,1-Dichloroethene	U	U	U	5.0
1,1-Dichloroethane	U	U	U	5.0
cis-1,2-Dichloroethene	U	U	U	5.0
trans-1,2-Dichloroethene	U	U	U	5.0
Chloroform	U	U	U	5.0
1,2-Dichloroethane	U	U	U	5.0
2-Butanone	U	U	U	10
1,1,1-Trichloroethane	U	U	U	5.0
Carbon Tetrachloride	U	U	U	5.0
Bromodichloromethane	U	U	U	5.0
1,2-Dichloropropane	U	U	U	5.0
cis-1,3-Dichloropropene	U	U	U	5.0
Trichloroethene	U	U	2J	5.0
Dibromochloromethane	U	U	U	5.0
1,1,2-Trichloroethane	U	U	U	5.0
Benzene	U	U	U	5.0
trans-1,3-Dichloropropene	U	U	U	5.0
Bromoform	U	U	U	5.0
4-Methyl-2-Pentanone	U	U	U	10
2-Hexanone	U	U	U	10
Tetrachloroethene	U	U	U	5.0
Toluene	U	U	U	5.0
1,1,2,2-Tetrachloroethane	U	U	U	5.0
Chlorobenzene	U	U	U	5.0
Ethylbenzene	U	.3J	U	5.0
Styrene	U	U	U	5.0
Xylene (total)	U	2J	U	5.0
Date Received		02/28/00	02/28/00	
Date Extracted	N/A	N/A	N/A	
Date Analyzed	02/28/00	02/28/00	02/28/00	

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.6 Soil
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

All values are ug/Kg dry weight basis.

Client Sample I.D.	9F 35-37	9E 1-3	9E 5-7	Quant. Limits with no Dilution
Lab Sample I.D.	000422A-12	000422A-13	000422A-14	
Method Blank I.D.	VBLKKI	VBLKKI	VBLKKI	
Quant. Factor	1.14	1.04	1.04	
Chloromethane	U	U	U	10
Bromomethane	U	U	U	10
Vinyl Chloride	U	U	U	10
Chloroethane	U	U	U	10
Methylene Chloride	U	U	U	5.0
Acetone	11B	18B	15B	10
Carbon Disulfide	U	U	U	5.0
Vinyl Acetate	U	U	U	10
1,1-Dichloroethene	U	U	U	5.0
1,1-Dichloroethane	U	U	U	5.0
cis-1,2-Dichloroethene	U	U	U	5.0
trans-1,2-Dichloroethene	U	U	U	5.0
Chloroform	U	U	U	5.0
1,2-Dichloroethane	U	U	U	5.0
2-Butanone	U	U	U	10
1,1,1-Trichloroethane	U	U	U	5.0
Carbon Tetrachloride	U	U	U	5.0
Bromodichloromethane	U	U	U	5.0
1,2-Dichloropropane	U	U	U	5.0
cis-1,3-Dichloropropene	U	U	U	5.0
Trichloroethene	1J	U	.4J	5.0
Dibromochloromethane	U	U	U	5.0
1,1,2-Trichloroethane	U	U	U	5.0
Benzene	U	U	U	5.0
trans-1,3-Dichloropropene	U	U	U	5.0
Bromoform	U	U	U	5.0
4-Methyl-2-Pentanone	U	U	U	10
2-Hexanone	U	U	U	10
Tetrachloroethene	U	U	U	5.0
Toluene	U	U	U	5.0
1,1,2,2-Tetrachloroethane	U	U	U	5.0
Chlorobenzene	U	U	U	5.0
Ethylbenzene	U	U	U	5.0
Styrene	U	U	U	5.0
Xylene (total)	U	U	U	5.0
Date Received	02/28/00	02/28/00	02/28/00	
Date Extracted	N/A	N/A	N/A	
Date Analyzed	02/28/00	02/28/00	02/28/00	

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.7 Soil
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

All values are ug/Kg dry weight basis.

Client Sample I.D.	9E 10-12	9E 25-27	9E 30-32	Quant. Limits with no Dilution
Lab Sample I.D.	000422A-15	000422A-16	000422A-17	
Method Blank I.D.	VBLKKI	VBLKKI	VBLKKI	
Quant. Factor	1.05	1.04	1.11	
Chloromethane	U	U	U	10
Bromomethane	U	U	U	10
Vinyl Chloride	U	U	U	10
Chloroethane	U	U	U	10
Methylene Chloride	U	U	U	5.0
Acetone	13B	10B	6JB	10
Carbon Disulfide	U	U	U	5.0
Vinyl Acetate	U	U	U	10
1,1-Dichloroethene	U	U	U	5.0
1,1-Dichloroethane	U	U	U	5.0
cis-1,2-Dichloroethene	U	U	U	5.0
trans-1,2-Dichloroethene	U	U	U	5.0
Chloroform	U	U	U	5.0
1,2-Dichloroethane	U	U	U	5.0
2-Butanone	U	U	U	10
1,1,1-Trichloroethane	U	U	U	5.0
Carbon Tetrachloride	U	U	U	5.0
Bromodichloromethane	U	U	U	5.0
1,2-Dichloropropane	U	U	U	5.0
cis-1,3-Dichloropropene	U	U	U	5.0
Trichloroethene	.5J	U	.9J	5.0
Dibromochloromethane	U	U	U	5.0
1,1,2-Trichloroethane	U	U	U	5.0
Benzene	U	U	U	5.0
trans-1,3-Dichloropropene	U	U	U	5.0
Bromoform	U	U	U	5.0
4-Methyl-2-Pentanone	U	U	U	10
2-Hexanone	U	U	U	10
Tetrachloroethene	U	U	U	5.0
Toluene	.5J	U	U	5.0
1,1,2,2-Tetrachloroethane	U	U	U	5.0
Chlorobenzene	U	U	U	5.0
Ethylbenzene	.1J	U	U	5.0
Styrene	U	U	U	5.0
Xylene (total)	1J	U	U	5.0
Date Received	02/28/00	02/28/00	02/28/00	
Date Extracted	N/A	N/A	N/A	
Date Analyzed	02/28/00	02/28/00	02/28/00	

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE VO-1.8 Soil
7000-0422A
ARCADIS/GERAGHTY & MILLER
TCL VOLATILE ORGANICS

All values are ug/Kg dry weight basis.

Client Sample I.D.	9E 35-37			Quant. Limits with no Dilution
Lab Sample I.D.	000422A-18			
Method Blank I.D.	VBLKKI			
Quant. Factor	1.14			
Chloromethane	U			10
Bromomethane	U			10
Vinyl Chloride	U			10
Chloroethane	U			10
Methylene Chloride	U			5.0
Acetone	5JB			10
Carbon Disulfide	U			5.0
Vinyl Acetate	U			10
1,1-Dichloroethene	U			5.0
1,1-Dichloroethane	U			5.0
cis-1,2-Dichloroethene	U			5.0
trans-1,2-Dichloroethene	U			5.0
Chloroform	U			5.0
1,2-Dichloroethane	U			5.0
2-Butanone	U			10
1,1,1-Trichloroethane	U			5.0
Carbon Tetrachloride	U			5.0
Bromodichloromethane	U			5.0
1,2-Dichloropropane	U			5.0
cis-1,3-Dichloropropene	U			5.0
Trichloroethene	.5J			5.0
Dibromochloromethane	U			5.0
1,1,2-Trichloroethane	U			5.0
Benzene	U			5.0
trans-1,3-Dichloropropene	U			5.0
Bromoform	U			5.0
4-Methyl-2-Pentanone	U			10
2-Hexanone	U			10
Tetrachloroethene	U			5.0
Toluene	U			5.0
1,1,2,2-Tetrachloroethane	U			5.0
Chlorobenzene	U			5.0
Ethylbenzene	U			5.0
Styrene	U			5.0
Xylene (total)	U			5.0
Date Received	02/28/00			
Date Extracted	N/A			
Date Analyzed	02/28/00			

See Appendix for qualifier definitions
Note: Compound detection limit = quantitation limit x quantitation factor
Quant. Factor = a numerical value which takes into account any variation in sample weight/volume, % moisture and sample dilution.

TABLE AS-1.0
7000-0422A
ARCADIS/GERAGHTY & MILLER
PRIORITY POLLUTANT METALS

Aqueous

All values are ug/L.

Client Sample I.D.	FB 9F22500	FB 9F22600		
Lab Sample I.D.	000422A-06	000422A-08		
Antimony	3.0U	3.0U		
Arsenic	3.0U	3.0U		
Beryllium	1.0U	1.0U		
Cadmium	1.0U	1.0U		
Chromium	1.0U	1.0U		
Copper	1.0U	1.0U		
Lead	2.0U	2.0U		
Mercury	0.10U	0.10U		
Nickel	1.0U	1.0U		
Selenium	3.0U	3.0U		
Silver	1.0U	1.0U		
Thallium	4.0U	4.0U		
Zinc	1.0U	1.0U		

See Appendix for qualifier definitions

TABLE AS-1.1
7000-0422A
ARCADIS/GERAGHTY & MILLER
PRIORITY POLLUTANT METALS

Soil

All values are mg/Kg dry weight basis.

Client Sample I.D.	9F 5-7	9F 2-3	9F 10-12	9F 15-17
Lab Sample I.D.	000422A-01	000422A-02	000422A-03	000422A-04
Antimony	0.65BN	0.71BN	1.1BN	1.5BN
Arsenic	2.0B	1.6B	3.5	2.5
Beryllium	0.21U	0.21U	0.20U	0.21U
Cadmium	0.21U	0.21U	0.20U	0.21U
Chromium	9.6	8.5	55.8	40.2
Copper	6.2	4.4B	17.6	14.2
Lead	10.	4.0	36.6	7.5
Mercury	0.012	0.0058B	0.038	0.0062
Nickel	3.9B	3.9B	21.0	30.7
Selenium	0.63U	0.62U	0.62U	0.62U
Silver	0.21U	0.21U	0.89B	0.21U
Thallium	0.84U	0.83U	0.82U	0.83U
Zinc	29.3	17.9	27.0	35.2

See Appendix for qualifier definitions

TABLE AS-1.2
7000-0422A
ARCADIS/GERAGHTY & MILLER
PRIORITY POLLUTANT METALS

Soil

All values are mg/Kg dry weight basis.

Client Sample I.D.	9F 20-22	9F 25-27	9F 30-32	9F 35-37
Lab Sample I.D.	000422A-05	000422A-10	000422A-11	000422A-12
Antimony	1.3BN	1.0BN	1.3BN	2.0BN
Arsenic	1.4B	1.4B	2.3	2.6
Beryllium	0.20U	0.21U	0.23U	0.22U
Cadmium	0.20U	0.21U	0.23U	0.22U
Chromium	15.2	12.9	19.1	21.5
Copper	7.5	8.6	17.8	16.6
Lead	3.4	2.8	4.7	6.2
Mercury	0.0040B	0.0034U	0.0040B	0.0058B
Nickel	14.2	14.8	18.6	20.0
Selenium	0.61U	0.63U	0.68U	0.75B
Silver	0.20U	0.21U	0.23U	0.22U
Thallium	0.82U	0.84U	0.91U	0.90U
Zinc	21.5	18.3	45.6	45.6

See Appendix for qualifier definitions

TABLE AS-1.3
7000-0422A
ARCADIS/GERAGHTY & MILLER
PRIORITY POLLUTANT METALS

Soil

All values are mg/Kg dry weight basis.

Client Sample I.D.	9E 1-3	9E 5-7	9E 10-12	9E 25-27
Lab Sample I.D.	000422A-13	000422A-14	000422A-15	000422A-16
Antimony	0.85BN	1.2BN	1.1BN	0.82BN
Arsenic	1.6B	2.4	2.9	1.2B
Beryllium	0.25U	0.21U	0.21U	0.21U
Cadmium	0.25U	0.21U	16.2	0.21U
Chromium	6.8	12.6	49.0	10.2
Copper	4.6B	4.3B	46.8	9.1
Lead	4.4	8.6	19.1	3.6
Mercury	0.0091	0.0092	0.012	0.0028U
Nickel	3.0B	3.3B	87.6	16.2
Selenium	0.75U	0.63U	0.63U	0.73B
Silver	0.25U	0.21U	0.31B	0.21U
Thallium	1.0U	0.84U	0.84U	0.84U
Zinc	20.2	20.6	34.5	19.2

See Appendix for qualifier definitions

TABLE AS-1.4 Soil
7000-0422A
ARCADIS/GERAGHTY & MILLER
PRIORITY POLLUTANT METALS

All values are mg/Kg dry weight basis.

Client Sample I.D.	9E 30-32	9E 35-37		
Lab Sample I.D.	000422A-17	000422A-18		
Antimony	1.3BN	1.9BN		
Arsenic	3.4	2.8		
Beryllium	0.21U	0.22U		
Cadmium	2.4	1.3		
Chromium	25.0	22.3		
Copper	20.6	15.2		
Lead	8.5	8.4		
Mercury	0.0086	0.015		
Nickel	41.0	25.0		
Selenium	0.64U	0.67U		
Silver	0.21U	0.22U		
Thallium	0.85U	0.89U		
Zinc	42.1	32.8		

See Appendix for qualifier definitions

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 5-7

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-01

% Solids: 94.8 Date Received: 02/26/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.530	U	mg/Kg		L
12408-02-5	pH	8.46		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 2-3

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-02

% Solids: 96.1 Date Received: 02/26/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.510	U	mg/Kg		L
12408-02-5	pH	11.7		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 10-12

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-03

% Solids: 97.1 Date Received: 02/26/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.500	U	mg/Kg		L
12408-02-5	pH	10.2		S.U.		D

Comments:

_____

_____

_____

_____

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 15-17

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-04

% Solids: 96.8 Date Received: 02/26/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.510	U	mg/Kg		L
12408-02-5	pH	10.2		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 20-22

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-05

% Solids: 97.6 Date Received: 02/26/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.500	U	mg/Kg		L
12408-02-5	pH	9.04		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

FB 9F22500

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): WATER Lab Sample ID: 000422A-06

% Solids: 0 Date Received: 02/26/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.0100	U	mg/L		L
12408-02-5	pH	6.36		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

FB 9F22600

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): WATER Lab Sample ID: 000422A-08

% Solids: 0 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.0100	U	mg/L		L
12408-02-5	pH	6.25		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 25-27

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-10

% Solids: 95.6 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.530	U	mg/Kg		L
12408-02-5	pH	6.87		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 30-32

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-11

% Solids: 88 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.570	U	mg/Kg		L
12408-02-5	pH	6.90		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9F 35-37

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-12

% Solids: 89.3 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.570	U	mg/Kg		L
12408-02-5	pH	7.20		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9E 1-3

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-13

% Solids: 79.9 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.630	U	mg/Kg		L
12408-02-5	pH	11.6		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9E 5-7

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-14

% Solids: 94.9 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.520	U	mg/Kg		L
12408-02-5	pH	11.1		S.U.		D

Comments:

_____

_____

_____

_____

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9E 10-12

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-15

% Solids: 95.7 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	6.61		mg/Kg		L
12408-02-5	pH	11.5		S.U.		D

Comments:

FORM I - WC

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9E 25-27

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-16

% Solids: 95.4 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.530	U	mg/Kg		L
12408-02-5	pH	9.13		S.U.		D

Comments:

_____

_____

_____

_____

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9E 30-32

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-17

% Solids: 93.9 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.850		mg/Kg		L
12408-02-5	pH	10.2		S.U.		D

Comments:

_____

_____

_____

_____

1

WET CHEM ANALYSIS DATA SHEET

SAMPLE NO.

9E 35-37

Lab Name: STL Contract: _____

Lab Code: STL Case No.: 0422A SAS No.: _____ SDG No.: A0422

Matrix (soil/water): SOIL Lab Sample ID: 000422A-18

% Solids: 90 Date Received: 02/28/00

CAS No.	Analyte	Concentration	C	Units	Q	M
57-12-5	Cyanide, Total	0.560	U	mg/Kg		L
12408-02-5	pH	9.05		S.U.		D

Comments:

FORM I - WC

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INORGANICS APPENDIX

C - Concentration qualifiers

U - Indicates analyte was not detected at method reporting limit.

B - Indicates analyte result between IDL and contract required detection limit (CRDL)

Q - QC qualifiers

E - Reported value is estimated because of the presence of interference

M - Duplicate injection precision not met

N - Spiked sample recovery not within control limits

S - The reported value was determined by the method of standard additions (MSA)

W - Post-digest spike recovery furnace analysis was out of 85-115 percent control limit, while sample absorbance was less than 50 percent of spike absorbance

* - Duplicate analysis not within control limit

\+ - Correlation coefficient for MSA is less than 0.995

M - Method codes

P - ICP

A - Flame AA

F - Furnace AA

CV - Cold vapor AA (manual)

C - Cyanide

NR - Not Required

NC - Not Calculated as per protocols

Committed To Your Success

ORGANICS APPENDIX

U - Indicates that the compound was analyzed for but not detected.

J - Indicates that the compound was analyzed for and determined to be present in the sample. The mass spectrum of the compound meets the identification criteria of the method. The concentration listed is an estimated value, which is less than the specified minimum detection limit but is greater than zero.

B - This flag is used when the analyte is found in the blanks as well as the sample. It indicates possible sample contamination and warns the data user to use caution when applying the results of this analyte.

N - Indicates that the compound was analyzed for but not requested as an analyte. Value will not be listed on tabular result sheet.

S - Estimated due to surrogate outliers.

X - Matrix spike compound.

(1) - Cannot be separated.

(2) - Decomposes to azobenzene. Measured and calibrated as azobenzene.

A - This flag indicates that a TIC is a suspected aldol condensation product.

E - Indicates that it exceeds calibration curve range.

D - This flag identifies all compounds identified in an analysis at a secondary dilution factor.

C - Confirmed by GC/MS.

T - Compound present in TCLP blank.

P - This flag is used for a pesticide/aroclor target analyte when there is a greater than 25 percent difference for detected concentrations between the two GC columns (see Form X).

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STATE CERTIFICATIONS

In some instances it may be necessary for environmental data to be reported to a regulatory authority with reference to a certified laboratory. For your convenience, the laboratory identification numbers for Severn Trent Laboratories-Connecticut are provided in the following table. Many states certify laboratories for specific parameters or tests within a category (i.e. method 325.2 for wastewater). The information in the following table indicates the lab is certified in a general category of testing such as drinking water or wastewater analysis. The laboratory should be contacted directly if parameter-specific certification information is required.

Severn Trent-Connecticut
Certification Summary (as of March 1999)

State	Responsible Agency	Certification	Lab Number
Connecticut	Department of Health Services	Drinking Water, Wastewater	PH-0497
Kansas	Department of Health and Environment	Drinking Water, Wastewater/Solid, Hazardous Waste	E-10210
Maine	Department of Human Services	Wastewater	CT023
Massachusetts	Department of Environmental Protection	Potable/Non-Potable Water	CT023
New Hampshire	Department of Environmental Services	Drinking Water, Wastewater	2528
New Jersey	Department of Environmental Protection	Drinking Water, Wastewater	46410
New York	Department of Health	CLP, Drinking Water, Wastewater, Solid/ Hazardous Waste	10602
North Carolina	Division of Environmental Management	Wastewater Hazardous Waste	388
Oklahoma	Department of Environmental Quality	General Water Quality/ Sludge Testing	9614
Rhode Island	Department of Health	Chemistry...Non-Potable Water and Wastewater	A43
Washington	Department of Ecology	Wastewater/ Hazardous Waste	C231
Wisconsin	Department of Natural Resources	Wastewater/ Hazardous Waste	998355710

7000-0422A
ARCADIS/GERAGHTY & MILLER
SAMPLE SUMMARY

CLIENT ID	LAB ID	MATRIX	DATE COLLECTED	DATE RECEIVED
9F 5-7	000422A-01	SOIL	02/25/00	02/26/00
9F 2-3	000422A-02	SOIL	02/25/00	02/26/00
9F 10-12	000422A-03	SOIL	02/25/00	02/26/00
9F 15-17	000422A-04	SOIL	02/25/00	02/26/00
9F 20-22	000422A-05	SOIL	02/25/00	02/26/00
FB 9F22500	000422A-06	WATER	02/25/00	02/26/00
FB 9F22500	000422A-07	WATER	02/25/00	02/26/00
FB 9F22600	000422A-08	WATER	02/26/00	02/28/00
FB 9F22600	000422A-09	WATER	02/26/00	02/28/00
9F 25-27	000422A-10	SOIL	02/26/00	02/28/00
9F 30-32	000422A-11	SOIL	02/26/00	02/28/00
9F 35-37	000422A-12	SOIL	02/26/00	02/28/00
9E 1-3	000422A-13	SOIL	02/26/00	02/28/00
9E 5-7	000422A-14	SOIL	02/26/00	02/28/00
9E 10-12	000422A-15	SOIL	02/26/00	02/28/00
9E 25-27	000422A-16	SOIL	02/26/00	02/28/00
9E 30-32	000422A-17	SOIL	02/26/00	02/28/00
9E 35-37	000422A-18	SOIL	02/26/00	02/28/00

IEA-CT ANALYTICAL SUMMARY

Client ID: 9E 1-3, 9E 10-12, 9E 25-27, 9E 30-32, 9E 35-37, 9E 5-7, 9F 10-12, 9F 15-17, 9F 2-3, 9F 20-22, 9F 25-27, 9F 30-32, 9F 35-37, 9F 5-7, FB 9F22500, FB 9F22600, TB 9F22500, TB 9F22600
Job Number: 7000-0422A

Date: 3/8/100

Qty	Matrix	Analysis	Description
1	None	DISK	Diskette Prep.
14	SOIL	CNT-N9012	Total Cyanide
14	SOIL	MET-NSW846-PP	Pri Pol Metals
14	SOIL	PH-N9045	pH
14	SOIL	VOA-N8260B-TCL	TCL Volatile Organic
2	WATER	CNT-N9012	Total Cyanide
2	WATER	MET-NSW846-PP	Pri Pol Metals
2	WATER	PH-N9040	pH
4	WATER	VOA-N8260B-TCL	TCL Volatile Organic

STL
...mmitted To Your Success

Sev... rent ... rator
200 Monroe Turnpike
Monroe CT 06468
Tel (203) 261-4458
Fax (203) 268-5346

CHAIN OF CUSTODY RECORD

PAGE 1 OF 2 | NO. P7000-0422A

STL JOB #: 7000-0422A
CLIENT: ARCADIS/GERAGHTY & MILLER
PROJECT ID: G17670-LKM RCRA SOIL
STL PROJECT MGR: JOHANNA DUBAUSKAS
RUSH: [X] YES [ ] NO | DUE DATE

TESTS	PH MET-PP CNT BNA-TCL	VOA-TCL	BNA TCL	CNT	MET PP	PH	VOA TCL	
BOTTLE TYPE AND PRESERVATION	GL250	SEPTA60	GL1000	NAOH ASC PL500	HNO3 PL500	PL500	UNP VOAVIAL	

GENERAL REMARKS: Hold All SVOCs Pending Notification

FIELD FILTERED - CIRCLE Y or N

BOTTLE #	CLIENT SAMPLE ID	DATE / TIME SAMPLED	MATRIX	LAB ID	QC Y / N	Y / N	Y / N	Y / N	Y / N	Y / N	Y / N	Y / N	Y / N	SAMPLE REMARKS
01	~~9F 2-3~~		SO		Y	~~3~~	~~3~~							
02	9F 5-7	2/25/00 1440	SO	01	N	1	1							
03	9F 2-3	2/25/00 1410	SO	02	N	1	1							
04	9F 10-12	2/25/00 1515	SO	03	N	1	1							
05	9F 15-17	2/25/00 1535	SO	04	N	1	1							Hold SVOC
06	9F 20-22	2/25/00 1550	SO	05	N	1	1							
07	~~9F 25-27~~	~~2/25/00~~	~~SO~~		~~N~~	~~1~~	~~1~~							
08	~~9F 30-32~~	~~2/25/00~~	~~SO~~		~~N~~	~~1~~	~~1~~							
09	FB 9F 22500	2/25/00 1630	WA	06	N	~~1~~ [initials] 2/26/00	~~1~~	2	1	1	1	2		Field Blank
10	TB 9F 22500	2/25/00 1630	WA	07	N	~~1~~	~~1~~					2		Trip Blank

PASSED RAD SCREEN

6°C

MATRIX CODES
A AIR | S SOIL
... AQUEOUS | SL SLUDGE
... | W WIPE
... DRINKING WATER | O OTHER
... OIL | FB FIELD BLANK
TB TRIP BLANK

BOTTLES PREPARED BY	DATE / TIME	BOTTLES REC'D BY	DATE / TIME
SIGNATURE [signature]		SIGNATURE	
SAMPLES COLLECTED BY	DATE / TIME	RECEIVED IN LAB BY	DATE / TIME
SIGNATURE Robert [signature]	2/25/00 1700	SIGNATURE [signature]	2/26/00

REMARKS ON SAMPLE RECEIPT
[ ] BOTTLES INTACT [ ] CUSTODY SEALS
[ ] PRESERVED [ ] SEALS INTACT
[ ] CHILLED [ ] SEE REMARKS

LABORATORY COPY

17 ... ...

ARCADIS GERAGHTY & MILLER

Laboratory Task Order No./P.O. No. ____

CHAIN-OF-CUSTODY RECORD

Project Number/Name NY001227.0017.00001

Project Location LMC

Laboratory STL- Monroe, CT

Project Manager Christina Tuohy / Nick Valkenburg

Sampler(s)/Affiliation Mike Engelmann / ARCADIS G&M

2000-0422A

* HOLD ALL SVOC's Pending Notification

Sample ID/Location	Matrix	Date/Time Sampled	Lab ID	GL-250 Ph Met-PP CNT BNA-TCL	Septa 60 VOA-TCL	BNA TCL GL 1000	CNT NaOH ASC PL500	MET-PP HNO3 PL-500	Ph PL-500	+	Remarks	Total
FIELD BLANK 2/26/00	L	2/26/00	08			2	1	1	1		Field Blank - FB	7
TRIP BLANK 2/26/00	L		09								Trip Blank - TB	2
9F-25'-27'	S	8:30	10	1	1						HOLD SVOC	2
9F-30'-32'	S	9:15	11	1	1						HOLD SVOC	2
9F-35'-37'	S	9:30	12	1	1						HOLD SVOC	2
9E-1'-3'	S	10:50	13	1	1						HOLD SVOC	2
9E-5'-7'	S	11:05	14	1	1						HOLD SVOC	2
9E-10'-12'	S	11:35	15	1	1						HOLD SVOC	2
~~9E-20'-22'~~	~~S~~	~~11:55~~		~~1~~	~~1~~	~~→ Please Call Nick Valkenburg~~					~~HOLD SVOC~~	~~2~~
9E-25'-27'	S	12:05	16	1	1						HOLD SVOC	2
9E-30'-32'	S	12:20	17	1	1						HOLD SVOC	2
9E-35'-37'	S	12:30	18	1	1						HOLD SVOC	2
												~~2~~

PASSED RAD SCREEN

6°C

VOA-TCL UNP... 2 2

* 1 DAY TURNAROUND - ANALYSIS COMPLETED BY TUESDAY!

Sample Matrix: L = Liquid; S = Solid; A = Air

Total No. of Bottles/Containers ~~31~~ ~~29~~

Relinquished by: [signature]	Organization: ARCADIS Geraghty & Miller	Date 2/26/00	Time 3:00	Seal Intact?
Received by: [signature]	Organization: STL-CT	Date 2/28/00	Time 10:00	Yes No N/A
Relinquished by:	Organization:	Date / /	Time	Seal Intact?
Received by:	Organization:	Date / /	Time	Yes No N/A

Special Instructions/Remarks:

PLEASE CALL NICK VALKENBURG WITH ANY QUESTIONS ON MONDAY FEBRUARY 28, 2000 ~~at~~ AT (631) 249-7600

Delivery Method: ☐ In Person ☒ Common Carrier FED EX (SPECIFY) ☐ Lab Courier ☐ Other ____ (SPECIFY)

AG 05-0597

FedEx USA Airbill

FedEx Tracking Number: 8184 8157 8775

Form I.D. No.: 0215

RECIPIENT: PEEL HERE

1 From This portion can be removed for Recipient's records.

Date 2/25/00 FedEx Tracking Number 818481578775

Sender's Name BOB POESCHE Phone 515 249 7600

Company [illegible] AND MILLER

Address [illegible] Dept./Floor/Suite/Room

City [illegible] State NY ZIP 11747

2 Your Internal Billing Reference

3 To

Recipient's Name JOHANNA DUBASKAS Phone 203 261 4448

Company SEVERN TECHNOLOGIES

Address 100 MONROE TRPK Dept./Floor/Suite/Room

We cannot deliver to P.O. boxes or P.O. ZIP codes.

To "HOLD" at FedEx location, print FedEx address here.

City MONROE State CT ZIP 06468

8184 8157 8775

0125531612

4a Express Package Service — *Packages up to 150 lbs.* Delivery commitment may be later in some areas

- [X] FedEx Priority Overnight — Next business morning
- [ ] FedEx Standard Overnight — Next business afternoon
- [ ] FedEx First Overnight — Earliest next business morning delivery to select locations
- [ ] FedEx 2Day* — Second business day
- [ ] FedEx Express Saver* — Third business day

* FedEx Letter Rate not available. Minimum charge: One-pound rate

4b Express Freight Service — *Packages over 150 lbs.* Delivery commitment may be later in some areas

- [ ] FedEx 1Day Freight* — Next business day
- [ ] FedEx 2Day Freight — Second business day
- [ ] FedEx 3Day Freight — Third business day

* Call for Confirmation: _____

5 Packaging

- [ ] FedEx Letter*
- [ ] FedEx Pak*
- [X] Other Pkg. — Includes FedEx Box, FedEx Tube, and customer pkg. * Declared value limit $500

6 Special Handling

- [X] Saturday Delivery — Available for FedEx Priority Overnight and FedEx 2Day to select ZIP codes
- [ ] Sunday Delivery — Available for FedEx Priority Overnight to select ZIP codes
- [ ] HOLD Weekday at FedEx Location — Not available with FedEx First Overnight
- [ ] HOLD Saturday at FedEx Location — Available for FedEx Priority Overnight and FedEx 2Day to select locations

Does this shipment contain dangerous goods? One box must be checked.

- [X] No
- [ ] Yes — As per attached Shipper's Declaration
- [ ] Yes — Shipper's Declaration not required
- [ ] Dry Ice — Dry Ice, 9, UN 1845 _____ x _____ kg
- [ ] Cargo Aircraft Only

Dangerous Goods cannot be shipped in FedEx packaging.

7 Payment *Bill to:* Enter FedEx Acct. No. or Credit Card No. below. [ ] Obtain Recipient Acct. No.

- [X] Sender — Acct. No. in Section will be billed.
- [ ] Recipient
- [ ] Third Party
- [ ] Credit Card
- [ ] Cash/Check

Total Packages	Total Weight	Total Charges
1	30	Credit Card Auth.

†Our liability is limited to $100 unless you declare a higher value. See the *FedEx Service Guide* for details.

8 Release Signature *Sign to authorize delivery without obtaining signature.*

By signing you authorize us to deliver this shipment without obtaining a signature and agree to indemnify and hold us harmless from any resulting claims.

Questions? Call 1·800·Go·FedEx® (800-463-3339)

Visit our Web site at www.fedex.com

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359

500

FedEx USA Airbill FedEx Tracking Number 8184 8157 8753

Form I.D. No. 0215

1 From This portion can be removed for Recipient's records.

Date 2/26/10 FedEx Tracking Number 818481578753

Sender's Name M... Englerman Phone 516 249-7600

Company ARCADIS ... AND MILLER

Address ... Dept./Floor/Suite/Room

City ... State NY ZIP 11747

RECIPIENT: PEEL HERE

2 Your Internal Billing Reference NY001227.0017.00001

3 To

Recipient's Name Sample Receiving Dept. Phone 203 271-4958

Company Severn Trent Laboratories

Address 200 Monroe Turnpike Dept./Floor/Suite/Room

We cannot deliver to P.O. boxes or P.O. ZIP codes.

To "HOLD" at FedEx location, print FedEx address here

City ... State CT ZIP 06468

8184 8157 8753

0125531612

4a Express Package Service *Packages up to 150 lbs.* Delivery commitment may be later in some areas.

- ☐ FedEx Priority Overnight — Next business morning
- ☐ FedEx Standard Overnight — Next business afternoon
- ☒ FedEx First Overnight — Earliest next business morning delivery to select locations
- ☐ FedEx 2Day* — Second business day
- ☐ FedEx Express Saver* — Third business day

* FedEx Letter Rate not available. Minimum charge: One-pound rate

4b Express Freight Service *Packages over 150 lbs.* Delivery commitment may be later in some areas.

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- ☐ FedEx 2Day Freight — Second business day
- ☐ FedEx 3Day Freight — Third business day

* Call for Confirmation:

* Declared value limit $500

5 Packaging

- ☐ FedEx Letter*
- ☐ FedEx Pak*
- ☒ Other Pkg. — Includes FedEx Box, FedEx Tube, and customer pkg.

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- ☐ Saturday Delivery — Available for FedEx Priority Overnight and FedEx 2Day to select ZIP codes
- ☐ Sunday Delivery — Available for FedEx Priority Overnight to select ZIP codes
- ☐ HOLD Weekday at FedEx Location — Not available with FedEx First Overnight
- ☐ HOLD Saturday at FedEx Location — Available for FedEx Priority Overnight and FedEx 2Day to select locations

Does this shipment contain dangerous goods? One box must be checked.

- ☒ No
- ☐ Yes — As per attached Shipper's Declaration
- ☐ Yes — Shipper's Declaration not required
- ☐ Dry Ice — Dry Ice, 9, UN 1845 ______ x ______ kg
- ☐ Cargo Aircraft Only

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7 Payment *Bill to:* Enter FedEx Acct. No. or Credit Card No. below ☐ Obtain Recip. Acct. No.

- ☒ Sender — Acct. No. in Section 1 will be billed.
- ☐ Recipient
- ☐ Third Party
- ☐ Credit Card
- ☐ Cash/Check

[redacted]

Total Packages	Total Weight		Total Charges
1	53	[redacted]	
			Credit Card Auth.

†Our liability is limited to $100 unless you declare a higher value. See the *FedEx Service Guide* for details.

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359

By signing you authorize us to deliver this shipment without obtaining a signature and agree to indemnify and hold us harmless from any resulting claims.

Questions? Call 1·800·Go·FedEx® (800-463-3339)

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Severn ...t - Connecticut
Internal Chain-of-Custody

Client: GFM

STL Job #: 7000-0422A

Custody Seal: present / absent
Tamper Evident / Non Tamper Evident
intact / not intact

Date Received: 2/28/00

Airbill# FE

Sample #s: 08→18

Field C-O-C: present / absent

Locations: 33F, 38, 35N, 96, 99

Laboratory Sample #	Relinquished by	Accepted by	Date	Time	Reason	Relinquished by	Accepted by	Date	Time
10-18		C. Crow	2/28	11:00	ICP				
8, 10-18A		B Alves	2/28	1350	CN	B Alves		2/28	1715
10-18		M. Crow	2/28/00	1425	VOA			2/28	2047
8, 09		KG	2/29	1:00	VOA	used			
8B, 10-18(A)		SBW	03/02/00	10:50	BNA	8 used SBW		03/03/00	16:15

STL Form# SMF00504.CT

AS:022189:O

Severn Trent Laboratories
200 Monroe Turnpike
Monroe CT 06468
Tel: (203) 261-4458
Fax: (203) 268-5346

Committed To *Your* Success

CHAIN OF CUSTODY
ATOMIC SPECTROSCOPY DEPARTMENT

Job Number 04221 Sample Numbers 06, 08

(WATER) - SOIL - SLUDGE - EPTOX/TCLP

I confirm that I have performed the preparation below following SOP guidelines and authorize the release of this preparation:

Sample Prep C Rodriguez	2/29/00	
		ICP/FLME
		FURN
		MERCURY
Chemist	Date(s)	

I confirm that I have performed the analysis below following SOP guidelines and authorize the release of all associated data:

Analysis 200.7	2/27/00	ICP
		FLAME
		FURN
		MERCURY
Chemist	Date(s)	

I have reviewed and authorize the release of this job:

Complete 200.7 — Supervisor; 3/3/00 — Date

Batch Assignment

AS:022189:O

Severn Trent Laboratories
200 Monroe Turnpike
Monroe CT 06468
Tel: (203) 261-4458
Fax: (203) 268-5346

Committed To *Your* Success

CHAIN OF CUSTODY
ATOMIC SPECTROSCOPY DEPARTMENT

Job Number 000422A Sample Numbers 01 — 18

WATER - (SOIL) - SLUDGE - EPTOX/TCLP

I confirm that I have performed the preparation below following SOP guidelines and authorize the release of this preparation:

Sample Prep		
Carlos Cortés	2/28/00	ICP/FLME
		FURN
Gerda Bao (Chemist)	02/28/00 (Date(s))	MERCURY

I confirm that I have performed the analysis below following SOP guidelines and authorize the release of all associated data:

Analysis		
[illegible]	2/28/00	ICP
		FLAME
		FURN
Gerda Bao (Chemist)	02/28/00 (Date(s))	MERCURY

I have reviewed and authorize the release of this job:

Complete		
[illegible] (Supervisor)	3/3/00 (Date)	

Batch Assignment _____

AS:022189:O

Severn Trent Laboratories
200 Monroe Turnpike
Monroe CT 06468
Tel: (203) 261-4458
Fax: (203) 268-5346

Committed To *Your* Success

CHAIN OF CUSTODY
ATOMIC SPECTROSCOPY DEPARTMENT

Job Number 000422A Sample Numbers 06, 08

WATER - SOIL - SLUDGE - EPTOX/TCLP

I confirm that I have performed the preparation below following SOP guidelines and authorize the release of this preparation:

Sample Prep			
			ICP/FLME
			FURN
	Glenda Bao	02/29/00	MERCURY
	Chemist	Date(s)	

I confirm that I have performed the analysis below following SOP guidelines and authorize the release of all associated data:

Analysis			ICP
			FLAME
			FURN
	Glenda Bao	02/29/00	MERCURY
	Chemist	Date(s)	

I have reviewed and authorize the release of this job:

Complete	[signature]	2/29/00	
	Supervisor	Date	

Batch Assignment _____

IEA / CT
LABORATORY CHRONICLE

SAMPLE PREPARATION AND ANALYSIS SUMMARY
INORGANIC ANALYSIS

JOB #: 7000-0422A

SAMPLE ID	MATRIX	LIST REQUESTED	DATE RECEIVED	DATE DIGESTED	DATE ANALYZED
9F 5-7	SOIL	MET-NSW846-PP	02/26/00	02/28/00	02/28/00
9F 2-3	SOIL	MET-NSW846-PP	02/26/00		
9F 10-12	SOIL	MET-NSW846-PP	02/26/00		
9F 15-17	SOIL	MET-NSW846-PP	02/26/00		
9F 20-22	SOIL	MET-NSW846-PP	02/26/00		
FB 9F22500	WATER	MET-NSW846-PP	02/26/00		
FB 9F22600	WATER	MET-NSW846-PP	02/28/00		
9F 25-27	SOIL	MET-NSW846-PP	02/28/00		
9F 30-32	SOIL	MET-NSW846-PP	02/28/00		
9F 35-37	SOIL	MET-NSW846-PP	02/28/00		
9E 1-3	SOIL	MET-NSW846-PP	02/28/00		
9E 5-7	SOIL	MET-NSW846-PP	02/28/00		
9E 10-12	SOIL	MET-NSW846-PP	02/28/00		
9E 25-27	SOIL	MET-NSW846-PP	02/28/00		
9E 30-32	SOIL	MET-NSW846-PP	02/28/00		
9E 35-37	SOIL	MET-NSW846-PP	02/28/00		

Section Supervisor (signature) [signature]

Review & Approval (printed name) David W. Hafel

(Date) 3/3/00

QC Supervisor (signature) _____

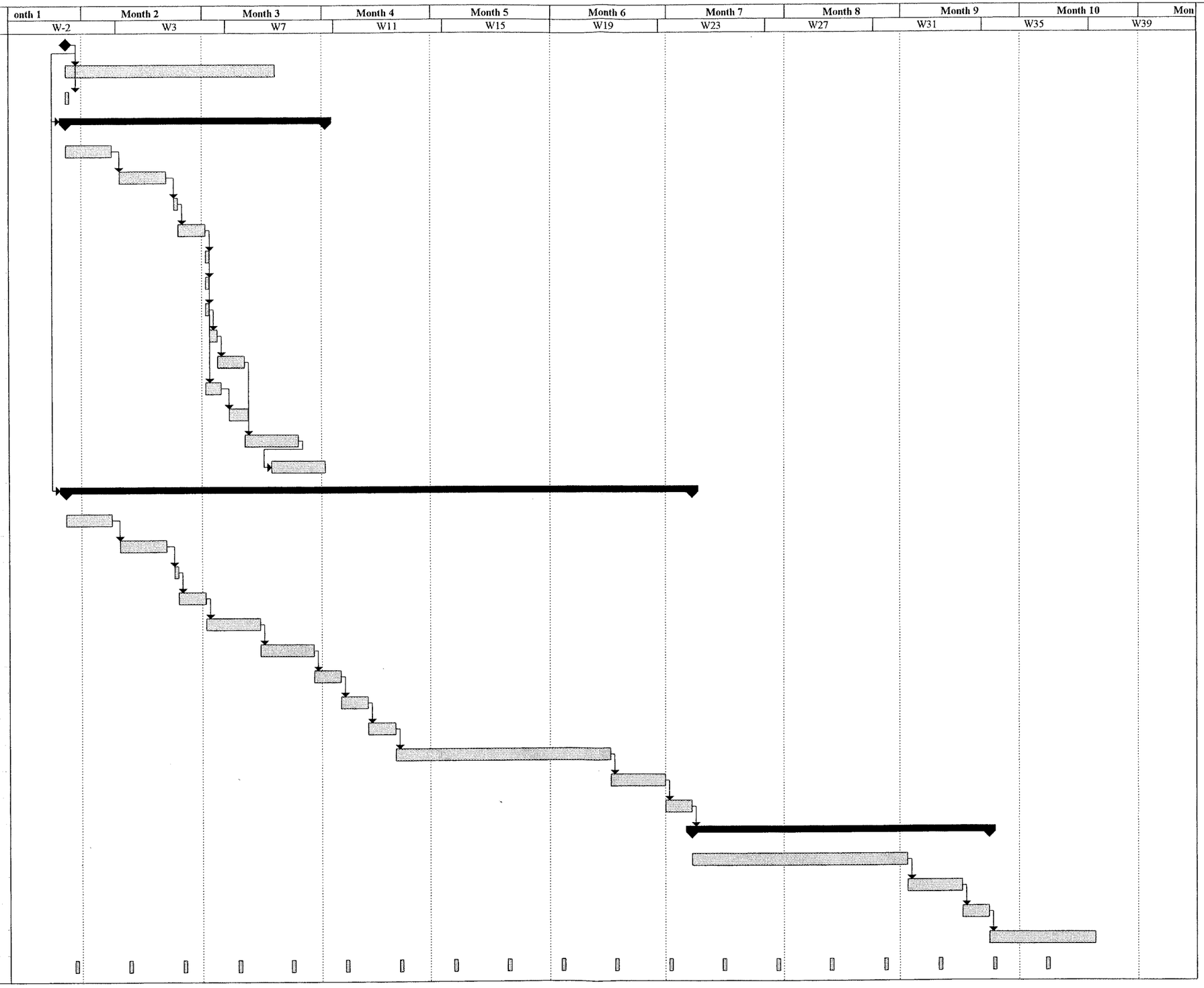
Review & Approval (printed name) _____

(Date) __/__/__

Appendix B

Project Closure Schedule

ID	Task Name
1	Receive Final Approval for Part 373 Closure Plan and Closure Work Plan
2	Implement AUL for Interior Areas
3	Inspection of Concrete Slab
4	**Decontamination/Powerwashing**
5	Bidding Process
6	Contracting
7	Kickoff Meeting
8	Mobilization/Site Preparation
9	Collection of Free Standing Liquid in Sumps
10	Sweep and Pressure Wash Area 9
11	Rinsate Sampling in Area 9
12	Receive Area 9 Rinsate Results
13	Receive NYSDEC Approval of Pressurewash Proceedures
14	Sweep Floors in Interior Areas
15	Pressure Wash HWMU
16	Surface Decontamination of Other Areas
17	Characterization and Disposal of Rinse Water
18	**Exterior Soil Investigations**
19	Bidding Process
20	Contracting
21	Kickoff Meeting
22	Mobilization/Site Preparation
23	Primary Soil Boring Investigation
24	Receive Anayltical Results
25	Data Validation
26	Correspondence with NYSDEC to Approve Secondary Investigation
27	Remobilization
28	Secondary Soil Boring Investigation
29	Receive Analytical Results
30	Data Validation
31	**Remedial Work**
32	Proposal for Remedial Strategy
33	NYSDEC Approval
34	Prepare Schedule for Remedial Strategy
35	Prepare Closure Certification Report
36	**Coordination with i.park Lake Success**



Project: Estimated Part 373 Closure S
Great Neck, New York, Fri 11/3/00

Task | Progress | Milestone | Summary | Rolled Up Task | Rolled Up Milestone | Rolled Up Progress

2 **Implement AUL for Interior Areas**
In any AUL restricted area where the concrete slab is breached or demolished, the proposed soil investigation will commence within approximately one month if feasible and shall be completed within approximately six months.

16 **Surface Decontamination of Other Areas**
Decontamination of the eastern half of Area 17 will be completed when the soil vapor extraction equipment is removed in accordance with the approved Closure Work Plan.

18 **Exterior Soil Investigations**
Exterior soil investigation will begin upon approval of work plan. Interior soil investigation will be deferred until the slab is breached or demolished.