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UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 5
230 SOUTH DEARBORN ST.
CHICAGO, ILLINOIS 60604

22 DEC 1989

REPLY TO THE ATTENTION OF
5HS-11

RE: Yeoman Creek Landfill
Waukegan, Illinois

Dear Sir or Madam:

Enclosed is a fully executed copy of the Consent Order for the Yeoman Creek Landfill. Please send the U.S. EPA and IEPA the name, title and qualifications of the proposed engineer or geologist, and of the names and principal contractors and/or subcontractors proposed to be used for carrying out the work to be performed pursuant to this Order, in accordance with the requirements of the Order.

According to the Order, the RI/FS Work Plan is due within 60 days of the date of this letter. This letter along with a copy of the fully executed Consent Order are being mailed to the addresses listed on the following page.

Sincerely yours,

Richard E. Boice

Richard E. Boice
Remedial Project Manager

cc w/attachments:
Scott Moyer, IEPA
Mike Kuhn, LCHD

THOMAS P. HEALY, JR., ESQ.
MAYER, BROWN & PLATT
190 S. LASALLE STREET
CHICAGO,IL 60603

MS. GWEN S. WALSH, ENVIR. AFFAIRS
BROWNING-FERRIS INDUSTRIES
757 N. ELDRIDGE P.O. BOX 3151
HOUSTON,TX 77253

PETER F. LOMONACO, ESQ.
325 WASHINGTON STREET
SUITE 401
WAUKEGAN,IL 60085

CLIFTON D. WARNER
WAUKEGAN SCHOOL DISTRICT NO. 60
LINCOLN CENTER
1201 N. SHERIDAN ROAD
WAUKEGAN,IL 60085

DONALD M. LONCHAR, JR. ESQ.
LONCHAR, NORDIGIAN & BAKK
32 N. WEST STREET
WAUKEGAN,IL 60085

SHELL J. BLEIWEISS, ESQ.
MCDERMOTT, WILL & EMERY
111 W. MONROE STREET SUITE 2000
CHICAGO,IL 60603

ROBERT E. LESSMAN
HULL, HOLMBERG, ET. AL.
20 SOUTH UTICA STREET
WAUKEGAN,IL 60085

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION V

IN THE MATTER OF: YEOMAN CREEK LANDFILL FACILITY LAKE COUNTY WAUKEGAN, ILLINOIS Respondents, Proceeding under Section 122(a) and (d)(3) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980, as amended.	ADMINISTRATIVE ORDER BY CONSENT RE: REMEDIAL INVESTIGATION AND FEASIBILITY STUDY U.S. EPA Docket No.

The United States Environmental Protection Agency ("U.S. EPA"), Illinois Environmental Protection Agency ("IEPA") jointly referred to herein as the "Agencies") and the Respondents have each agreed to the making and entry of this Administrative Order by Consent ("Consent Order").

I. JURISDICTION

A. This Consent Order is issued pursuant to the authority vested in the President of the United States by Section 122(a) and (d)(3) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980, 42 U.S.C. Section 9601 et seq., as amended by the Superfund Amendments and Reauthorization Act of 1986, Pub. L. 99-499 ("CERCLA"), and delegated to the Administrator of the U.S. EPA on January 29, 1987, by Executive Order 12580, 52 Federal Register 2923, and further delegated to the

Assistant Administrator for Solid Waste and Emergency Response and the Regional Administrators by U.S. EPA Delegation No. 14-14-C on February 26, 1987 and to the Waste Management Division Director by U.S. EPA, Region V, Delegation No. 14-14-C on September 14, 1987. This Consent Order is also issued pursuant to the authority vested in the IEPA by the Illinois Environmental Protection Act, Ill. Rev. Stat. Ch. 111 1/2, para. 1001 et seq.

B. The Respondents to this Consent Order agree to undertake all actions required by the terms and conditions hereunder, and consent to and will not contest or legally challenge the issuance of this Consent Order or the U.S. EPA's or IEPA's jurisdiction regarding this Consent Order.

II. NOTICE OF ACTION

A. U.S. EPA has notified all potentially responsible parties that it has identified as of the date of entry of this Consent Order of this action to the extent such notification is required, pursuant to Section 122(e) of CERCLA.

B. U.S. EPA has notified the Federal Natural Resource trustee of this action pursuant to the requirements of Section 122(j) of CERCLA. The IEPA has notified, pursuant to Section 104(b)(2) of CERCLA, the State Natural Resource Trustees, who are the Director of the Department of Energy and Natural Resources, the Director of the Department of Conservation, the Director of the Division of Water Resources of the Illinois Department of Transportation, and the Director of the IEPA.

III. PARTIES BOUND

A. This Consent Order applies to and binds the following persons as defined in Section 101(21) of CERCLA:

(1) U.S. EPA, through the Waste Management Division Director, Region V;

(2) IEPA, through the Director;

(3) the individuals and corporations, their respective successors and assignees, (referred to collectively as "Respondents") identified in Attachment A of this Consent Order.

B. Each of the undersigned representatives of the U.S. EPA, IEPA and the Respondents certifies that he or she is fully authorized to enter into the terms and conditions of this Consent Order and to execute and legally bind such party to this document.

C. No change in ownership, corporate, or partnership status shall in any way alter the status or responsibility of the Respondents under this Consent Order. The Respondents shall be jointly and severally responsible for carrying out all actions required of the Respondents by the terms and conditions of this Consent Order. Respondents shall be responsible for ensuring that all contractors, consultants, firms and other persons or entities acting under or for it with respect to matters included herein comply with the terms of this Consent Order. Respondents shall not raise as a defense to enforcement of this Order that its officers, directors, principals, employees, agents, servants, contractors, subcontractors, firms and/or other persons or entities acting under or for them violated this Consent Order.

IV. STATEMENT OF PURPOSE

A. In entering into this Consent Order, the mutual objectives of the U.S.EPA, IEPA and the Respondents are for the Respondents: (1) to conduct a remedial investigation (RI) to determine fully the nature and extent of the release or threatened release of hazardous substances, pollutants or contaminants from the Yeoman Creek Landfill Facility, (2) to perform a feasibility study (FS) to identify and evaluate alternatives for the appropriate extent of remedial action to prevent or mitigate the migration or the release or threatened release of hazardous substances, pollutants, or contaminants from the Yeoman Creek Landfill Facility, and (3) to implement certain measures consisting of restricting site access, and eliminating presently existing erosion gullies, which shall be incorporated in the work to be performed during the RI.

B. The activities conducted pursuant to this Consent Order are subject to approval by the U.S. EPA and IEPA as provided herein, shall employ sound scientific, engineering and construction practices and shall be consistent with the National Contingency Plan, 40 CFR Section 300.68(a) through (j) as amended, CERCLA, and applicable State laws.

V. FINDINGS OF FACT

Based upon information available on the effective date of this Consent Order, and without admission of any fact, conclusions of law or liability by the Respondents, the Waste Management Division

Director of the U.S. EPA, Region V, and the Director of the IEPA make the following findings:

A. The Yeoman Creek Landfill (Facility) is located in the City of Waukegan, Lake County, Illinois. The Facility was operated as a sanitary landfill for the City of Waukegan and is presently a closed and covered landfill owned and maintained by the Waukegan Unit School District #60.

B. The Facility is approximately 40-50 acres in area and is located south of Sunset Avenue, west of Butrick Drive and east of Elmwood and Lorraine Avenues in Waukegan, Illinois. The site is not fenced and has unrestricted access. Some erosion is occurring at two gullies on the western edge of the facility. The south boundary is a peat bog that continues to Edwards Field. Apartments, homes and businesses directly border the Facility on the east, west and north.

C. By contract with the City of Waukegan, National Disposal Service of Illinois, Inc. operated the Facility from 1959 to February 1969. The city then awarded the contract to T-K City Disposal, Inc. who operated the Facility until September 1969. Under the contract, each of these contractors was to collect and dispose of all residential garbage within the City of Waukegan. These contractors were also permitted to accept waste materials from private disposal companies. Since Yeoman Creek Landfill was the only authorized municipal landfill in Waukegan for the period in which it was in operation, some industrial wastes were sent for disposal at the Facility through private disposal companies.

D. Leachate seepage from the Facility is known to enter Yeoman Creek which is a tributary of the Waukegan River emptying into Lake Michigan less than one mile from the Waukegan drinking water aqueduct intake. Tests conducted by U.S. EPA in 1985 indicated the presence of PCBs and other organic chemicals in the sediments of Yeoman Creek at the Facility and further downstream at Yeoman Park.

E. The Facility is included in the National Priorities List (NPL) of hazardous waste sites with a Hazardous Ranking Score of 33.23.

VI. CONCLUSIONS OF LAW

Based upon information available on the effective date of this Consent Order, and without admission of any fact, conclusions of law or liability by the Respondents, the Waste Management Division Director of the U.S. EPA, Region V, and the Director of IEPA make the following conclusions of law:

A. The Yeoman Creek Landfill, as defined in Section V., is a "Facility" as defined in Section 101(9) of CERCLA.

B. "Hazardous substances" as defined in Section 101(14) of CERCLA have been deposited, stored, disposed of, placed, or otherwise come to be located at the Facility.

C. The spilling, leaking, leaching, dumping, or disposing of hazardous substances into the soils and groundwater at the Facility, and the past, present, and potential migration of hazardous substances from the Facility constitutes an actual and/or

threatened "release" of hazardous substances into the environment as defined in Section 101(22) of CERCLA.

D. The Respondents are "persons" as defined in Section 101(21) of CERCLA.

E. The Respondents are liable persons pursuant to Section 107 of CERCLA and are potentially responsible parties for the purposes of Section 122 of CERCLA.

VII. DETERMINATIONS

Based on the foregoing Findings of Fact and Conclusions of Law, the Waste Management Division Director of U.S. EPA, Region V, and the Director of the IEPA have determined that:

A. Respondents shall promptly and properly take appropriate response action at the Facility by conducting a Remedial Investigation and Feasibility Study ("RI/FS"), and are qualified to perform the RI/FS; and

B. In order to ensure orderly conduct of the RI/FS, it is necessary to implement access restrictions (i.e., a fence) and erosion control measures.

C. The actions outlined in this Consent Order are necessary to ensure the protection of public health, welfare and the environment.

D. The actions required by this Consent Order are in the public interest and are consistent with the National Contingency Plan, 40 CFR Part 300, as amended, (hereinafter "NCP") and with CERCLA.

VIII. WORK TO BE PERFORMED

A. All work to be performed by the Respondents pursuant to this Consent Order shall be under the direction and supervision of a qualified professional engineer or certified geologist. Prior to the initiation of work at the Facility, the Respondents shall notify the U.S. EPA and IEPA, in writing, of the name, title, and qualifications of the proposed engineer or geologist, and of the names of principal contractors and/or subcontractors proposed to be used in carrying out the work to be performed pursuant to this Consent Order. Selection of any such engineer or geologist or contractor and/or subcontractor shall be subject to approval by the U.S. EPA in consultation with the IEPA. If the U.S. EPA disapproves of the Respondent's proposed engineer or geologist or contractor or subcontractor, the U.S. EPA shall specify, in writing, the bases for such disapproval.

B. Attachment I to this Consent Order provides a Statement of Work ("SOW") for the completion of the RI/FS, including access and erosion control measures. The SOW is incorporated into and made a part of this Consent Order.

C. The following work shall be performed:

1. Within sixty (60) calendar days of the effective date of this Consent Order, the Respondents shall submit a work plan to the U.S. EPA and IEPA for a complete Remedial Investigation and Feasibility Study (hereinafter RI/FS Work Plan). The RI/FS Work Plan shall be developed in conformance with the SOW, the standards

set forth in CERCLA, including Section 121 of CERCLA, the NCP, U.S. EPA guidance on remedial investigations and feasibility studies, as amended, "the Superfund Remedial Design and Remedial Action Guidance," (February 1985), as amended, and any additional guidance documents provided by U.S. EPA. In the event that any such additional guidance document is provided to the Respondents by the Agencies after the effective date of this Consent Order, the Respondents shall have fifteen (15) calendar days to revise the Work Plan as necessary, and any time limits provided in this Consent Order shall be extended as necessary to accommodate said fifteen (15) day period.

2. The RI/FS Work Plan submittal shall include, but not be limited to, the following project plans: (1) an access restriction and erosion control measures plan; (2) a field sampling plan; (3) a health and safety plan; (4) a quality assurance project plan ("QAPP"); (5) provisions for the preparation of an endangerment assessment plan; (6) a data management plan, and; (7) a schedule, including specific dates for implementation of RI/FS tasks and deliverables such as technical memoranda, preliminary and final Remedial Investigation reports, preliminary and final endangerment assessments, and preliminary and final Feasibility Study reports. The preliminary and final Remedial Investigation reports and the preliminary and final Feasibility Study reports shall be prepared in accordance with the applicable U.S. EPA guidance.

3. The RI/FS Work Plan shall be subject to review,

modification, and approval by the U.S. EPA in consultation with the IEPA.

4. Within forty five (45) calendar days of receipt of the RI/FS Work Plan, the U.S. EPA Project Coordinator shall notify the Respondents, in writing, of approval or disapproval of the RI/FS Work Plan, or any part thereof. In the event that a longer review period is required, the U.S. EPA Project Coordinator shall notify the Respondents of that fact within thirty (30) calendar days of receipt of the Work Plan. In the event of any disapproval, the U.S. EPA shall specify, in writing, any deficiencies and required modifications to the RI/FS Work Plan.

5. Within fifteen (15) calendar days of receipt of any U.S. EPA RI/FS Work Plan disapproval, the Respondents shall submit a revised RI/FS Work Plan to the U.S. EPA and the IEPA which incorporates the U.S. EPA modifications.

6. In the event of subsequent U.S. EPA disapproval of the RI/FS Work Plan, the U.S. EPA retains the right to conduct a complete or partial RI/FS and/or to enforce the terms of this Consent Order.

7. The Respondents shall commence implementation of the work detailed in the RI/FS Work Plan within fifteen (15) calendar days after the RI/FS Work Plan is fully approved by the U.S. EPA. The fully approved RI/FS Work Plan shall be deemed incorporated into and made an enforceable part of this Consent Order. All work shall be conducted in accordance with the National Contingency Plan, the RI/FS Guidance and the guidance

specified in paragraph C.1., above, and the requirements of this Consent Order, including the standards, specifications and schedule contained in the RI/FS Work Plan.

IX. PLANS AND REPORTS

A. The Respondents shall provide a preliminary and final Remedial Investigation Report and Feasibility Study Report and any other plans or reports required by the RI/FS Work Plan to the U.S. EPA and the IEPA according to the schedule contained in the RI/FS Work Plan.

B. The U.S. EPA shall approve, in consultation with the IEPA, the preliminary and final Remedial Investigation Report, the preliminary and final Feasibility Study Report, and any other preliminary or final plans or reports specified in the RI/FS Work Plan as requiring U.S. EPA approval.

C. If the U.S. EPA, in consultation with the IEPA, disapproves any preliminary or final plan or report, the U.S. EPA shall specify, in writing, any deficiencies and required modifications and the Respondents shall submit a revised plan or report to the U.S. EPA and IEPA within forty five (45) calendar days or such longer period as the U.S. EPA Project Coordinator may establish, which plan or report shall incorporate any U.S. EPA modifications or additions.

D. In the event of subsequent disapproval of any revised plan or report, the U.S. EPA, and the IEPA under State authority, retain the right to perform additional studies, to conduct a

complete or partial RI/FS, and/or to enforce the terms of this Consent Order.

E. The Respondents shall provide monthly written progress reports to the U.S. EPA and the IEPA. The past reportable month refers to the month immediately preceding the report submittal date, and the next reportable month refers to the month following the report submittal date (e.g., for a report due February 20, the past reportable month is January, and the next reportable month is March). At a minimum, these monthly written progress reports shall include the following:

1. A description of the action during the past reportable month which has been taken toward achieving compliance with this Consent Order, including all plans and procedures completed, and changes in key personnel;
2. A description of difficulties encountered during the past reportable month, and all actions taken to rectify the difficulties;
3. All results of sampling and tests produced during the past reportable month, relating to the Facility, and subjected to the QA/QC program;
4. Results or a description of sampling and tests produced during the past reportable month, relating to the Facility, but not subjected to the QA/QC program. Results of all such sampl-

ing and tests, whether subjected to the QA/QC program or not, shall be submitted by the next monthly written progress report;

5. All plans, procedures, actions, and data which are scheduled for the next reportable month;

6. Target and actual completion dates for each element of activity, including the project completion, and an explanation of any deviation from the schedules in the RI/FS Work Plan schedule; and

7. A description of any observed change in the cap and site security during the past reportable month, including but not limited to, erosion and leachate.

F. The monthly written progress reports shall be submitted to the U.S. EPA and the IEPA by the twentieth (20) business day of each month following the date of commencement of the work detailed in the RI/FS Work Plan.

X. ADDRESS FOR ALL CORRESPONDENCE

Documents, including reports, approvals, disapprovals and other correspondences to be sent by certified mail or any other form of mail delivery which records the date of receipt to the following addresses, or to such other addresses as the Respondent, the IEPA or the U.S. EPA may hereafter designate for themselves in writing:

A. Documents to be submitted to the U.S. EPA should be sent to:

Richard Boice
Remedial Project Manager
Remedial and Enforcement Response Branch (5HS-11)
U.S. Environmental Protection Agency
Region V
230 S. Dearborn Street
Chicago, Illinois 60604

B. Documents to be submitted to the IEPA should be sent to:

Scott Moyer
Project Manager
Division of Land Pollution Control
Illinois Environmental Protection Agency
2200 Churchill Road
Springfield, Illinois 62706

C. Documents to be submitted to the Respondents should be sent to a name and address to be designated by the Respondents within ten (10) calendar days of the effective date of this Consent Order.

XI. ADDITIONAL WORK

A. In the event that the U.S. EPA, the IEPA or the Respondents determines that additional work, including remedial investigatory work and/or engineering evaluation, is necessary to accomplish the objectives of the RI/FS, written notification of such additional work shall be provided to each of the other parties.

B. Any additional work determined to be necessary by the Respondents shall be subject to approval by the U.S. EPA, in consultation with the IEPA.

C. Any additional work determined to be necessary by the Respondents or the IEPA and approved by the U.S. EPA, or determined to be necessary by the U.S. EPA in consultation with the IEPA, shall be completed by the Respondents in accordance with the standards, specifications, and schedule determined or approved by the U.S. EPA in consultation with the IEPA and shall be incorporated into this Consent Order and made an enforceable part thereof.

XII. COMPLIANCE WITH APPLICABLE LAWS

All work undertaken by the Respondents pursuant to this Consent Order shall be performed in compliance with all applicable Federal and State laws and regulations, including all Occupational Health and Safety Administration and Department of Transportation regulations. The Respondents shall be responsible for obtaining all State or local permits which are necessary for the performance of any work hereunder.

XIII. ACCESS

A. To the extent that the Facility or other areas, where work is to be performed hereunder, is presently owned by parties other than those bound by this Consent Order, the Respondents shall obtain, or shall use their best efforts to obtain, access agreements from the present owners within thirty (30) calendar days of approval of the RI/FS Work Plan. Such agreements shall provide access for the Respondents, the U.S. EPA, the IEPA and authorized representatives of the U.S. EPA and the IEPA, as specified below.

In the event that such access agreements are not obtained within the time referenced above, the Respondents shall so notify the U.S. EPA and the IEPA, in writing, and shall specify the efforts to obtain access, and the responses thereto. If, despite the Respondents' best efforts to obtain access under this provision, the Respondents are unable to obtain access necessary to carry out the terms of this Consent Order, the Director, Waste Management Division, U.S. EPA, Region V agrees to recommend that the U.S. EPA's authority under Section 104(e) of CERCLA be exercised to secure such access on behalf of the Respondents. This agreement shall be subject to the following: (1) The U.S. EPA's determination that Respondents have exercised best efforts to obtain access necessary to carry out the terms of this Consent Order; (2) U.S. EPA guidance, including, but not limited to guidance entitled "Entry and Continued Access Guidance Under CERCLA," dated June 5, 1987; (3) consultation with the U.S. EPA's Office of Regional Counsel, the U.S. EPA's Office of Enforcement and Compliance Monitoring and, to the extent necessary, concurrence by the Department of Justice; and (4) agreement by the Respondents to cooperate with U.S. EPA in the exercise of this authority. The Respondents are advised that the expenses incurred by the United States in gaining access are response costs for which the Respondents may be liable. The U.S. EPA reserves the right to terminate this Consent Order should the Respondents' inability to gain access to the Facility or other areas materially affect the Respondents' ability to perform the work required herein.

B. Authorized representatives of the U.S. EPA and the IEPA shall be allowed access to the Facility and other areas by the Respondents, and as part of any agreement obtained under paragraph A above, for purposes including, but not limited to: inspecting records, operating logs and contracts related to the Facility; reviewing the progress of the Respondents in carrying out the terms of this Consent Order; conducting such tests, inspections, and sampling as the U.S. EPA and the IEPA may deem necessary; using a camera, sound recording, or other documentary type equipment; and verifying the data submitted to the U.S. EPA and the IEPA by the Respondents hereunder. Subject to applicable attorney-client and work product privileges as defined in Section XXI.B., below, the Respondents shall permit such authorized representatives to inspect and copy all records, files, photographs, documents, and other writings, including all sampling and monitoring data, which pertains to this Consent Order. All persons with access to the Facility pursuant to the Consent Order shall comply with approved health and safety plans.

C. Nothing herein shall be construed as restricting the inspection or access authority of the U.S. EPA or the IEPA under any law or regulation.

XIV. PROJECT COORDINATORS

A. On or before the effective date of this Consent Order, the U.S. EPA, the IEPA and the Respondents shall each designate a Project Coordinator. Each Project Coordinator shall be responsible

for overseeing the implementation of this Consent Order. The U.S. EPA Project Coordinator will be the U.S. EPA designated representative at the Facility. The IEPA Project Coordinator will be the IEPA's designated representative at the Facility. To the maximum extent possible, communications between the Respondents, the IEPA and the U.S. EPA, and all documents, reports, approvals and other correspondences concerning the activities performed pursuant to the terms and conditions of this Consent Order, shall be directed through the Project Coordinators. During implementation of the RI/FS Work Plan, the Project Coordinators shall, whenever possible, operate by consensus and shall attempt in good faith to resolve disputes informally through discussion of the issues.

B. The U.S. EPA, the IEPA and the Respondents shall each have the right to change their respective Project Coordinators. Such a change shall be accomplished by notifying each of the other parties in writing at least ten (10) calendar days prior to the change.

C. The U.S. EPA Project Coordinator shall have the authority vested in an On-Scene Coordinator and a Remedial Project Manager (OSC, RPM) by the National Contingency Plan, 40 CFR Part 300, as amended, including the authority to halt, conduct, or direct any work required by this Consent Order, or to direct any response action undertaken by the U.S. EPA when conditions at the Facility may present an imminent and substantial endangerment to the public health or welfare or the environment. In the event that the U.S. EPA Project Coordinator halts or substantially modifies work

specifically required by the Work Plan pursuant to this paragraph, the Respondent may request a modification of the schedule or work described in the RI/FS Work Plan and this Consent Order.

D. The absence of the U.S. EPA or IEPA Project Coordinator from the Facility shall not be cause for stoppage of work.

E. The Project Coordinator for the Respondents or his designated representative shall be on-site during all hours of site work and shall be on call during the pendency of this Consent Order.

XV. SAMPLING AND DATA/DOCUMENT AVAILABILITY

A. The Respondents shall make the results, including raw data, of all sampling and/or tests or other data generated by the Respondents, or on behalf of the Respondents, pursuant to implementation of this Consent Order, available to the U.S. EPA and the IEPA, and shall submit these results in written monthly progress reports as required by Section IX of this Consent Order.

B. At the request of the U.S. EPA or the IEPA, the Respondents shall provide split or duplicate samples to the U.S. EPA or the IEPA of any samples collected by the Respondents pursuant to the implementation of this Consent Order. The Respondents shall notify the U.S. EPA and the IEPA at least ten (10) calendar days or such other time period as may be agreed upon by the project coordinators, in advance of any sample collection activity. If the Agencies take their own samples, they shall provide Respondents a reasonable opportunity to collect split or duplicate samples.

C. Pursuant to applicable Federal laws and regulations, (Section 104(e) of CERCLA and 40 CFR Part 2), the Respondents may assert a confidentiality claim with respect to any or all of the information requested or submitted pursuant to the terms of this Consent Order. Such an assertion must be adequately substantiated when the assertion is made. Analytical data and other information described in Section 104(e)(7)(F) of CERCLA shall not be claimed as confidential by the Respondents. Information determined to be confidential by the U.S. EPA in accordance with applicable Federal laws and regulations will be afforded the full protection provided by such laws and regulations. Information determined to be confidential by IEPA pursuant to applicable State laws and regulations will be afforded the full protection provided by such laws and regulations. If no confidentiality claim accompanies information when it is submitted to the U.S. EPA and the IEPA, or if information claimed as confidential is determined by the U.S. EPA or the IEPA not to be confidential, the information may be made available to the public by the U.S. EPA or the IEPA.

XVI. QUALITY ASSURANCE

A. The Respondents shall use quality assurance, quality control, and chain of custody procedures in accordance with U.S. EPA "Interim Guidelines and Specifications for Preparing Quality Assurance Project Plans" QAMS-005-80 (U.S. EPA, 1980c) throughout all data collection activities.

B. The Respondents shall consult with the U.S. EPA and IEPA Project Coordinators in planning for, and prior to, all sampling and analysis as detailed in the RI/FS Work Plan. In order to provide quality assurance and maintain quality control with respect to all samples collected pursuant to this Consent Order, the Respondents shall:

1. Ensure that the U.S. EPA and IEPA personnel and/or the U.S. EPA and IEPA authorized representatives are allowed access to any laboratories and personnel utilized by the Respondents for analysis;

2. Ensure that all sampling and analyses are performed according to U.S. EPA methods or other methods deemed satisfactory by the U.S. EPA, in consultation with the IEPA; and

3. Ensure that any laboratories utilized by the Respondents for analyses participate in a U.S. EPA quality assurance/quality control program equivalent to that which is followed by the U.S. EPA, and which is consistent with U.S. EPA document QAMS-005-80. As part of such a program, and upon request by the U.S. EPA, such laboratories shall perform analyses of samples provided by the U.S. EPA or the IEPA to demonstrate the quality of analytical data for each such laboratory.

XVII. FORCE MAJEURE

A. The Respondents shall cause all work to be performed within the time limits set forth herein, unless performance is delayed by events which constitute a force majeure. For purposes

of this Consent Order, a "force majeure" is an event beyond the control of the Respondents which delays performance of any obligations required by this Consent Order. Increases of costs shall not be considered circumstances beyond the control of the Respondents.

B. The Respondents shall notify the U.S. EPA and the IEPA by telephone within 24 hours, and in writing no later than five (5) calendar days after any event which the Respondents contend is a force majeure. Such notification shall describe the anticipated length of the delay, the cause or causes of the delay, the measures taken and to be taken by the Respondents to minimize the delay, and the timetable by which these measures will be implemented. The Respondents shall have the burden of demonstrating that the event is a force majeure.

C. If the U.S. EPA, in consultation with the IEPA, agrees that a delay is attributable to a force majeure, the time period for performance under this Consent Order shall be extended for the time period not to exceed that time period attributable to the event constituting the force majeure.

XVIII. STIPULATED PENALTIES

A. The Respondents shall be liable for payment into the Hazardous Substances Superfund administered by the U.S. EPA of the sums set forth below as stipulated penalties for each day that the Respondents fail to commence work or submit a report or document or comply with a schedule in accordance with the requirements contained in this Consent Order, unless U.S. EPA determines that such

delay is attributable to a force majeure as defined in Article XVII above. Such sums shall be due and payable within fifteen (15) calendar days of receipt of notification from the U.S. EPA assessing the penalties. These stipulated penalties shall accrue in the amount of $300 per day for the first seven (7) days, $500 per day for days 8-28, and $700 per day for each day thereafter.

B. The stipulated penalties set forth in paragraph A of this section shall not preclude the U.S. EPA or the IEPA from electing to pursue any other remedy or sanction because of the Respondents' failure to comply with any of the terms of this Consent Order, including a suit to enforce the terms of this Consent Order. Said stipulated penalties shall not preclude the U.S. EPA or the IEPA from seeking statutory penalties up to the amount authorized by law in the event of Respondents' failure to comply with any requirements of this Consent Order.

C. Any stipulated penalties accruing pursuant to this Consent Order shall be paid by certified or cashier's check made payable to the Hazardous Substances Superfund, and shall be remitted to:

U.S. Environmental Protection Agency
Region V
Superfund Accounting
P.O. Box 70753
Chicago, Illinois 60673

Copies of the transmittal of payment shall be sent to the Office of Regional Counsel, SWER Branch Secretary, U.S. EPA, Region V, 230 South Dearborn Street, 5CS-TUB-3, Chicago, Illinois 60604, and to the parties designated in Section X.A. and B., above.

D. The payment of stipulated penalties demanded pursuant to this Article does not preclude U.S. EPA or IEPA from pursuing any other remedies or sanctions which may be available to them by reason of Respondents' failure to comply with any of the requirements of this Consent Order, nor shall payment of said penalties relieve Respondents of the responsibility to comply with this Consent Order. In its discretion, U.S. EPA shall have the right to reduce stipulated penalties provided for in this Agreement.

E. Should Respondents fail to comply with a time requirement of any task required by this Consent Order, the period of noncompliance shall terminate upon Respondents' completion of performance of said requirement. In addition, should Respondents fail to obtain U.S. EPA or IEPA approval of a plan, report or other document required to be submitted for approval pursuant to this Consent Order, the period of noncompliance shall commence upon the date of receipt of notice of disapproval, and shall terminate upon Respondents' submittal of an approvable document to U.S. EPA and IEPA or upon the modification and approval of such document by U.S. EPA and IEPA, whichever is sooner.

XIX. DISPUTE RESOLUTION

A. The parties shall use their best efforts to in good faith resolve all disputes or differences of opinion informally. If, however, any dispute arises concerning this Consent Order which the parties are unable to resolve informally, the Respondents shall

present a written notice of such dispute to the U.S. EPA and the IEPA, which shall set forth specific points of dispute, the position of the Respondents and the technical basis therefor, and any actions which the Respondents consider necessary.

B. Within fourteen (14) calendar days of receipt of such a written notice, the U.S. EPA, in consultation with the IEPA, shall provide a written response to the Respondents setting forth its position and the basis therefor. During the five (5) business days following receipt of the response, the U.S. EPA, the IEPA and the Respondents shall attempt to negotiate in good faith a resolution of their differences.

C. Following the expiration of the time periods described in Paragraph B above, if the U.S. EPA, in consultation with the IEPA, concurs with the position of the Respondents, the Respondents and the IEPA shall be so notified in writing and this Consent Order shall be modified to include any necessary extensions of time or variances of work. If the U.S. EPA, in consultation with the IEPA, does not concur with the position of the Respondents, the U.S. EPA, in consultation with the IEPA, shall resolve the dispute, based upon and consistent with the terms of this Consent Order, and shall provide written notification of such resolution to the Respondents.

D. The pendency of dispute resolution set forth in this Article shall not affect the time period for completion of work and/or obligations to be performed under this Consent Order, except that upon mutual agreement of the U.S. EPA, the IEPA, and

Respondents, any time period may be extended not to exceed the actual time taken to resolve the dispute. Elements of work and/or obligations not affected by the dispute shall be completed in accordance with the schedule contained in the RI/FS Work Plan.

E. Upon resolution of any dispute, whether informally or using the procedures in this Article, any additions or modifications required as a result of such dispute resolution shall promptly be incorporated, if necessary, into the appropriate plan or procedure and into this Consent Order. The Respondents shall proceed with all remaining work according to the modified plan or procedure.

F. In any proceeding to enforce the terms of this Consent Order or to collect penalties for violations thereof, the Respondents may defend on the basis that U.S. EPA's resolution of any properly invoked dispute was arbitrary and capricious or not otherwise in accordance with applicable law.

XX. COMMUNITY RELATIONS AND PUBLIC COMMENT

A. The Respondents shall cooperate with the U.S. EPA and the IEPA in providing RI/FS information to the public. As requested by the U.S. EPA or the IEPA, the Respondents, or their representatives shall cooperate in the preparation of all appropriate information disseminated to the public, and cooperate in preparation for public meetings which may be held or sponsored by the U.S. EPA or the IEPA to explain activities at or concerning the Facility, including the findings of the RI/FS.

XXI. RECORD PRESERVATION

A. The Respondents agree to preserve, during the pendency of this Consent Order, and for a minimum of ten (10) years after termination of this Consent Order, all records and documents in the possession of the Respondents, or in the possession of any division, employees, agents, accountants, contractors, or attorneys of the Respondents, which relate in any way to the RI/FS, and any other sampling and laboratory analysis, and any other activities at the Facility. Upon request by the U.S. EPA or the IEPA, the Respondents shall make available to the U.S. EPA or the IEPA such records, or copies of any such records, subject to Paragraph C of Article XV of this Consent Order, and except those that are subject to applicable attorney-client and attorney work product privileges.

B. For purposes of this Consent Order "applicable attorney-client and attorney work product privileges" do not include investigative reports if they are required by this Consent Order, or sampling data collected and laboratory analysis related to this Facility, even if prepared at the request of one of Respondents' attorneys. Respondents shall provide to the U.S. EPA and IEPA upon request sampling data related to this Facility collected after the effective date of this Consent Order and laboratory analyses of same even if Respondents are not required to collect or analyze said data by this Consent Order.

XXII. CERCLA FUNDING

A. The Respondents waive any claims or demands for compensation or payment under Sections 106(b)(2), 111 and 112 of CERCLA against the United States or the Hazardous Substance Response Trust Fund established by Section 221 of CERCLA for or arising out of any activity performed or expenses incurred pursuant to this Consent Order.

B. This Consent Order does not constitute any decision on preauthorization of funds under Section 111(a)(2) of CERCLA.

XXIII. RESERVATION OF RIGHTS

A. The U.S. EPA and the IEPA reserve all rights and defenses that they may have pursuant to any available legal authority.

B. Nothing herein shall waive the right of the U.S. EPA to enforce this Consent Order, or to take action pursuant to Sections 104, 106(a) and 107 of CERCLA or to take any other action pursuant to applicable Federal and State law. The U.S. EPA and the IEPA reserve the right to take any enforcement action pursuant to CERCLA and/or any available legal authority, including the right to seek injunctive relief, monetary penalties, and punitive damages. In addition, the U.S. EPA reserves the right to undertake any remedial investigation/feasibility study work, and/or any removal, remedial and/or response actions relating to the Facility, and to seek recovery from the Respondents for any costs incurred in undertaking such actions. Nothing herein shall be construed to limit or in any way impair the ability of the U.S. EPA to secure satisfaction of

the work to be undertaken pursuant to this Consent Order in the event the Respondents fail to perform the work in accordance with this Consent Order, SOW or RI/FS Work Plan.

C. Nothing herein is intended to release, discharge, or in any way affect any claims, causes of action or demands in law or equity which the parties may have against any person, firm, partnership or corporation not a party to this Consent Order for any liability it may have arising out of, or relating in any way to, the generation, storage, treatment, handling, transportation, release or disposal of any materials, hazardous substances, hazardous wastes, contaminants, or pollutants at, to, or from the Facility. The parties to this Consent Order expressly reserve all rights, claims, demands, and causes of action they have against any and all other persons and entities who are not parties to this Consent Order, and as to each other for matters not covered hereby.

D. Nothing herein shall be construed to release the Respondents from any liability for failure of the Respondents to perform the RI/FS in accordance with the RI/FS Statement of Work attached hereto and incorporated herein or with the RI/FS Work Plan or any subsequent work plan incorporated herein. The parties further expressly recognize that this Consent Order and the successful completion and approval of the RI/FS do not represent satisfaction, waiver, release, or covenant not to sue, of any claim of the United States or the State of Illinois against the Respondents relating to the Facility, (including claims to require Respondents to undertake further response actions and claims to

seek reimbursement of response costs pursuant to Section 107 of CERCLA) except that, upon receipt of written notice of satisfaction as provided in Article XXVIII of this Consent Order, Respondents shall have no further obligations under this Consent Order.

E. Nothing herein is intended to be a release or settlement of any claim for personal injury or property damage by any person not a party to this Consent Order.

F. The Agencies recognize that the Respondents may have the right to seek contribution, indemnity and/or any other available remedy against any person found to be responsible or liable for contributions, indemnity or otherwise for any amounts which have been or will be expended by the Respondents in connection with the Facility. This Consent Order constitutes an administrative settlement within the meaning of Section 113(f)(2) of CERCLA, provided Respondents are in compliance with this Consent Order.

G. In agreeing to the issuance of and entering into this Consent Order, Respondents do not admit, accept, concede or acknowledge, and specifically reserve the right to contest any determinations, allegations, findings, and conclusions by the Agencies herein, in any proceeding regarding the Facility other than a proceeding brought by U.S. EPA or IEPA. Nothing in this Consent Order may be used in any fashion or admitted into evidence in any proceeding other than to enforce the terms of this Consent Order. Furthermore, Respondents specifically deny any fault or liability under CERCLA or any other statutory or common law and except as otherwise provided in this Consent Order do not, by

signing this Consent Order, waive any right they may have to assert claims under CERCLA against any person, as defined in Section 101(21) of CERCLA, 42 U.S.C. §9601(21). This Consent Order and the Respondents' performance hereunder shall not create any private rights. This Consent Order shall be evidence only of the agreements contained herein. However, nothing in this Consent Order shall prohibit its use by the parties hereto to establish its existence and terms.

XXIV. REIMBURSEMENT OF COSTS

A. The U.S. EPA and the IEPA shall provide the Respondents with an accounting, based on U.S. EPA Financial Management System summary data (SPUR Report) of all response costs incurred by the U.S. EPA, and an accounting by the IEPA prior to the effective date of this Consent Order. Within thirty (30) calendar days of receipt of such accounting, the Respondents shall pay to the U.S. EPA and the IEPA the total sum of their response costs incurred prior to the effective date of this Consent Order.

B. Within thirty (30) calendar days of the end of each twelve (12) month period beginning with the effective date of this Consent Order, the U.S. EPA and the IEPA shall each submit an accounting (SPUR Report and State accounting, respectively) to the Respondents of all response and oversight costs incurred by the U.S. EPA and the IEPA with respect to this Consent Order during the previous twelve (12) month period including, but not limited to, the costs incurred by the U.S. EPA in having a qualified person

oversee the conduct of this RI/FS pursuant to Section 104(a) of CERCLA. Within thirty (30) calendar days of receipt of each such tabulation, the Respondents shall remit a check to the U.S. EPA and/or the IEPA for the full amount of their respective costs.

C. Payment to the U.S. EPA for response and oversight costs incurred by the U.S. EPA shall be made to the order of the Hazardous Substance Superfund forwarded to the U.S. EPA, Region V, Attn: Superfund Accounting, P.O. Box 70753, Chicago, Illinois 60673. Copies of all payments to the U.S. EPA shall be provided at the time of such payments to the U.S. EPA Project Coordinator and to: U.S. EPA, Region V, SWER Branch, Attention: SWER Branch Secretary, Office of Regional Counsel, 5CS-TUB-3, 230 South Dearborn Street, Chicago, Illinois 60604.

D. Payment to the IEPA for response and oversight costs incurred by the IEPA shall be payable to "Treasurer, State of Illinois, for deposit in the Hazardous Waste Fund", and forwarded to: Illinois Environmental Protection Agency, Division of Administration, Fiscal Services Section, 2200 Churchill Road, Springfield, Illinois 62794-9276. A copy of the transmittal letter and check shall be sent to the IEPA Project Coordinator.

E. The U.S. EPA and the IEPA reserve the right to bring an action against the Respondents for recovery of any future costs incurred by the United States or the State of Illinois in connection with any response activities conducted or to be conducted at the Facility, other than those response activities

completed pursuant to this Consent Order to the satisfaction and approval of the U.S. EPA in consultation with the IEPA.

XXV. INDEMNIFICATION OF THE UNITED STATES

A. The Respondents agree to indemnify and save and hold the United States Government and the State of Illinois Government, their agencies, departments, agents, and employees, harmless from any and all claims or causes of action arising from, or on account of, acts or omissions of the Respondents, their officers, employees, receivers, trustees, agents, or assigns, in carrying out the activities pursuant to this Consent Order.

B. Neither the U.S. EPA nor the IEPA is a party to any contract involving the Respondents at the Facility.

XXVII. EFFECTIVE DATE

This Consent Order shall become effective, after signature by the parties hereto with U.S. EPA as the final signatory, on the date that U.S. EPA sends notification that this Consent Order is effective, in writing, to the Respondents.

XXVIII. SUBSEQUENT AMENDMENT

In addition to the procedures set forth in Sections XI, XIV, XVII, and XIX of this Consent Order, this Consent Order may be amended by mutual agreement of the U.S. EPA in consultation with the IEPA and the Respondents. Any amendment of this Consent Order shall be in writing, signed by the U.S. EPA, IEPA and the

Respondents and shall have as the effective date that date on which such amendment is signed by the U.S. EPA.

XXIX. TERMINATION AND SATISFACTION

A. With the exception of those Sections relating to Record Preservation, CERCLA Funding, Reservation of Rights, Reimbursement of Costs and Indemnification, the provisions of this Consent Order shall be deemed satisfied upon receipt by the Respondents of written notice from the U.S. EPA that the Respondents have demonstrated that all of the terms of this Consent Order, including any additional work, modifications or amendments, have been completed in accordance with the terms hereof to the satisfaction of the U.S. EPA in consultation with the IEPA. Upon such demonstration by the Respondents, said written notice shall not be unreasonably withheld or delayed.

IT IS SO AGREED:

BY: John Roger Crawford November 6, 1989
Date

Name of signatory: JOHN ROGER CRAWFORD

Title: CORPORATE DIRECTOR ENVIRONMENTAL CONTROL

Respondent: OUTBOARD MARINE CORPORATION

Address: 100 SEAHORSE DRIVE, WAUKEGAN, IL 60085

Respondents and shall have as the effective date that date on which such amendment is signed by the U.S. EPA.

XXIX. TERMINATION AND SATISFACTION

A. With the exception of those Sections relating to Record Preservation, CERCLA Funding, Reservation of Rights, Reimbursement of Costs and Indemnification, the provisions of this Consent Order shall be deemed satisfied upon receipt by the Respondents of written notice from the U.S. EPA that the Respondents have demonstrated that all of the terms of this Consent Order, including any additional work, modifications or amendments, have been completed in accordance with the terms hereof to the satisfaction of the U.S. EPA in consultation with the IEPA. Upon such demonstration by the Respondents, said written notice shall not be unreasonably withheld or delayed.

IT IS SO AGREED:

BY: Gerald K Burger 11-2-89
Date

Name of signatory: Gerald K. Burger

Title: Vice President

Respondent: Browning-Ferris Industries of Illinois, Inc.

Address: c/o Thomas P. Healy, Jr.
Mayer, Brown & Platt
190 South LaSalle St.
Chicago, Illinois 60603

Respondents and shall have as the effective date that date on which such amendment is signed by the U.S. EPA.

XXIX. TERMINATION AND SATISFACTION

A. With the exception of those Sections relating to Record Preservation, CERCLA Funding, Reservation of Rights, Reimbursement of Costs and Indemnification, the provisions of this Consent Order shall be deemed satisfied upon receipt by the Respondents of written notice from the U.S. EPA that the Respondents have demonstrated that all of the terms of this Consent Order, including any additional work, modifications or amendments, have been completed in accordance with the terms hereof to the satisfaction of the U.S. EPA in consultation with the IEPA. Upon such demonstration by the Respondents, said written notice shall not be unreasonably withheld or delayed.

IT IS SO AGREED:

BY: _____ Oct 24, 1989
Date

Name of signatory: Henry G. Tucker Jr.

Title: N/A

Respondent: N/A/H

Address: 2 S. Wacker Chicago IL 60675

Respondents and shall have as the effective date that date on which such amendment is signed by the U.S. EPA.

XXIX. TERMINATION AND SATISFACTION

A. With the exception of those Sections relating to Record Preservation, CERCLA Funding, Reservation of Rights, Reimbursement of Costs and Indemnification, the provisions of this Consent Order shall be deemed satisfied upon receipt by the Respondents of written notice from the U.S. EPA that the Respondents have demonstrated that all of the terms of this Consent Order, including any additional work, modifications or amendments, have been completed in accordance with the terms hereof to the satisfaction of the U.S. EPA in consultation with the IEPA. Upon such demonstration by the Respondents, said written notice shall not be unreasonably withheld or delayed.

IT IS SO AGREED:

BY: Haig Paravonian 10/31/87
Date

Name of signatory: Haig Paravonian

Title: Mayor, City of Waukegan, Illinois

Respondent: City of Waukegan

Address: 106 N. Utica, Waukegan, Illinois 60085

BY: _____ _____
Date

Name of signatory: _____

Title: _____

Respondent: _____

Address: _____

BY: _____ _____
Date

Name of signatory: _____

Title: _____

Respondent: _____

Address: _____

BY: _____ _____
Date

Name of signatory: _____

Title: _____

Respondent: _____

Address: _____

BY: Clifton D. Warner 10-27-89
Date

Name of signatory: Cliffton D. Warner

Title: Associate Superintendent for Business Affairs

Respondent: Waukegan Public Schools District 60

Address: 1201 N. Sheridan Rd., Waukegan, IL 60085

YEOMAN CREEK LANDFILL FACILITY
LAKE COUNTY
WAUKEGAN, ILLINOIS

IT IS SO ORDERED AND AGREED:

Illinois Environmental Protection Agency

BY: Bernard P. Killian — 11/29/89

Bernard P. Killian — **Date**
Director

BY: [signature] — 12/14/89

Basil G. Constantelos, Director — **Date**
Waste Management Division
U.S. Environmental Protection Agency, Region V

EFFECTIVE DATE:

YEOMAN CREEK LANDFILL FACILITY
LAKE COUNTY
WAUKEGAN, ILLINOIS

ATTACHMENT I

STATEMENT OF WORK FOR CONDUCTING A REMEDIAL INVESTIGATION AND FEASIBILITY STUDY AT THE YEOMAN CREEK LANDFILL SITE, LAKE COUNTY, ILLINOIS

This document is the Statement of Work (SOW) for conducting a Remedial Investigation (RI) and Feasibility Study (FS) at the Yeoman Creek Landfill NPL site located in Lake County, Illinois. The purpose of this SOW is to provide the direction and intent of the RI/FS. Within 60 days of the effective date of the Consent Order a RI/FS Work Plan will be submitted that provides detailed guidance on the execution of the RI/FS.

The purpose of the RI is to investigate the site's physical characteristics, identify the sources of contamination, and determine the nature and extent of contamination at the Yeoman Creek Landfill site. The purpose of the FS is to develop and evaluate remedial action alternatives based on the RI data and report. All personnel, materials, and services required to perform the RI/FS will be provided by the Potentially Responsible Parties (PRPs).

The tasks described herein are grouped into the following three categories:

- Plans and Management,
- Remedial Investigation (RI), and
- Feasibility Study (FS).

The Work Plan developed pursuant to this SOW will present a phased, iterative approach that recognizes the interdependency of the RI and FS. The overall organization and interactive nature of this approach are illustrated in Figure 1, the flow chart for the remedial selection process. Please note that the activity sequence depicted in Figure 1 is not consistent with the topical sequence of presentation in this SOW.

The primary intent of the phased approach is to minimize the need for conducting post-FS or supplemental RI/FS activities by thorough characterization of the migration pathways and early identification of the site specific data requirements associated with the applicable remedial technology.

Brief discussions of the major RI/FS tasks are presented, by major topical categories, in the following sections.

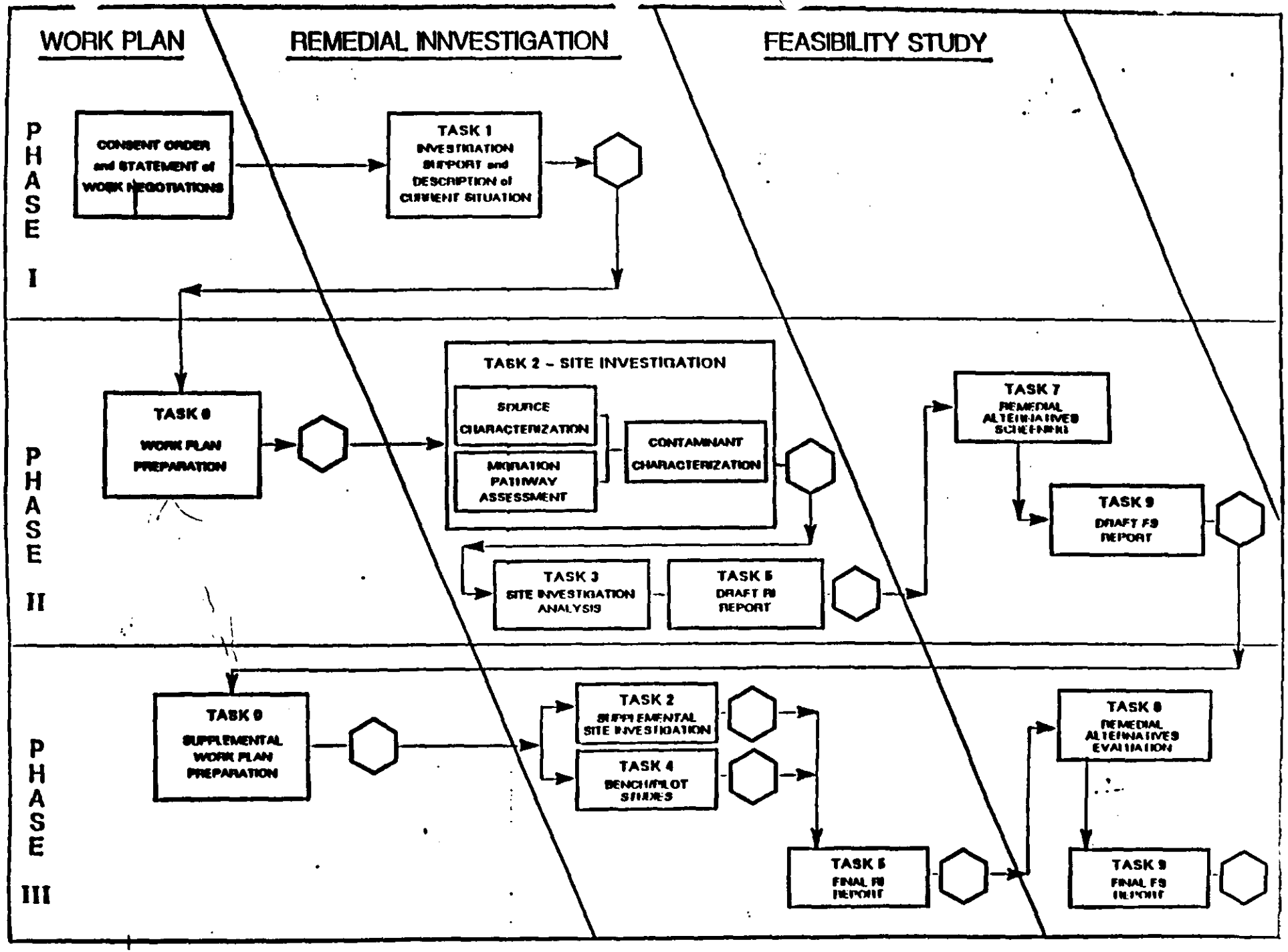


FIGURE 1. PROPOSED REMEDIAL SELECTION PROCESS IN ACCORDANCE WITH SARA

I.

PLANS AND MANAGEMENT

A. RI/FS WORK PLAN PREPARATION

A RI/FS Work Plan will be prepared for the Yeoman Creek Landfill site that details the technical approach, personnel requirements, and schedule for each task described in this SOW. The schedule will show the implementation of tasks and submission of deliverables in weeks subsequent to regulatory (e.g., U.S. EPA and Illinois Environmental Protection Agency (IEPA)) approval and acceptance of prior deliverables. Incorporated into this Work Plan will be the following specific plans:

1. Access Restriction and Erosion Control Measures Plans

A plan for restriction of site access by installation of a security fence around the site and by properly posting the site shall be prepared. The fence must comply with the following specifications:

- The fence in nature shall be at least six (6) feet tall with an additional one (1) foot section of barbed wire strands. The fence must be constructed in accordance with Section 629 of the Illinois Department of Transportation reference manual titled: "Standard Specifications for Road and Bridge Construction"(SSRBC) dated July 1, 1988. The barbed wire section shall also be consistent with the specifications shown in Figure 2.

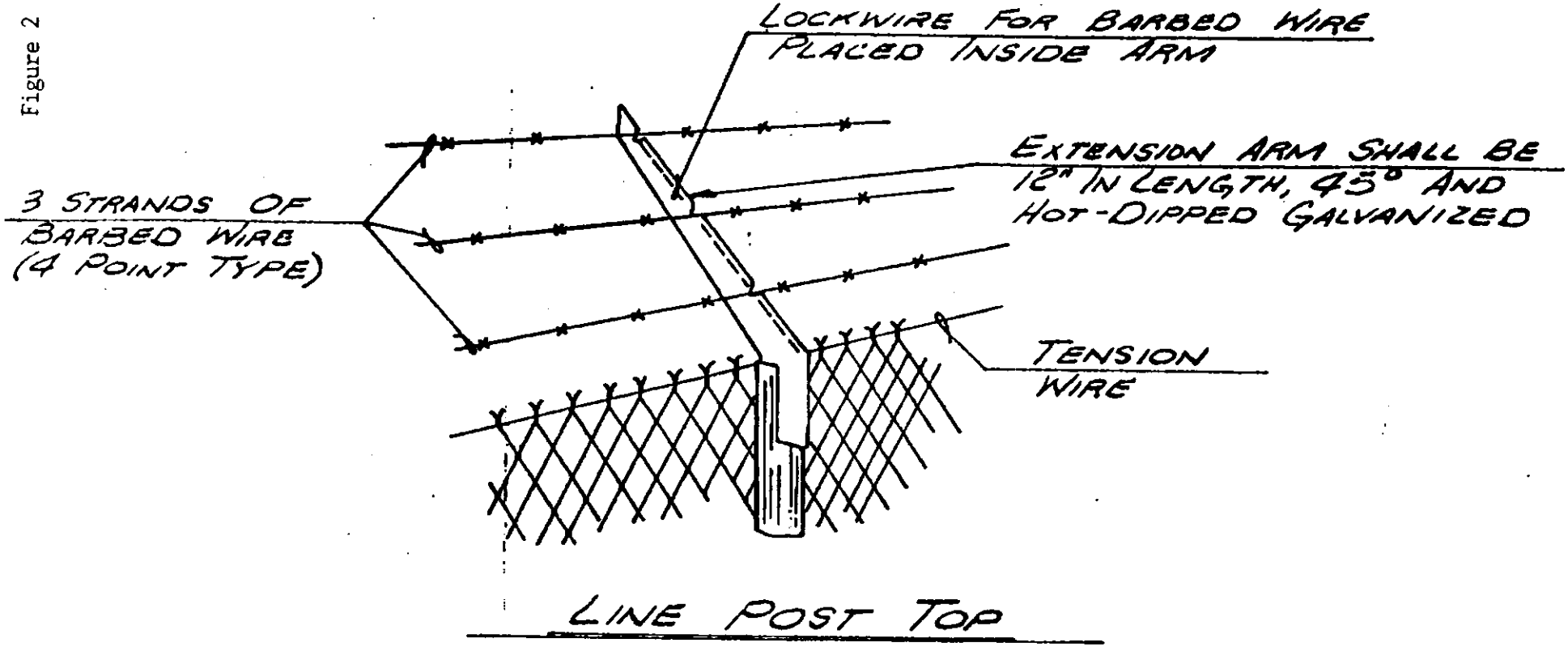
- Materials to be used shall meet the requirements of applicable portions of Articles 710.33 and 710.34(b) of the SSRBC.

- The fence must surround the entire filled area as shown on Figure 3 and must not contact any portion of the filled area, except for the eastern portion of the site consisting of Butrick Road east to the eastern boarder of the site and south to Pine Avenue. There must be at least a five (5) foot buffer zone between the fence and the landfill where possible. The fence must not inhibit public right-of-ways such as city streets.

The plan must include a map showing the perimeter in which the fence shall be placed. The Plan shall include the design details, gate locations, sign locations, access considerations, consideration of impacts and permits required for any wetland filling and any other special considerations.

Two large, approximately 20 foot long erosion cuts exist along the western border of the filled area, east of Yeoman Creek. A plan shall be prepared to provide for construction of erosion control measures at these cuts by filling and installation of coarse aggregate, and stone or concrete riprap, and revegetation as needed in order to prevent further erosion of these cuts by site drainage. The materials used shall be consistent with applicable

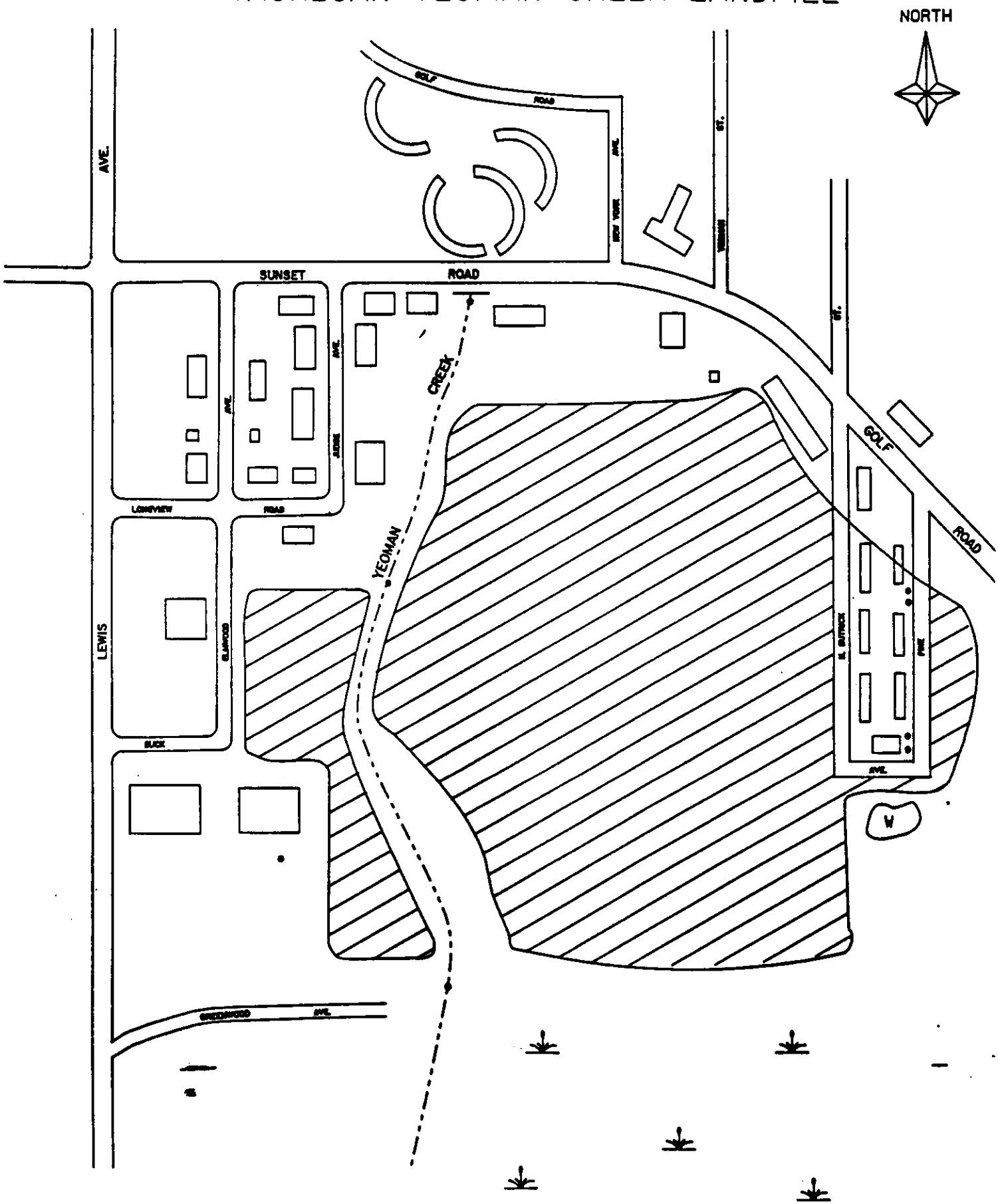
Figure 2



LINE POST TOP

Figure 3

WAUKEGAN YEOMAN CREEK LANDFILL



portions of Section 704 and 705 of the SSRBC and must resist being washed away during high flows in Yeoman Creek.

The Respondents shall be responsible for the safety and well-being of contractors involved in implementation of the work described in these Plans.

The Plans shall also provide for periodic inspections of the landfill cap and fence during completion of the RI/FS.

2. Field Sampling Plan

A Sampling Plan that addresses all data acquisition activities will be prepared. The plan will contain a statement of sampling objectives and equipment specifications, required analyses, sample types, and sample locations and frequency. The plans will address specific hydrologic, hydrogeologic, and air transport characterization methods including, but not limited to, geologic mapping, geophysics, field screening, drilling and well installation, flow determination, and sampling. The application of these methods will be described for each major subtask within the site investigation (e.g., waste characterization, migration pathway assessment, and contaminant characterization).

In addition, the plan will identify the data requirements of specific remedial technologies that may be necessary to evaluate remedial alternatives in the FS. It will include an evaluation explaining what additional data are required to adequately characterize the site, evaluate the no-action alternative, and support the feasibility study. It will provide a schedule stating when events will take place and when deliverables will be ready.

3. Quality Assurance Project Plan

A Quality Assurance Project Plan (QAPP), prepared in accordance with current U.S. EPA guidance, will be appended to the Sampling Plan. The QAPP will describe the project and project personnel organization and responsibilities. It will include quality assurance objectives for data (precision, accuracy, completeness, representativeness, comparability, and intended use) and specify sampling procedures, locations, parameters, number of samples, and sample custody.

The QAPP will specify the type and frequency of calibration procedures for field and laboratory instruments; the type and frequency of internal quality control checks; the type and frequency of quality assurance performance audits and system audits; the preventive maintenance procedures and schedule; specific procedures to assess data precision, representativeness, comparability, accuracy, and completeness of specific measurement parameters, and corrective action procedures for field and laboratory instruments.

The QAPP will also describe how the data will be documented and tracked, including documentation materials and procedures, financial reporting procedures, and documents.

4. Health and Safety Plan

A Health and Safety Plan to protect the health of personnel involved in site activities and the surrounding community, will be developed on the basis of site conditions and be consistent with the following regulations and guidance:

- 20 CFR 1910.120 (i) (2) - Occupational Health and Safety Administration: Hazardous Waste Operations and Emergency Response, Interim Rule, December 19, 1986.
- U.S. EPA Order 1440.2 - Health and Safety Requirements for Employees Engaged in Field Activities.
- U.S. EPA O 1440.3 - Respiratory Protection.
- U.S. EPA Occupational Health and Safety Manual.
- *U.S. EPA Interim Standard Operating Procedures* (September, 1982).

The health and safety plan shall provide information on provisions to protect site visitors, personnel responsibilities, protective equipment, procedures, protocols, decontamination methods, and medical surveillance.

5. Endangerment Assessment Plan

An Endangerment Assessment Plan will be developed quantifying the risks posed by the Yeoman Creek Landfill site and analyzing the public health impacts of the remedial alternatives. The methodology presented in this plan will conform to the Superfund Public Health Evaluation Manual (ICF, 1986).

6. Data Management Plan

A Data Management Plan will be developed to document and track investigative data and results. The plan will identify and establish laboratory and data documentation materials and procedures, project file requirements, and project-related progress reporting procedures and documents.

7. ATSDR Health Assessment

The Work Plan for the site shall also provide for collection of adequate information to support the ATSDR Health Assessment required by SARA. Since the health assessment will be prepared by ATSDR, all draft Work Plans and support documents will be submitted for ATSDR review and comment to ensure that their needs and requirements are being met. In the event that the health assessment has already been completed by ATSDR, the RI report will include and address the findings of that report.

B. PREPARATION AND SUBMISSION OF PLANS

As shown in Figure 1, the preparation of the project plans will be preceded by an evaluation of the existing information and initiation of investigative support activities (Task 1).

The Work Plan will be submitted in accordance with the schedule defined in Section VIII (Work to be Performed) of the Consent Order. Specifically, the RI/FS Work Plan will be developed and implemented in conformance with all provisions of the Consent Order, this SOW, and the standards set forth in the following statutes, regulations, and guidance:

- Section 121 of SARA,
- U.S. EPA "Guidance on Remedial Investigations under CERCLA," dated May 1985, as amended,
- U.S. EPA "Guidance on Feasibility Studies under CERCLA," dated May 1985, as amended,
- The National Contingency Plan, dated November 1985, as amended, and
- Any additional guidance documents provided by the U.S. EPA.

****

II.

REMEDIAL INVESTIGATION

A. Objectives

The objectives of the RI are to:

- Characterize the source(s) of potential contamination;
- Characterize the hydrogeologic setting to determine the most likely contaminant migration pathways and physical features that could effect potential remedial actions;
- Determine the migration rates, extent, and characteristics of any contamination that may be present at the site: and
- Gather data and information to the extent necessary and sufficient to quantify the risk to public health and the environment and to

support the development and evaluation of viable remedial alternatives in the FS.

B. Scope

The scope of the Remedial investigation consists of six tasks:

Task 1: Description of Current Situation and Investigative Support

Task 2: Site Investigation

Task 3: Site Investigation Analyses

Task 4: Bench/Pilot Testing Studies

Task 5: Reports

Task 6: Community Relations Support

Each of these tasks is described in the following sections.

TASK 1 - INVESTIGATIVE SUPPORT AND DESCRIPTION OF CURRENT SITUATION

1. *Information and Data Gathering*

a. *Site Mapping*

Prepare an accurate topographic map of appropriate working scale. A base map of the site with a scale of 1 inch to 100 feet (1" - 100') and 2-foot contour intervals will be prepared from this topographic map. The base map will illustrate the locations of wetland areas, floodplains, water features, drainage patterns, tanks, buildings, utilities, paved areas, easements, right-of-ways, and other pertinent features. Larger scale maps will be produced from the base map as necessary.

In addition to the topographic map, a grid plan will be prepared using the base map and grid overlay. This grid plan will show the location of existing monitoring wells, sampling locations, and water supply wells. These maps will require surveying to establish horizontal and vertical controls for sites of the work relative to the National Geodetic Vertical Datum of 1929.

Review and verify in the field the legal description of the property. The intent is not to perform a boundary survey, but to locate the boundaries so that future activities do not carry over onto adjacent property without proper permission.

b. Metes and Bound

Assemble a legal description of the site from existing county and township records and results of the site survey.

c. Access Arrangements

Make the necessary arrangements to guarantee access to the site and surrounding parcels. These arrangements will include negotiating access agreements with landowners and obtaining demarcation clearance for all buried utilities and construction of access roads.

d. Preparation of Support Facilities

Initiate and implement the necessary arrangements to construct support facilities and/or procure the equipment necessary to performing a hazardous site investigation. This includes preparation of decontamination facilities, utility hook-ups, and site access control stations.

e. Description of Current Situation

Gather and describe the background information pertinent to the site and its environmental concerns, further detailing the purpose of the RI. The data gathered during previous investigations will be reviewed and evaluated. Regional information will be obtained from available USGS and Illinois State Geologic Survey reports. The existing site information to be reviewed will include but not necessarily be limited to:

- Illinois Department of Natural Resource and Environmental Protection Agency files.
- Lake County Soil Conservation Service reports.
- Aerial photographs.
- Historical water quality data.
- U.S. and Illinois State Geological Survey files.
- Disposal records (if available).

In addition to this literature search, on-site activities may be used to confirm and/or update certain information. For example, existing monitoring wells may be inspected to determine if they are functional and the location and status of selected water supply wells field verified.

2. Preparation of Preliminary Site Evaluation Report

Information and data that are gathered during these initial steps will be used to generate a preliminary Site Evaluation Report that will address the following:

a. A summary of the site background that includes the pertinent boundary conditions, general site physiography, hydrology, and geology as well as a complete history of waste disposal activities and ownership transfer on the site.

b. The nature and extent of the problem that includes a summary of actual or potential on-site and off-site health and environmental effects. This report will emphasize threats or potential threats to the public health.

c. The history of response actions that includes a summary of response actions conducted by local, state, or private parties.

d. A definition of boundary conditions that includes site boundary conditions that limit the areas of investigation. The boundaries will be set so that the on-site activities will cover the contaminated media in sufficient detail to support the FS. Boundaries for site access control and site security will also be identified. The boundaries of the study area may or may not correspond to the property boundaries.

e. Identification of potential receptors that includes the identification of private and public water supply wells within a two mile radius of the site. If possible, obtain the well construction details for these wells and other private water supply wells that may have been previously sampled and prepare a table summarizing the known construction details to submit with the original drilling logs.

f. Develop a site conceptual model that includes a description of the physical site conditions as to geology, meteorology, hydrology and hydrogeology. All subsequent site investigation activities will refine and validate this model. The conceptual model will focus on the groundwater flow system and will be based on the depositional history, inferred recharge and discharge mechanisms, estimated topographic and hydraulic gradients, and existing and last land use patterns.

As shown in Figure 1, the Investigative Support and Description of Current Situation (Task 1) will be conducted prior to, or concurrent with, the Work Plan Preparation (Task 0). The Preliminary Site Evaluation Report will be submitted as supporting documentation with the Work Plan.

TASK 2 - SITE INVESTIGATIONS

Investigations necessary to characterize the site and its actual or potential hazard to public health and the environment will be conducted and result in data of adequate technical content to support the development and evaluation of remedial alternatives during the FS. Investigation activities will focus on problem definition and data to support the screening of remedial technologies, alternative development and screening, and detailed evaluation of alternatives.

The site investigation activities will follow the Plans set forth in Task 0. All sample analyses will be conducted at laboratories following EPA protocols or their equivalents. Strict chain of custody procedures will be followed, and all samples will be located on the site map (and grid system) established under Tasks 0 and 1. A description of the types of investigations that will be conducted is presented below.

a. Source Characterization and Preparation of Technical Memorandum.

An investigation will be carried out to characterize the physical and chemical aspects of the waste materials and the materials in which they are contained. The investigation of these source areas will involve obtaining data related to:

- Waste characteristics (type, quantity, chemical and physical properties, and concentrations) and
- Facility characteristics (type and integrity of containment, leachate collection systems, and drainage control).

This information will be obtained from a combination of existing site information, field inspection, and site sampling activities. Field investigations may be necessary to determine the integrity of the landfill covers.

The source characterization will culminate in the preparation and submittal of a Technical Memorandum. This memorandum will summarize the findings of the source characterization and will recommend parameters, or classes of parameters, that will be the focus of subsequent contaminant characterization studies.

b. Migration Pathway Assessment and Preparation of Technical Memorandum.

The migration pathways at the Yeoman Creek Landfill site will be physically characterized through the following types of investigations:

Hydrogeology - A hydrogeology study will further evaluate the subsurface geology and characteristics of the water bearing formations. This study will define the site hydrostratigraphy, controlling geologic features, zones of preferential groundwater transmission, and the distribution of hydraulic heads within the water bearing formations. The results of this study will be combined with the existing site data described in the preliminary site evaluation report, and the results of the source characterization, to define the groundwater flow patterns and to predict the vertical and lateral extent of contaminant migration. These predictions will form the rationale for locating and designing monitor wells and the subsequent contaminant characterization.

Hydrology - Drainage patterns and runoff characteristics will be evaluated for potential erosional transport. Staff gauges may be used to evaluate the hydraulic connection between surface water bodies and the groundwater flow system and to determine the potential for sediment transport.

Soils and Sediments - The physical characteristics of the site soils and aquatic sediments will be evaluated. Some elements of this investigation may overlap with the hydrogeology and the hydrology investigations.

Air - The potential for airborne particle transport will be evaluated to determine if an atmospheric testing program over and above that required to assure protection of the site workers and surrounding community, should be initiated at later project stages. This information will be derived from a combination of existing data and information and data resulting from the field investigations.

The Migration Pathway Assessment will culminate in the preparation and submittal of a Technical Memorandum describing the findings of the assessment. This memorandum will contain specific recommendations for the location and design of monitoring stations (i.e., wells, air quality samplers, surface water samplers, etc.).

c. Contaminant Characterization

Data generated from the Pathway Assessment and Source Characterization will be used to design an environmental sampling and analyses program. The objective of this program is to evaluate the extent and magnitude of contaminant migration along the pathways of concern at the Yeoman Creek Landfill Site.

Monitoring points will be installed in each media previously identified as a migration pathway. This monitoring network may incorporate several of the piezometers and/or gauges installed during the Pathway Assessment. The analytical parameters list used in this subtask will be based on the data collected during the source characterization. The selection of parameters or classes of parameters (i.e., volatile organics, metals, PCBs/pesticides, etc.) will be based upon their source concentration and their persistence and mobility within the most likely pathway of migration. Provisions will be made for conducting full Hazardous Substance List (HSL) analyses at those monitoring stations where there is a reasonable anticipation of detecting a complex contaminant profile. All samples will be collected, handled, and analyzed in accordance with the protocols and procedures described in the site QAPP.

As shown in Figure 1, provisions will be made for conducting additional site investigation activities after the completion of the Remedial Alternatives Screening (Task 7). These supplemental investigations are intended to further characterize the sources, pathways, and/or contaminants and to satisfy the specific data requirements of the applicable remedial actions. The Plans for these investigations and the Bench/Pilot Studies (Task 4) will be prepared and submitted for Agency comment and approval after the completion of Task 7.

TASK 3 - SITE INVESTIGATION ANALYSES

An analyses of all data collected during this investigation will be made to assure that the quality (e.g., QA/QC procedures have been followed) and quantity of data adequately support the Endangerment Assessment and FS. The results of the site investigations will be organized and presented in a report that summarizes the type and extent of on-site contamination and submitted to U.S. EPA and IEPA as the Preliminary Data Transmittal.

Based upon the specific chemicals and ambient levels at the site, the number and location of the surrounding population, and migration pathways, a second report, the Endangerment Assessment, will be conducted by the responsible parties to evaluate the actual or potential threat to human health, welfare, or the environment. Actual or potential risks will be quantified whenever possible. A general outline of work for the Endangerment Assessment follows:

- Select target chemicals for evaluation based on their degree of contribution to the risks associated with the site.

- Conduct exposure assessments that include the identification of acute and chronic hazards of concerns and the population(s) at risk.

- Evaluate existing toxicity information and determine the potential acute and chronic effects of the site contaminants as well as the specific effects such as carcinogenicity, reproductive dysfunction, teratogeny, neurotoxicity, and other metabolic alterations; and environmental effects of aquatic and terrestrial toxicities.

- Assess impact by identifying acceptable exposure guidelines or standards, comparing estimated doses with these guidelines or standards. For target chemicals at the site that are designated as carcinogens by EPA, use EPA's evaluations to estimate the increased cancer risks.

This assessment will be conducted in accordance with the procedures described in the Superfund Public Health Evaluation Manual (ICF, 1986).

TASK 4 - BENCH/PILOT TESTING STUDIES

Bench and piloting scale testing studies will be performed as necessary to determine the applicability of selected remedial technologies to site specific conditions. These may include treatability and cover studies, aquifer testing, and/or material compatibility testing. As shown on Figure I, these

studies will be conducted in the later stages of the RI after the initial screening of remedial technologies and actions.

TASK 5 - REPORTS

1. Progress Reports

Monthly progress reports will be prepared to describe the technical progress of the RI. These reports shall be submitted to the U.S. EPA and IEPA in accordance with the provisions of Section IX.E. of the Consent Order.

2. Technical Memorandums

The results of specific remedial investigation activities such as the Migration Pathway Assessment, Source Characterization, Endangerment Assessment, etc., will be submitted in draft form to the U.S. EPA and IEPA throughout the RI process. All responses to U.S. EPA and IEPA comments concerning memorandum issues will be addressed in letters from the Respondent Project Coordinator to the U.S. EPA Remedial Project Manager and will be summarized in the draft RI report. The specific technical memorandums and their associated schedule of submittal will be identified in the project Work Plan (Task 0).

3. Remedial Investigation Report

A final report covering the remedial investigations, the Remedial Investigation Report (RI), will be prepared. The RI will characterize the site and summarize the data collected and the conclusions drawn from investigative Tasks 1 through 3. The report will be submitted in draft form for review and comment. Upon receipt of comments, a draft final report will be prepared and submitted. The RI report will not be considered final until a letter of approval is issued by the U.S. EPA Remedial Project Manager.

TASK 6 - COMMUNITY RELATIONS SUPPORT

A community relations program will be implemented jointly by the U.S. EPA and the IEPA. The responsible parties will cooperate with the U.S. EPA and the IEPA in providing RI/FS information to the public. The responsible parties will, at the request of the U.S. EPA or IEPA, participate in the preparation of information distributed to the public, such as fact sheets by the U.S. EPA or the IEPA to describe activities at, or concerning, the site, including the findings of the RI/FS.

Community relations support will be consistent with Superfund community relations policy as stated in the "Guidance for Implementing the Superfund Program" and Community Relations in Superfund - A Handbook.

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III.

FEASIBILITY STUDY

A. Scope

The purpose of the FS for the Yeoman Creek Landfill site is to develop alternative remedial actions, based upon the results of the RI, that will mitigate impacts to public health and welfare and the environment.

The FS will conform to Section 121 of SARA, the NCP as amended, the FS Guidance as amended, and U.S. EPA policy. The FS is comprised of the four tasks:

Task 7: Remedial Alternatives Screening
Task 8: Remedial Alternatives Evaluation
Task 9: Feasibility Study Report

The intent and purpose of each of these tasks is outlined in the following sections; the technical approach and schedule is detailed in the RI/FS Work Plan (Task 0).

B. Tasks

TASK 7 - REMEDIAL ALTERNATIVES SCREENING

This task constitutes the first stage of the FS and is comprised of six interrelated subtasks. The goal is to develop and evaluate remedial alternatives for additional screening and evaluation. The Public Health Evaluation results will be considered throughout the evaluation process.

Subtask 7A - Preliminary Remedial Technologies

A master list of potentially feasible technologies will be developed that includes both on-site and off-site remedies. The master list will be screened according to site conditions, waste characteristics, and technical requirements, in order to eliminate or modify those technologies that may prove extremely difficult to implement, require unreasonable time periods, or rely on insufficiently developed technology. Emerging technologies being evaluated through the U.S. EPA's Site Program will also be considered if that information is available. The results of this task will be summarized in a Technical Memorandum that will be submitted to the U.S. EPA and the IEPA.

Subtask 7B - Development of Alternatives

1. Developing Remedial Response Objectives

   Develop site-specific objectives based on public health and environmental concerns for the Yeoman

Creek Landfill site, the description of the current situation, information gathered during the RI, Section 300.68 of the National Contingency Plan (NCP), U.S. EPA's interim guidance, and the requirements of any other applicable U.S. EPA, Federal, and State environmental standards, guidance and advisories as defined under Section 121 of SARA. Preliminary cleanup objectives will be developed under formal consultation with the U.S. EPA and the IEPA.

2. Assembling Alternatives for Remedial Actions

Develop a comprehensive, site-specific approach for Remedial Action by assembling combinations of identified technologies that include the following:

a. Treatment alternatives for source control that eliminate the need for long-term management (including monitoring).

b. Alternatives involving treatment as a principal element to reduce the toxicity, mobility, or volume of waste.

Develop at least two additional alternatives that include the following:

c. An alternative that involves containment of waste with little or no treatment but protects human health and the environment primarily by preventing exposure to, or reducing the mobility of, the waste.

d. A no action alternative.

For groundwater response actions, a limited number of remedial alternatives will be developed within a performance range defined in terms of a remediation level. The targeted remediation level is the risk range of 10^{-4} to 10^{-7} for maximum lifetime risk and includes different rates of restoration. If feasible, one alternative that would restore groundwater quality to a 10^{-6} risk for maximum lifetime risk level within five years will be configured.

The remedial action alternatives developed for the Yeoman Creek Landfill site may involve both source control and groundwater response actions. In these instances, the two elements may be formulated together so that the comprehensive remedial action is effective and the elements complimentary. Because each element has different requirements, each will be detailed separately in the development and analyses of alternatives.

Subtask 7C - Initial Screening of Alternatives

1. Initial Screening Considerations

The alternatives developed under Subtask 7B will be subjected to an initial screening to narrow the list of potential remedial actions for detailed analyses; the rationale for eliminating alternatives will be included. Initial screening considerations include:

a. Effectiveness - degree to which the alternative to protects human health and the environment; attains Federal and State ARARs or other applicable criteria, advisories, or guidance; significantly and permanently reduces the toxicity, mobility, or volume of the hazardous constituents and are technically reliable and effective in other respects. Reliability considerations include the potential for failure and the need to replace the remedy.

b. Implementability - degree to which the alternatives is technically feasible and employs available technologies; the technical and institutional ability to monitor, maintain, and replace the technology over time, and the administrative feasibility of implementing the alternative.

c. Cost - evaluation of construction and long-term costs to operate and maintain the alternative based on conceptual costing information. At this stage of the FS, cost will be used as a factor when comparing alternatives that provide similar results, but not when comparing treatment and non-treatment alternatives. Cost will, however, be a factor in the final remedial selection process, however as described in Subtask 8B, Section 1, paragraphs (c) and (d).

2. Intent of Alternatives Screening

The initial screening of alternatives incorporating treatment will be conducted with the intent of preserving the most promising alternatives as determined by their likely effectiveness and implementability further analyses. The screening should result in a range of alternatives remaining for further analyses as described previously in Subtask 7B(2).

Innovative alternative technologies will be carried through the screening if there is a reasonable belief they offer either the potential for better treatment performance or implementability, fewer or less adverse impacts than other available approaches, or lower costs for similar performance than the demonstrated technologies.

The containment and no-action alternatives will be carried through the screening process to the detailed analyses.

Subtask 7D - Remedial Alternatives Array Document

To obtain ARARs from IEPA, a detailed description of alternatives (including the extent of remediation, contaminant levels to be addressed, and method of treatment) will be prepared. This document will also include a brief site history and background, a site characterization that indicates the contaminants of concern, migration pathways, receptors, and other pertinent site information. A copy of this Alternative Array Document will be submitted to the U.S. EPA and the IEPA along with the request for a notification of the standards.

Subtask 7E - Community Relations Program

A program for community relations support will be developed. The program will be consistent with the Community Relations Program developed under Task 6 and with the conditions set forth in the Consent Order.

Subtask 7F - Data Requirements

Data requirements specific to the relevant and applicable technologies will be identified. These requirements will focus on providing data needed for the detailed evaluation and development of a preferred alternative.

TASK 8 - REMEDIAL ALTERNATIVES EVALUATION

The contractor will conduct a detailed analysis of alternatives which will consist of an individual analysis of each alternative against a set of evaluation criteria and a comparative analysis of all options against the evaluation criteria with respect to one another.

The evaluation criteria are as follows:

Overall Protection of Human Health and the Environment addresses whether or not a remedy provides adequate protection and describes how risks posed through each pathway are eliminated, reduced, or controlled through treatment, engineering controls, or institutional controls.

Compliance with ARARs addresses whether or not a remedy will meet all of the applicable or relevant and appropriate requirements of other Federal and State environmental statutes and/or provide grounds for invoking a waiver.

Long-Term Effectiveness and Permanence refers to the ability or a remedy to maintain reliable protection of human health and the environment over time once cleanup goals have been met.

Reduction of Toxicity, Mobility, or Volume Through Treatment is the anticipated performance of the treatment technologies a remedy may employ.

Short-Term Effectiveness addresses the period of time needed to achieve protection and any adverse impacts on human health and the environment that may be posed during the construction and implementation period until cleanup goals are achieved.

Implementability is the technical and administrative feasibility of a remedy, including the availability of materials and services needed to implement a particular option.

Cost includes estimated capital and operation and maintenance costs, and net present worth costs.

State Acceptance (Support Agency) addresses the technical or administrative issues and concerns the support agency may have regarding each alternative.

Community Acceptance addresses the issues and concerns the public may have to each of the alternatives.

The individual analysis should include: (1) a technical description of each alternative that outlines the waste management strategy involved and identifies the key ARARs associated with each alternative; and (2) a discussion that profiles the performance of that alternative with respect to each of the evaluation criteria. A table summarizing the results of this analysis should be prepared. Once the individual analysis is complete, the alternatives will be compared and contrasted to one another with respect to each of the evaluation criteria.

An alternative that is preferred, but does not meet the Federal or State public health or environmental ARARs, will be selected only when:

1. The alternative is an interim remedy and will become part of a more comprehensive final remedy that will meet the Federal and State ARARs.

2. Compliance with the ARAR will result in a greater risk to human health and the environment than the alternative options.

3. Compliance with the requirements is technically impractical.

4. The alternative will attain a standard of performance that is equivalent to that required under the otherwise applicable standard,

requirement, or limitation through the use of another method or approach.

5. The State has not consistently applied or demonstrated the intent to consistently apply the requirement at other similar facilities across the state.

The evaluation of alternatives to select the appropriate remedy will, in addition to meeting the required findings in Section 300.68(h)(1) of the NCP and reflecting the preferences in Section 300.68(h)(2) of the NCP, also consider and weigh the full range of factors in Section 300.68(e)(2) of the NCP. The selected alternative will represent the best balance across all evaluation criteria.

TASK 9 - FINAL FS REPORT

The FS will be prepared in a draft report and submitted for review and comment. Upon receipt of comments, a draft final FS report will be prepared and submitted. The FS report will not be considered final until a letter of approval is issued by the U.S. EPA Remedial Project Manager. Deliverables and technical memorandums prepared previously will be summarized and referenced in order to limit the size of the report. The report will completely document the FS and the process by which the recommended remedial alternative was selected.