

SPECIFICATION
FOR THE
ASBESTOS ABATEMENT AND
DEMOLITION OF BUILDINGS
AT
KINGSLEY AVENUE TRANSPORTATION BUILDING
AND
SOUTH WASHINGTON STREET BUILDING

PROJECT NO. 92-103.01 & .03

MAY 1994

PREPARED BY
FACILITIES MANAGEMENT
ENGINEERING DESIGN

NIAGARA MOHAWK POWER CORPORATION
300 ERIE BOULEVARD WEST
SYRACUSE, NEW YORK 13202

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Prepared By

Maureen E. Hain

Approved By

Peter M. Nelson, P.E.

RETIREMENT ORDER	4655
	4665
BUDGET NO.	8321
FILE INDEX	4.2-K3
	4.2-W25

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MAY 1994

ASBESTOS ABATEMENT SPECIFICATIONS & PLANS

PREPARED BY:

JACK EISENBACH ENGINEERING, P.C.
291 GENESEE STREET
UTICA, NEW YORK 13501



DEMOLITION PLANS

PREPARED BY:

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ENGINEERING DESIGN
NIAGARA MOHAWK POWER CORPORATION
300 ERIE BOULEVARD WEST
SYRACUSE, NEW YORK 13202

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DIVISION 0

BIDDING AND CONTRACT DOCUMENTS

A-PROPOSAL

- 1 Bidders shall submit bids on unaltered proposal forms (which include bid forms) if furnished by NMPC. All blank spaces shall be filled in without erasure or reservation.
- 2 Failure to include all requested information will cause the bidder's proposal to be considered non-responsive.
- 3 When a bid form is not furnished by NMPC, then all bids shall be submitted under the bidder's company letterhead and signed by a duly authorized representative of the bidder. Any bids or alternates not submitted in such a manner will be considered invalid.
- 4 In all cases, proposals shall be signed with the signatory's name typed below the signature. Unsigned proposals shall be considered invalid.
- 5 The bid original and one copy shall be mailed to System Purchasing Department, NMPC, 300 Erie Boulevard West, Syracuse, New York 13202. Use bid sticker provided.

B-INFORMATION REQUIRED WITH PROPOSAL

- 1 Bidder shall submit a complete list of subcontractors and suppliers to be used on this project. Each subcontractor is subject to acceptance by NMPC before any work is awarded to the successful bidder.
- 2 Bidder shall submit a construction schedule with the bid.

C-ALTERNATE BIDS AND SUBSTITUTIONS

- 1 No modifications to, or deviations from, the bid specification shall be made unless authorized by NMPC Addendum. Bids shall be submitted using all criteria specified.
- 2 Should a bidder desire to propose an alternate in addition to the requested bid, he shall include with his alternate a description of the design substitution that he proposes, with sufficient data to establish its validity, including cost adjustment as an additive or deductive amount to his base bid. NMPC reserves the right to accept or reject any or all substitutions at NMPC's discretion and such decisions shall be final.
- 3 Any drawings or sketches included with this request for quotation are to be considered as part of the Specification.

D-DOCUMENTS

- 1 When a bidder declines to bid, all bidding documents, including specifications and drawings, must be returned to NMPC along with an explanation as to why a bid will not be submitted.

E-BID DUE DATE

- 1 No bid will be considered if received later than 4:00 p.m. on the due date unless an extension of time has been granted previously by NMPC Purchasing. No extension will be granted within one week of the due date.

F-EXTENSION OF BID DUE DATE

- 1 Bidders may be allowed extension of time should the allotted bid due date appear unrealistic for the proper submission of a bid. Any request for such an extension of time should be made as soon as possible but in no event later than one week prior to the due date. All such requests shall be directed to NMPC, Purchasing Department.

G-RIGHT TO REJECT

- 1 NMPC reserves the right to open bids privately and to reject any or all proposals. No liability or obligation of any kind shall be attached to NMPC by reason of such rejection.

H-DRAWINGS

- 1 NMPC reserves the right to reproduce any and all drawings or prints considered necessary for engineering, construction or other purposes which are received from the successful bidder after award of contract, despite any notice to the contrary appearing on such drawings or prints.

I-BID EXPIRATION

- 1 All bids shall be valid for a period of not less than 90 days.

J-ITEMIZATION

- 1 The Contractor agrees to further itemize the contract price when requested by NMPC.

K-ESTIMATED QUANTITIES

- 1 Any items and respective quantities provided by NMPC in the itemized contract price schedule, are strictly engineering estimates to indicate the scope of the project and are not firm.

L-DOCUMENT EXAMINATION

- 1 Should a bidder find discrepancies in, or omissions from, the bidding documents or should he be in doubt as to their meaning, he shall at once request clarification from NMPC.

M-EXCEPTIONS

- 1 Bidder agrees to all provisions contained in the bid documents unless exceptions are specifically and clearly listed in the contractor's bid. All such exceptions must be listed together and specifically identified as EXCEPTIONS. Bidder's printed terms and conditions are not considered specific exceptions.

N-PRE-BID MEETING

- 1 NMPC may call a pre-bid meeting during the bid period. Notification of the meeting will be forwarded to all bidders of record. Failure to attend may result in rejection of the bidder's proposal.

O-START OF WORK

- 1 The successful bidder shall commence the work within five days after receipt of a purchase order or notice of award, or in accordance with the schedule submitted in the bidder's proposal.

SECTION 00210 - CONSTRUCTION PROGRESS REPORTS

PART 1 - GENERAL

1.1 Condition:

- A. Construction Reports shall be submitted with the bid.

PART 2 - PROCEDURES

2.1 Construction Report (Bar Chart)

- A. Item No. - Activities listed are sequentially numbered (1, 2, etc.)
- B. Activities - Activities listed are to be consistent with the breakdown of the items in the Contractors Proposal.
- C. Duration - Each activity requires a duration denoted by an open bar; identify duration by calendar days, week ending or months. When progress is reported, the open bar is filled in accordingly. (If the actual progress is 20%, then fill in 20% of bar).
- D. Provide separate construction progress report for each work location (see Section 0101, 3.C.)

END

[illegible]

SCHEDULED
COMPLETED

PROJECT SUMMARY

PROJECT MGR.

% SCHEDULED:

CONTRACTOR.

PROJECT ENG.

% COMPLETED:

CONTRACT AWARD \$

CONSTR. SUPT.

SCHEDULED COMP. DATE:

CONTRACT CHANGES \$

CONSTR. CRD.

PROJECTED COMP. DAT.

CONTRACT TOTAL \$

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SECTION 00300 - PROPOSAL FORM

FOR

KINGSLEY AVENUE TRANSPORTATION BUILDING AND
SOUTH WASHINGTON STREET ASBESTOS ABATEMENT AND
BUILDING DEMOLITIONS
SEE ATTACHED PLANS

PROJECT NUMBER 92-103.01 & .03

Date:

Name of Bidder

Address

City, State, Zip Code

Niagara Mohawk Power Corporation
300 Erie Boulevard West
Syracuse, NY 13202

Gentlemen:

The undersigned herewith submits a bid pursuant to your Contract Drawings and Specifications for the specific applicable contract for Building Demolitions at Kingsley Avenue Transportation Building, Rome, NY, and South Washington Street Gas Regulator Building, Herkimer, NY.

This Bidder has carefully examined the site of the Work, the Specifications and the Drawings referred to in the Specifications, and proposes and agrees, if this bid is accepted, to contract with Niagara Mohawk Power Corporation to fulfill all the obligations of the Contractor as set forth in the Specifications and the Drawings, including Addenda No. ____, ____, ____, issued thereto and receipt of which is hereby acknowledged, and to do all work in the manner and time described therein, and to accept in full payment therefore, the following lump sum price adjusted by the extra work unit prices as agreed to with the Corporation, all as defined in the following schedules.

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SECTION 00300 - PROPOSAL FORM (Continued)

KINGSLEY AVENUE TRANSPORTATION BUILDINGS

NMPC Acct. No. 144.32 (Removals)

<u>ITEM</u>	<u>DESCRIPTION</u>	<u>QUOTATION</u>
1.	Asbestos Abatement	\$ _____
2.	Building Demolitions and Removals to existing grade	\$ _____
3.	Building Demolitions and Removals from existing grade to 12" below existing grade.	\$ _____
4.	Select Fill (quantity to be included in this line amount is 1000 cubic yards)	\$ _____
SUBTOTAL		\$ _____

Other (List Items Not Specifically Referenced Above)

_____	\$ _____
_____	\$ _____
_____	\$ _____
TOTAL LUMP SUM	\$ _____

ALTERNATIVE NO. 1

DEDUCT from the total lump sum amount quoted
above if the NMPC site soil characterization
which is currently being performed, results in
waiver of OSHA 29CFR1910.120 training require-
ments for below grade removals.

\$ _____

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SECTION 00300 - PROPOSAL FORM (Continued)

SOUTH WASHINGTON STREET BUILDING

NMPC Acct. No. 144.32 (Removals)

<u>ITEM</u>	<u>DESCRIPTION</u>	<u>QUOTATION</u>
1.	Asbestos Abatement	\$ _____
2.	Building Demolitions and Removals to existing grade	\$ _____
3.	Building Demolitions and Removals from existing grade to 12" below existing grade.	\$ _____
4.	Select Fill (quantity to be included in this line amount is 20 cubic yards)	\$ _____

SUBTOTAL \$ _____

Other (List Items Not Specifically Referenced Above)

_____ \$ _____
_____ \$ _____
_____ \$ _____

TOTAL LUMP SUM (REMOVALS) \$ _____

ALTERNATIVE NO. 1

DEDUCT from the total lump sum amount quoted
above if the NMPC site soil characterization
which is currently being performed results in
waiver of OSHA 29CFR1910.120 training requirements
for below grade removals. \$ _____

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SECTION 00300 - PROPOSAL FORM (Continued)

ACKNOWLEDGMENTS:

Accompanying this proposal is the following (please acknowledge by checking):

1. Proposal Demolition/Construction Schedule ☐ Yes ☐ No
2. Substitutions to items specified (cost savings and/or schedule improvements. ☐ Yes ☐ No
3. Site visitation acknowledgement ☐ Yes ☐ No
4. Provision for full time Construction Superintendent by this Contractor for duration of "contracted work". ☐ Yes ☐ No
5. Acceptance of conditions as specified. ☐ Yes ☐ No
6. Exceptions ☐ Yes ☐ No

If "yes", please advise with explanation of conditions and how it affects the Lump Sum Total Price: (Note: Please provide sufficient information for evaluation transmitted on company letterhead.

7. Certificate of Insurance ☐ Yes ☐ No

LABOR RATES

Itemize below labor rates of all trades that will be utilized under this contract.

Straight Time

<u>Labor Type</u>	<u>Rate</u>
<hr/>	<hr/>
<hr/>	<hr/>
<hr/>	<hr/>
<hr/>	<hr/>

Overtime

<u>Labor Type</u>	<u>Rate</u>
<hr/>	<hr/>
<hr/>	<hr/>
<hr/>	<hr/>
<hr/>	<hr/>

KINGSLEY AVENUE AND S. WASHINGTON STREET
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SECTION 00300 - PROPOSAL FORM (Continued)

EXTRA WORK UNIT PRICE SCHEDULE

In the event that changes from the original Drawing and Specifications are necessary and require an increase in the work covered by the bidding documents contained herein, adjustment will be subject to approval by the Owner. The undersigned agrees to receive and accept from the Owner the unit price compensations as listed below. These unit prices shall include all costs for furnishing, transporting and placing all materials including equipment necessary to complete the work. The Owner reserves the right to remove any or all items listed below from the Contract prior to award of bid.

The following unit prices apply to each item as described.

<u>ITEM</u>	<u>DESCRIPTION OF WORK</u>	<u>UNIT PRICE</u>
1.	Concrete block, metal panels, walls, etc. removal and disposal off site	\$ _____ /Truckload
2.	Reinforced concrete floors removal and disposal off site	\$ _____ /C.Y.
3.	Glass - Windows, etc. removal and disposal off site	\$ _____ /Truckload
4.	Foundation Walls and Footings removal and disposal off site	\$ _____ /C.Y.
5.	Miscellaneous Materials Removal and Disposal Off Site a) Structural Steel b) Miscellaneous Steel	\$ _____ /Net Ton \$ _____ /Net Ton
6.	Additional Excavation	\$ _____ /C.Y.
7.	Crushed Stone compacted to finish grade	\$ _____ /C.Y.
8.	Select Fill including compaction	\$ _____ /C.Y.

Other items as deemed appropriate by Contractor (describe)

_____	\$ _____ /
_____	\$ _____ /
_____	\$ _____ /

SECTION 00300 - PROPOSAL FORM (Continued)

SCHEDULE OF COMMENCEMENT AND COMPLETION

We agree, if awarded the Contract, to commence the work as noted in Section 01010 - Summary of the Work not later than 5 calendar days after receipt of a written notice from the Owner that this Proposal has been accepted. The work shall progress with all reasonable speed and diligence to be fully completed as per Section 01010, Item 1.3, Work Schedule.

NOTE: Insurance certificates must be on file with NMPC before a Purchase Order will be issued.

EQUAL EMPLOYMENT OPPORTUNITY CLAUSE

We understand Section 00700, Paragraph 724, of the Specifications which deals specifically with Equal Employment Opportunity, and, if awarded the Contract, will strictly adhere to said clause.

SUBCONTRACTORS AND SUPPLIERS

We plan to use the following subcontractors and suppliers for operations as indicated:

WORK TO BE PERFORMED

SUBCONTRACTOR'S & SUPPLIER'S NAME & ADDRESS

The Bidder agrees that this bid is to continue open for acceptance and is irrevocable until 90 days from the Bid Due Date.

CONTRACTOR'S LICENSE NUMBER _____

EXPIRATION DATE _____

Name, Signature and Title of Individual Preparing Bid

Name of Bidder (Firm, Corporation or Company)

Address

City, State, Zip Code

Telephone

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710 GENERAL

711 DEFINITIONS

1. "Owner," "Corporation," or "Purchaser" shall mean—
Niagara Mohawk Power Corporation
300 Erie Boulevard West
Syracuse, New York 13202

2. "Contractor" or "Vendor" shall mean the party or parties, and their legally appointed representatives, successors and assigns, entering into this Contract with the Owner.
3. "Work" shall mean and include equipment, apparatus, machinery, and/or material supplied together with all of the work to be executed, whether temporary or permanent, under this Contract. It shall also mean the place and methods of working, where the context so indicates.
4. "Contract" shall mean the written agreement between the Owner and Contractor, including all documents therein specified and all "Contract Changes" pursuant to Section 00733. It contains the entire agreement between the Owner and Contractor.
5. "Project" shall mean an Owner-defined objective, to be completed within a specified time and cost, of which the Work performed under this contract may be the whole or a part.

712 DESCRIPTION OF WORK

The Contractor shall furnish all labor and materials, perform all work, and provide everything incidental, requisite or proper for performance of the Work, all as specified in this Contract, and shall produce finished Work free from all defects or inadequacies in design, workmanship and materials. All materials shall be of suitable quality and all operations of the Contractor shall be conducted, performed and carried to completion efficiently, skillfully and safely.

713 INTENT AND APPLICATION OF CONTRACT DOCUMENTS

1. All component parts of the Contract are intended to be complementary and contain the entire agreement between the parties. The Contract consists of the following parts, which, in the event of conflict between them, are listed in descending order of precedence:
1. Contract Changes, if any.
2. Form of Agreement, if any.
3. Purchase Order.
4. General Conditions of Contract.
5. Supplementary Conditions, if any.
6. Drawings, if any.
7. Specification (Divisions 1-16), if any. Conflicts between different divisions of the specification shall be resolved by the Owner.

714 WORK PERFORMED BY OTHERS

1. The Contractor shall not assign this Contract, nor sublet any portion of the Work, nor assign any moneys payable under this Contract, without first obtaining the written consent of the Owner. Any assignment or subletting by the Contractor without written consent of the Owner shall be considered null and void from its inception. Any Owner-authorized assignment or subletting shall not relieve the Contractor of the responsibility for full compliance with the requirements specified in the Contract.
2. The Owner reserves the right to award other contracts or perform work at the site. At no time shall the Contractor restrict the movement of other personnel and equipment in the performance of their work. In case of interference between the operations of different contractors, the Owner will determine the rights of each contractor and the sequence of work necessary to expedite the completion of the entire Project. Any decision which results in a deviation from Contract requirements constitutes a "Contract Change" (Section 00733).

715 TERMINATION

The Owner may, in its sole discretion, terminate, in whole or in part, this Contract or the Contractor's performance services hereunder, or both, at any time in accordance with the provisions set forth herein. The Owner may exercise its right of partial termination hereunder any number of times.

715 TERMINATION (CONTINUED)

.1 For Default/Forfeiture

- .1 If the Work to be done shall be abandoned by the Contractor, or if this Contract be assigned or sublet by him without Owner's previously obtained written consent, or if he loses control of the Work from any cause, excepting acts of God and the public enemy, or if the Contractor refuses or neglects to provide sufficient and properly skilled or other labor, sufficient materials of proper quality, or fails in any respect to prosecute the Work with diligence, or if the contractor is violating any of the conditions or covenants of this Contract or is not executing this Contract in good faith, or is not executing or performing the Work on schedule in accordance with Section 00731.1 or Section 00731.2, or should the Contractor or any subcontractor directly, or indirectly, cause a disruption of Work, or should his presence result in a disruption of the Work being performed on the Project, or should Contractor become insolvent, the Owner may, by written notice to the Contractor, terminate, in whole or in part, this Contract or the Contractor's performance of services hereunder, or both. Such termination will be effective upon the date set forth in the written notice and, upon receipt of said notice, the Contractor immediately shall turn over and deliver to the Owner all technical data and other information and materials relating to the terminated services which are within the Contractor's possession or control. The Contractor understands and agrees that, in the event the Contractor fails or refuses to comply with the turnover and delivery obligations set forth herein, the Contractor shall not be entitled to any amounts due and owing as of the date of termination for services previously rendered under this Contract until such turnover has been fully complied with by the Contractor.
- .2 Upon termination for default, the Owner may take over the terminated Work and prosecute the same to completion. In such event, the Contractor and its insurers shall be liable to the Owner for all direct transitional administrative costs and expenses incurred by the Owner to engage another contractor and for all costs to complete the said terminated Work.
- .3 Subject to the provisions in Section 00715.1.1, the Contractor's compensation in the event of termination for default shall be limited to the amounts for services rendered up to the date of termination as provided for in Section 00731.3. No amount shall be paid or payable by the Owner for the Contractor's termination costs, including but not limited to demobilization costs, costs associated with the transfer or termination of personnel, or loss of anticipated profit.
- .4 If, after notice of termination hereunder, it is determined for any reason that the Contractor was not in default in the performance of any obligation hereunder, the rights and obligations of the parties shall be the same as if the notice of termination had been originally issued pursuant to Section 00715.2.

.2 For Convenience

- .1 The Owner may, at any time for any reason, by written notice to the Contractor, terminate, in whole or in part, this Contract or the Contractor's performance of services hereunder, or both. Such termination will be effective upon the date set forth in the written notice and, upon receipt of said notice, the Contractor immediately shall turn over and deliver to the Owner, all technical data and other information and materials related to the terminated services which are within the Contractor's possession or control. The Contractor understands and agrees that, in the event it fails or refuses to comply with the turnover and delivery obligations set forth herein, the Contractor shall not be entitled to any amounts due and owing as of the date of termination for services previously rendered under this Contract as well as any amounts otherwise payable hereunder for termination costs until such turnover has been fully complied with by the Contractor.
- .2 Upon termination hereunder and subject to the provisions in Section 00715.2.1, the Owner shall pay (a) all amounts due and owing up to the effective date of termination, and (b) an amount, mutually agreed upon between the Owner and the Contractor, representing the Contractor's costs and expenses incurred as a result of the termination. Such amounts shall in no event include an item or claim for loss of anticipated profit.

.3 Partial Termination

Upon any exercise by the Owner of its rights of partial termination, the parties shall mutually agree upon appropriate adjustments, if any, to the provisions of this Contract which are directly affected by any such partial termination.

716 CONTRACT SUBJECT TO APPROVAL BY COMMISSIONS

This Contract is entered into subject to authorization by, or requirements of, regulatory commissions or bodies having jurisdiction in respect to this Contract.

717 FAMILIARITY WITH THE WORK AND RELATED CONDITIONS

- .1 The Contractor shall carefully examine the Contract documents and shall make a thorough investigation of the conditions at the location of the Work. This investigation by the Contractor shall include the implementation and completion of all actions with the Owner and any appropriate parties necessary to obtain information regarding the type and location of concealed utilities, appurtenances, and other facilities at the location of the Work.
- .2 The Contractor shall acquaint himself and be familiar with the practices, conditions, and procedures established and accepted in the building and construction industry prevailing in the area and applicable at the jobsite for the installation of similar types of Work and shall perform the Work such as not to cause disruption of other Work at the Work location.
- .3 The Owner assumes no responsibility whatsoever for ascertaining for the Contractor any facts which the Contractor can ascertain for himself through such investigation.
- .4 The Contractor agrees that he will make no claim for additional payment or extension of time for completion of the Work because of any failure on his part to perform such investigation and to include the results of such investigation in establishing the Contract Price and Schedule.

718 ALCOHOL AND DRUG ABUSE POLICY FOR CONTRACTORS

- 1 Acceptance of this Contract by Contractor establishes that Contractor employees and employees working under Contractor's direction or subcontract will not bring, use, distribute, sell or possess illegal drugs or alcoholic beverages when working at Owner's facilities. The term "employee" as used herein shall include the employee of any subcontractor or anyone working under or providing material under contractor's prime Contract with Owner.
- 2 Furthermore, Contractor employees will be expected to be fit for duty at all times during their assignment and shall not be under the influence of alcohol or drugs. Additionally, Contractor shall not assign any individual in violation of this policy to work assignments for the Owner and if Contractor discovers any of its employees are in violation of these requirements it shall remove any such employee forthwith.
- 3 Violation of these requirements by Contractor employees shall result in denial of access of Owner's facilities and equipment; and in the case of possession, use or sale of illegal drugs, shall be reported to the Owner's Security Department immediately.

719 THIRD PARTY BENEFICIARY, WAIVER, SEVERABILITY

- 1 *No Third-Party Beneficiary*—Except as specifically provided herein, no person or party shall have any rights or interest, direct or indirect, in this Contract or the services to be provided hereunder, or both, except the Owner and the Contractor. The parties specifically disclaim any intent to create any rights in any person or party as a third-party beneficiary to this Contract or the services to be provided hereunder, or both.
- 2 *Waiver*—No waiver or modification of any of the provisions of this Contract shall be deemed to have been made by either party unless expressed in writing and signed by an officer of the waiving or modifying party. No express waiver or modification in any specific instance as provided herein shall be construed as a waiver or modification of future instances, unless specifically so provided in the required writing. The failure of either party to insist in any one or more instances upon the strict performance of any of the provisions of this Contract or to exercise any right herein shall not be construed as a waiver or relinquishment for the future of such strict performance of such provision or the exercise of such right.
- 3 *Severability*—The invalidity or unenforceability of any portion or provision of this Contract shall in no way affect the validity or enforceability of any other portion or provision hereof. Any invalid or unenforceable portion or provision shall be severed from the Contract and the balance of the Contract shall be construed and enforced as if the Contract did not contain such invalid or unenforceable portion or provision.

720 NOTICES

Unless otherwise provided for in the Contract, any legal or contractual notice required to be given to either party shall be deemed duly given when written and delivered personally or when sent by registered or certified mail, postage prepaid, to the intended party at the following address or at such changed addresses as may from time to time be designated in a notice similarly delivered or mailed:

- 1 In the case of the Owner, to:
Niagara Mohawk Power Corporation
300 Erie Boulevard West
Syracuse, New York 13202
Attention: Vice President—Purchasing
- 2 In the case of the Contractor, to the address provided in the Purchase Order.

721 GOVERNING LAWS/REGULATIONS**722 COMPLIANCE WITH APPLICABLE LAWS**

- 1 The Contractor shall comply with all applicable federal, state and local laws, ordinances, rules, regulations, permits, licenses, and requirements thereunder in connection with performance of the Work.
- 2 The Contractor shall save the Owner harmless from all liability resulting from violations of said laws, ordinances, rules, regulations, permits and licenses.
- 3 If the Contractor observes that any requirement specified in this Contract is at variance with any governing laws, ordinances, rules, regulations, permits, or licenses, he shall promptly notify the Owner in writing before incurring any further liability, expense, or obligation for the Contractor or the Owner.

723 PERMITS AND LICENSES

The Contractor shall, at his own expense, obtain any necessary permits and licenses, unless otherwise specified in this Contract, and shall be responsible for conducting his operations in accordance with the provisions of such permits and licenses.

724 EQUAL EMPLOYMENT OPPORTUNITY

- 1 The provisions of the following laws, Executive Orders, and any rules and regulations issued thereunder, are incorporated herein by reference as part of this Contract:
 - 1 Paragraphs one (1) through seven (7) of Section 202 of Executive Order 11246, as amended, relating to equal opportunity in employment under government contracts and subcontracts;
 - 2 Section 2012 of Title 38 of the United States Code and Executive Order 11701, as amended, relating to affirmative action obligations of government contractors and subcontractors for disabled veterans and veterans of the Vietnam era;
 - 3 Section 503 of the Rehabilitation Act of 1973, and Executive Order 11758, as amended, relating to affirmative action obligations of government contractors and subcontractors for handicapped workers; and
 - 4 The Human Rights Law of the State of New York (Article 15 of the Executive Law).
- 2 The Contractor agrees to fully comply with such provisions, and any amendments thereof. In addition, all subcontracts and agreements that the Contractor enters into to accomplish the Work under the terms of this Contract shall obligate such subcontractors to comply with such provisions.

725 FEDERAL SUBCONTRACTING REQUIREMENTS

- .1 The provisions of the following laws, Executive Orders, and any rules and regulations issued thereunder, are incorporated herein by reference as part of this Contract:
 - .1 Executive Order 11625, as amended, relating to utilization of minority business enterprises in the performance of government contracts and subcontracts;
 - .2 Executive Order 12138, as amended, relating to utilization of women-owned businesses in the performance of government contracts and subcontracts; and
 - .3 Section 211 of Public Law 95-507, as amended, relating to utilization of small business concerns and small disadvantaged business concerns in the performance of government contracts and subcontracts.
- .2 The Contractor agrees to fully comply with such provisions and any amendments thereof. In addition, all subcontracts and agreements that the Contractor enters into to accomplish the Work under the terms of this Contract shall obligate such subcontractors to comply with such provisions.

726 PLACE OF CONTRACT EXECUTION AND GOVERNING LAWS

- .1 This Contract shall be deemed to be executed in the State of New York and shall be interpreted, performed and enforced according to the laws of the State of New York.
- .2 Only the courts in the State of New York shall have jurisdiction over this Contract and any controversies arising out of this Contract. Any controversies arising out of this Contract shall be submitted only to the courts in the State of New York.
- .3 The Contractor hereby submits to the jurisdiction of the courts in the State of New York for the purposes of interpretation and enforcement of this Contract. The Contractor hereby waives personal service by manual delivery and agrees that service of process on the Contractor in any action arising out of this Contract may be made by registered or certified mail, return receipt requested, directed to Contractor at the Contractor's address set forth on the purchase order.

727 ENVIRONMENTAL PROTECTION

The Contractor agrees to comply with all federal, state, and local laws, rules, and regulations pertaining to the preservation and protection of the environment, and to bear fully all civil and criminal penalties that may arise from the Work or operations of the Contractor, whether such penalties are assessed against the Owner or the Contractor. The Contractor further agrees to promptly restore and repair, at the Contractor's expense, any damage inflicted upon the environment during performance of the Work.

728 SAFETY COMPLIANCE

The Contractor shall comply with all applicable requirements of the Occupational Safety and Health Act of 1970 (P.L. 91-596), as amended, and regulations thereunder and perform the Work in strict accordance with the Niagara Mohawk Accident Prevention Rules. The Niagara Mohawk Accident Prevention Rule Book is available for review on request. The Contractor shall indemnify and hold harmless the Owner from all liability, civil and criminal, resulting from violations of these requirements.

729 FIRE PROTECTION

The Contractor is responsible for and shall provide adequate fire protection for the Work. In the performance of the Work, the Contractor shall comply with the good practices recommended in National Fire Protection Association Standard 241 and other national consensus standards for fire safety on construction projects, in addition to any special procedures otherwise specified in this Contract to meet existing site conditions.

730 IMPLEMENTATION OF CONTRACT**731 PLANNING AND CONTROL**

- .1 The Contractor understands that **TIME IS OF THE ESSENCE** and agrees to furnish and complete all the Work within the time frame specified in the Contract. Any failure by the Owner to terminate the contract promptly where the Contractor does not perform within the time required does not constitute a waiver by the Owner to subsequently cancel or terminate or to be entitled to damages for untimely performance.
- .2 The Contractor shall develop and submit Contract schedules (i.e. time, manpower, cost) and status reports for the Owner's review and acceptance in accordance with the requirements specified in the Contract. The Contractor shall arrange and perform all Work in accordance with the Owner-accepted schedules.
- .3 Prior to commencing work, the Contractor shall establish an "earned value system" to provide a consistent way to measure accomplishments related to work being performed. An earned value system is one which subdivides the Contractor's total scope of Work into manageable parts or elements. Each element has one or more confirmable deliverables associated with it upon which progress measurement shall be based and validated. After approval by the Owner, such system will be utilized to measure progress of the Work. If no earned value system is developed, the Owner shall be obligated to pay the Contractor only upon Final Acceptance of the Work. (Section 00739)
- .4 The Contractor shall provide the Owner with timely written notification of any problems which do or might cause a deviation from the Owner-accepted schedules. This notification shall identify the problem, its cause, its forecasted impact on the Owner-accepted schedules, and recommended corrective actions.

731 PLANNING AND CONTROL (CONTINUED)

.4 Timely Written Notification (Continued)

- .1 If the problem and its cause are the result of any unauthorized act or improper performance on the part of the Contractor, no extension of time shall be considered by the Owner for any such deviation. If the Owner so directs, the Contractor shall proceed to correct any such deviation as quickly as circumstances permit by furnishing a full work force for all overtime work seven (7) days a week, twenty-four (24) hours a day and, in any such case, the Contractor shall have no claim therefor whatsoever.
- .2 If the problem and its cause are the result of any act on the part of the Owner, fire, unusual transportation delays, unusually severe weather, or any other cause beyond the Contractor's control, the Owner-accepted schedules and Contract Cost shall be revised as agreed to by the Owner and Contractor.
- .5 Any proposed changes to the Owner-accepted schedules constitute a request for "Contract Change" (Section 00733) and must be authorized by the Owner in writing.

732 MANNER OF PAYMENT

- .1 Prior to the 10th of each month following the previous month's services, the Contractor shall prepare and submit an invoice in accordance with his accomplishments based on the "earned value system." The amount being invoiced shall be limited to the contract cost associated with completed deliverables, as agreed to per 00731.3, rather than the actual cost incurred by the Contractor. The format and content of the invoice shall be as specified in this Contract or, if not specified, as agreed to by the Owner and the Contractor. The invoice shall be accompanied by such data as may be required for Owner verification of accuracy and completeness. One copy of this invoice and supportive documentation shall be submitted to:

Niagara Mohawk Power Corporation
Accounts Payable Department
300 Erie Boulevard West, B-2
Syracuse, New York 13202

- .2 Within 30 days after receipt of the invoice, the Owner will pay the Contractor 90% of those charges which represent identifiable Work elements/milestones completed in accordance with this Contract.
- .3 Progress payments shall continue in accordance with Section 00732.1 until the Owner has paid the Contractor an amount not to exceed 90% of the total Contract price, including adjustments resulting from Contract Changes.
- .4 Contractor agrees that retained funds are intended as security to the Owner for Contractor's performance of its obligations and Owner may withhold, use, deduct or permanently retain any or all of such monies as Owner may be entitled by the terms of this Contract or at law, or both, without otherwise limiting its rights. Upon receiving notification of the Owner's "Final Acceptance" (Section 00739), the Contractor may submit a retention invoice to the 10% of the total Contract price withheld.

733 CONTRACT CHANGES

- .1 This Contract cannot be changed, altered, modified or discharged orally.
- .2 The Owner shall have the right to initiate Contract Changes at any time until Final Acceptance (Section 00739). The Contractor has an obligation to implement such changes in accordance with Contract requirements.
- .3 The Contractor may request changes in the Work. All such requests shall be in writing and directed to the attention of the Owner. Upon receipt thereof, the Owner shall review each such request for design and quality compliance. Project schedule and cost impact as applicable. The Owner shall have the right to approve, approve with modification(s), or disapprove the request. Request(s) made by the Contractor shall be approved only if such request is substantiated to the Owner's satisfaction.
- .4 If approved, the Owner shall prepare and issue to the Contractor a written Contract Change which will specify the manner in which the agreement of the parties has been modified. Any Work which is initiated or completed without this written authorization shall be subject to the provisions of Section 00743 (Non-Conformance).
- .5 If the value of this Contract is decreased as a result of any changes, the written authorization of the Owner will specify the amount to be deducted. This deduction shall be based upon Contract pricing requirements or an amount agreed to by the Owner and the Contractor.
- .6 If the value of this Contract is increased as a result of any changes, the written authorization of the Owner shall specify the additional price to be paid. This additional price shall be based upon the price established by the Contract or an additional price agreed to by the Owner and the Contractor. Failing such agreement, the addition price shall be the base labor rate and the cost of materials furnished, plus ten percent (10%) which shall cover supervision, use of tools, appliances, machinery, overhead, office and all other expenses, plus ten percent (10%) for profit; the base labor rate shall be the hourly wage paid directly to workers plus applicable benefits, taxes and insurance, and the cost of materials shall be the invoiced cost of materials required for the additional Work. In those instances where a subcontractor performs the Work, the total markup over the base labor rate and the materials costs shall not exceed twenty-seven percent (27%) and shall include the total overhead and profit of the Contractor and all subcontractors.

734 ACCESS TO CONTRACTOR'S RECORDS

The Owner shall be granted access to the Contractor's records if the Owner shall deem it necessary to determine the Owner's rights or the Contractor's obligations as they pertain to this Contract or to ascertain any facts relative to any claim relating to this Contract. If the Owner identifies any inconsistencies, errors or costs not expended in accordance with this Contract, the Contractor shall make appropriate adjustments as may be required, including refund to the Owner, to reflect the results thereof.

735 SUPERVISION/KEY PERSONNEL

- .1 The Contractor shall furnish supervision of sufficient quantity and expertise to provide the direction and coordination which will insure that all Work is performed in accordance with Contract requirements.
- .2 The individuals identified in the Contractor's Proposal are considered essential to the Work being performed under this Contract; substitutions for any such individuals or substantial reductions in any of their efforts will not be made without the prior written approval of the Owner.

736 WORK CARRIED ON DURING DISPUTE

The Contractor shall carry on the Work and maintain the Contract schedules during any dispute between the Contractor and the Owner, unless otherwise directed in writing by the Owner.

737 CONTRACTOR'S OPERATIONS AREAS

- .1 The Contractor's operations areas are those areas designated by the Owner to the Contractor for his various operational activities. They will encompass all of his areas of activity such as work areas, shop and storage areas, and field office. The Contractor shall confine his operations to the designated operations areas.
- .2 The Contractor shall, under regulations prescribed by the Owner in this Contract, use only established roads or construct and use temporary roadways as specified in the Contract.

738 TEMPORARY FACILITIES/UTILITIES

Unless otherwise specified in this Contract, all temporary facilities and utilities necessary to accomplish the Work in accordance with Contract requirements shall be arranged for or provided by the Contractor including all associated costs for installation, maintenance, and removal.

739 FINAL ACCEPTANCE

When it has been determined that the Work is completed, the Contractor and Owner will verify that all conditions of the Contract have been met. Following this verification, a Final Acceptance statement signed by both parties will constitute the formal completion of the Contract.

740 QUALITY OF THE WORK

741 CONTRACTOR'S RESPONSIBILITY/OWNER'S RIGHTS

- .1 The Contractor shall ensure that all Contract Work meets or exceeds the level of quality specified in the Contract. As requested, the Contractor must demonstrate to the Owner that the Work performed is in compliance with the requirements specified in the Contract. The Contractor shall make records available for the Owner's verification of this compliance.
- .2 The Owner may perform audits, visual examinations, tests, and conduct regular surveillance to verify Contractor compliance with Contract requirements. Presence of the Owner at the location of the Work shall not relieve the Contractor of responsibility for full compliance with the requirements specified in the Contract.

742 MATERIAL AND EQUIPMENT DEVIATIONS

- .1 Whenever an item is specified in the Contract by reference to manufacturer or supplier, trade name, catalog number, or the like, it is so specified for the purpose of establishing a standard of quality. Any item manufactured by others which the Contractor feels will meet or exceed the specified item's standard of quality may be proposed for substitution; however, such proposal must be submitted by the Contractor and accepted by the Owner prior to Contract award.
- .2 After Contract award, any proposed deviation from the specified material or equipment constitutes a request for "Contract Change" (Section 00733).

743 NON-CONFORMANCE AND CORRECTIVE ACTION

- .1 The Contractor and the Owner shall provide each other with prompt written notification when the Work, or performance thereof, is in non-conformance with Contract requirements.
- .2 If continuation of any Work compounds the impact of a non-conformance on the completed Work, the Owner has the right and the Contractor an obligation to cease such Work until appropriate corrective action is initiated.
- .3 Upon notification of a non-conformance, the Contractor shall identify and segregate all non-conforming Work and promptly furnish recommendations of corrective action and associated implementation schedules for the Owner's review and disposition.
- .4 The Owner will evaluate and determine the disposition of all recommended corrective actions as follows:
 - .1 Use-as-is—The Owner has determined after an evaluation that the non-conforming condition is acceptable.
 - .2 Rework/Repair—After acceptable written procedures and support documentation have been provided by the Contractor to justify the recommended corrective action to meet Contract requirements, the Owner may direct the Contractor to implement such corrective action.
 - .3 Reject—The Owner has determined after an evaluation that the non-conforming Work is unacceptable and rejected. In this case the Contractor shall promptly remove from the site all materials (whether or not already installed) and any affected portion of the Work. The Contractor shall promptly correct such portions of the Work in accordance with the Contract.
- .5 Corrective action which impacts the Work schedules is subject to the provisions of "Planning and Control" (Section 00731).

—Explosion, Collapse and Damage to Underground Property (XCU hazards).
—Products—Completed Operations, which shall be kept in force for at least two years after Final Acceptance of the Work.
—Contractual Liability:

3. Contractor's Public Liability, including:
 1. Workers' Compensation, including Employer's Liability, with a limit of at least \$100,000. The Employer's Liability shall not exclude the Maritime Exposure.
 2. Where applicable, coverage shall include the U.S. Longshoremen's and Harbor Workers' Compensation Act and the Jones Act.
4. Unless otherwise specified, minimum Contract Insurance requirements are as follows:
 3. Insurance policies shall provide that they cannot be cancelled or changed without ten (10) days prior written notice to the Owner.

This submittal shall be mailed to:
Niagara Mohawk Power Corporation
Systems Risk Management Department
Building C-1
300 Erie Boulevard West
Syracuse, New York 13202

2. Prior to commencement of the Work, the Contractor shall submit, for the Owner's review and approval, Certificates of Insurance, which are in compliance with Contract requirements, from insurance companies acceptable to the Owner.
1. The Contractor shall maintain in force, from commencement through Final Acceptance of the Work, insurance policies which meet or exceed the requirements of this Contract.

INSURANCE

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3. Risk of loss for all labor, materials, and Work performed remains with the Contractor until the Work under this Contract is completed and accepted by the Owner.
2. Material and Work—The Contractor shall at all times protect and preserve all materials, supplies and equipment (including that which may be Owner furnished or owned) and all work performed against deterioration, vandalism, and damage.
1. Properties and Existing Structures—The Contractor shall provide and maintain proper protection against any and all damage resulting from the performance of the Work for all properties and structures which are within or adjacent to the work area.

PROTECTION OF WORK/RISK OF LOSS

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2. The Contract price shall be deemed to include all sales, consumer, excise, use, and other taxes required by law and incurred by the Contractor during the performance of the Work.
1. The Owner will not pay to the Contractor any sales or use taxes based on the Contract price. However, the Owner will provide documentation as applicable, such as a Certificate of Capital Improvement, Exempt Use Certificate, or Direct Payment Permit, one or more of which will relieve the Contractor of any legal obligations for collecting such taxes from the Owner.

TAXES

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2. All work under this Contract shall be free and clear of all liens, encumbrances, taxes and other liabilities. The Contractor shall be liable to the Owner for all costs and legal expenses incurred by the Owner in discharging such liabilities.
1. The Contractor shall pay punctually for all labor and materials and all liabilities incurred by him in the performance of this Contract, and when requested shall furnish the Owner with satisfactory evidence of such payment.

PAYMENT BY CONTRACTOR

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LIABILITIES

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8. If non-conformances are not remedied by the Contractor within the Owner-accepted implementation schedule, the Owner may complete the required corrective action at the Contractor's risk and expense. All associated costs shall be paid by the Contractor to the Owner, or deducted from sums due the Contractor. Owner may deduct out of any moneys due or to become due to the Contractor such sum or sums as may be sufficient to meet the expense of making good such defective or deficient Work or of replacing such rejected materials, equipment and apparatus with proper materials, equipment and apparatus.
7. All costs associated with the correction of any non-conformances for which the Contractor is responsible shall be borne solely by the Contractor.
6. Corrective action which results in a deviation from Contract requirements constitutes a request for "Contract Change" (Section 00733) and must be authorized by the Owner in writing.

NON-COMFORMANCE AND CORRECTIVE ACTION (CONTINUED)

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GENERAL CONDITIONS OF CONTRACT

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INSURANCE (CONTINUED)

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4. Contract Insurance Requirements (Continued)

4. Owner's Protective Liability (in the name of the Owner).
5. The limits for both Contractor's Public Liability and Owner's Protective Liability shall be, at least, as follows:
- | | |
|--|---------------------------|
| -Bodily Injury | \$500,000 each occurrence |
| -Property Damage | \$100,000 each occurrence |
| | \$100,000 aggregate |
| - If a combined single limit is provided, the limit shall not be less than \$500,000. | |
| 6. Automobile Liability, including owned, non-owned and hired automobiles, with limits of liability, at least, as follows: | |
| -Bodily Injury | \$300,000 each person |
| -Bodily Injury | \$500,000 each occurrence |
| -Property Damage | \$100,000 each occurrence |
7. Watercraft Liability, if the Work requires the use of watercraft, with limits of not less than the limits of liability required for Public Liability.
8. Aircraft Liability, if the Work requires the use of aircraft, with limits of not less than \$1,000,000 combined single limit.
9. If any of the Work is subcontracted, the Contractor shall require each subcontractor to carry Workers' Compensation and Liability Insurance, with the same coverages and in the same limits specified in this Contract.

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INDEMNIFICATION

The Contractor shall indemnify, defend and save harmless the Owner, its agents and employees, from any loss, damage, liability, cost, suit, charge, expense or cause of action arising out of or in connection with this Contract (including injuries resulting in death), directly or indirectly caused by or arising out of or in connection with this Contract (including injuries resulting in death), whether or not such damage or injury shall, in whole or in part, be attributed to, or claimed to be attributed in any way to, the acts, fault, negligence, equipment, facilities or property of the Owner, building, structure, furnishings and appliances within the terms of Chapter 40B of the Laws of 1975 of the State of New York, and any amendments thereof, the Owner shall not be indemnified or held harmless against liability for damage arising out of or resulting from the sole negligence of the Owner.

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WARRANTY

1. The Contractor shall warrant the Work against any defects or inadequacies in design, workmanship, materials, and that the Work conforms with Contract requirements. The Contractor shall promptly implement corrective action to bring all defects or inadequacies into conformance with Contract requirements. The Contractor shall bear all costs and expenses associated with this corrective action, including necessary disassembly, transportation, reassembly and retesting, as well as rework/repair or replacement of the affected Work and disassembly and reassembly of adjacent Work when necessary to give access to the defective or inadequate Work.
2. Unless otherwise specified, the period of this warranty shall commence upon "Final Acceptance" (Section 00739) and shall terminate one (1) year thereafter; provided, however, that this period shall be extended for one (1) year following as to any portion of the Work corrected in accordance with the warranty, commencing upon the Owner's written acceptance of such corrected Work.
3. If the defects or inadequacies are not promptly remedied by the Contractor, the Owner may proceed to have the defects or inadequacies remedied at the Contractor's risk and expense. All resulting costs shall be payable by the Contractor to the Owner or deducted from sums payable to the Contractor.
4. The warranties under this section in addition to any manufacturer's guarantee or warranty. Manufacturer's guarantees or warranties that extend over a period of time greater than one year shall not be modified or voided by any requirements of this Contract.

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PATENTS

All royalties for any patent, invention, article or arrangement that may be furnished by the Contractor and used or embodied in the Work hereunder shall be paid solely by the Contractor. The Contractor shall protect and save harmless the Owner against any and all claims, demands, proceedings, judgments and costs, including attorneys' fees, on account of any such royalty, and shall pay all judgments against the Owner resulting therefrom before they become enforceable liens against the Owner's property. Should any suits for infringement of patents be brought against the Owner before the payments herein provided for, or any of them, are made, the Contractor shall give a bond in amount and with sureties satisfactory to the Owner to indemnify the Owner against judgments, costs and attorneys' fees before demanding any balance hereunder. Should any injunction be threatened or issued which would or might stop, hinder or delay the Work, the Contractor shall promptly secure dissolution thereof by giving bond or otherwise, or at the option of the Owner shall promptly cease the use of the patented article or arrangement complained of.

ACCEPTANCE OF CONDITIONS

The undersigned hereby agrees that any Work (as defined herein) performed for Niagara Mohawk in compliance to any order, written or verbal, shall be governed by the terms and conditions stated herein whether or not specific reference is made to these General Conditions of Contract—Construction by the Purchase Order unless the Purchase Order specifically contains terms and conditions other than those contained herein; then those terms will apply to the extent that they are different. Contractor is free to terminate his status as a Contractor with Niagara Mohawk Power Corporation at any time by forwarding written notice indicating termination and rescission; however, such notice shall not affect any transactions in force at that time.

Receipt of this Niagara Mohawk Power Corporation—General Conditions of Contract—Construction last dated October 1985 is hereby acknowledged on the _____ day of _____ 198____ and the undersigned agrees to be bound to same and the signatory represents complete authority to sign and accept same on behalf of the Contractor.

Contractor

By _____

Title_____
Street Address_____
City, State, Zip Code

—

—

—

ADDENDUM B TO 00700

GENERAL CONDITIONS OF CONTRACT
FOR CONSTRUCTION

NIAGARA MOHAWK POWER CORPORATION

ADDENDUM B

TO THE GENERAL CONDITIONS OF CONTRACT
FOR CONSTRUCTION - 00700

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EXTRA WORK PROVISIONS - TIME AND MATERIAL
(T&M) BASIS

761 EXTRA WORK PROVISIONS - TIME & MATERIAL (T&M) BASIS

In the event that NMPC shall direct that extra work be performed on a time and material (T&M) basis, the following provisions shall apply. These provisions will be incorporated into the terms of the contract.

.1 LABOR

Labor rates for each craft and classification to be utilized in the work shall be provided in the enclosed "Hourly Labor Rate Analysis" forms. Contractor must provide all requested information and include a copy of its executed labor agreement for Owner's verification. The following provisions shall apply to Labor reimbursement.

- .1 The amount indicated for overhead (Direct and Indirect) shall include all Home Office and Field Administrative Expenses, field supervision, an allowance for small tools and minor construction equipment (value less than \$1,000.00 - new), and an allowance for light duty vehicles (gross weight up to 1-1/2 ton). The amount indicated for profit represents the only fee which will be reimbursed by NMPC for T&M work.
- .2 Upon expiration of the Labor Rates (effective period shall be indicated on the "Hourly Labor Rate Analysis" form), adjustments will be allowed in the Wage Rate and Benefit Cost Elements consistent with the revised labor agreement as executed by the Contractor. (New agreements and forms must be provided for NMPC's verification.) The dollar amounts originally indicated for Contractor's overhead and profit shall remain fixed for the contract duration.

.2 MATERIALS

Reimbursement shall be allowed for the NET cost of all materials directly purchased in support of the extra work. Copies of all vendor invoices, including cash/ payment discounts, must be submitted with Contractor's payment requests to NMPC.

.3 TOOLS AND CONSTRUCTION EQUIPMENT

Reimbursement shall be allowed for the NET cost of all tools and construction equipment having a value in excess of \$1,000 directly purchased in support of the extra work. These items shall become the property of NMPC at the completion of the work unless other disposition is agreed to by NMPC. Contractor will be responsible for accounting for all such items utilized during the work and shall have secured NMPC's prior approval prior to purchase.

.4 RENTAL

Reimbursement shall be allowed for the actual cost of all equipment rented by the Contractor in support of the extra work on the basis of a paid rental agreement. An allowance for fuel, oil and maintenance (unless otherwise provided) of 15 percent of the paid rental cost will also be reimbursed. This allowance assumes full daily use of the equipment - and will be subject to adjustment for idle time or other periods of non-use. The Labor Cost of equipment operators will be reimbursed under Item .1, above, as applicable.

.5 CONTRACTOR'S OWN EQUIPMENT

In the event that the Contractor proposes the use of its own equipment for the work, appropriate rates (including fuel, oil and maintenance) shall be provided to and approved by the Owner prior to use in the work. The proposed rates shall not exceed the current Rental "Blue Book" Rates in effect for the same or like equipment. Owner will not reimburse Contractor additional amounts for use of its equipment already on the project site. Labor for equipment operation will be reimbursed under Item .1, above, as applicable.

.6 USE OF SUBCONTRACTORS

In the event that the Contractor subcontracts any portion of the work, with the Owner's prior approval, the Contractor shall be reimbursed for the actual cost for the subcontracted work based on a paid subcontractor invoice or other acceptable evidence of cost. The Contractor will additionally be paid a 5 percent mark-up allowance for its total overhead and profit on the approved subcontracted amount.

.7 ALLOWANCES

The Contractor will be reimbursed a 7 percent allowance on the total of the costs incurred and approved under Items .2, .3 and .4, above. This allowance shall be applied and invoiced at the completion of all work and shall represent Contractor's total overhead and profit recovery on such costs.

.8 CRAFT LABOR RATES

The Contractor shall provide its applicable craft labor rates on the "Hourly Labor Rate Analysis" form, included as page 00700-Add B-7 of these provisions.

.9 MONITORING

The Contractor will be responsible for carefully monitoring all T&M work being performed and shall submit a daily (or by shift, if appropriate) summary of all hours incurred on the work by craft and classification including the cost of any equipment, materials or supplies employed in the Work for NMPC's approval. The final cost of all T&M Work will be the sum of all prior approved Work summations.

.10 WITHHOLDING LIMITS

Contractor has included in the hourly reimbursement rates allowances for Federal Unemployment Insurance (FUI), State Unemployment Insurance (SUI), and Federal Income Compensation Act (FICA). These allowances are subject to maximum withholding limits as established by the appropriate taxing agencies for the calendar year. When these allowances reach the maximum withholding limits, then such allowances shall be deleted from the applicable reimbursement rates and such rates shall be reduced accordingly. NMPC reserves the right to audit Contractor's records to ensure compliance with this provision.

.11 AUDIT

NMPC has the right at any time and at NMPC's expense to audit the Contractor's records as they pertain to T&M charges invoiced to NMPC. Such audits may be performed by NMPC's employees or by others employed by NMPC.

Audits will generally include, but may not be limited to, (1) verification of hours and the position classifications charged, (2) subcontract charges, (3) materials, tools or equipment purchased, and (4) business expenses charged. Contractor shall refund to NMPC all charges found to be not in compliance with these provisions.

.12 DISCOUNTS/ALLOWANCES

Contractor will be expected to pass on to NMPC through its regular T&M billings, the cost benefit obtained through trade discounts, special allowances or other arrangements having the benefit of reducing Contractor's cost of the work.

.13 TERMS AND CONDITIONS

- .1** In the event that Contractor shall subcontract with others (with NMPC's prior written approval) for any services associated with the work or directly purchase equipment or materials to be used in the work, the Contractor shall:

 - (1) ensure that the extra work provisions are applied in such subcontracts in the best interests and protection of both Contractor and NMPC, and
 - (2) notify NMPC of any cost plus subcontracts of any tier in excess of \$5,000 in any calendar year for New York State Public Service Commission approval.
- .2** It is understood that NMPC shall have full rights of ownership of all equipment and materials purchased by the Contractor for the prosecution of the work. At the request of NMPC, Contractor shall provide, or cause to be provided, appropriate bills of sale, assignments or other documents to ensure the vesting of rights of title and ownership with NMPC.
- .3** Following completion of work under this Contract, NMPC may direct the Contractor to deliver all equipment, appliances and materials not previously incorporated in the work or otherwise disposed of (with NMPC's approval) to NMPC's facility.

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GENERAL CONDITIONS OF CONTRACT

CONSTRUCTION

- .4 These extra work provisions applicable to time and material (T&M) work are intended to supersede that part of Article 733.6 of the General Conditions of Contract - Construction - 00700 pertinent to compensation to the Contractor on an hourly "...base labor rate and the cost of materials furnished..." basis only.

NIAGARA MOHAWK POWER CORPORATION
HOURLY LABOR RATE ANALYSIS
(TIME AND MATERIAL)

Contract/RFQ No. _____
Project _____
Contractor _____

Craft _____
Local No. _____
Effective from _____ to _____

	Straight Time Rate		Time & One-Half Rate (Premium Portion Only)		Double time Rates (Premium Portion Only)	
	Journeyman	Foreman	Journeyman	Foreman	Journeyman	Foreman
A. Base Rate/Hour	\$ _____	\$ _____	\$ _____	\$ _____	\$ _____	\$ _____
B. _____ % FICA	_____	_____	_____	_____	_____	_____
C. _____ % State & Fed. Unemployment	_____	_____	_____	_____	_____	_____
D. _____ % Workmen's Comp	_____	_____	_____	_____	_____	_____
E. _____ % Insurance(s)	_____	_____	_____	_____	_____	_____
F. Welfare	_____	_____	_____	_____	_____	_____
G. Vacation	_____	_____	_____	_____	_____	_____
H. Education/Training	_____	_____	_____	_____	_____	_____
I. Pension	_____	_____	_____	_____	_____	_____
J. Sub-Total (A.-I.)	\$ _____	\$ _____	\$ _____	\$ _____	\$ _____	\$ _____
K. Overhead (J. x _____ %)	_____	_____	_____	_____	_____	_____
L. Sub-Total (A.-K.)	_____	_____	_____	_____	_____	_____
M. Profit (L. x _____ %)	_____	_____	_____	_____	_____	_____
N. Total Rate (A.-M.)	\$ _____	\$ _____	_____	_____	_____	_____

- NOTES:**
- 1. Contractor must attach copies of all applicable labor agreements.
 - 2. All rates subject to audit/verification.
 - 3. Provide supplemental sheet for other classifications within craft, as applicable.
 - 4. If included in rate, provide detail of any cost component other than those indicated.



[illegible]

DESCRIPTION OF PROPERTY

Show locations, circuit number and use. Refer to drawings on which construction is shown. Property is to be reported at least by units, as shown in Exhibit 48, Section 617. Following are examples of property to be reported and detail required:—

- Steel Structure**—Quantity and size of members of superstructure steel and substructure steel, if any. Print of manufacturer's drawing corrected to field detail will suffice. Additional steel added should be itemized.
- Wood Structure**—Poles and crossarms by size and kind. Guy anchors by size. Guy assemblies complete by size of wire.
- Fencing**—For yard and lightning arresters. Overall height. Length and height of mesh, number and size of gates, posts, top rail, barbed wire, etc.
- Yard Improvements**—Roads and walks—Dimensions of finished product by kind of material.
Surfacing—Quantities of materials.
Grading—Number of cubic yards of cut and fill.
Retaining Walls—Dimensions, material and volume.
Drains and sewers—Length, size and kind of pipe.
- Structure Lighting**—Number and kind of fixtures. Wiring and conduits shall be shown on corrected conduit schedule. Lighting cabinets—dimensions, rating and material of housing, panels, switches, terminal blocks, etc.
- Concrete Foundations**—Dimensions and volume of each foundation for a structure, a fence, or each piece of equipment.
- Manholes**—Inside dimensions—material, volume, quantity of racks, stanchions, drains, etc.
- Duct Lines**—Length of runs by cross section from face to face of manholes or other terminals. Arrangement, size and kind of ducts.
- Cell Structure**—Overall dimensions. Quantity and size of compartments, doors, special slabs, concrete, brick, transite board, etc.
- Indoor Open Structures**—Quantity and size of pipe or steel members.
- Buses and Connections to Apparatus**—Main bus—quantity, size and material of conductors and insulators. Connections to apparatus—quantity, size and material of conductors and insulators totaled by circuit.
- Grounding System**—Quantity and size of wire and ground plates. Show locations on print or sketch.
- Power and Control**—Detail may be shown on corrected conduit schedule.
- Conduit, Cable & Potheads**—Conduit and cable racks—quantities of materials.
Control cabinets—dimensions, rating and material of housing panels, switches, terminal blocks, etc.
- Major Equipment**—Detail will be shown for power transformers, oil circuit breakers, disconnecting switches, cut-outs and fuses, instrument transformers, lightning arresters, regulators, reactors, rotaries, condensers, frequency changer sets, generators, turbines, motors, motor-generator sets, exciters, etc.
- Cooling and Oil Storage System**—Quantity, size and kind of pipe, blowers, pumps, tanks, etc.
- Switchboards**—Each panel with equipment mounted thereon and circuits controlled.
Supporting structure—quantity and size of pipe or steel members for whole structure.
Control bus—quantity and size of wire.
- Storage Batteries**—Rating and quantity of cells. Racks—overall dimensions, material and size of principal members. Hydrometers.
- Misc. Station Equipment**—Quantity and size of switch sticks and holders, ground stick sets, OCB tank, lifters, shop and testing equipment, storage cabinets, fire protection, air compressors, pumps, etc.
- Building, Dams, Canals and Waterways**—Details of construction, quantities of excavation and installed materials.
- Boiler Plant Equipment**—Description of each unit of property, length, size and material of runs of piping.

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SECTION 00850 - DRAWINGS INDEX

1.1 The contract drawings which accommodate and form a part of these specifications are for information purposes only.

1.2 All drawings are dated.

<u>DRAWING NUMBER</u>	<u>REVISION NUMBER</u>	<u>SHEET NUMBER</u>	<u>TITLE</u>
Demo 1	-	-	Kingsley Avenue Gas Regulating Station Transportation Building Demolition Plan
Demo 2	-	-	South Washington Street Gas Regulator Station Building Demolition Plan
AS 1	-	-	Kingsley Avenue Asbestos Abatement
AS 2	-	-	Kingsley Avenue Asbestos Abatement
AS 3	-	-	South Washington St. Asbestos Abatement

1.3 The drawings are, in general, drawn to scale, but any working dimensions shall be taken from actual measurements at the job and not by scaling.

ALL CONDITIONS SHALL BE FIELD VERIFIED BY THE CONTRACTOR BEFORE COMMENCING REMOVAL WORK. THE OWNER SHALL NOT BE RESPONSIBLE FOR FAILURE TO IDENTIFY ANY CONDITIONS FOUND CONTRADICTING THE DRAWING(S) AND/OR SPECIFICATIONS. IF ANY CONTRADICTION OR CONFLICT BETWEEN THESE ELEMENTS, THE CONTRACTOR SHALL NOTIFY THE SUPERINTENDENT OF CONSTRUCTION IN WRITING WITH A DESCRIPTION OF THE CONTRACTOR'S PROPOSED CORRECTION.

The Owner reserves the right to revise this drawing and to furnish any additional drawings for the proper execution of the work as may be deemed necessary. The Contractor shall execute the work in accordance with the latest drawing revisions.

1.4 The drawing is diagrammatic and indicates the general arrangement of the buildings.

END

DIVISION 1

DIVISION 1 - GENERAL REQUIREMENTS

SECTION 01010 - SUMMARY OF THE WORK

PART 1 - GENERAL

1.1 Description:

- A. The work of this project in general consists of providing all labor, supervision, materials, equipment and services necessary to accomplish the asbestos abatement and building demolitions at the Kingsley Avenue and South Washington Street. All work shall be in strict accordance with the specification and drawings referenced therein.
- B. A summary description of this work includes but is not necessarily limited to the following:
 - 1. Asbestos abatement in the buildings.
 - 2. Removal, transportation, and disposal of buildings.
 - 3. Removal, transportation, and disposal of concrete foundation walls, slabs, and footings to 12" below existing grade.
 - 4. Provide, install, and compact select fill.
 - 5. Backfill, compaction, and finish grading of site.
- C. Correspondence:
 - 1. All correspondence concerning this project, (specifications or drawings) after notice of award shall be forwarded to the Facilities Design Department to the attention of:

Niagara Mohawk Power Corporation
300 Erie Boulevard West
Syracuse, NY 13202
Attn: Mr. P. N. Nelson
Facilities Engineering, C-1
- D. The work shall be performed in order of Kingsley Avenue and South Washington Street. All asbestos abatement and demolition work at Kingsley Avenue will be completed including backfill before the work at South Washington Street is begun.
- E. Areas to receive 6" of crushed stone will be as directed by the project engineer.

SECTION 01010 - SUMMARY OF THE WORK (Continued)

1.2 Drawings and Specifications:

- A. The drawings are listed in Section 00850.
- B. The specifications are in 3 divisions, each divided into separate sections as itemized in the Table of Contents.
- C. During the bidding period addenda to this Specification may be issued.

1.3 Work Schedule:

- A. Notice of Award, if award is made, is anticipated to be given within 5 calendar days after the Bid Due Date.
- B. Submittals are due within 14 working days after notice of job award.
- C. The Contractor shall commence work per Section 00100, paragraph 0.1, Start of Work. The work shall progress with all reasonable diligence to be completed on or before June 30, 1994.

1.4 Progress Reports:

- A. Furnish with this bid a Construction Schedule-Progress Report as per Section 00210, indicating the proposed period of work by types of work and man hours for each type. The outline parameters for this schedule-progress report will be the start and finish dates as outlined above 1.3. Milestones will be required for defining scheduled starts and completions of tasks.
- B. The Contractor shall complete a "Property Record" form as provided in Section 01390 of this Specification, or an approved equivalent. This shall produce an accurate total of all materials removed by this project. Additional copies of this form are available from the Facilities Construction Representative (FCR). Completed forms shall be submitted to the CSR at the beginning of each subsequent working day.
- C. This project consists of one (1) contract.

1.5 Work Area:

- A. The Owner shall provide the Contractor with location(s) within the Owner's property for use of new material/equipment storage and parking of authorized vehicles. The area provided will be uncovered and unguarded.

SECTION 01010 - SUMMARY OF THE WORK (Continued)

1.5 Work Area: (Continued)

- B. The Contractor shall ensure the entire work area is left secured. It shall be vacant of all persons and made inaccessible for vandalism to or within the building at the end of the work day.
- C. The Contractor will include in his bid labor and materials for a temporary fencing as required suitable to secure area.
- D. Refer to Section 01500 - Temporary Facilities and Controls for more detailed information.

1.6 Permits and Licenses:

- A. The Contractor shall obtain the necessary permit(s) and satisfy necessary requirements specifically required to perform this work in accordance with authorities having jurisdiction.

1.7 Certificate of Insurance:

- A. Furnish With the Bid a certificate of insurance from your insurance carrier which attests to be the indicated coverage for the period of performance. This form can be found in the Appendix.
- B. Contractor shall maintain asbestos liability insurance with a minimum of \$1,000,000 and name the owner as an additional insured.

1.8 Disposal of Materials:

- A. All demolition material shall be considered not suitable for reuse by the Owner and shall become the property of the Contractor. All material shall be disposed of in accordance with current local and state rules and regulations. Final destination shall be at a facility properly licensed to receive this material.

1.9 Salvage:

- A. The buildings contain several tons of structural steel and miscellaneous steel (tanks, window lintels, etc.). An appropriate salvage value credit should be reflected in the bidders price.

1.10 Contract Closeout:

- A. See Section 01700.

SECTION 01010 - SUMMARY OF THE WORK (Continued)

PART 2 - MATERIALS

1.0 Not Applicable.

PART 3 - EXECUTION

1.0 Not Applicable.

SECTION 01040 - COORDINATION

1.1 Conditions:

- A. The terms and requirements of the Contract Documents apply to all the work of this section.
- B. The Owner has a Facilities Construction Representative (F.C.R.) who shall oversee the construction work of the project and be Owners sole contact.
- C. The F.C.R. will provide daily, on-site observation during this contract. Note: This condition shall in no way be construed to relieve the Contractor(s) of responsibilities required by the NYSDOL and any other authorities having jurisdiction.
- D. For the purpose of administering this contract the organizational line of communication in order of vertical sequence shall be:

Owner
Engineer
Facilities Construction Representative (FCR)
Contractor

- E. All Contractors' questions and requests in connection with the work of the contract shall be directed solely to the FCR, or in his absence, the Engineer for reply.
- F. The Contractor shall be responsible for demolition work means, methods and techniques in performance of the contract and the Contractor shall be responsible for coordinating the work with any other contractor or Owner's personnel in cooperation with FCR who shall serve as the only "on-site" liaison between the Contractor(s), the Engineer and the Owner.

1.2 Contractor's Duties, Responsibilities and Services:

- A. The duties, responsibilities and services as specified and delineated to be performed by the Contractor in all other parts of this contract document shall also apply herein and shall be supplemented by the following:

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SECTION 01040 - COORDINATION (Continued)

- A. 1. Maintain at the project site on a current basis: Project Progress Schedules, records of all drawings, specifications and addenda, shop drawings, samples, schedules, applicable criteria from authorities having jurisdiction over this work and any other related documents and revisions which arise out of the contract of this work. At the completion of the project, or when requested by the FCR, deliver any required records to him for the Owner's use.
- 2. On or about final completion, transmit to the FCR required guarantees, affidavits, releases, bonds and invoices. Turn over all manuals and record drawings.
- 3. Contractor and any sub-contractor(s) shall be required to attend scheduled job meetings and special job meetings when called by the Engineer. Decisions and schedules agreed upon at such meetings shall be binding upon all Contractors whether present or absent.
- 4. Decisions required from the FCR shall be anticipated by the Contractor to provide ample time for inspection, investigation or detail drawings.

1.3 Project Coordination with Work of Others:

- A. Contractor shall be responsible for the coordination of everything incidental to or requisite for the completion of his work.
- B. Contractor shall arrange his work and shall place and dispose of the materials being used by him so as not to interfere with the operations of others. He shall join his work with that of the others in acceptable manner and shall perform it in a proper sequence to that of the others.
- C. In case of disputes, the Engineer shall be arbitrator and his decision shall be final and binding on all. However, the Contractor expressly agrees that he has fully accounted for any and all contingencies in his proposal that may be affected by such activity and he shall not make such activity or the delays or hindrances resulting therefrom or delays, acts, omissions or negligence of others a basis of claim for any extra payment or extension of time on the Contract or for damages for breach thereof.

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SECTION 01152 - INVOICE FORM

PART 1 - GENERAL

1.1 Conditions:

- A. An example of Niagara Mohawk Invoice Form No. 313-297N01-87 (see next four pages) is attached for information. After award of the contract, NMPC Facilities Construction personnel will work with the Contractor in preparing the invoice form for use in billing. The contract work items (see page 2) shall correspond to the proposal form when the invoice is submitted.

PART 2 - MATERIALS

Not Applicable.

PART 3 - EXECUTION

Not Applicable.

END

313-297812-87

SYMBOL NO. 55-32-306

CONTRACT TITLE	PURCHASE ORDER NO.
CONTRACTOR NAME	INVOICE NO.
CONTRACTOR ADDRESS (FOR PAYMENT)	INVOICE PERIOD ____ THROUGH ____
AUTHORIZED SIGNATURE	INVOICE DATE

CONTRACT SUMMARY	AMOUNT	CONSTRUCTION SERVICES APPROVAL
ORIGINAL CONTRACT PRICE	\$	
CONTRACT CHANGES	\$	NM CONSTRUCTION SUPT.
CONTRACT TOTAL	\$	DATE INVOICE REC'D

INVOICE SUMMARY	TOTAL TO DATE	THIS PERIOD
INVOICE AMOUNT (CONTRACT WORK ITEMS)	\$	\$
INVOICE AMOUNT (CONTRACT CHANGES / WORK AUTHORIZATIONS)	\$	\$
INVOICE SUBTOTAL	\$	\$
RETENTION (10%)	- \$	- \$
DISCOUNT ____ % IN ____ DAYS (BASED ON INVOICE SUBTOTAL LESS RETENTION)	- \$	- \$
INVOICE NET	\$	\$ PA

FOR NIAGARA MOHAWK USE ONLY

AREA CODE	INS CODE	TAX CODE	INV NO.	DUE DATE
MRR NO.	PURCHASE ORDER NO.			
\$	DISC. IF PAID BY	DATE RECEIVED		
ACCT. CLASS	POSTED	PRICE OK	GOODS REC'D OK	
REMARKS			CALC. OK	
APPROVED FOR PAYMENT				

ACCOUNT	SUB. LEDG.	ACTIVITY/ ORDER	COST CENTER	BUD. CAT.	COST. COMP.	LOCATION	SUB. ACCT.	PRQI. COST ACCT. NO.	%	AMOUNT

SUPPLEMENTAL APPROVAL OF INVOICE REQUESTED

NOTE : AFTER FINAL APPROVAL THIS INVOICE MUST BE RETURNED TO THE PURCHASING DEPT., SYRACUSE ATTN. _____

APPROVAL ROUTING	SIGNATURE / DATE	EMPLOYEE



**SHEET
NO.**

OF

CONTRACT TITLE

PURCHASE ORDER NO.

CONTRACTOR NAME**INVOICE NO.****CONTRACTOR ADDRESS (FOR PAYMENT)****INVOICE PERIOD**

THROUGH

INVOICE DATE[illegible]



INVOICE FORM

**SHEET
NO.**

OF

CONTRACT TITLE

PURCHASE ORDER NO.

CONTRACTOR NAME**INVOICE NO.****CONTRACTOR ADDRESS (FOR PAYMENT)****INVOICE PERIOD**

THROUGH

INVOICE DATE	01/01/2018
---------------------	------------

ACCOUNT DISTRIBUTION

[illegible]

SECTION 01300 - SUBMITTALS

PART 1 - GENERAL

1.1 Conditions:

- A. The terms and requirements of Division 0 and the other sections of Division 1 apply to all the work of this section.
- B. The asbestos abatement submittals are listed in Section 02073.

1.2 Quality Assurance:

- A. All shop drawings shall meet the following requirements in order to satisfy conditions of Section 01700 - Project Closeout.
 - 1. ALL CONTRACTORS SHOP DRAWINGS SHALL BE SUITABLE FOR GOOD MICROFILM IMAGE.
 - 2. Size of reproduction shall be maximum 42 inches x 28 inches.
 - 3. All lettering shall be readable from the bottom or right side of the drawing.
 - 4. Minimum letter height on all shop drawings shall be 1/8 inch.

PART 2 - MATERIALS

- A. All materials used shall comply with OSHA standards. Material Safety Data Sheets shall be available for review by Owner. A sample of this form is in the Appendix.

PART 3 - EXECUTION

3.1 General:

- A. The procedures outlined here shall apply to all submittals unless different specific requirements are stated in individual specification sections.
- B. The Contractor shall be responsible for scheduling submittals to avoid delays in the work. All shop drawings and material lists shall be submitted for "review" and "acceptance" within 14 days from notice of award.

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SECTION 01300 - SUBMITTALS (Continued)

3.2 Shop Drawings, Product Data and Samples:

A. General:

1. Submit 5 complete sets of any submittals to:

NIAGARA MOHAWK POWER CORPORATION
300 Erie Boulevard West
Syracuse, N.Y. 13202
ATTN: Mr. P. N. Nelson
Facilities Design Eng. C-1

Return of shop drawings shall be through same.

2. Submit all items with a letter of transmittal listing project name, Contractor's name, specification section number to which items pertain, number and title of drawings or description of submittal. Note: If applicable, provide separate letter of transmittal for each work division. Marked up, printed or other reproductions of Engineer's drawings are not acceptable as shop drawings.
3. All submittals of catalog cut copies shall be highlighted for reference to specific product(s) applying to this project. Pay postage, transportation and delivery charges for samples and shop drawings.
4. Retain 2 complete sets of prints of drawings, manufacturer's literature and similar data for submittal at the completion of the project in accordance with Section 01700, Project Closeout.
5. All shop drawings shall be checked by the Contractor for compliance with contract documents prior to submittal.

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SECTION 01300 - SUBMITTALS (Continued)

B. Actions:

1. All submittals shall be reviewed, signed and dated by the Engineer for one of the following actions by the Contractor:
 - a. ACCEPTED - shall mean that the submittals are accepted as submitted.
 - b. ACCEPTED AS NOTED - shall mean that the submittals are accepted as noted. The work may proceed with the noted changes.
 - c. REVISE AND RESUBMIT - significant aspects need correction prior to acceptance.
 - d. NOT ACCEPTED - provide a new item, in accordance with the specifications.
 2. Work from submissions marked REVISE AND RESUBMIT or NOT ACCEPTED shall not be permitted.
 3. Submissions which are incomplete due to lack of Contractor's approval, lack of proper identification, incorrect number or type of submittal items or similar reasons shall be returned without action for correction and resubmission.
 4. The Contractor shall not be relieved of responsibility for any deviation from the requirements of the Contract Documents by the Engineer's review and acceptance of Shop Drawings, Product Data or Samples.
 5. The Contractor shall not be relieved from responsibility for errors or omissions in the Shop Drawings, Product Data or Samples by the Engineer's review and acceptance thereof.
- 3.3 Substitutions of specified items shall not be allowed unless they are agreed to at time of bid award.

END



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SECTION 01390 - COMPLETION REPORT

PART 1 - GENERAL

1.1 Conditions:

- A. At the completion of the job the Contractor shall complete a "Completion Report" (form 624-20 R07-84), an example of which can be seen on the following sheets. This shall produce a descriptive account of all materials and equipment removed. Information should be retained on a daily basis to obtain a quality report. Any questions concerning this report will be answered by NMPC site personnel.

PART 2 - MATERIAL

2.0 Not Applicable

PART 3 - EXECUTION

3.0 Not Applicable

END



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SECTION 01500 - TEMPORARY FACILITIES AND CONTROLS

PART 1 - GENERAL

1.1 Conditions:

- A. The terms and requirements of Division 0 and the other sections of Division 1 apply to all the work of this section.
- B. All temporary facilities shall be provided as in Section 00700, paragraph 738 and as noted or superseded in this section. All work shall be performed by the Contractor when noted.
- C. Description:
 - 1. Contractor shall provide a temporary office and storage facilities as described herein throughout the construction period unless otherwise indicated.
 - 2. Contractor shall pay all costs for modifying, maintaining and cleaning of all the temporary facilities unless otherwise indicated.

1.2 Field Office:

- A. The Contractor may erect a temporary weatherproof office (trailer) in a location accepted by the Facilities Construction Representative (FCR).
- B. On completion of the work, all temporary offices shall be removed from the site.

1.3 Temporary Storage Facilities:

- A. The Owner will provide limited areas for the Contractor to use for outside storage of materials as deemed necessary and as permitted by the FCR. Any such material requiring protection from inclement weather shall be provided by the Contractor as needed at no additional cost to the Owner.
- B. The area used for the Contractor's storage and temporary field office will not be guarded by the Owner.

1.4 Temporary Building Weather Protection:

- A. Do not leave unprotected and unsecured materials on premises overnight.
- B. Do not store materials on roof deck, in concentrations exceeding safe capacities.
- C. Secure buildings from unauthorized entry at the end of the work day.

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SECTION 01500 - TEMPORARY FACILITIES AND CONTROLS (Continued)

1.5 Temporary Water Supply:

- A. Provide potable drinking water for all Contractor's personnel on the site.
- B. Refer to Section 00700, Paragraph 738.
- C. Construction Water
 - 1. Maintain tap location for construction water of sufficiently pure and potable quality to avoid deleterious effect on any materials used. Provide and maintain all hoses, piping and valves as required for obtaining construction water from tap location.

1.6 Temporary Sanitary Facilities:

- A. Refer to Section 00700, Paragraph 738.

1.7 Traffic Protection, Maintenance and Control:

- A. Provisions shall be made to maintain and protect normal pedestrian and vehicle traffic in work areas. The provisions shall be made so that any person who has no knowledge of conditions may safely and with a minimum of discomfort and inconvenience walk, ride or drive, day or night around adjacent exterior ground level area.
- B. The Contractor shall ensure that during the removal work there is continuous access and egress to the exterior of the building. Cones, markers, taping, hazard lights shall be provided as necessary to allow safe ingress and egress to Niagara Mohawk buildings on site throughout the day and night.
- C. Cost of maintenance and protection provisions herein shall be included in the base price bid. No additional payment will be made to satisfy these requirements.

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SECTION 01500 - TEMPORARY FACILITIES AND CONTROLS (Continued)

1.7 Traffic Protection, Maintenance and Control: (Continued)

- D. On site vehicle traffic and parking is restricted to specific areas. No private owned vehicles shall be parked in the building and only permitted at this site within designated locations. Only vehicles registered in the contracted firm(s) name or their employees may be permitted to park on-site. Firm name(s) and/or vehicle owner, vehicle model and license number shall be recorded with the FCR for the Owner's Security Department. Any Contractor or his employees private owned vehicle(s) needing to enter Owner's property shall have said vehicle on record. Any vehicle not registered on FCR list shall be refused access. All vehicles must display Contractor's name.
- E. At all times when Contractor's equipment is not engaged in the performance of the work, the Contractor shall remove the equipment from the site or make it inoperable if it is permitted to remain unused on the site.

1.8 Contractor's Restricted Areas:

- A. The Contractor shall restrict his work activity to the boundary established by the FCR except as otherwise authorized in writing and agreed upon by the FCR.
- B. The Contractor shall keep his personnel, equipment and materials in areas designated and agreed to with the FCR. Specific details concerning locations of facilities, utilities, material storage, etc. will be agreed on between the Contractor, FCR and Engineer prior to mobilization.

1.9 Trash Removal

- A. After demolition of buildings Contractor shall clean up and remove all trash generated as a result of the work.
- B. Refer to Section 01700, 1.3, Cleaning.

1.10 Telephone

- A. Refer to Section 00700, Paragraph 738.

1.11 Temporary Fencing

- A. Prior to demolition work, the Contractor will construct a suitable fence as required to secure area during construction.

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SECTION 01518 - FIRE PREVENTION PROCEDURES FOR CONTRACTORS AND
SUBCONTRACTORS

It is the intent of the Owner, Niagara Mohawk Power Corporation, that all reasonable and appropriate precautions be taken to prevent fires on this construction project and to assure prompt extinguishment of any accidental fires which may occur. All contractors and subcontractors are expected to cooperate fully to achieve this end.

Niagara Mohawk Power Corporation has identified proper fire safety standards (see Section 00700, Paragraph 728). The Fire Protection Coordinator as Owner's Superintendent of Construction will periodically inspect all areas of the project to determine that proper standards of fire safety are being maintained. He will specify special procedures or protection where deemed necessary.

In general, the suggested good practices of the National Fire Protection Association form the basis of the fire safety requirements for the project. The word "approved" in the following rules refers to approval by the Fire Protection Coordinator and, when referring to articles of equipment, will normally call for an Underwriter's Laboratories, Inc. or Factory Mutual label.

The fire safety rules include, but may not be limited, to the following:

Fire Equipment

Within contractor's work areas, extinguishers of approved types shall be provided by contractors. Contractors' shanties and equipment, such as trucks, motor cranes, cats, etc., must be individually equipped with the proper fire extinguishers by the contractor involved. Fire equipment provided by a contractor is expected to be maintained in proper operating condition at all times.

Flammable Liquids

Handling of all liquids having a flash point below 140 degrees Fahrenheit on the job site will normally require the use of properly identified approved safety cans. Bulk storage in tanks, drums or other containers will be in a manner acceptable to the Fire Protection Coordinator. Combustible solvents used for cleaning purposes will be required to have a minimum flash point of 100 degrees Fahrenheit. Refueling of gasoline or diesel driven mobile equipment in enclosed areas is prohibited. Precautions to be followed when refueling fixed or semi-fixed equipment such as compressor, pumps, welding generators, etc., will be established by the Fire Protection Coordinator. Equipment having an attached fuel tank will not be refueled while the engine is running.

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SECTION 01518 - FIRE PREVENTION PROCEDURES FOR CONTRACTORS AND
SUBCONTRACTORS (Continued)

Cutting and Welding

Operations involving the use of a torch or welding equipment require the issuance of either a permanent or temporary permit by the Fire Protection Coordinator who will specify the special precautions to be observed for the particular job involved. A special permit will be required for any hazardous area. Fire watchers may be required when so specified.

Heating Devices

All heating devices must be an approved type. Solid fuel devices are not permitted in enclosed areas. All such equipment shall be installed and used in a safe manner. Temporary space heaters shall be supervised by a competent employee when in use. Refueling of portable space heaters shall be done in a safe location and not while the unit is in operation.

Compressed Gases

Containers of compressed gases in use on the site shall be installed in an approved manner. They shall be properly supported to prevent upset. Charged containers not in use shall have safety caps in place. Storage of bulk quantities of gases shall be in an approved manner. Unloading of gas cylinders by dropping from a truck bed is prohibited.

Electrical

All electrical installations will be in accordance with the requirements of the National Electrical Code. Only approved equipment and devices will be used. Particular care is necessary in protecting and supporting temporary light and power wiring. Lighting units shall be properly guarded against mechanical damage where necessary. Portable cables for welding sets, power tools, lights, etc., shall be maintained in good condition and protected against pedestrian or vehicle damage insofar as possible.

Painting

Painting operations using combustible materials shall be conducted in a safe manner. No sparking or open flame devices shall be permitted in the area. Bulk supplies of finishing materials shall be stored in an approved manner. In general, no more than 1 day's supply should be stored in the work area.

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SECTION 01518 - FIRE PREVENTION PROCEDURES FOR CONTRACTORS AND
SUBCONTRACTORS (Continued)

Tarpaulins

Only approved flameproofed tarpaulins shall be used on the job site. Plastic drop cloths shall be of an approved slow burning type.

Smoking

Smoking will be prohibited in those areas deemed to be hazardous by the Fire Protection Coordinator. These areas will be adequately placarded.

Material Storage

Storage of combustible building materials or materials with combustible packaging will be so arranged as to offer a minimum exposure to permanent construction. Combustible storage in areas where hazardous operations, such as welding and cutting, are being conducted will be avoided insofar as possible.

Housekeeping

Combustible scrap, debris, packaging materials, etc., must be removed to designated collection points at appropriate intervals to prevent accumulation in work or storage areas. Burning of such materials is prohibited. Containers which have been used for combustible liquids shall be kept separate and not mixed with other combustible refuse.

General

Contractors and subcontractors are expected to be alert to the hazards of fire. Special cases not covered by these procedures or exceptions will be referred to the Fire Protection Coordinator for instructions.

END

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SECTION 01520 - OPERATIONS AT FORMER MGP SITES

PART 1 - GENERAL

- 1.1 The Kingsley Avenue and S. Washington Street sites have been identified as a former manufactured gas plant (MGP) site. The residue from manufacturing coal gas (coal tar sludge) has been found in site soil test borings; however, the work under this contract may or may not encounter these residues.
- 1.2 Wherever the soil is disturbed (i.e.-required for the removals to 12" below grade), the contractor shall be in strict compliance with OSHA regulations stated in 29 CFR 1910.120. Contractor personnel performing excavation and backfill work and work within the excavated area shall be trained in Hazardous Waste Operations per the OSHA Regulation.
- 1.3 The Contractor shall follow all requirements within the Hazardous Waste Operations and Emergency Response (HAZWOPER) Standard - OSHA 29 CFR.1910.120.
- 1.4 The Contractor shall prepare a Health and Safety Plan (HASP) as required by the OSHA Regulation. Available site specific information shall be furnished by Niagara Mohawk Power Corporation for bidding purposes and for development of the site specific HASP by the successful contractor.

Note: For the development and implementation of the program to be the most effective, safety and health specializing professionals should be used.
- 1.5 One copy of the Health and Safety Plan shall be submitted to NMPC prior to the start of site excavations.
- 1.6 Proof of workers hazardous waste training and medical monitoring will be available on-site for all workers prior to the start of excavation.

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SECTION 01520 - OPERATIONS AT FORMER MGP SITES

PART 1 - GENERAL (Continued)

- 1.7 The Contractor shall perform monitoring during sitework as required by the HASP. Monitoring shall be performed to determine worker exposure at the site of the excavation and beyond, as appropriate to ensure any contaminant exposure to employees at the NMPC facility are within permissible levels.

END

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SECTION 01700 - CONTRACT CLOSEOUT

1.1 Conditions:

- A. The terms and requirements of the Contract Documents apply to all the work of this section.

1.2 Description:

- A. Perform all the work necessary to complete the contract and close out the project, including but not limited to the following principal items of work:
 - 1. Project clean up.
 - 2. Guarantees, bonds, affidavits, related documents.

1.3 Cleaning Up:

- A. At all times, keep the premises free from accumulations of waste material or rubbish caused by employees or work and remove from the Owner's property and from all public and private property, at the Contractor's expense, all rubbish and waste materials resulting from his operations.
- B. At the completion of the work and prior to final inspection, remove all temporary structures and all rubbish and waste from and about the work area and all tools, scaffolding and surplus materials and leave the work "broomclean" and ready for Owner's use.
- C. Clean all new materials and surfaces as recommended by the manufacturer's or as required in each section of these specifications.

1.4 Project Record Documents:

- A. During the progress of the work, keep a record of all changes and corrections from the information shown on the drawings. Upon completion of the contract work, submit 1 copy of "as-built contract drawings" showing all approved changes (including Change Order No., if any) and all verified field dimensions to the Engineer.

1.5 Guarantees, Bonds and Affidavits:

- A. Provide all bonds, affidavits or guarantees as required. The effective date shall be the date of Substantial Completion.

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SECTION 01700 - CONTRACT CLOSEOUT (Continued)

1.5 Guarantees, Bonds and Affidavits: (Continued)

- B. All the work of each portion of the project shall be guaranteed by that portion's Contractor for a period of not less than one calendar year beginning from the date of Substantial Completion.

1.6 Final Application:

- A. Contractor shall submit the following items (in duplicate) to Niagara Mohawk for review and approval together with the final Application for Payment. All documents shall be completed, signed and dated.
1. Written notice that the project is ready for final inspection and acceptance (see 1.7).
 2. Guarantee: written guarantee on the Contractor's letterhead of all work as called for in these specifications.
 3. Contractor's affidavit of payment of debts and claims.
 4. Contractor's affidavit of release of liens for the Contractor.
 5. Contractor's affidavit of release of liens for each subcontractor or supplier.
 6. As-built drawings: provide 1 complete set of as-built drawings, incorporating all removal work as well as new construction per 1.4.A.
 7. Shop drawings and submittals: provide one complete set of all previously "ACCEPTED" shop drawings, manufacturer's literature and data for the new construction work. All shop (vendor's) drawings shall meet the requirements as previously stated in Section 01300.
 8. Property Record Forms:
 - a. At the completion of the job, the Contractor shall complete a "Completion Report" (form 624-20 R07-84), an example of which is attached with Section 01390 "Completion Report". This shall produce a descriptive account of all materials removed from the facility. Information should be retained on a daily basis to obtain a quality report. Any questions concerning this report will be answered by designated NMPC site representative.

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SECTION 01700 - CONTRACT CLOSEOUT (Continued)

1.7 Notice of Substantial Completion:

- A. When the Contractor determines that the work, or a designated portion thereof is sufficiently complete and acceptable to the owner, the contractor shall notify the FCR in writing. When the FCR on the basis of an inspection determines that the work is sufficient complete, he shall have the Engineer issue a Notice of Substantial Completion.
- B. All guarantees and warranties required by the contract documents, shall commence on the date of the Notice of Substantial Completion unless otherwise noted therein.

END



DIVISION 2

SITE WORK



SECTION 02000 - SITE WORK, GENERAL

PART 1 - GENERAL

1.1 Description:

- A. Provide all labor, supervision, equipment, tools, materials, accessories and services necessary to the site work as described in the contract documents. All excavation work on the site is to be performed in accordance with OSHA CFR1910.120.
- B. The work of this section includes, but is not limited to, the following principal items:
 - 1. Excavation.
 - 2. Backfill and compaction of on site materials and select fill.
 - 3. Finish site grading.

1.2 Bench Marks and Monuments:

- A. All bench marks, monuments and other reference points shall be maintained. If disturbed or destroyed, they shall be replaced by the Contractor to original degree of accuracy and permanence. Copies of all survey notes to be filed with the Facilities Construction Representative (F.C.R.).

1.3 Protection of Plants to Remain:

- A. All existing trees or shrubs that are to remain shall be protected during construction. They will be marked in field by the time of bidding. [Construct barricades a minimum of 8 feet outside drip line for trees and a minimum of 4 feet for shrubs. Unless noted on the drawings, excavation and grading shall not be permitted within these areas. Do not pile or store earth, debris, or any other material within these areas. Care should be taken with parking or movement of vehicles and machines around plants. If any of these designated plants are damaged or disturbed, as determined by the F.C.R. the Contractor shall remove and replace any such tree or shrub with one of like size and species, at no expense to the Owner. Replacement plants shall be guaranteed for a period of one year from the time of planting. Any replacement tree or shrub that dies or, in the opinion of the F.C.R., becomes unsightly due to dead branches or excessive pruning, shall be replaced by the Contractor at his own cost.

SECTION 02000 - SITE WORK, GENERAL (Continued)

1.4 Underground Facilities:

- A. Before any earthwork is started, all underground facilities in areas to be excavated or graded shall be identified in the field by those owning the facilities. All precautions necessary for protection of these underground facilities are to be taken. (Reference: New York State Department of Labor, Industrial Code Rule 53). Contractor is to verify locations and show on "As-Built" site drawings.

1.5 Soil Erosion Control and Water Pollution Abatement:

- A. Schedule and conduct operations to minimize erosion of soils and to prevent silting and muddying of streams, rivers, impoundments, swamps, etc.
- B. See Section 00700, Item 727 of these specifications. Adhere to all provisions therein, including any costs incurred for the construction of temporary erosion control devices if required.
- C. All erosion control devices if required shall be maintained for duration of this contract. Temporary erosion control devices shall be removed at the completion of this contract.

1.6 Dust Control:

- A. The Contractor shall conduct all activities and maintain the work area so as to minimize creation and dispersion of dust. Water shall be used to control serious or prolonged dust problems. The frequency of use shall be as directed by the F.C.R. The use of any other method of dust control shall be subject to the approval of the F.C.R. In particular, calcium chloride shall not be used.

1.7 References:

- A. All items listed as DOT or Department of Transportation, refer to New York State Department of Transportation Standard Specifications for Construction and Materials dated 2 January 1990.
- B. All items listed as ASTM, refer to Specification of American Society for Testing and Materials, latest edition.

SECTION 02000 - SITE WORK, GENERAL (Continued)

1.8 Testing:

- A. Test of soils, where specified, shall be performed as follows:
 - 1. Gradation:
 - a. Sieve analysis of aggregates - ASTM Specification C136-84a.
 - 2. Moisture density relations of soils: Modified Procter Test, ASTM Specification D1557-78.
 - 3. Compaction:
 - a. Sand cone method - ASTM D-1556-82.
 - b. Nuclear method - ASTM D2922-81.
- B. All test reports shall be submitted directly to the Project Engineer.

1.9 Contractor Qualification:

- A. General Contractor will be required to furnish a statement of facts as to the previous experience of any subcontractors for work in this Division.
- B. All sub-contractors will be subject to the approval of the Owner before any materials are ordered or work started.

1.10 Material Disposal:

- A. Material removed from the excavations which does not conform to the requirements for fill or is in excess of that required for backfill, shall be disposed of on site. Contractor to coordinate materials and locations with Owner.

PART 2 - MATERIALS

2.1 Select Fill:

- A. Select fill shall be a granular material having no particles larger than 6 inches in greatest dimension and not more than 15 percent (by weight) passing Number 200 mesh sieve (Department of Transportation Specification Item 203-2.02-A, with minimum size added).

SECTION 02000 - SITE WORK, GENERAL (Continued)

2.2 Crushed Stone:

- A. Material shall consist of crushed limestone or granite as described in NYS Department of Transportation Specification Item 703-02, including Table therein. DOT Material Designation 703-0201, Crushed Stone. Mixture of #1 and #2.

PART 3 - EXECUTION

3.1 Excavation:

- A. All excavations will be made in accordance with the requirements of OSHA CFR 1910.120.
- B. The Contractor will provide continuous air monitoring during the excavation work. Methods and equipment as approved by NMPC Health and Safety personnel.

3.2 Backfill:

- A. Excavated materials will be used as backfill unless deemed unsuitable by NMPC field representative.
- B. Basement areas will be backfilled with below grade foundation removal, then covered with compacted select fill.

3.3 Final Grade

- A. The Contractor will begin and complete finish grading areas after demolition of the buildings bringing it approximately to the level of existing grade. The final grade will be made suitable to maintain positive drainage as approved by the project engineer.
- B. At the direction of the project engineer, the Contractor will bring in select fill and compact to finish grade.

END

SECTION 02060 - BUILDING DEMOLITION

PART 1 - GENERAL

1.1 Conditions:

- A. The terms and requirements of the Contract Documents apply to all the work of this section.

1.2 Description:

- A. Provide all labor, supervision, equipment, tools, materials, accessories and services necessary to complete all demolition shown on the project drawings and/or mentioned in these specifications.
- B. The work of this section includes but is not limited to the following principal items:
 - 1. Demolition, removal and disposal of buildings designated (see plans in Appendix). Work includes all walls, floors, roofs, all other building components and all existing debris.
 - 2. Backfilling of all resulting trenches, holes, pits and cellars with select fill.
 - 3. Remove foundations and floor slabs, 12" below existing grade. All work below grade will be performed by OSHA CFR 1910.120 trained personnel.
 - 4. Remove all tanks and piping (if required).
 - 5. Disposal of all materials above grade.
 - 6. Removal of all existing concrete steps and concrete walks to full depth of pavement.
 - 7. Disconnect, cap and identify all site utilities on an "As-Built" plan to be submitted with the closeout documents.
- C. Submittals required:
 - 1. Submit demolition and removal procedures and schedule under provisions of Section 01300.
 - 2. Submit record documents under provisions of Section 01700.

SECTION 02060 - BUILDING DEMOLITION

1.3 Existing Conditions:

A. General

1. Conduct demolition to minimize interference with adjacent structures.
2. Provide, erect, and maintain temporary barriers and security devices.
3. Conduct operations with minimum interference to public or private thoroughfares. Maintain protected egress and access at all times.
4. Do not close or obstruct roadways and sidewalks without permits.

PART 2 - MATERIALS

2.1 Backfill:

- A. Material for use as backfill in demolition work is to be as follows.

1. All on site soil materials.
2. Below grade construction debris from foundation removals.

- B. All above grade demolition debris will be disposed of off site and will not be used as backfill, unless directed otherwise by Project Engineer.

- 2.2 Refer to the NMPC "Fire Prevention Procedures for Contractors and Subcontractors" in Section 01518 for specific requirements of materials required in this project.

PART 3 - EXECUTION

3.1 General:

- A. Before any structure or building is razed or relocated, all utilities shall be disconnected and capped, plugged or removed, in accordance with State and local ordinances or utility company regulations. The arrangements for and costs incurred are the responsibility of this Contractor.

SECTION 02060 - BUILDING DEMOLITION (Continued)

3.1 General: (Continued)

- B. Prevent movement or settlement of adjacent structures. Provide bracing and shoring.
- C. Protect existing landscaping materials, appurtenances, structures which are not to be demolished (Section 01500).
- D. Mark location of disconnected utilities. Identify utilities and indicate capping locations on project record documents.
- E. Cooperate with Owner in making necessary arrangements to secure the building against entry of unauthorized persons at all times.

3.2 Maintenance and Protection of Traffic:

- A. For the duration of the contract maintain and keep passable, free from debris, equipment and construction material access to stairs, doors, and driveways.
- B. Provide adequate protection for pedestrian and vehicle traffic in vicinity of this work.
- C. Repair or replace in kind at the Contractor's expense any areas intended to be preserved that are damaged by the Contractor's removal work.

3.3 Removal and Disposal of Building Materials:

- A. Demolish indicated structures and appurtenances in an orderly and careful manner. The building material that are to be razed above grade shall become the property of the Contractor unless otherwise noted and shall be disposed of in accordance with all local, state, and federal rules and regulations governing the disposal of demolition material. All below grade soils and foundation materials will remain on site as directed by the engineer.
- B. Cease operations and notify Project Engineer immediately if adjacent structures appear to be endangered. Do not resume operations until corrective measures have been taken.

SECTION 02060 - BUILDING DEMOLITION (Continued)

3.3 Removal and Disposal of Building Materials: (Continued)

- C. No burning of combustibles or burying of materials on site will be permitted.
- D. Do not hold any sales, public or private, of salvage equipment or articles on the Owner's land. Remove from the site all materials resulting from the removal of the building materials.
- E. The Owner does not guarantee that material of any value existing in the buildings to be present after their release to the Contractor.
- F. No dynamiting or burning will be permitted.
- G. Provision shall be made at every demolition site to control the amount of airborne dust resulting from demolition operations by wetting the debris and other materials and the immediate work area with appropriate spraying agents or other means acceptable to the F.C.R.

Rodent control:

- 1. In the event the local Board of Health requires rodent control, exterminate rodents in each building so infested, as determined by the City, County or District Office of the State Department of Health. The Contractor or Subcontractor performing the exterminating work shall, upon request, show at least 5 years' experience in extermination.
- 2. The work shall be performed in a manner approved by the F.C.R. and in accordance with the requirements of the City, County or District of the State Department of Health.
- 3. Bait shall be placed at least 13 calendar days and not more than 30 calendar days before actual demolition is started, or at such time as required by the City or County Health Department.
- 4. Upon completion of the extermination work, notify the City, County or District Office of the State Health Department. Demolition shall not proceed until a certificate from the City, County or District Office of the State Health Department is received stating the extermination has been satisfactorily performed.

SECTION 02060 - BUILDING DEMOLITION (Continued)

3.3 Removal and Disposal of Building Materials: (Continued)

- H. Cooperate with the Owner so that annoyance and inconvenience may be minimized.
- I. All salvage and waste materials shall be promptly removed from the site and disposed of in accordance with applicable codes, rules and regulations.
- J. All necessary provisions shall be provided to protect against any hazardous conditions created by this work. The safety provisions shall ensure safeguarding against these conditions in compliance with authorities having jurisdiction at no additional cost to the Owner.
- K. Foundation Walls and Floors:

Remove all foundation walls to at least 12 inches below present grade. Break-up and remove all on grade slabs, concrete pads and concrete dividers.
- L. Concrete Slabs:
 - 1. Remove all supported and structural slabs.
 - 2. Remove concrete slabs on grade, except slabs below grade (i.e. basement slabs)
- M. Remove all tanks, components, and piping from site.

3.5 Coordination

- A. The Demolition Contractor shall coordinate his work with the asbestos abatement contractor's work where necessary.
- B. Demolition Enclosure:
 - 1. Provide separation of work areas from occupied or abatement areas with proper signage and barriers, as required.

3.6 Backfill:

- A. The area of demolition or removal shall be brought to present grade. Backfill open pits and holes caused as a result of demolition with select fill.

SECTION 02060 - BUILDING DEMOLITION (Continued)

3.7 Testing:

- A. Compaction tests may be performed by the FCR in areas where it is determined an average representative compaction has occurred.
- B. Tests if required are to be as per Specification Section 02000.

3.8 Clean-Up:

- A. Clean up procedures shall follow the most stringent regulation having jurisdiction. Contractor shall obtain the necessary approvals that his methods are in accordance with the regulations and advise the Owner in writing.
- B. As the work progresses, to prevent exceeding available storage capacity on site, remove waste and dispose as previously indicated.
- C. Leave site in clean condition.

END

SECTION 02070

ASBESTOS ABATEMENT SUMMARY OF WORK

PART 1 - GENERAL

1.01 WORK COVERED BY CONTRACT DOCUMENTS

- A. The Work of this Contract comprises of asbestos abatement located at the South Washington Street Gas Regulator building in Herkimer, New York and the Kingsley Avenue buildings in Rome, New York.
- B. The Work under this Contract includes the removal and disposal of the following asbestos containing materials:
 - 1.) South Washington Street Building
 - a.) Window caulk
 - b.) Roof flashings
 - 2.) Kingsley Avenue buildings
 - a.) Building A
 - 1.) Pipe insulation
 - 2.) Window Caulk
 - 3.) Transite Pipe
 - 4.) Transite ceiling
 - 5.) Roofing
 - b.) Building B
 - 1.) Roofing

1.02 CONTRACTS

- A. Perform the asbestos abatement work as part of a single lump sum bid as described in Section 01010.
- B. Division of Work
 - 1. Asbestos Abatement Contractor
 - a. Perform Work required and as specified in the following specification sections and divisions: Divisions 1 and 2
 - b. Perform Work required and indicated on the following drawings: AS-1, AS-2, AS-3.
 - 2. The above listing of drawings and specifications is intended as a guide and does not relieve the Contractors of the responsibility of reviewing all drawings and specifications for bidding and co-ordinating with others during the construction period. Review Contract Documents before submitting proposals.

1.03 WORK BY OTHERS

- A. Work on the project site which will be executed prior to the start of the Work of this Contract, and which is excluded from this Contract, is as follows:
 - 1. None

- B. Work on the project site which will be executed after completion of the Work of this Contract, and which is excluded from this Contract, is as follows:

- 1. None

1.04 DESCRIPTION OF WORK

- A. The Work specified herein shall be the removal of asbestos-containing materials by competent persons trained, knowledgeable, and qualified in the techniques of abatement, handling, and disposal of asbestos containing and asbestos-contaminated materials and the subsequent cleaning of contaminated areas, who comply with all applicable federal, state, and local regulations and are capable of and willing to perform the Work of this Contract.
- B. The Contractor shall supply labor, materials, services, insurance, permits, and equipment necessary to carry out the Work in accordance with all applicable federal, state, and local regulations and these specifications.
- C. Related Work specified elsewhere.
 - 1.) Demolition as specified in Section 01010.

1.05 WORK SEQUENCE

- A. Coordinate construction schedule with the Engineer.

1.06 INTERPRETATION OF DRAWINGS AND SPECIFICATIONS

- A. The lists of equipment, tabulations of data measurements, and schedules appearing in the specifications or drawings are included only for the assistance and guidance of the Contractor in arriving at a more complete understanding of the intended installation. They are not intended, or to be construed, as relieving the responsibility of the Contractor in making his own takeoff.

1.07 ABBREVIATIONS AND SYMBOLS

- A. Contractor is expected to be familiar with the standard abbreviation symbols used in the Contract Documents. Inform the Engineer, in writing, of any unclear or unknown abbreviation or symbol prior to the Bid Date. Unless notified, the Engineer will assume that the Contractor is fully familiar with all such items and can execute his Work accordingly.

1.08 PROTECTION OF EQUIPMENT AND MATERIALS

- A. Assume full and complete responsibility for protection and safekeeping of his products and equipment stored at project location.

1.09 PROTECTION OF UTILITIES

- A. Provide and maintain adequate protection for existing utilities. Repair such Work damaged during construction to the satisfaction of the Engineer.

1.10 ASBESTOS PROJECT MONITOR

- A. Perform work only when the Asbestos Project Monitor is on site unless otherwise instructed in writing by the Engineer.

- B. Perform work only during the hours of work established at the Pre-Construction Meeting or as approved in writing by the Engineer at least 24 hours in advance of the change. This will allow the Asbestos Project Monitor to monitor the Work in progress.
- C. The Asbestos Project Monitor shall be responsible for, among other things:
 - 1. Assisting in decision making regarding selection of procedures.
 - 2. Enforcing Contract Specifications.
 - 3. Touring the work area with the Contractor and agreeing on pre-abatement conditions of the work area.
 - 4. Inspecting and approving or disapproving barriers and decontamination enclosure systems.
 - 5. Observing activities at all times during the course of abatement.
 - 6. Collecting air samples before, during and at the completion of abatement activities.
 - 7. Meeting with the Contractor or his representative daily to review work progress, solve problems, and adjust procedures.
 - 8. Reviewing and maintaining Contractor submittals.
 - 9. Keeping a daily log of on-site observations concerning Contractors' compliance with the specifications. The log will list the names of all persons entering the work area. The log will also show the workers' license identification cards were checked to ensure that all workers are licensed by New York State.
 - 10. The Asbestos Project Monitor has the authority to condemn work not being performed in accordance with applicable regulations, guidelines, and the requirements of this specification. If a verbal condemnation order is given, a written order will follow promptly. If a condemnation order is given, all work will cease until the condition is corrected.

1.11 CONTRACTORS ASBESTOS SUPERVISOR

- A. The Contractor shall designate a full time Project Supervisor who shall be on-site at all times. If the Project Supervisor is not on-site, all work shall be stopped. The Project Supervisor must be able to read and write English fluently, as well as communicate with his workers. The Project Supervisor shall remain until the project is complete and cannot be removed without the written consent of the Owner and the Environmental Consultant.

Prior to the commencement of work, the Contractor shall submit the proposed Project Supervisor's resume to the Owner and Environmental Consultant for approval. The project Supervisor shall meet the requirements of a "Competent Person" as defined by OSHA 1926.58 and shall have a minimum of one year on-the-job training. This person shall hold certification as an Asbestos Project Supervisor.

* * * * *

SECTION 02071

ASBESTOS ABATEMENT REGULATORY REQUIREMENTS

PART 1 - GENERAL

1.01 GENERAL REQUIREMENTS

- A. All Work under this Contract shall be done in strict accordance with all applicable federal, state, and local regulations, standards, and codes governing asbestos abatement and any other trade work done in conjunction with the abatement.
- B. The most recent edition of any relevant regulation, standard, document, or code shall be applicable to the Work. Where conflict among the requirements or with these specifications exists, the most stringent requirements are applicable.
- C. Copies of all standards, regulations, codes, and other applicable documents and subsequent amendments thereto, listed in this section and including this specification, shall be available at the work site in the clean change area of the worker decontamination system.

PART 2 - SPECIFIC REQUIREMENTS

2.01 OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION (OSHA)

- A. OSHA regulations governing asbestos abatement include, but are not limited to:
 - 1. Title 29 CFR 1926.58, Occupational Exposure to Asbestos Construction Standard.
 - 2. Title 29 CFR 1910.1001, General Industry Standard for Asbestos.
 - 3. Title 29 CFR Section 1910.134, General Industry Standard for Respiratory Protection.
 - 4. Title 29 CFR Section 1910.20, Access to Employee Exposure and Medical Records.
 - 5. Title 29 CFR Section 1910.1200, Hazard Communication.
 - 6. Title 29 CFR Section 1910.145, Specifications for Accident Prevention Signs and Tags.
 - 7. Title 29 CFR Section 1910.95, Noise Regulation.

2.02 ENVIRONMENTAL PROTECTION AGENCY (EPA)

- A. EPA regulations governing asbestos abatement include, but are not limited to:
 - 1. Title 40 CFR Part 61, Subparts A and M, National Emission Standard for Asbestos.
 - 2. Title 40 CFR Part 763, Subpart G, Asbestos Abatement Project.

2.03 AMERICAN NATIONAL STANDARDS INSTITUTE (ANSI)

- A. ANSI standards governing asbestos abatement include, but are not limited to:
 - 1. Fundamentals Governing the Design and Operation of Local Exhaust Systems, Publication 29.2-79.
 - 2. Practices for Respiratory Protection, Publication Z88.2-80.

2.04 COMPRESSED GAS ASSOCIATION (CGA)

- A. Pamphlet G-7, "Compressed Air for Human Respiration" and Specification G-7.1, "Commodity Specification for Air."

2.05 MINE SAFETY AND HEALTH ADMINISTRATION (MSHA)

- A. Certification of respirators as per 30 CFR Part 11.

2.06 NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH (NIOSH)

- A. NIOSH regulations governing asbestos abatement include, but are not limited to:
 - 1. A guide to respiratory protection for the asbestos abatement industry.
 - 2. Approval of respirators as per 30 CFR Part 11.
 - 3. Standards for analysis of air samples.

2.07 CANADIAN STANDARD ASSOCIATION

- A. Standard Z180.1-1978, "Compressed Breathing Air."

2.08 AMERICAN SOCIETY FOR TESTING AND MATERIALS (ASTM)

- A. Standard Guide for Visual Inspection of Asbestos Abatement Projects.

2.09 NEW YORK STATE REQUIREMENTS

- A. State regulations governing asbestos abatement include, but are not limited to:
 - 1. New York State Department of Environmental Conservation (NYSDEC), Title 6 NYCRR, Part 360 and 364, The New York State Hazardous Waste Management Regulations.
- B. Part 56 of Title 12 of the Official Compilation of Codes, Rules and Regulations.
- C. Chapter II: Title 10, Part 73 of the New York Code of Rules and Regulations: Asbestos Safety Program Requirements.

2.10 LICENSES

- A. Maintain current licenses as required by applicable state or local jurisdictions for the removal, transportation, disposal, or other regulated activity relative to the Work of this Contract.

2.11 NEW AND AMENDED REGULATIONS

- A. Any and all new or amended federal, state, or local regulations becoming effective during this project and not listed are to be considered as part of this specification.

2.12 NOTICES

- A. USEPA: Send written notification in accordance with 40 CFR Part 61.146 to the Regional Asbestos Contact responsible for the enforcement of the National Emission Standard for Asbestos at least ten (10) days prior to the commencement of any on-site project activity. Send notification to the following address:

Region 2
Asbestos NESHAPS Contact
Air and Waste Management Division
USEPA
26 Federal Plaza
New York, New York 10007

- B. NYS Department of Labor: Send written notification in accordance with Part 56 of Title 12 to the Asbestos Control Bureau of the NYS Department of Labor's Division of Safety and Health. Use forms provided by the Department of Labor.

* * * * *

SECTION 02072

ASBESTOS ABATEMENT

DEFINITIONS

PART 1 - GENERAL

1.01 GENERAL

- A. The following is a list of definitions that are used in the Contract Documents.
- B. The listing is comprehensive and not all definitions may be used.
- C. Additional definitions may be included in other locations of the Contract Documents.

1.02 DEFINITIONS

- A. Abatement: Procedures to control fiber release from asbestos-containing materials. Includes removal, encapsulation, enclosure, repair, demolition, and renovation activities.
- B. Action Level: The level of asbestos concentration in the air above which respirator protection and air monitoring must be instituted, 0.1 F/CC.
- C. Aggressive Sampling: A method of sampling in which the person collecting the air sample creates activity by the use of mechanical equipment during the sampling period to stir up settled dust and simulate activity in that area of the building.
- D. Air Cell: Insulation normally used on pipes and ductwork that is comprised of corrugated cardboard and frequently contains asbestos.
- E. Airlock: A system for permitting ingress and egress with minimum air movement between a contaminated area and an uncontaminated area, typically consisting of two curtained doorways separated by a distance of at least 3 feet such that one passes through one doorway into the airlock, allowing the doorway sheeting to overlap and close off the opening before proceeding through the second doorway, thereby preventing flow-through contamination.
- F. Air Monitoring: The process of measuring the fiber content of a known volume of air collected during a specific period of time.
- G. Air Sampling Professional (ASP): The professional contracted or employed by the Owner to supervise and/or conduct air monitoring and analysis schemes. This individual may also function as the Asbestos Project Monitor, if qualified. Supervision of air sampling and evaluation of results should be performed by an individual certified in the Comprehensive Practice of Industrial Hygiene (C.I.H.) and having specialized experience in air sampling for asbestos. Other acceptable Air Sampling Professionals include Environmental Engineers, Chemists, and Environmental Scientists, or others with equivalent experience in asbestos air monitoring. This individual shall not be affiliated in any way other than through this Contract with the Contractor performing the abatement work.
- H. Amended Water: Water to which a surfactant has been added.

- I. Approved Asbestos Safety Program: A program approved by the commissioner of health providing training in the handling and use of asbestos and asbestos material, education concerning safety and health risks inherent in such handling and use and training in techniques for minimizing exposure of the public to asbestos fibers, which shall include but not be limited to the requirements set forth in this Part (rule).
- J. Area Air Sampling: Any form of air sampling or monitoring where the sampling or monitoring where the sampling device is placed at some stationary location.
- K. Asbestos: The asbestiform varieties of serpentine (chrysotile), riebeckite (crocidolite), cummingtonite - grunerite (amosite), anthrophyllite, actinolite, and tremolite.
- L. Asbestos-Containing Material (ACM): Material composed of asbestos of any type and in an amount greater than 1 percent by weight, either alone or mixed with other fibrous or non-fibrous materials.
- M. Asbestos-Containing Waste Material: Asbestos-containing material or asbestos-contaminated objects requiring disposal.
- N. Asbestos Contract: An oral or written agreement contained in one or more documents for the performance of work on an asbestos project and includes all labor, goods and services.
- O. Asbestos Handler: An individual who installs, removes, applies, encapsulates, or encloses asbestos or asbestos material or who disturbs friable asbestos.
- P. Asbestos Handling Certificate: A certificate issued by the commissioner to a person who has satisfactorily completed an approved asbestos safety program.
- Q. Asbestos Handling License: A license issued by the commissioner pursuant to the provisions of this article to a contractor engaged in the installation, removal, application, enclosure or encapsulation of asbestos or asbestos material or the disturbance of friable asbestos.
- R. Asbestos Project: Work undertaken by a contractor which involves the removal, encapsulation, enclosure, or disturbance of friable asbestos, or the handling of asbestos material that may result in the release of asbestos fiber, except for work in an owner-occupied single family dwelling performed by the owner of such dwelling. At the time that such disturbance occurs, the project shall become an asbestos project. Where all asbestos work on a project is subcontracted to a contractor with an asbestos handling license, only that part of the work involving asbestos shall be deemed to be an asbestos project. Asbestos projects include Large Asbestos Projects, Small Asbestos Projects and Minor Asbestos Projects.
- S. Asbestos Project Monitor (Also Known as Clerk-of-the Works or Competent Person): An individual, qualified by virtue of experience and education as defined in 29 CFR 1926.58 and Industrial Code Rule 56, designated as the Owner's representative and responsible for overseeing the asbestos abatement project.
- T. Asbestos Supervisor: The individual who supervises the asbestos abatement project and ensures that proper asbestos abatement procedures as well as individual safety procedures are being adhered to.
- U. Asbestos Waste Material: Asbestos material or asbestos-contaminated objects requiring disposal.

- V. Authorized Visitor: The Owner (and any designated representatives) and any representative of a regulatory or other agency having jurisdiction over the project.
- W. Background Level Monitoring: A method used to determine airborne asbestos fiber concentrations inside and outside of a building or structure prior to starting an asbestos project.
- X. Barrier: Any surface between the asbestos abatement area and spaces either inside or outside the building but not inside the work area.
- Y. Category I nonfriable asbestos containing material: asbestos containing packings, gaskets, resilient floor covering, and asphalt roofing products containing more than 1 percent asbestos.
- Z. Category II nonfriable: any material, excluding Category I nonfriable ACM, containing more than 1 percent asbestos, that when dry, cannot be crumbled, pulverized, or reduced to powder by hand pressure.
- AA. Certified Industrial Hygienist (CIH): An industrial hygienist certified in Comprehensive Practice by the American Board of Industrial Hygiene.
- BB. Clean Room: An uncontaminated area or room which is a part of the worker decontamination enclosure system with provisions for storage of worker's street clothes and clean protective equipment.
- CC. Clean Surfaces: Surfaces shall be accepted as clean when there is no dust, dirt, film, stains, or discoloration due to the abatement or the cleaning process.
- DD. Cleanup: The utilization of HEPA vacuuming and/or wet cleaning to control and eliminate accumulations of asbestos material and asbestos waste material.
- EE. Clearance Air Monitoring: The employment of aggressive sampling techniques with a volume of air collected to determine the airborne concentration of residual fibers upon conclusion of an asbestos abatement project.
- FF. Contractor: The individual and/or business with which the Owner arranges to perform the asbestos abatement.
- GG. Curtained Doorway: A device to allow ingress or egress from one room to another while permitting minimal air movement between the rooms, typically constructed by placing three overlapping sheets of plastic over an existing or temporarily framed doorway, securing each along the top of the doorway, securing the vertical edge of one sheet along one vertical side of the doorway and securing the vertical edge of the other sheet along the opposite vertical side of the doorway. Other effective designs are permissible.
- HH. Decontamination Enclosure System: A series of connected rooms, separated from the work area and from each other by airlocks, for the decontamination of workers and equipment.
- II. Demolition: The wrecking or taking out of any load-supporting structural member of a facility together with any related handling operations.
- JJ. Encapsulant: A liquid material which can be applied to asbestos-containing material which controls the possible release of asbestos fi-

- bers from the material either by creating a membrane over the surface (bridging encapsulant) or by penetrating into the material and binding its components together (penetrating encapsulant).
- KK. Encapsulation: The application of an encapsulant to asbestos-containing materials to control the release of asbestos fibers into the air.
- LL. Enclosure: The construction of an airtight, impermeable, permanent barrier around asbestos-containing material to control the release of asbestos fibers into the air.
- MM. Equipment Decontamination Enclosure System: That portion of a decontamination enclosure system designed for controlled transfer of materials and equipment into or out of the work area, typically consisting of a washroom and holding area.
- NN. Equipment Room: A contaminated area or room which is part of the worker decontamination enclosure system with provisions for storage of contaminated clothing and equipment.
- OO. Facility: Any institutional, commercial, or industrial structure, installation, or building.
- PP. Facility Component: Any pipe, duct, boiler, tank, reactor, turbine, or furnace at or in a facility or any structural member of a facility.
- QQ. Fixed Object: A piece of equipment or furniture in the work area which cannot be removed from the work area.
- RR. Friable Asbestos: Asbestos-containing material which, when dry, can be crumbled, pulverized, or reduced to powder by hand pressure.
- SS. Glovebag Technique: A method with limited applications for removing small amounts of friable asbestos-containing material from HVAC ducts, short piping runs, valves, joints, elbows, and other non-planar surfaces in a non-contained (plasticized) work area. The glovebag assembly is a manufactured or fabricated device consisting of a glovebag (typically constructed of 6 mil transparent polyethylene or polyvinyl chloride plastic), two inward projecting longsleeves, an internal tool pouch, and an attached, labeled receptacle for asbestos waste. The glovebag is constructed and installed in such a manner that it surrounds the object or material to be removed and contains all asbestos fibers released during the process. All workers who are permitted to use the glovebag technique must be highly trained, experienced, and skilled in this method.
- TT. HEPA Filter: A high efficiency particulate air filter capable of removing particles greater than 0.3 micron in diameter with 99.97 percent efficiency.
- UU. HEPA Vacuum: A vacuum system equipped with HEPA filtration.
- VV. Holding Area: A chamber in the equipment decontamination enclosure located between the washroom and an uncontaminated area. The holding area comprises an airlock.
- WW. Homogenous Work Area: A site within the abatement work area which contains one type of asbestos material and where one type of abatement is used.
- XX. Movable Object: A piece of equipment or furniture in the work area which can be removed from the work area.

- YY. Negative Pressure Ventilation System: A portable exhaust system equipped with HEPA filtration and capable of maintaining a constant low velocity air flow into contaminated areas from adjacent uncontaminated areas.
- ZZ. NESHAPS: The National Emission Standards for Hazardous Air Pollutants (40 CFR, Part 61).
- AAA. Occupied Area: Any frequented portion of the work site where abatement is not taking place.
- BBB. Outside Air: The air outside buildings and structures.
- CCC. Owner: The Owner or his authorized representative.
- DDD. Permissible Exposure Level (PEL): The level of exposure that a worker may be exposed to, 0.2 f/cc, 8-hour TWA.
- EEE. Personal Air Monitoring: A method used to determine an individual's exposure to airborne fibers. The sample is collected outside the respirator in the person's breathing zone.
- FFF. Plasticize: To cover floors and walls with fire-retardant plastic sheeting as herein specified.
- GGG. Prior Experience: Experience required of the Contractor on asbestos projects of similar nature and scope to ensure capability of performing the asbestos abatement in a satisfactory manner. Similarities shall be in areas related to material composition, project size, abatement methods required, number of employees, and the engineering, work practice, and personal protection controls required.
- HHH. Regulated asbestos containing material (RACM): (a) Friable asbestos material, (b) Category I nonfriable ACM that has become friable, (c) category I nonfriable ACM that will be or has been subjected to sanding, grinding, cutting, or abrading, or (d) Category II nonfriable ACM that has a high probability of becoming or has become crumbled, pulverized, or reduced to powder by the forces expected to act on the material in the course of demolition or renovation operations.
- III. Removal: The stripping of any asbestos-containing materials from surfaces or components of a facility.
- JJJ. Renovation: Altering in any way one or more facility components. Operations in which load-supporting structural members are wrecked or taken out, are excluded.
- KKK. Repair: Corrective action using required work practices to control fiber release from damaged areas.
- LLL. Respiratory Protection: Respiratory protection required of authorized visitors in accordance with this Part (rule).
- MMM. Shower Room: A room between the clean room and the equipment room in the worker decontamination enclosure with hot and cold or warm running water controllable at the tap, and suitably arranged for complete showering during decontamination.
- NNN. Staging Area: Either the holding area or some area near the waste transfer airlock where containerized asbestos waste has been placed prior to removal from the work area.

000. Strip: To take off friable asbestos materials from any part of the facility.
- PPP. Structural Member: Any load-supporting member of a facility, such as beams and load-supporting walls, or any non-load-supporting member, such as ceilings and non-load-supporting walls.
- QQQ. Surfactant: A chemical wetting agent added to water to improve penetration.
- RRR. Visible Emissions: Any emissions containing particulate asbestos material that are visually detectable without the aid of instruments. This does not include condensed, uncombined water vapor.
- SSS. Washroom: A room between the work area and the holding area in the waste decontamination enclosure system, where equipment and waste containers are wet cleaned and/or HEPA vacuumed.
- TTT. Waste Decontamination Enclosure System: An area, consisting of a washroom and a holding area, designated for the controlled transfer of materials and equipment.
- UUU. Wet Cleaning: The process of eliminating asbestos contamination from building surfaces and objects by using cloths, mops, or other cleaning utensils which have been dampened with amended water and afterwards thoroughly decontaminated or disposed of as asbestos-contaminated waste.
- VVV. Work Area: Designated rooms, spaces, or areas of the project in which asbestos abatement actions are to be undertaken or which may become contaminated as a result of such abatement actions. A contained work area is a work area which has been sealed, plasticized, and equipped with a decontamination enclosure system. A non-contained work area is an isolated or controlled-access work area which has not been plasticized nor equipped with a decontamination enclosure system.
- WWW. Worker Decontamination Enclosure: A decontamination system consisting of a clean room, a shower room, and an equipment room separated from each other and from the work area airlocks and contained doorways. This system is used for all worker events and exists in the work area for equipment and waste pass-out for small jobs.

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SECTION 02073

ASBESTOS ABATEMENT
SUBMITTALS

PART 1 - GENERAL

1.01 DESCRIPTION

A. Related Requirements Specified Elsewhere

1. Testing Laboratory Services: Section 02074.

B. Schedule submittals to be presented at the pre-construction meeting. Indicate items where additional time is needed and on what dates they will be submitted. The dates indicated for each submittal shall take into account the lead time required for ordering and fabricating of the various items.

1.02 SUBMISSION REQUIREMENTS

A. Prior to Commencement of Work, Owner will:

1. Submit to the Contractor results of pre-abatement air sampling (if conducted) including location of samples, names of the Air Sampling Professional, equipment utilized, and method of analysis.
2. Document that Owner's employees who will be required to enter the work area during abatement have received training equal to that detailed in Section 02080.

B. Prior to Commencement of Work, Contractor shall:

1. US EPA: Provide Owner with a copy of the notice to the Asbestos NESHAPS Contact of the EPA as per Section 02071.
2. NYS Department of Labor: Provide Owner with a copy of the notice to the Asbestos Control Program of the NYS Labor Department's Division of Safety and Health as per Part 56 of Title 12.
3. NYSDEC: Submit to the Owner a copy of the annual "Industrial Waste Hauler Permit" specifically for asbestos-containing materials required pursuant to 6 NYCRR364. Submit certification that the proposed waste disposal site meets the requirements of 40 CFR 61.156 and any pertinent local and state regulations. Provide Owner with a copy of the notice to the Asbestos Enforcement Division of the NYSDEC.
4. Submit documentation satisfactory to the Owner that the Contractor's employees, including Superintendent, Foremen, Supervisors, and other company personnel or agents, who may be exposed to airborne asbestos fibers or who may be responsible for any aspects of abatement activities, have received adequate training. A copy of their Asbestos Handling Certificates will be provided. Foremen and Supervisors shall, at a minimum, meet the training requirements of a competent person as defined in 29 CFR 1926.58 (e), (b), and (11).
5. With the Owner, inspect the premises wherein all abatement and abatement related activities will occur and prepare a statement signed by both agreeing on building and fixture conditions prior to the commencement of work.

6. When rental equipment is to be used in abatement areas or to transport asbestos-contaminated waste, a written notification concerning intended use of the rental equipment must be provided to the rental agency with a copy submitted to the Owner.
 7. Provide a copy of the respiratory program required in 29 CFR 1910.134 (b), (d), (e), and (f). Include manufacturer certification of HEPA filtration capabilities for all cartridges and filters.
 8. Submit a copy of the firm's asbestos handling license.
 9. Submit the name, address, contact person and the ELAP approval number for the laboratory utilized for the analysis of the Contractor's OSHA monitoring samples.
 10. Abatement Work Plan: Provide plans which clearly indicate all work areas (numbered sequentially) including the locations and types of all decontamination chambers, entrances and exits to the work area, type of abatement activity/technique, number and location of negative air units and exhaust including calculations, and the proposed location and construction of storage facilities and field office.
 11. Samples: Submit samples of warning notices to be posted, catalog descriptions of protective clothing, replacement materials, etc.
 12. Worker Training and Medical Surveillance: The Contractor shall submit a list of the persons who will be employed by him and his subcontractors in the removal work. Present evidence that workers have received proper training required by the regulations and the medical examinations required by OSHA 29 CFR 1926.58.
 13. Logs: Specimen copies of daily progress log, visitor's log, and disposal log.
 14. Material List: A complete materials list of all items proposed to be furnished and used under this contract.
 15. Subcontractors List: The prime contractor shall submit a list of all subcontractors to be used on the project.
 16. Material Safety Data Sheets (MSDS): Submit copies of MSDS for each chemical or material used for the project (encapsulant, surfactant, mastic remover, etc.)
 17. Project Supervisor: Submit the resume of the proposed Project Supervisor.
 18. Worker's Acknowledgments: Submit statements signed by each employee that the employee has received training in the proper handling of asbestos containing materials; understands the health implications and risks involved; and understands the use and limitations of the respiratory equipment to be used.
- C. During abatement activities, Contractor shall:
1. Submit copies of all transport manifests, trip tickets, and disposal receipts for all asbestos waste materials removed from the work area during the abatement process. The documentation must show the entire chain of custody from the time the asbestos is removed.

2. The Contractor will maintain worksite entry log books with information on worker and visitor access. The Asbestos Handling Certificates for all workers will be kept at the entrance to the work site or the certificates will be checked upon each entry by the Contractor. Copies will be provided to the Owner, Engineer, and Contractor.
3. Submit logs documenting filter changes on respirators, HEPA vacuums, negative pressure ventilation units, and other engineering controls.
4. Submit results of bulk material analysis and air sampling data collected during the course of the abatement including OSHA compliance air monitoring results.
5. Submit results of materials testing conducted during the abatement for purposes of utilization during abatement activities (e.g., testing of encapsulant for depth of penetration and testing of substitute materials for adherence to encapsulated surfaces).
6. Post in the clean room area of the worker decontamination enclosure a list containing the names, addresses, and telephone numbers of the Contractor, the Owner, the Engineer, the Asbestos Project Monitor, the General Superintendent, the Air Sampling Professional, the testing laboratory, the police department, the fire department, and any other personnel who may be required to assist during abatement activities (e.g., Safety Officer, Building Maintenance Supervisor, and Energy Conservation Officer).

E. Project Closeout Submissions:

1. Submit copies of all waste disposal manifests, seals, and disposal logs.
2. Submit OSHA compliance air monitoring records conducted during the work.
3. Submit copies of the daily progress log.
4. Submit copies of the Visitor's log.
5. Submit Certificate of Visual Inspection.
6. Submit copies of any required Employee Statements such as Medical Examination Statement, Certificate of Worker's Release, or Employee Training Statement.

SUBMITTAL COVER SHEET

JACK EISENBACH ENGINEERING, P.C.
291 GENESEE STREET
UTICA, NEW YORK 13501

CONTRACTOR: _____
ADDRESS: _____

NAME OF PROJECT: NIAGARA MOHAWK POWER CORPORATION - KINGSLEY AVE AND S. WASHINGTON

JACK EISENBACH ENGINEERING PROJECT NUMBER: JE4902 CLIENTS PROJECT NUMBER: _____

DATE OF SUBMITTAL:	NAME OF SUBCONTRACTOR:
<u>SUBMITTAL DESCRIPTION:</u> SHOP DRAWING TITLE: _____ NUMBER: _____ REVISION NUMBER: _____ DATE: _____ PRODUCT DATA, TESTS, SCHEDULES: _____ _____ SAMPLES: _____ MANUFACTURER: _____ MANUFACTURER'S ADDRESS: _____	
<u>REFERENCES:</u> SPECIFICATION SECTION(S): _____ PARAGRAPH(S): _____ CONTRACT DRAWING(S): _____ ROOM NUMBER(S): _____	

<u>ENGINEER'S STAMP:</u> NO EXCEPTION TAKEN <input type="checkbox"/> MAKE CORRECTIONS NOTED <input type="checkbox"/> REJECTED <input type="checkbox"/> REVISE AND RESUBMIT <input type="checkbox"/> SUBMIT SPECIFIED ITEM <input type="checkbox"/> Checking is only for general conformance with the design concept of the project and general compliance with the information given in the contract documents. Notations are subject to the requirements of the plans and specifications. The contractor is responsible for dimensions which shall be confirmed and correlated at the job site: Fabrication processes and techniques of construction: Coordination of his work with that of all other trades and the satisfactory performance of his work. JACK EISENBACH ENGINEERING, P.C. 291 GENESEE STREET UTICA, NEW YORK 13501 DATE: _____ BY: _____	<u>CONTRACTOR'S APPROVAL STAMP</u>
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REMARKS:

JE4902
02073/4

SECTION 02074
ASBESTOS ABATEMENT
TESTING LABORATORY SERVICES
QUALITY CONTROL

PART 1 - GENERAL

1.01 DESCRIPTION

- A. Related Requirements Specified Elsewhere
 - 1. Asbestos Abatement Submittals: Section 02073
 - 2. Personnel Protection: Section 02080.
 - 3. Asbestos Abatement Procedures: Section 02085.
- B. The Owner will obtain the services of an Project Monitor and analysis laboratory to constantly monitor airborne concentrations of asbestos throughout the course of the abatement project.
- C. Laboratory services, obtained by the Owner for bulk sampling, area air sampling, and clearance sampling, are to ensure that Contract provisions are met.
 - 1. Results of Owner-procured tests will be made available to the Contractor. This act shall not be construed as relieving the Contractor of his obligations to provide materials and workmanship in accordance with pertinent regulations.
- D. Laboratory services obtained by the Contractor for personnel sampling shall comply with all pertinent regulations.
 - 1. Forward copies of test results to the Owner as indicated in Section 02073.

1.02 QUALITY ASSURANCE

- A. Pre-Work Airborne Fiber Counts
 - 1. The Owner will monitor the baseline fiber counts or those prevalent in the area before work begins using the NIOSH 7400 analytical procedure.
- B. Work Area Airborne Fiber Counts
 - 1. The Owner will monitor airborne fiber counts in the work area during the progress of the work through reviewing the personnel monitoring done by the contractor. The purpose of this air sampling will be to detect airborne fiber counts which may significantly challenge the ability of the work area isolation procedures to protect the balance of the building or outside of the building from contamination by airborne fibers.
- C. Work Area Clearance
 - 1. To determine if the elevated airborne fiber counts encountered during abatement operations have been reduced to an acceptable level, the Owner will sample and analyze air as per this Section using Phase Contrast Microscopy (PCM).

- D. The Owner will be conducting air sampling throughout the course of the project.
- E. Fibers Counted
 - 1. PCM: "Airborne Fibers" referred to above include all fibers regardless of composition as counted in the NIOSH 7400 procedure.
- F. The laboratory utilized for analyzing air samples shall be satisfactory participants in the AIHA Proficiency Analytical Testing (PAT) program for asbestos analysis and shall be NYSDOH (New York State Department of Health) ELAP accredited.
- G. Laboratories used for bulk material identification shall be satisfactory participants in the EPA quality assurance program for bulk asbestos analysis and shall be NYSDOH ELAP accredited.
- H. The Project Monitor shall have a current Project Monitor certificate and an air sampling technician certificate.

PART 2 - PRODUCTS - NOT APPLICABLE

PART 3 - EXECUTION

3.01 TESTING LABORATORY SERVICES

- A. The Owner will obtain air and bulk sampling laboratory services by separate Contract. The laboratory will be independent of the abatement contractor.
- B. Personal Air Monitoring
 - 1. In addition to the requirements of OSHA 1926.58, the contractor shall be required to perform personal air monitoring every work shift, in each work area, during which abatement activities occur, in order to determine that appropriate respiratory protection is being utilized.
 - 2. Results of the air monitoring shall be returned to the site, at least verbally, and posted no later than 24 hours following the time the sample was collected. Written results shall be returned to the site and posted no more than five days after the monitoring was performed.
 - 3. Personal air samples shall be analyzed by a laboratory which holds certification by the New York State Department of Health's Environmental Laboratory Approval Program. The asbestos consultant must approve the laboratory the contractor intends to use.

3.02 RESPONSIBILITIES AND DUTIES OF CONTRACTOR

- A. To facilitate testing services, the Contractor shall:
 - 1. Furnish to the laboratory such samples of materials as may be necessary for testing purposes.
 - 2. Advise the testing agency sufficiently in advance of operations to allow for completion of tests and for the assignment of personnel.
 - 3. Ensure the cooperation of the employees and superintendent with the Project Monitor.

3.03 ANALYTICAL METHODS

A. The following methods may be used by the testing laboratory in analyzing filters used to collect air samples:

1. Cellulose ester filters will be analyzed using the NIOSH 7400 Method accounting rules.

3.04 SAMPLE VOLUMES

A. General: The number and volume of air samples taken by the Owner will be in accordance with the following schedule. Sample volumes given may vary depending upon the analytical method used.

1. Before the Start of Work

a. The Owner will secure the following air samples to establish a base line before the start of work.

Location Sampled	Minimum Number of Samples	Filter Media	Detection Limit Fibers/cc.	Minimum Volume (Liters)	Rate LPM
Each Work Area	5	Cellulose Ester	0.01	1500	2-10
Outside Each Work Area	5	Cellulose Ester	0.01	1500	2-10
Outside Building	2	Cellulose Ester	0.01	1500	2-10
At Job Site	2	Cellulose Ester	0.01	0	0

b. Base line is an action level by sample location and expressed in fibers per cubic centimeter which is the largest of the following:

- 1) Actual fiber concentration of the samples collected on cellulose ester filters for each work area.
- 2) 0.01 fibers per cubic centimeter.

2. Daily During Abatement

a. From the start of work building temporary enclosures until ready for clearance air monitoring, the laboratory will take the following samples on a daily basis.

Location Sampled	Minimum Number of Samples	Filter Media	Detection Limit Fibers/cc.	Minimum Volume (Liters)	Rate LPM
Outside Each Work Area*	4	Cellulose Ester	0.01	3000	2-10
Outside Building	1	Cellulose Ester	0.01	3000	2-10
Output Negative Pressure System	1 per machine	Cellulose Ester	0.01	3000	2-10
At Job Site	2	Cellulose Ester	0.01	0	0

* Two (2) samples outside the work area but within ten (10) feet of isolation barriers. Two (2) samples at location within ten (10) feet of and within the actual environment of the entrance exit of the personnel and waste decontamination enclosures.

- b. If airborne fiber counts exceed allowed limits additional samples will be taken as necessary to monitor fiber levels.

3. Clearance Air Monitoring

- a. Air sample locations shall be the same as the locations of the samples collected before the start of work.
- b. All air samples will be taken using aggressive sampling techniques as follows:
 - 1) There are no standards available for flow rate of leaf blowers or large fans. However, this information is not critical to the success of the procedure.
 - 2) Before sampling pumps are started, the exhaust from forced air equipment (leaf blower with at least 1 horsepower electric motor) will be swept against all walls, ceilings, floors, ledges and other surfaces in the room. This procedure will be continued for five minutes per 1,000 cubic feet of floor.
 - 3) One 20 inch diameter fan per 10,000 cubic feet of room volume will be mounted in a central location at approximately 2 meters above floor, directed toward ceiling, and operated at low speed for the entire period of sample collection.
 - 4) Air samples will be collected in areas subject to normal air circulation away from room corners, obstructed locations, and sites near windows, door, or vents.
 - 5) After air sampling pumps have been shut off, fans will be shut off.

c. Schedule of Air Samples

- 1) General: The number and volume of air samples taken and analytical methods used by the Owner will be in accordance with the following schedule. Sample volumes given may vary depending upon the analytical instruments used.

d. Phase/Contrast Microscopy

- 1) In each homogeneous work area after completion of all cleaning work, a minimum of 13 samples will be taken and analyzed as follows:

Location Sampled	Minimum Number of Samples	Filter Media	Detection Limit Fibers/cc.	Minimum Volume (Liters)	Rate LPM
Each Work Area	5	Cellulose Ester	0.01	1500	2-10
Outside Work Area	5	Cellulose Ester	0.01	1500	2-10
At Job Site	2	Cellulose Ester	0.01	0	0
At Laboratory	1	Cellulose Ester	0.01	0	0

- 2) Analysis: Fibers on each filter will be measured using the NIOSH 7400 procedure accounting rules.
- 3) Split Sample: One work area sample will be split and both halves analyzed separately for duplicate analysis.
- 4) Satisfactory Clearance Air Monitoring Results: PCM clearance air monitoring is to be considered satisfactory only when every sample is below the base line.

e. Release Criteria

- 1) Decontamination of the work area will be considered complete when the work area has achieved satisfactory PCM clearance air monitoring. If PCM Clearance Air Monitoring is not satisfactory, then the decontamination is incomplete and recleaning and retesting is required.

3.05 LABORATORY TESTING

A. Phase Contrast Microscopy

1. The services of a testing laboratory will be employed by the Owner to perform laboratory analysis of the air samples. Samples will be sent daily by overnight mail so that verbal reports on air samples can be obtained within 24 hours. A complete record, certified by the testing laboratory, of all air monitoring tests and results, will be furnished to the Owner's Representative, the Owner, and the Contractor.
 - a. Written reports of all monitoring tests will be posted at the job site on a daily basis.
2. The personnel monitoring done by the Contractor will be conducted in accordance with the standards outline in sub-paragraph 1 above.

3.06 ADDITIONAL TESTING

- A. The Contractor may conduct his own air monitoring and laboratory testing. If he elects to do this, the cost shall be included in the Contract sum.

- B. If it is necessary to resample work areas for clearance testing because the area does not meet the release criteria, the Abatement Contractor will bear all costs for this additional sampling.
- C. If the Contractor does not adhere to the schedule and the Owner incurs additional air monitoring costs as a result, the additional costs will be paid by the Contractor. This will not apply if the project is delayed because of an Owner caused delay.

3.07 DATA SUBMITTAL

- A. The Project Monitor will submit all clearance air monitoring data to the NYSDOL in accordance with Industrial Code Rule 56.

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SECTION 02078

ASBESTOS ABATEMENT
SITE SECURITY

PART 1 - GENERAL

1.01 DESCRIPTION

- A. Related Requirements Specified Elsewhere
 - 1. Submittals: Section 02073.
 - 2. Personnel Workplace Entry and Exit Procedures and Waste Pass-Out Procedures: Section 02082.
- B. The Contractor shall provide all controls required to comply with all pertinent regulations and the Contract Documents including, but not limited to, those described in this section.

PART 2 - CONTROLS

2.01 SITE SECURITY

- A. The Work area is to be restricted to authorized, trained, and protected personnel. These may include the Contractor's employees, employees of subcontractors, Owner employees and representatives, state and local inspectors, and any other designated individuals. A list of authorized personnel shall be established prior to job start and posted in the clean room of the worker decontamination facility.
- B. Entry into the Work area by unauthorized individuals shall be reported immediately to the Owner by the Contractor.
- C. A log book shall be maintained by the Contractor in the clean room area of the worker decontamination system. Anyone who enters the Work area must record name, affiliation, time in, and time out for each entry. The asbestos handlers shall show their certification card or have a copy on file at the entrance upon their first entry of the day.
- D. The Project Monitor should have control of site security during abatement operations whenever possible, in order to protect Work efforts and equipment.

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SECTION 02079

ASBESTOS ABATEMENT
EMERGENCY PLANNING

PART 1 - GENERAL

1.01 DESCRIPTION

- A. Related Requirements Specified Elsewhere
 - 1. Submittals: Section 02073.
- B. The Contractor shall prepare an emergency preparedness plan detailing at least the information required in this section and in any pertinent federal, state, or local regulations.

PART 2 - DETAILS OF PLAN

2.01 EMERGENCY PLANNING

- A. Emergency planning shall be developed prior to abatement initiation and agreed to by Contractor and Owner.
- B. Emergency procedures shall be in written form and prominently posted in the clean change area and equipment room of the worker decontamination area. Everyone, prior to entering the work area, must read and sign these procedures to acknowledge receipt and understanding of work site layout, location of emergency exits, and emergency procedures.
- C. Emergency planning shall include written notification of police, fire and emergency medical personnel of planned abatement activities, work schedule and layout of work area, particularly barriers that may affect response capabilities.
- D. Emergency planning shall include considerations of fire, power failure, explosion, toxic atmospheres, electrical hazards, slips, trips and falls, confined spaces, and heat related injury. Written procedures shall be developed and employee training in procedures shall be provided.
- E. Employees shall be trained in evacuation procedures in the event of workplace emergencies.
 - 1. For Non-Life-Threatening Situations: Employees injured or other wise incapacitated shall decontaminate following normal procedures with assistance from fellow workers, if necessary, before exiting the workplace to obtain proper medical treatment.
 - 2. For Life-Threatening Injury or Illness: Worker decontamination shall take least priority. After measures to stabilize the injured worker, remove him from the workplace and secure proper medical treatment.
- F. Telephone numbers of all emergency response personnel shall be prominently posted in the clean change area and equipment room, along with the location of the nearest telephone.

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SECTION 02080

ASBESTOS ABATEMENT PERSONNEL PROTECTION

PART 1 - GENERAL

1.01 DESCRIPTION

- A. Related Requirements Specified Elsewhere
 - 1. Regulatory Requirements: Section 02071.
 - 2. Testing Laboratory Services: Section 02074.
 - 3. Personnel Workplace Entry and Exit Procedures and Waste Pass-Out Procedures: Section 02082.
- B. Description of Work
 - 1. This section describes the equipment and procedures required for worker and authorized visitor protection against asbestos contamination and other hazards.

1.02 SUBMITTALS

- A. Asbestos Handling Certificate
 - 1. Each worker will have a current asbestos handling certificate issued by the NYS Department of Labor. Copies will be submitted to the Engineer.
- B. Product Data
 - 1. Submit manufacturer's product data for all components of respiratory systems proposed to be utilized.
- C. System Diagram
 - 1. When a Type "C" supplied air respiratory system is required, submit a drawing showing the assembly of components into a complete system. Identify location of all components and routing of air lines.
- D. Operations and Maintenance (O&M)
 - 1. Submit O&M manuals for respiratory systems.
 - 2. Submit the name and qualifications of the individual assigned to monitor the supply air respiratory system.
- E. Respiratory Protection Program
 - 1. Provide the respiratory protection program detailed herein.
- F. Historic Data
 - 1. If a Class "C" respiratory system is not utilized, the Contractor will provide documentation showing that in the past, the Contractor has not exceeded the limits allowed for the proposed respirator work.

PART 2 - EQUIPMENT

2.01 RESPIRATORY PROTECTION EQUIPMENT

- A. Respirators shall be provided that have been tested and approved by NIOSH MSHA under 30 CFR Part 11 for use in asbestos-contaminated atmospheres and bear the approval labels and TC numbers. The respirator chosen by the Contractor must ensure that the workers are not exposed to asbestos concentrations above the PEL, 0.2 f/cc, 8 hour TWA. The rules in 29 CFR 1926.58 (h) (2) shall govern the respirator selection.

1. Where not in violation of NIOSH, OSHA, and any other regulatory requirements, the Contractor shall provide the following minimum respiratory protection to the maximum use concentrations indicated:

<u>MSHA/NIOSH Approved Respiratory Protection</u>	<u>Maximum Use Concentrations</u>
Half-Mask Air Purifying With HEPA Filters	0.1 f/cc
Full-Facepiece Air Purifying HEPA Filters and Quantitative Fit Test	0.5 f/cc
Powered Air Purifying (PAPR) Loose fitting Helmet or Hood, HEPA Filter	0.25 f/cc
Powered Air Purifying (PAPR) Full Facepiece, HEPA filter	0.5 f/cc
Supplied Air, Continuous Flow Loose fitting Helmet or Hood	0.25 f/cc
Supplied Air, Continuous Flow Full Facepiece, HEPA Filter	0.5 f/cc
Full Facepiece-Supplied Air, Pressure Demand, HEPA Filter	10 f/cc
Full Facepiece-Supplied Air, Pressure Demand, with Aux. SCBA, Pressure Demand or Continuous Flow	>10 f/cc

- B. A sufficient supply of charged replacement batteries and high efficiency filters and a flow test meter shall be available in the clean change area for use with powered air purifying respirators.
- C. Spectacle kits and eyeglasses must be provided for employees who wear glasses and who must wear full face piece respirators.
- D. A sufficient supply of high efficiency filters shall be available for all air purifying respirators.
- E. Compressed air systems shall be operated in a pressure demand mode and be designed to provide air volumes and pressures to accommodate respirator manufacturer's specifications. The compressed air systems shall have a stand-by system of adequate capacity to allow escape of all respirator wearers from contaminated areas in the event of compressor

failure. Compressors must meet the requirements of 29 CFR 1910.134 (d). Documentation of the adequacy of compressed air systems/respiratory protection system must be retained on site. This documentation will include a list of compatible components with the maximum number and type of respirators that may be used with the system. Periodic testing of compressed air shall ensure that systems provide air of sufficient quality, i.e., Grade D breathing air as described in Compressed Gas Association Commodity Specifications G-7.1-1966. The supplied air respirator equipment shall include the following features:

1. The face piece and hose shall be by the same manufacturer and shall be certified by NIOSH/MSHA as an approved Type "C" pressure demand respirator assembly.
 2. Backup air supply shall be provided that is adequate to allow a minimum of one-half hour escape time for each individual in a six man crew. The one-half hour shall be based upon all connections to the backup air supply being used by an average-sized, adult male engaged in moderately strenuous activity or by the air requirements of the particular respirator in use, whichever is greater.
 3. A warning device shall be located in the work area which will be clearly audible in all parts of the work area and can be heard above the noise level produced by equipment and work procedures in use. This warning device shall warn of:
 - a. Compressor shutdown or other fault requiring use of backup air supply.
 - b. Carbon Monoxide (CO) levels in excess of 5 PPM/V.
 4. Carbon Monoxide (CO) levels shall be continually monitored and recorded. A monitor shall be placed in the air line between backup air supply and workers, and shall also sound an alarm as specified in Paragraph 3 above.
 5. The compressor shall automatically shutdown and alarms sound if any of the following occur:
 - a. Carbon Monoxide (CO) concentrations exceed 5 PPM/V in the air line between the filter bank and backup air supply.
 - b. Compressor temperature exceeds normal operating range.
 6. The Compressor motor shall be an electric motor. Compressors driven by gas or diesel engines shall not be used.
 7. An after-cooler shall be provided at the entry to the filter system which is capable of reducing temperatures to outside ambient air temperatures.
 8. The system configuration shall permit the recharging of 1/2 hour 2260 PSI SCBA cylinders.
- F. The nature of the encapsulant may effect the requirements for respiratory protection. Vapors that may be given off during encapsulant application must be taken into account when selecting respirators, if types other than air supplied are used.

2.02 PROTECTIVE CLOTHING

- A. Full body disposable protective clothing, including head, body, and foot coverings (unless using footwear as described below) consisting of material impenetrable by asbestos fibers (TyvekR or equivalent) shall be provided to all workers and authorized visitors in sizes adequate to accommodate movement without tearing. Provide a sufficient number for all required changes, for all workers in the work area.
- B. Additional safety equipment (e.g., hard hats meeting the requirements of ANSI Standard Z89.1-1981, eye protection meeting the requirements of ANSI Standard Z87.1-1979, safety shoes meeting the requirements of ANSI Standard Z41.1-1967, disposable PVC gloves or other work gloves), as necessary, shall be provided to all workers and authorized visitors.
- C. Nonskid footwear shall be provided to all abatement workers. Disposable clothing shall be adequately sealed to the footwear to prevent body contamination.

PART 3 - EXECUTION

3.01 TRAINING

- A. All workers will have current Asbestos Handling Certificates issued by the New York State Commissioner of Labor.
- B. Supervisory personnel shall be competent people, as defined in 29 CFR 1926.58 (b), and shall receive training as required in 29 CFR 1926.58 (e) (6) (ii) and (iii) and have a current Supervisor Certificate issued by the New York State Commissioner of Labor.

3.02 RESPIRATORY PROTECTION

- A. All respiratory protection shall be provided to workers in accordance with the submitted written respiratory protection program, which includes all items in OSHA 29 CFR 1910.134 (b), (d), (e), and (f). This program shall be posted in the clean room of the worker decontamination enclosure system.
- B. Workers shall be provided with personally issued, individually identified (marked with waterproof designations) respirators.
- C. Respirators shall be selected that meet the following level of protection requirements: The workers will not be exposed to in excess of 0.2 f/cc, 8-hour TWA.
- D. When air tests show the level of asbestos exceeds 0.1 f/cc (the action level), the Contractor will begin respiratory protection and personnel monitoring. At a minimum, half-face air purifying respirators will be worn during all preparation and cleaning operations.
- E. During all removal operations, except glovebag removal, the minimum level of protection required is the powered air purifying respirator. During glovebag removal the minimum level of protection required is a half face negative pressure air purifying respirator.
- F. Fit Testing
 - 1. Workers must perform positive and negative air pressure fit tests each time a respirator is put on, whenever the respirator design so permits. Powered air-purifying respirators shall be tested for adequate flow as specified by the manufacturer.

2. Workers shall be given a qualitative fit test in accordance with procedures detailed in the OSHA Regulation (29 CFR 1926.58, Appendix C, Qualitative and Quantitative Fit Testing Procedures) for all respirators to be used on this abatement project. The irritant fume protocol will be utilized. An appropriately administered quantitative fit test may be substituted for the qualitative fit test.
- G. No one wearing a beard or other facial hair shall be permitted to don a respirator and enter the work area.
- H. Additional respirators (minimum of two of each type) and training on their donning and use must be available at the work site for authorized visitors who may be required to enter the work area.

3.03 PROTECTIVE CLOTHING

- A. Disposable clothing including head, foot, and full body protection shall be provided in sufficient quantities and adequate sizes for all workers and authorized visitors.
- B. Hard hats, protective eyewear, gloves, rubber boots, and/or other footwear shall be provided as required for workers and authorized visitors. Safety shoes may be required for some activities.
- C. Protective clothing shall not be worn outside the work area in lieu of street clothing.

3.04 MEDICAL SURVEILLANCE

- A. Medical surveillance must be provided by the Contractor to any employee or agent that may be exposed to asbestos in excess of background levels during any phase of the abatement project. The surveillance program shall be in accordance with 29 CFR 1926.58 (m) and (n) (3) and (5).
- B. Employees shall be given an opportunity to be evaluated by a physician to determine their capability to work safely while breathing through the added resistance of a respirator.
- C. Copies of the Medical Surveillance Documentation for each employee must be submitted.

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SECTION 02081

ASBESTOS ABATEMENT

PERSONNEL DECONTAMINATION ENCLOSURE SYSTEMS AND
WASTE PASS-OUT ENCLOSURE SYSTEMS CONSTRUCTION

PART 1 - GENERAL

1.01 DESCRIPTION

- A. Related Requirements Specified Elsewhere.
 - 1. Submittals: Section 02073.
 - 2. Negative Pressure System: Section 02076.
 - 3. Work Area Preparation and Maintenance: Section 02077.
 - 4. Asbestos Abatement Materials and Equipment: Section 02083.
- B. Worker decontamination enclosure systems shall be provided at all locations where workers will enter or exit the work area. One system at a single location for each contained work area is preferred. These systems may consist of existing rooms outside of the work area, if the layout is appropriate, can be enclosed in plastic sheeting and are accessible from the work area. When this situation does not exist, enclosure systems may be constructed out of metal, wood, or plastic support as appropriate to comply with enclosure requirements.

1.02 SUBMITTALS

- A. Plans for construction, including materials and layout, shall be submitted as shop drawings and approved in writing by the Owner prior to work initiation.
 - 1. Worker decontamination enclosure systems constructed at the worksite shall utilize 6 mil opaque black or white fire-retardant polyethylene sheeting, or other acceptable materials for privacy.
 - 2. Detailed descriptions of portable, prefabricated units, if used, must be submitted for the Owner's approval.
 - 3. Plans must include floor plan, dimensions, materials, size, thickness, plumbing and electrical utilities.
 - 4. A minimum of two layers of 6 mil fire-retardant polyethylene sheeting shall be required for walls and ceiling for on-site constructed decontamination units.
 - 5. The floor shall be covered with at least 2 layers of 6 mil fire-retardant polyethylene sheeting. Replace damaged layers so as to maintain 2 layers at all times.
 - 6. When the enclosure system is situated near an area of public access, it shall be fully framed, sheathed for safety and constructed to prevent unauthorized entry.

PART 2 - PRODUCTS

2.01 MATERIALS

- A. Utilize materials described in Section 02083.

PART 3 - EXECUTION

3.01 WORKER DECONTAMINATION UNIT

- A. The worker decontamination enclosure system shall consist of at least a clean room, a shower room, and an equipment room, each separated from each other and from the work area by three airlocks designed to minimize fiber and air transfer as people pass between areas.
- B. Entry to and exit from all airlocks and decontamination enclosure system chambers shall be through curtained doorways consisting of three sheets of overlapping 6 mil fire-retardant polyethylene sheeting.
 - 1. The sheets shall have weights attached to the bottom to ensure that they hang straight and maintain a seal over the doorway when not in use.
 - 2. Doorway designs, providing equivalent protection and that are acceptable to the regulations and the Owner, may be utilized.
- C. Pathways into (from clean to contaminated) and out from (contaminated to clean) the work area shall be clearly designated. Worker shower and waste wash-down rooms in decontamination enclosure systems shall be constructed in such a way so that travel through the rooms shall be through the shower(s) and/or waste wash-down areas.
- D. Clean room shall be sized to adequately accommodate the work crew.
 - 1. Benches, lockers and hooks shall be provided for each employee's street clothes.
 - 2. Shelves for storing respirators shall also be provided in this area.
 - 3. Clean work clothes (if required under disposables), clean disposable clothing, replacement filters for respirators, towels, and other necessary items shall be provided in adequate supply in the clean room.
 - 4. A location for postings shall also be provided in this area.
 - 5. A lockable door shall be used to permit access into the clean room from outside the work area. It shall be used to secure the work area during off-shift hours.
 - 6. Lighting, heat, and electricity shall be provided as necessary for comfort.
 - 7. This space shall not be used for storage of tools, equipment, or materials (except as specifically designated), or as office space.
 - 8. No asbestos contaminated items are permitted in this room.
- E. Shower room shall contain one or more showers as necessary to adequately accommodate workers.

1. There shall be one shower per six full shift abatement persons calculated on the basis of the largest shift.
 2. Each shower head shall be supplied with hot and cold water adjustable at the tap.
 3. The shower enclosure shall be constructed to ensure against leakage.
 4. An adequate supply of soap, shampoo, and towels shall be supplied by the Contractor at all times.
 5. Shower water shall be drained, collected, and filtered through a system with at least 5 micron particle size collection capability. The system shall be used which contains a series of several filters.
- F. The equipment room shall be used for storage of equipment and tools at the end of the shift after they have been decontaminated using a HEPA filtered vacuum and/or wet cleaning techniques as appropriate.
1. Replacement filters (in sealed containers until used) for HEPA vacuums and negative pressure ventilation equipment, extra tools, containers of surfactant, and other materials and equipment that may be required during the abatement may also be stored here as needed.
 2. A walk-off pan (a small children's swimming pool or equivalent) filled with water shall be located in the work area just outside the equipment room for workers to clean off foot coverings after leaving the work area and prevent excessive contamination of the worker decontamination enclosure system.
 3. A labeled 6 mil polyethylene bag for collection of disposable clothing shall be located in this room.
 4. Contaminated footwear (e.g., rubber boots and other reusable footwear) shall be stored in this area for reuse the following workday.
 5. An extra layer of 6 mil polyethylene will be added to the floor at the beginning of each work shift and removed and disposed of as asbestos-contaminated waste at the end of the shift.

3.02 WASTE DECONTAMINATION ENCLOSURE SYSTEM

- A. The waste pass-out airlock shall be constructed as far away from the worker decontamination enclosure system as is reasonable. The exact location will be agreed upon by the Engineer. Wherever possible, this shall be located where there is direct access from the work area to the outside of the building.
- B. This airlock system shall consist of washroom/clean up room, a holding area and two airlocks. These rooms shall be separated from each other and the work area by airlocks.
1. Washroom - A room between the work area and the holding area in the waste decontamination enclosure system, where equipment and waste containers are wet cleaned and/or HEPA vacuumed.
 2. Cleanup - The utilization of HEPA vacuuming and/or wet cleaning to control and eliminate accumulations of asbestos material and asbestos waste material.

3. Holding Area - A chamber in the waste decontamination enclosure located between the washroom and an adjacent uncontaminated area.
 4. Drains - The wash water shall be filtered through a 5 micron filter prior to draining into sewers; or the water will be disposed of as contaminated waste.
- C. The waste container pass-out airlock shall be constructed in similar fashion to the worker decontamination enclosure system using similar materials and airlock and curtain doorway designs.
- D. This airlock system shall not be used to enter or exit the worksite.
- E. If it is necessary to use the equipment room of the personnel decontamination chamber for the waste pass-out, the Contractor must request written permission from the Engineer.

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SECTION 02082

ASBESTOS ABATEMENT

PERSONNEL WORKPLACE ENTRY AND EXIT PROCEDURES
AND WASTE PASS-OUT PROCEDURES

PART 1 - GENERAL

1.01 DESCRIPTION

A. Related Requirements Specified Elsewhere.

1. Site Security: Section 02078.

1.02 PERSONNEL ENTRY PROCEDURES

- A. All workers and authorized personnel shall enter the work area through the worker decontamination enclosure system.
- B. All personnel who enter the work area must sign the entry log, located in the clean room, upon every entry and exit.
- C. All personnel, before entering the work area, shall read and be familiar with all posted regulations, personal protection requirements (including workplace entry and exit procedures) and emergency procedures. A sign-off sheet shall be used to acknowledge that these have been reviewed and understood by all personnel prior to entry.
- D. All personnel shall proceed first to the clean room, remove all street clothes, and appropriately don respiratory protection (as deemed adequate for the job conditions) and disposable coveralls, head covering, gloves and foot coverings. Hard hats and eye protection shall also be utilized if required. Clean respirators and protective clothing shall be provided and utilized by each person for each separate entry into the work area.
- E. Personnel wearing designated personal protective equipment shall proceed from the clean room through the shower room to the equipment room and, after donning any additional required clothing and equipment previously deposited in the equipment room, may enter the main work area.

1.03 PERSONNEL EXIT PROCEDURES

- A. Before leaving the work area, all personnel shall remove gross contamination from the outside of respirators and protective clothing using a vacuum with an HEPA filter. Each person shall clean bottoms of protective footwear in the walk-off pan just prior to entering the equipment room.
- B. Personnel shall proceed to equipment room where they remove all protective equipment except respirators. Deposit disposable clothing into appropriately labeled containers for disposal.
- C. Reusable, contaminated footwear shall be stored in the equipment room when not in use in the work area. Upon completion of abatement, it shall be disposed of as asbestos-contaminated waste. Rubber boots may be decontaminated at the completion of the abatement for reuse.

- D. Still wearing respirators, personnel shall proceed to the shower area, clean the outside of the respirators and the exposed face area under running water prior to removal of respirator, and shower and shampoo to remove residual asbestos contamination. Various types of respirators will require slight modification of these procedures. An airline respirator with HEPA filtered disconnect protection may be disconnected in the equipment room and work in the shower. A powered air-purifying respirator face piece will have the power pack held by another person located in the equipment room. Keep motor operating until the shower is complete. Have second person wipe off power pack, then remove respirator.
- E. After showering and drying off, proceed to the clean room and don clean, disposable clothing if there will be later re-entry into the work area or street clothes if it is the end of the work shift. Respirators are picked up, washed thoroughly, disinfected as required, wrapped, and stored in the clean room.
- F. The Contractor shall assure that filters in dual cartridge type respirators used during the preparation phase of the job shall be removed, wetted, and discarded as contaminated waste. A new filter shall be in place in the respirator prior to reuse. For powered air purifying respirators or supplied air respirators, the manufacturer shall be consulted about the proper decontamination sequence.
- G. These procedures shall be posted in the clean room and equipment room.

1.04 WASTE PASS-OUT PROCEDURES

- A. Asbestos-contaminated waste that has been containerized shall be transported out of the work area through the waste pass-out airlock (or through the worker decontamination enclosure if a separate airlock has not been constructed).
- B. First Cleaning - External surfaces of contaminated containers and equipment shall be cleaned by wet cleaning and/or HEPA vacuuming in the work area before moving such items into the waste decontamination enclosure system airlock by persons assigned to this duty. These work area persons shall not enter the airlock.
- C. Removal to Washroom - these contaminated items shall be removed from the airlock by persons stationed in the washroom during waste removal operations. These washroom persons shall remove gross contamination from the exterior of their respirators and protective clothing by brushing, HEPA vacuuming and/or wet cleaning.
- D. Second Cleaning - Once in the waste decontamination enclosure system, external surfaces of contaminated containers and equipment shall be cleaned a second time by wet cleaning.
- E. Recontainerizing - The cleaned containers of asbestos material and equipment are to be dried of any excessive pooled or beaded liquid, placed in uncontaminated plastic bags or sheeting, as the item's physical characteristics demand, and sealed airtight.
- F. Removal to Airlock - The clean recontainerized items shall be moved into the airlock that leads to the holding area. The washroom persons shall not enter this airlock or the work area until waste removal is finished for that period.

- G. Removal to Holding Area - Containers and equipment shall be moved from the airlock and into the holding area by persons dressed in clean personal protective equipment, who have entered from uncontaminated areas.

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SECTION 02083
ASBESTOS ABATEMENT
MATERIALS AND EQUIPMENT

PART 1 - GENERAL

1.01 DESCRIPTION

A. Related Requirements Specified Elsewhere

1. Temporary Facilities: Section 02075.
2. Work Area Preparation and Maintenance: Section 02077.
3. Personnel Decontamination Enclosure Systems and Waste Pass-Out Airlock Construction: Section 02081.

1.02 PRODUCT DELIVERY, STORAGE, AND HANDLING

- A. Deliver all materials in the original packages, containers, or bundles bearing the name of the manufacturer and the brand name (where applicable).
- B. Store all materials subject to damage off the ground, away from wet or damp surfaces, and under cover sufficient enough to prevent damage or contamination. Replacement materials shall be stored outside of the work area until abatement is completed.
- C. Damaged, deteriorating, or previously used materials shall not be used and shall be removed from the worksite and disposed of properly.

PART 2 - PRODUCTS

2.01 ABATEMENT PRODUCTS

A. Polyethylene Sheeting

1. Thickness shall be at least 6 mil thickness, in widths selected to minimize joints.
2. Polyethylene sheeting utilized for worker decontamination enclosure shall be opaque white or black in color.
3. Only fire-retardant polyethylene shall be used.
4. Reinforced polyethylene, where indicated.

- B. Attachment Materials for Polyethylene: Method of attaching polyethylene sheeting shall be agreed upon in advance by the Contractor and Engineer and selected to minimize damage to equipment and surfaces. Method of attachment may include any combination of duct tape or other waterproof tape, furring strips, spray glue, staples, nails, screws, or other effective procedures capable of sealing adjacent sheets of polyethylene and capable of sealing polyethylene to dissimilar finished or unfinished surfaces under both wet and dry conditions (including the use of amended water).

- C. Disposal Bags: 6 mil polyethylene, pre-printed with labels as required by OSHA requirement 29 CFR 1926.58 (K) (2) or OSHA requirement 29 CFR 1910.1200 (f), shall contain the following information:

DANGER
CONTAINS ASBESTOS FIBERS
AVOID CREATING DUST
CANCER AND LUNG DISEASE HAZARD

- D. Disposal Drums: Metal or fiberboard with locking ring tops.
- E. Stick-On Labels: Per OSHA requirements (see 29 CFR 1926.58 (k) (2)) for disposal drums.
- F. Warning Signs: Required by OSHA 29 CFR 1910.1001 (j) (1) or 29 CFR 1926.58 (k) (1) and shall contain the following information:

DANGER
ASBESTOS
CANCER AND LUNG DISEASE HAZARD
AUTHORIZED PERSONNEL ONLY
RESPIRATORS AND PROTECTIVE
CLOTHING ARE REQUIRED IN THIS AREA

- G. Glovebags: Minimum 6 mil polyethylene bag for removal of pipe lagging. Bags shall have long sleeve gloves, a tool pouch, and an opening for water application. Bag shall be labeled with the same label as the disposal bag. (See Paragraph 2.01 C of this Section).
- H. Surfactant (Wetting Agent): 50/50 mixture of polyoxyethylene ether and polyoxyethylene ester, or equivalent, mixed in a proportion of 1 fluid ounce to 5 gallons of water or as specified by manufacturer. (An equivalent surfactant shall be understood to mean a material with a surface tension of 29 dynes/cm as tested in its properly mixed concentration, using ASTM method D1331-56 "Surface and Interfacial Tension of Solutions of Surface Active Agents.") Where work area temperature may cause freezing of the amended water solution, the addition of ethylene glycol in amounts sufficient to prevent freezing is permitted.
- I. Encapsulating Agent: Provide a bridging type encapsulant specifically designed for application to ACM. Product shall be rated as acceptable for use intended when tested in accordance with draft ASTM proposed standard E-6.21 guide or evaluation of encapsulant for friable ACM building materials. All materials used shall have a flame spread of less than 25 when dry (when tested in accordance with ASTM-84). Submit product data for approval by Engineer.
- J. Replacement spray or trowel-applied thermal insulation and acoustical material shall be asbestos-free and provide performance characteristics equal to or better than the original material, and should be evaluated and selected by the Engineer prior to abatement.
- K. Plywood that is 1/2 inch will be used to protect the carpeting on the first floor during the work.
- L. Removal Encapsulant: Provide a penetrating type encapsulant designed specifically for removal of asbestos-containing material.

2.02 EQUIPMENT

A. General Equipment

- 1. A sufficient supply of disposable mops, rags, and sponges for work area decontamination shall be available.

2. A sufficient supply of scaffolding, ladders, lifts, and hand tools, (e.g., scrapers, wire cutters, brushes, utility knives, wire saws, etc.) shall be provided as needed.
3. Low pressure or airless sprayers.
4. Rubber dustpans and rubber squeegees.
5. Brushes utilized for removing loose asbestos containing material shall have nylon or fiber bristles, not metal.
6. HEPA filtered vacuum cleaners.

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SECTION 02084
ASBESTOS ABATEMENT
MAINTENANCE OF RECORDS

PART 1 - GENERAL

1.01 DESCRIPTION

- A. The Contractor shall maintain the records required in Title 29 CFR 1926.58 (n) and Part 56 of Title 12 of the Official Compilation of Codes, Rules and Regulations of the State of New York.
- B. The Contractor shall provide the Owner and Engineer with one (1) copy of all records.
- C. Related Requirements Specified Elsewhere
 - 1. Submittals: Section 02073.

* * * * *

SECTION 02085

ASBESTOS ABATEMENT PROCEDURES

PART 1 - GENERAL

1.01 DESCRIPTION

- A. Related Work Specified Elsewhere
 - 1. Waste Disposal Procedures: Section 02086.
- B. Procedures described in this specification are to be utilized at all times.
- C. If specified procedures cannot be utilized, a request must be made in writing to the Owner and Engineer, providing details of the problem encountered and recommended alternatives.
- D. Alternative procedures shall provide equivalent or greater protection than procedures that they replace.
- E. Any alternative procedure must be approved in writing by the Engineer prior to implementation.

1.02 QUALITY CONTROL

- A. Air Quality Control
 - 1. If any air sample taken outside of the work area exceeds the base line established, immediately and automatically stop all work. If this air sample was taken inside the building and outside of critical barriers as set forth in Section 02082, Waste Pass Out Procedures, to isolate the affected area from the balance of the building, erect critical barriers at the next existing structural isolation of the involved space (e.g., wall, ceiling, floor).

PART 2 - PRODUCTS - NOT APPLICABLE

PART 3 - EXECUTION

3.01 PRE-COMMENCEMENT CHECK LIST

- A. Work shall not start until:
 - 1. All pre-abatement submissions, notifications, postings, and permits have been provided and are satisfactory to the Owner.
 - 2. All equipment for abatement, clean-up, and disposal is on hand.
 - 3. All worker certifications are completed.
 - 4. Contractor receives written permission from Engineer to commence abatement.

3.02 REMOVAL PROCEDURES

- A. Wet all asbestos containing material with an amended water solution or a removal encapsulant in order to reduce airborne fiber concentrations when the material is disturbed.

1. Saturate the material to the substrate, however, do not allow excessive water to accumulate in the work area.
 2. Keep all removed material wet enough to prevent fiber release until it can be containerized for disposal.
 3. Wetting procedures are not equally effective on all types of asbestos-containing materials but shall, nonetheless, be used in all cases.
- B. Workers shall begin working on the areas nearest to the decontamination unit and work towards the negative air filtration units.
- C. Saturated asbestos-containing material shall be removed in manageable sections.
1. Removed material should be packed and sealed into 6 mil, labeled, plastic bags before moving to a new location for continuance of work. The bags should then be placed in nonmetallic drums.
 2. Surrounding areas shall be periodically sprayed and maintained in a wet condition until visible material is cleaned up.
 3. Water soaked fallen material shall be picked up while wet to prevent water loss to evaporation.
- D. Material removed from building structures or components shall not be dropped or thrown to the floor.
1. Material should be removed as intact sections or components, whenever possible, and carefully lowered to the floor.
 2. If this cannot be done for materials greater than 10 feet above the floor, a dust-tight, enclosed chute shall be constructed to transport the material directly to containers on the floor, or the material may be containerized at elevated levels (e.g., on scaffolds) and carefully lowered to the ground by mechanical means.
- E. Containers (6 mil polyethylene bags or drums) shall be sealed when full.
1. Bags shall not be overfilled.
 2. They should be securely sealed to prevent accidental opening and leakage by tying tops of bags in an overhand knot or by taping in gooseneck fashion.
 3. Do not seal bags with wire or cord.
 4. The outside of all containers shall be wet-cleaned or HEPA vacuumed before leaving the work area.
- F. Large components removed intact may be wrapped in 2 layers of 6 mil polyethylene sheeting secured with tape for transport to the landfill.
- G. Asbestos containing waste with sharp-edged components (e.g., nails, screws, metal lath, tin sheeting) shall be cut to size while adequately wet, placed in cardboard boxes, double bagged or single bagged, and placed in temporary fiber drums.
- H. After completion of all stripping work, surfaces from which asbestos containing materials have been removed shall be wet brushed and sponged or cleaned by some equivalent method to remove all visible residue.

3.03 CLEAN-UP PROCEDURE

- A. Remove and containerize all visible accumulations of asbestos-containing material and asbestos-contaminated debris utilizing rubber dust pans and rubber squeegees to move material around. Do not use metal shovels to pick up or move accumulated waste. Special care shall be taken to minimize damage to floor sheeting.
 - 1. Some HEPA vacuums might not be wet-dry vacuums. To pick up excess water and gross wet debris, a wet-dry shop vacuum may be used. This will be contaminated and require cleaning prior to removal from the work area.
- B. Wet clean all surfaces in the work area using rags, mops, and sponges as appropriate on a daily basis.
- C. Decontamination enclosures shall be HEPA vacuumed and/or wet cleaned at the end of each shift.
- D. Remove all containerized waste from the work area and waste pass-out airlock.
- E. Decontaminate all tools and equipment and remove at the appropriate time in the cleaning sequence.
- F. Cleanings and decontamination shall follow the appropriate variance or the incleaned until it is in compliance with federal, state, and local requirements. Additional cleaning cycles and air monitoring shall be provided, as necessary, at no cost to the Owner until these criteria have been met.
- G. Following the satisfactory completion of clearance air monitoring as specified in Section 02074, and after obtaining written permission of Owner, remaining barriers may be removed and properly disposed of. A final visual inspection by the Owner shall ensure that no contamination remains in the work area. Unsatisfactory conditions may require additional cleaning and air monitoring.

* * * * *

SECTION 02086

ASBESTOS ABATEMENT

WASTE DISPOSAL PROCEDURES

PART 1 - GENERAL

1.01 DESCRIPTION

- A. Related Requirements Specified Elsewhere
 - 1. Asbestos Abatement Procedures: Section 02085.
- B. As the work progresses, to prevent exceeding available storage capacity on site, sealed and labeled containers of asbestos-containing waste shall be removed and transported to the prearranged disposal location.
- C. All containers of asbestos-containing waste shall be labeled with the name of the waste generator and the location at which the waste was generated.
- D. Disposal of all regulated asbestos-containing material must occur at an authorized site in accordance with regulatory requirements of NESHAP 40 CFR 61.156, NYSDEC 6NYCRR364, and local guidelines and regulations.
- E. All dump receipts, trip tickets, transportation manifests, or other documentation of disposal shall be delivered to the Owner for his records.
 - 1. A record keeping format utilizing a chain of custody form which includes the names and addresses of the Generator (Owner), Contractor, pickup site, disposal site, the estimated quantity of the asbestos waste, and the type of containers used.
 - 2. The form should be signed by the Generator, the Contractor, the truck drivers, and the disposal site operator, as the responsibility for the material changes hands.
 - 3. If a separate hauler is employed, his name, address, telephone number, and signature should also appear on the form.

PART 2 - PRODUCTS - NOT APPLICABLE

PART 3 - EXECUTION

3.01 TRANSPORTATION TO THE LANDFILL - (REGULATED ASBESTOS CONTAINING MATERIAL)

- A. Once drums, bags, and wrapped components have been removed from the work area, they shall be loaded into an enclosed, hardbody, lockable truck for transportation.
- B. When moving containers, utilize hand trucks, carts, and proper lifting techniques to avoid back injuries. Trucks with lift gates are helpful for raising drums during truck loading.
- C. The enclosed cargo area of the truck shall be free of debris and lined with 2 layers of 6 mil polyethylene sheeting to prevent contamination from leaking or spilled containers. Floor sheeting shall be installed

first and extend up the sidewalls. Ceiling and wall sheeting shall be overlapped and taped into place.

- D. Drums shall be placed on level surfaces in the cargo area and packed tightly together to prevent shifting and tipping. Large structural components shall be secured to prevent shifting and have bags placed on top. Do not throw containers into truck cargo area.
- E. Personnel loading asbestos-containing waste shall be protected by disposable clothing including head, body, and foot protection, and at a minimum, half-face piece, air-purifying, dual cartridge respirators equipped with high efficiency filters.
- F. Any debris or residue observed on containers or surfaces outside of the work area resulting from clean-up or disposal activities shall be immediately cleaned up using HEPA filtered vacuum equipment and/or wet methods as appropriate.
- G. Large metal dumpsters are sometimes used for asbestos waste disposal. These should have doors or tops that can be closed and locked to prevent vandalism or other disturbance of the bagged asbestos debris and wind dispersion of asbestos fibers. Unbagged material shall not be placed in these containers, nor shall they be used for non-asbestos waste. Bags shall be placed, not thrown, into these containers to avoid splitting.
- H. The waste hauler shall provide a copy of his "Industrial Waste Hauler Permit" specifically for asbestos-containing material required pursuant to NYSDEC regulation 6 NYCRR364.

3.02 DISPOSAL AT THE LANDFILL - (REGULATED ASBESTOS CONTAINING MATERIAL)

- A. Upon reaching the landfill, trucks are to approach the dump location as closely as possible for unloading of the asbestos-containing waste.
- B. Bags, drums, and components shall be inspected as they are off-loaded at the disposal site. Material in damaged containers shall be repacked in empty drums or bags as necessary. (Local requirements may not allow the disposal of asbestos waste in drums. Check with appropriate agency and institute appropriate alternative procedures.)
- C. Waste containers shall be placed on the ground at the disposal site, not pushed or thrown out of trucks (weight of wet material could rupture containers).
- D. Personnel off-loading containers at the disposal site shall wear protective equipment consisting of disposable head, body, and foot protection and, at a minimum, half-face piece, air-purifying, dual cartridge respirators equipped with high efficiency filters.
- E. Following the removal of all containerized waste, the truck cargo area shall be decontaminated using HEPA vacuums and/or wet methods to meet the no-visible residue criteria. Polyethylene sheeting shall be removed and discarded along with contaminated cleaning materials and protective clothing, in bags or drums at the disposal site.
- F. If landfill personnel have not been provided with personal protective equipment for the compaction operation by the landfill operator, Contractor shall supply protective clothing and respiratory protection for the duration of this operation.

* * * * *

APPENDIX

ACORD. CERTIFICATE OF INSURANCE

ISSUE DATE (MM/DD/YY)

PRODUCER

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES BELOW.

COMPANIES AFFORDING COVERAGE

COMPANY LETTER A

COMPANY LETTER B

COMPANY LETTER C

COMPANY LETTER D

COMPANY LETTER E

INSURED

COVERAGES

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED TO THE INSURED NAMED ABOVE FOR THE POLICY PERIOD INDICATED, NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT OR OTHER DOCUMENT WITH RESPECT TO WHICH THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN. THE INSURANCE AFFORDED BY THE POLICIES DESCRIBED HEREIN IS SUBJECT TO ALL THE TERMS, EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY PAID CLAIMS.

CO LTR	TYPE OF INSURANCE	POLICY NUMBER	POLICY EFFECTIVE DATE (MM/DD/YY)	POLICY EXPIRATION DATE (MM/DD/YY)	LIMITS
	GENERAL LIABILITY <input type="checkbox"/> COMMERCIAL GENERAL LIABILITY <input type="checkbox"/> CLAIMS MADE <input type="checkbox"/> OCCUR. <input type="checkbox"/> OWNER'S & CONTRACTOR'S PROT.				GENERAL AGGREGATE \$ PRODUCTS-COMP/OP AGG. \$ PERSONAL & ADV. INJURY \$ EACH OCCURRENCE \$ FIRE DAMAGE (Any one fire) \$ MED. EXPENSE (Any one person) \$
	AUTOMOBILE LIABILITY <input type="checkbox"/> ANY AUTO <input type="checkbox"/> ALL OWNED AUTOS <input type="checkbox"/> SCHEDULED AUTOS <input type="checkbox"/> HIRED AUTOS <input type="checkbox"/> NON-OWNED AUTOS <input type="checkbox"/> GARAGE LIABILITY				COMBINED SINGLE LIMIT \$ BODILY INJURY (Per person) \$ BODILY INJURY (Per accident) \$ PROPERTY DAMAGE \$
	EXCESS LIABILITY <input type="checkbox"/> UMBRELLA FORM <input type="checkbox"/> OTHER THAN UMBRELLA FORM				EACH OCCURRENCE \$ AGGREGATE \$ STATUTORY LIMITS
	WORKER'S COMPENSATION AND EMPLOYERS' LIABILITY				EACH ACCIDENT \$ DISEASE-POLICY LIMIT \$ DISEASE-EACH EMPLOYEE \$
	OTHER				

DESCRIPTION OF OPERATIONS/LOCATIONS/VEHICLES/SPECIAL ITEMS

CERTIFICATE HOLDER

Niagara Mohawk Power Corp
 System Risk Management
 100 Erie Blvd West
 Syracuse, NY 13202

CANCELLATION

SHOULD ANY OF THE ABOVE DESCRIBED POLICIES BE CANCELLED BEFORE THE EXPIRATION DATE THEREOF, THE ISSUING COMPANY WILL ENDEAVOR TO MAIL 30 DAYS WRITTEN NOTICE TO THE CERTIFICATE HOLDER NAMED TO THE LEFT, BUT FAILURE TO MAIL SUCH NOTICE SHALL IMPOSE NO OBLIGATION OR LIABILITY OF ANY KIND UPON THE COMPANY, ITS AGENTS OR REPRESENTATIVES.

AUTHORIZED REPRESENTATIVE

STATE OF)
) ss.: Contractor's Release,
COUNTY OF) Release of Lien and
 Affidavit of Payment

KNOW ALL MEN BY THESE PRESENTS that _____
_____ (hereinafter
"Contractor") furnishing material and/or performing work for
Niagara Mohawk Power Corporation (hereinafter "NMPC") under
Purchase Order _____, Dated _____, and
all amendments thereto, in consideration of the sum of
\$ _____, which has been or is to be paid
pursuant to said agreement, including all extras to date, upon
payment of the said sum by Niagara Mohawk Power Corporation,
hereby releases, remises, and forever discharges Niagara
Mohawk Power Corporation, its officers, agents, and employees,
of and from all liabilities, obligations, claims and demands
whatsoever under or arising from the said contract.

Further, said Contractor does hereby release the said
NMPC from all manner of debts, sums of money, liens, claims,
and demands of whatsoever kind, which it now has or might have
against it or against any building and land owned by NMPC by
reason of the premises so that the owner of said premises and
its successors and assigns shall be freed and discharged of
said claims, and so that it shall and may hold and enjoy any
of the said buildings and land affected by this contract freed
and discharged from all liens, claims and demands whatsoever
which the Contractor now has or might or could have on or
against the same, if these presents had not been made.

The said Contractor does hereby covenant, warrant, and

represent that it has paid or will forthwith pay the moneys due to discharge the claims of all subcontractors, suppliers, materialmen and laborers or any debts owed by Contractor to any of them who have furnished material or performed labor to date in connection with said contract, and, further, that it shall hold said funds in trust to the extent necessary to do so, and further does covenant and agree to execute, acknowledge, and obtain and deliver all such further releases and other instruments as the said owner of said premises shall require for the better releasing of any and all claims which the Contractor or any of its subcontractors, suppliers, materialmen or laborers could have or claim as of the date hereof.

IN WITNESS WHEREOF, the said Contractor has hereunto set his hand and seal, or caused these presents to be signed by its proper corporate officers and caused its proper corporate seal to be hereto affixed, this _____ day of _____, 19__.

Contractor

By _____

Title _____

STATE OF)
)
COUNTY OF) ss.:

_____, being duly sworn, on his oath deposes and says that he executed the foregoing Release and Affidavit on behalf of _____ therein named pursuant to due authority, that all work required to be performed as of this date under said contract has been performed, that all materialmen and laborers who have furnished materials or performed labor in connection with said contract have been paid for in full in actual cash. Deponent makes this affidavit from facts within his own knowledge and to induce the said Niagara Mohawk Power Corporation to make a payment of \$_____ to Contractor, which represents full payment in accordance with said contract, including extras to date, knowing that the said Niagara Mohawk Power Corporation relies upon the truth of the statements herein contained.

Company and Title

Sworn and subscribed to before me
this _____ day of _____ ,
19__.

Notary Public

Material Safety Data Sheet

May be used to comply with
OSHA's Hazard Communication Standard,
29 CFR 1910.1200. Standard must be
consulted for specific requirements.

U.S. Department of Labor

Occupational Safety and Health Administration
(Non-Mandatory Form)

Form Approved
OMB No. 1218-0072

**IDENTITY** (As Used on Label and List)

Note: Blank spaces are not permitted. If any item is not applicable, or no
information is available, the space must be marked to indicate that.

Section I

Manufacturer's Name

Emergency Telephone Number

Address (Number, Street, City, State, and ZIP Code)

Telephone Number for Information

Date Prepared

Signature of Preparer (optional)

Section II — Hazardous Ingredients/Identity Information

Hazardous Components (Specific Chemical Identity; Common Name(s))

OSHA PEL

ACGIH TLV

Other Limits
Recommended

% (optional)

Section III — Physical/Chemical Characteristics

Boiling Point

Specific Gravity (H₂O = 1)

Vapor Pressure (mm Hg.)

Melting Point

Vapor Density (AIR = 1)

Evaporation Rate
(Butyl Acetate = 1)

Solubility in Water

Appearance and Odor

Section IV — Fire and Explosion Hazard Data

Flash Point (Method Used)

Flammable Limits

LEL

UEL

Extinguishing Media

Special Fire Fighting Procedures

Unusual Fire and Explosion Hazards

Section V — Reactivity Data

Stability	Unstable		Conditions to Avoid
	Stable		

Incompatibility (*Materials to Avoid*)

Hazardous Decomposition or Byproducts

Hazardous Polymerization	May Occur		Conditions to Avoid
	Will Not Occur		

Section VI — Health Hazard Data

Route(s) of Entry: Inhalation? Skin? Ingestion?

Health Hazards (*Acute and Chronic*)

Carcinogenicity: NTP? IARC Monographs? OSHA Regulated?

Signs and Symptoms of Exposure

Medical Conditions
Generally Aggravated by Exposure

Emergency and First Aid Procedures

Section VII — Precautions for Safe Handling and Use

Steps to Be Taken in Case Material Is Released or Spilled

Waste Disposal Method

Precautions to Be Taken in Handling and Storing

Other Precautions

Section VIII — Control MeasuresRespiratory Protection (*Specify Type*)

Ventilation	Local Exhaust	Special
	Mechanical (General)	Other

Protective Gloves Eye Protection

Other Protective Clothing or Equipment

Work/Hygienic Practices

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
A. Site Work					
1. Storm Management					
a. Manholes		EA.			
b. Catch Basins		EA.			
c. Storm Piping		L.F.			
(List Each Size)					
2. Sub-drain Piping					
(List Each Size)		L.F.			
3. Sanitary Sewer					
a. Manholes		EA.			
b. House Trap		EA.			
c. Piping		L.F.			
(List Each Size)					
4. Gas Service					
a. Piping		L.F.			
(List Each Size)					
b. Service Regulator		EA.			
Make:					
Model Number:					
Rating:					
Serial Number:					
5. Concrete Curbing		L.F.			
6. Concrete Walks		C.Y.			
7. Concrete Paving		C.Y.			
8. Asphalt Paving		S.Y.			
9. Fencing		L.F.			
10. Gates					
a. Swing Gates		EA.			
b. Motorized Gates		EA.			
11. Transformer Pads		C.Y.			

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
12. Generator Fuel Tank Pads		C.Y.			
B. General Construction					
1. Concrete					
a. Office Floor Slabs w/reinforcing		C.Y.			
b. Foundations w/reinforcing		C.Y.			
c. Piers w/reinforcing		C.Y.			
d. Retaining Walls		C.Y.			
2. Masonry					
a. Fire Walls		S.F.			
b. Bearing Walls		S.F.			
c. Exterior Walls		S.F.			
3. Metals					
a. Structural Framing					
1) Steel Framing		LB.			
2) Bar Joist		LB.			
3) Metal Roof Deck		LB.			
b. Light Gauge Metal Framing		LB.			
c. Stairs		LB.			
d. Railings		LB.			
4. Wood Plastics					
a. Cabinets		L.F.			
b. Countertops		L.F.			

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
5. Thermal & Moisture Protection a. Rigid Insulation Board 1) Floor 2) Foundation 3) Soffit b. Fibrous Insulation 1) Wall Insulation 2) Roof Insulation 3) Pre-engineered Bldg. Insulation c. Roofing 1) Membrane Roofing 2) Roof Edge Trim d. Doors and Windows 1) Hollow Metal Doors a) Exterior Doors b) Fire Doors c) Interior Doors 2) Wood Doors 3) Special Doors a) Overhead Doors 4) Aluminum Entrance & Storefront 5) Windows a) Office		S.F. S.F. S.F. S.F. S.F. S.F. S.F. L.F. EA. EA. EA. EA. EA. EA. S.F. EA/SF			
6. Interior Finishes a. Gypsum Wallboard System b. Acoustical Ceilings c. Flooring 1) Vinyl Tile 2) Carpet (Office) 3) Quarry Tile		S.F. S.F. S.F. S.Y. S.F.			
7. Specialties a. Partitions 1) Toilet 2) Office		EA. EA.			

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
8. Equipment a. Dock Levelers Make: Model Number: Rating: Serial Numbers: b. Dock Seal Make: Model Number: Serial Numbers: c. Trailer Locks Make: Model Number: Serial Numbers: d. Stove and Exhaust Hood Make: Model Number: Rating: Serial Numbers: e. Refrigerator Make: Model Number: Rating: Serial Numbers: f. Microwave Oven Make: Model Number: Rating: Serial Numbers:		EA.			
		EA.			
		EA.			
		EA.			
		EA.			
		EA.			

1. All items must be inventoried and tagged with a unique identification number.
 2. The inventory must be updated annually.
 3. The inventory must be maintained in a secure location.
 4. The inventory must be accessible to all personnel.
 5. The inventory must be maintained in a secure location.

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
9. Special Construction a. Pre-engineered Building 1) Structural Steel 2) Roof System 3) Wall System 4) Trim & Gutters b. Storage Rack System 1) Pallet Racks a) Interior Racks b) Exterior Racks 2) Drive-in Racks a) Interior Racks b) Exterior Racks 3) Cantilever Racks a) Interior Racks b) Exterior Racks 4) Flammable Liquid Cabinets 5) Steel Shelving (List by Size) 6) Shelf Racks 7) Battery Charger Racks 8) Staking Rack & Wire Containers c. Wire Guidance System 1) Wire 2) Line Driver Make: Model Number: Rating: Serial Numbers:		L.B. S.F. S.F. L.F. L.F. L.F. L.F. L.F. L.F. L.F. EA. L.F. L.F. L.F. EA. L.F. EA.			

Construction Item	Description	Unit	Quantity	Unit	Total Cost
C. Heating & Air Conditioning					
1. Heating/Cooling Systems					
a. Roof Top HVAC Units Including Curbs		EA.			
Make:					
Model Number:					
Capacity Rating:					
Serial Numbers:					
b. Electric Heating Units		EA.			
Make:					
Model Number:					
Rating:					
Serial Numbers:					
c. Wall Fin Radiation		EA.			
Make:					
Model Number:					
Rating:					
Serial Numbers:					
d. Ductwork		LB.			
e. Diffusers and Grilles		EA.			
f. Packaged Terminal Air Conditioning Units		EA.			
Make:					
Model Number:					
Rating:					
Serial Numbers:					
g. Gas Fired Heating Equipment		EA.			
Make:					
Model Number:					
Capacity Rating:					
Serial Number:					

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COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
2. Ventilation System a. Fans Make: Model Number: Rating: Serial Numbers: b. Ductwork c. Grilles		EA.			
D. Electric 1. Electric Service a. Conduit b. Wire c. Transformers (Main) Make: Model Number: Rating: Serial Numbers: d. Main Disconnect Make: Model Number: Rating: Serial Numbers:		L.F. L.F. EA. EA.			

COST BREAKDOWN

2. Power

a. Distribution

1) Panel Boards

I.D. Name:

Make:

Model Number:

Rating:

Serial Numbers:

2) Conduits
(List Each Size)

3) Wire
(List Each Size)

4) Transformers

Make:

Model Number:

Rating:

Serial Numbers:

5) Disconnect Switches

Rating:

6) Starters

Rating:

7) Receptacles

CONFIDENTIAL

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
3. Lighting a. Interior 1) Light Fixtures Type: Make: Model Number: Rating: 2) Exit & Emergency Lighting Type: Make: Model Number: Rating: b. Exterior 1) Building Lighting Type: Make: Model Number: Rating: 2) Site Lighting Type: Make: Model Number: Rating: Serial Numbers: 3) Light Poles 4) Conduits and Wire (List by Size)		EA.			
		EA.			
		EA.			
		EA.			
		EA. L.F.			
4. Telephone System a. Conduit and Wire b. Outlets		L.F. EA.			

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
5. Intercom System					
a. System		EA.			
Make:					
Model Number:					
Serial Numbers:					
b. Speakers		EA.			
Make:					
Model Number:					
Serial Numbers:					
c. Console		EA.			
Make:					
Model Number:					
Serial Numbers:					
d. Conduit and Wire		L.F.			
6. Fire Alarm System					
a. Fire Alarm Panel		EA.			
Make:					
Model Number:					
Rating:					
Serial Numbers:					
b. Detectors		EA.			
Make:					
Model Number:					
Rating:					
Serial Numbers:					
c. Pull Stations		EA.			
Make:					
Model Number:					
Rating:					
Serial Numbers:					
d. Conduit and Wire		L.F.			

Continuing Property Records

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
7. Emergency Generator					
a. Generator Set					
Make:					
Model Number:					
Rating:					
Serial Numbers:					
b. Transfer Switch					
Make:					
Model Number:					
Rating:					
Serial Numbers:					
c. Fuel Tank and Accessories					
Make:					
Model Number:					
Rating:					
Serial Numbers:					
d. Conduit and Wire					
e. Level Control/Alarm System					
1) Equipment					
Make:					
Model Number:					
Rating:					
Serial Numbers:					
2) Conduit and Wire					
f. Battery Chargers					
1) Chargers					
Make:					
Model Number:					
Rating:					
Serial Numbers:					
2) Conduit and Wire					

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

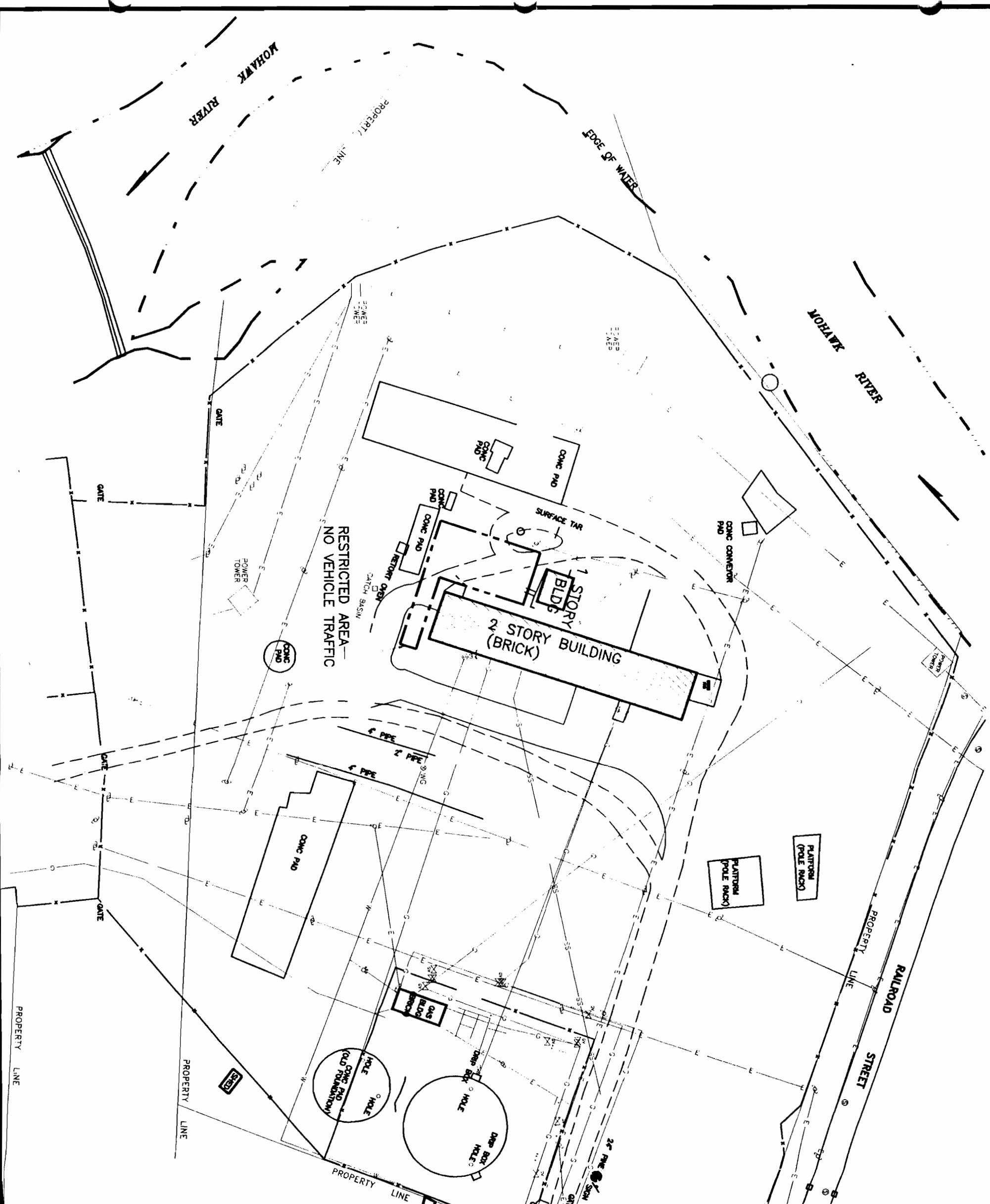
Construction Item	Description	Unit	Quantity	Unit	Total Cost
2. Sanitary and Vent System a. Piping 1) Above Floor a) Cooper b) Cast Iron c) Galvanized Steel 2) Below Floor b. Cleanouts c. Floor Drains		L.F. L.F. L.F. L.F. L.F. L.F. L.F.			
3. Storm System a. Piping 1) Above Floor (List by Size) 2) Below Floor (List by Size) b. Cleanouts c. Roof Drains		L.F. L.F. EA. EA.			
4. Gas System a. Gas System b. Valves c. Regulators Make: Model Number: Rating: Serial Number:		L.F. EA. EA.			

COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
5. Domestic Water System a. Piping b. Valves c. Fire Hydrants Make: Model Number: d. Yard Valves Make: Model Number: e. Wall Hydrants Make: Model Number:		L.F. EA. EA. EA. EA.			
F. Fire Protection 1. Wet Pipe System Piping a. Piping (List by Size) b. Heads 2. Dry Pipe System Piping a. Piping (List by Size) b. Heads 3. In-Rack System Piping a. Piping (List by Size) b. Heads 4. Hose Rack System a. Piping (List by Size) b. Hose Racks 5. Alarm Valves Make: Model Number: 6. Control Valves Make: Model Number:		L.F. EA. L.F. EA. L.F. EA. L.F. EA. EA. EA.			

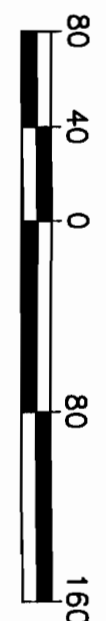
COST BREAKDOWN FOR CONTINUING PROPERTY RECORDS

Construction Item	Description	Unit	Quantity	Unit	Total Cost
7. Fire Extinguishers		EA.			
a. CO2					
b. Water					



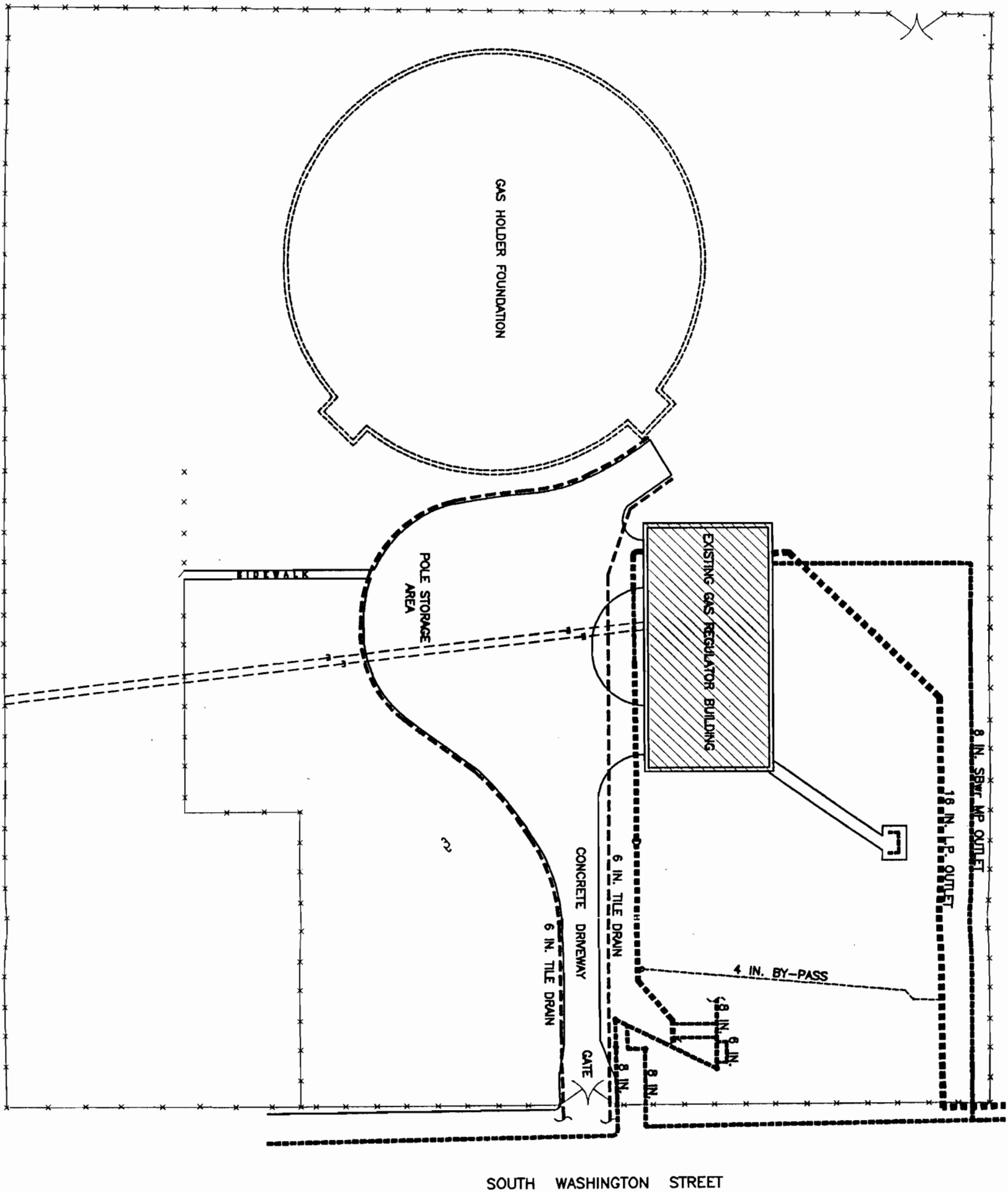
LEGEND

- POWER LINE
- GAS LINE
- FENCE
- UTILITY POLE
- GAS VALVE
- MANHOLE
- WATER
- HYDRANT
- BUILDING TO BE DEMOLISHED
- RESTRICTED AREA NO VEHICLE TRAFFIC



GRAPHIC SCALE IN FEET
PROJECT NO. 92-103.01

NIAGARA MOHAWK POWER CORPORATION SYRACUSE, N.Y.			
KINGSLEY AVENUE			
GAS REGULATING STATION			
TRANSPORTATION BUILDING			
DEMOLITION PLAN			
DES. meh	DR. meh	DATE	SCALE 2/9/94
APPROVED	APPROVED		INDEX 4.2-K3-B1
APPROVED	APPROVED	NO.	DEMO-1



SOUTH WASHINGTON STREET

LEGEND

- PROPERTY LINE
- STORM SEWER
- ELECTRICAL LINES
- GAS LINES
- SANITARY SEWER
- WATER LINES
- FENCE
- UNDERDRAIN
- UTILITY POLE
- GAS VALVE
- HYDRANT
- MANHOLE
- BUILDING TO BE DEMOLISHED

BASE MAP INFORMATION DERIVED FROM
NMPIC INDEX NO. 4.2-W25-M5
REVISION DATE 3/20/68
LOCATION OF SOME STRUCTURES APPROXIMATED
FROM COLOR AERIAL PHOTOGRAPHS



PROJECT NO. 92-103.03

NIAGARA MOHAWK

NIAGARA MOHAWK POWER CORPORATION
SYRACUSE, N.Y.

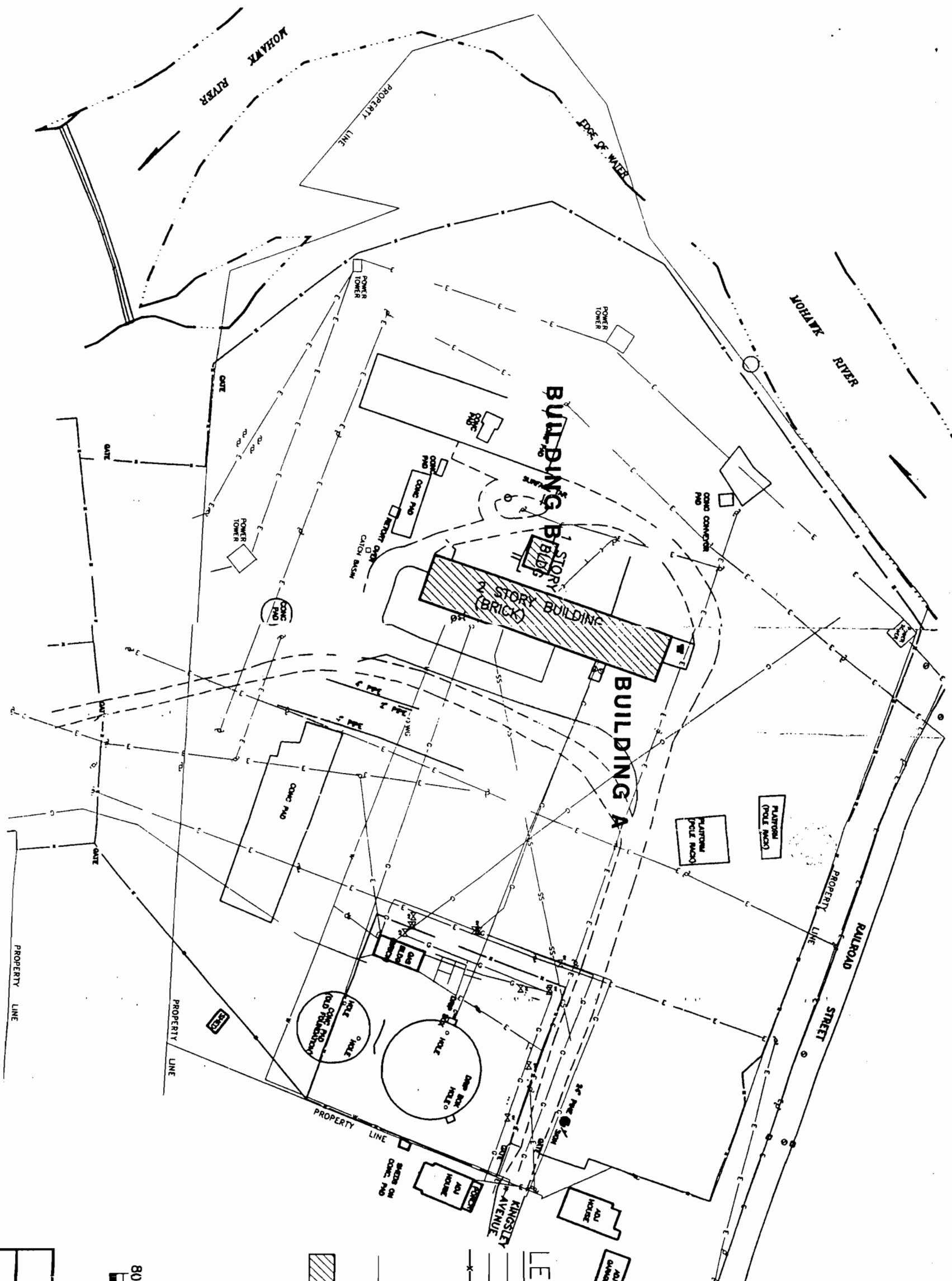
SOUTH WASHINGTON STREET

GAS REGULATOR STATION

BUILDING

DEMOLITION PLAN

DES.	me h	DR.	me h	CK.	DATE	2/11/94	SCALE	1"=30'
APPROVED								
INDEX								
NO.								



LEGEND

- E — POWER LINE
- G — GAS LINE
- F — FENCE
- U — UTILITY POLE
- V — GAS VALVE
- M — MANHOLE
- W — WATER
- H — HYDRANT
- D — BUILDING TO BE DEMOLISHED



GRAPHIC SCALE IN FEET

PROJECT NO. 92-103.01

NY MOHAWK

NIAGARA MOHAWK POWER CORPORATION
SYRACUSE, N.Y.

KINGSLEY AVENUE, Rome
GAS REGULATING STATION
TRANSPORTATION BUILDING

AS-1

KINGSLEY AVE, ROME, NY
ASBESTOS ABATEMENT

DATE: 5-18-94
DRAWN: JIE
NO: 4902

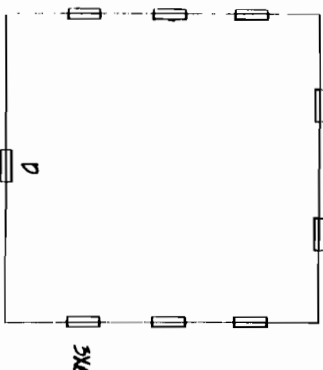
Jack Eisenbach Engineering, P.C.
185 Genesee Street, Utica, NY 13501 • 315-735-1916

LEGEND

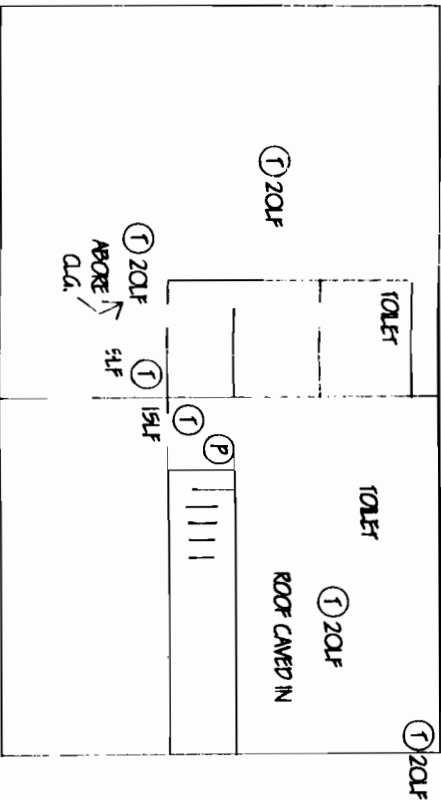
- WINDOW
- NON-ASBESTOS PIPE
- TRANSITE PIPE

MATERIAL	LOCATION	AMOUNT
PIPE INSULATION	GROUND FLOOR	15 LIN. FT.
WINDOW CAULK	WINDOWS	650 LIN. FT.
TRANSITE PIPE	THROUGHOUT	210 LIN. FT.
TRANSITE CEILING	GROUND FLOOR	2,400 SQ. FT.
ROOFING	ROOF	9,700 SQ. FT.

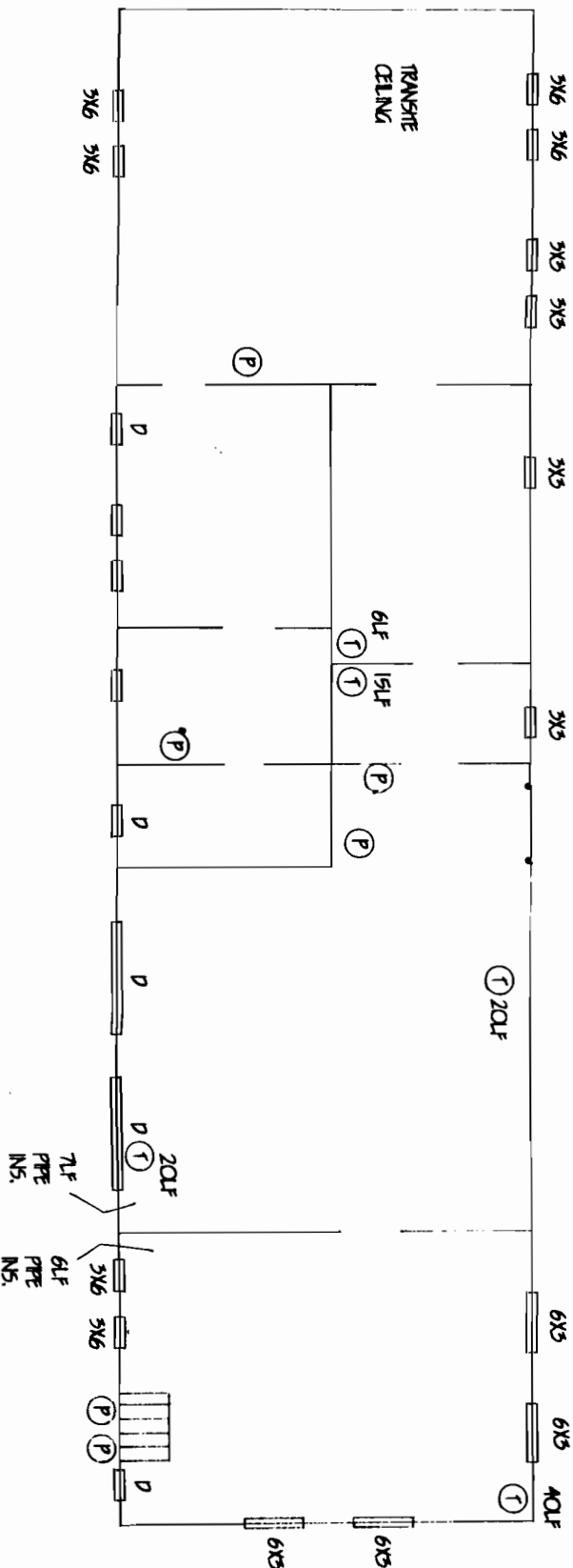
TABLE 1



BUILDING B



BUILDING A - SECOND FLOOR



BUILDING A - FIRST FLOOR

BUILDING B WORK AREA NOTES

- 1 - THE WORK CONSISTS OF REMOVING APPROXIMATELY 1000 SQ. FT. OF BUILT-UP ROOFING MATERIAL.
- 2 - THE WORK WILL BE DONE FOLLOWING IN-PLANT OPERATIONS REGULATIONS.
- 3 - THE BUILDING IS SCHEDULED FOR DEMOLITION AFTER THE ABATEMENT IS COMPLETE.
- 4 - PREPARE THE WORK AREA IN ACCORDANCE WITH THE IN-PLANT REGULATIONS
- 5 - A REMOTE DECONTAMINATION CHAMBER WILL BE UTILIZED.
- 6 - THE WORK AREA WILL BE CLEARED USING PCM'S.
- 7 - NO SPECIFIC VARIANCES WILL BE UTILIZED ON THIS PROJECT AS THE TIME FRAME FOR APPROVAL WILL NOT ALLOW THE SCHEDULE TO BE MET.

BUILDING A WORK AREA NOTES

- 1 - THE WORK CONSISTS OF REMOVING AND DISPOSING OF PIPE INSULATION, WINDOW CAULK, TRANSITE PIPE, TRANSITE CEILINGS, AND BUILT-UP ROOFING AND FLASHINGS. THE QUANTITIES ARE FOUND ON TABLE 1 BELOW.
- 2 - THE ROOFING AND TRANSITE MATERIALS WILL BE ABATED FOLLOWING THE IN-PLANT REGULATIONS IN CODE RULE 56.
- 3 - THE PIPE INSULATION WILL BE ABATED FOLLOWING EITHER AV-87 WRAPPED PIPE OR AV-91 GLOVEBAGS.
- 4 - THE WINDOW CAULK IS CONSIDERED NON-FRIABLE. THE CONTRACTOR WILL PROPOSE TO THE ENGINEER THE METHOD FOR ABATING THE CAULK.
- 5 - PREPARE THE WORK AREA AND PERFORM THE WORK IN ACCORDANCE WITH CODE RULE 56 AND THE SPECIFICATIONS.
- 6 - THE OWNER, ENGINEER AND CONTRACTOR WILL AGREE ON THE LOCATION OF THE REMOTE DECONTAMINATION CHAMBERS.
- 7 - THERE IS NO POWER OR WATER IN THIS BUILDING. THE CONTRACTOR WILL EXTEND NECESSARY SERVICES TO ACCOMPLISH THE WORK.
- 8 - GIVEN THE COMPLETION SCHEDULE FOR THE ABATEMENT AND DEMOLITION, NO SPECIFIC VARIANCES WILL BE ALLOWED BECAUSE OF THE TIME REQUIRED FOR APPROVALS TO BE OBTAINED FROM THE NEW YORK STATE DEPARTMENT OF LABOR.
- 9 - THE WORK AREA WILL BE CLEARED WITH PCM'S.

PROJECT NO. 92-103.01	
N.Y. MOHAWK	
NAGARA MOHAWK POWER CORPORATION	
SYRACUSE, N.Y.	
KINGSLEY AVENUE, Rome	
GAS REGULATING STATION	
TRANSPORTATION BUILDING	

AS-2

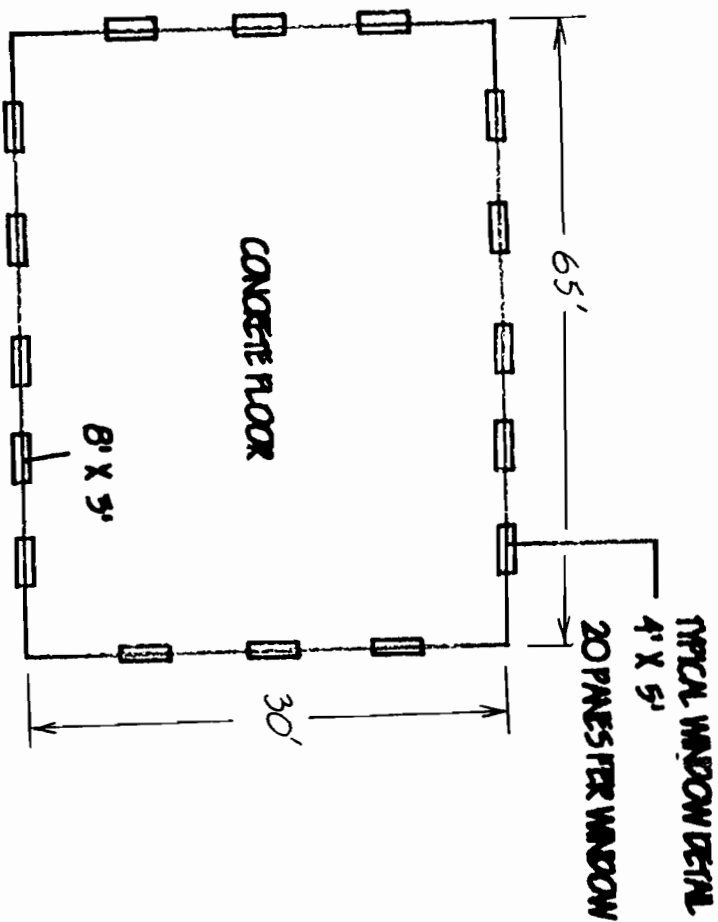
KINGSLEY AVE, ROME, NY
ASBESTOS ABATEMENT

DATE: 5-18-94
DRAWN: JIE
NO: 4902

Jack Eisenbach Engineering, P.C.
185 Genesee Street, Utica, NY 13501 • 315-735-1916



GAS REGULATOR BUILDING



- 1 - THE WORK CONSISTS OF THE REMOVAL AND DISPOSAL OF APPROXIMATELY 750 LINEAR FEET OF WINDOW CAULK AND 200 LINEAR FEET OF ROOF FLASHINGS.
- 2 - THE ROOFING FLASHINGS WILL BE ABATED FOLLOWING THE IN-PLANT REGULATIONS IN CODE RULE 56.
- 3 - THE WINDOW CAULK IS CONSIDERED NON-FRIABLE. THE CONTRACTOR WILL PROPOSE TO THE ENGINEER THE METHOD FOR ABATING THE CAULK.
- 5 - PREPARE THE WORK AREA AND PERFORM THE WORK IN ACCORDANCE WITH CODE RULE 56 AND THE SPECIFICATIONS.

- 3 - THE WINDOWCAULK IS CONSIDERED NON-RIABLE. THE CONTRACTOR WILL PROPOSE TO THE ENGINEER THE METHOD FOR ABATING THE CAULK.
- 5 - PREPARE THE WORK AREA AND PERFORM THE WORK IN ACCORDANCE WITH CODE RULE 56 AND THE SPECIFICATIONS.
- 6 - THE OWNER, ENGINEER AND CONTRACTOR WILL AGREE ON THE LOCATION OF THE REMOTE DECONTAMINATION CHAMBERS.
- 7 - THERE IS NO POWER OR WATER IN THIS BUILDING. THE CONTRACTOR WILL EXTEND NECESSARY SERVICES TO ACCOMPLISH THE WORK.
- 8 - GIVEN THE COMPLETION SCHEDULE FOR THE ABATEMENT AND DEMOLITION, NO SPECIFIC VARIANCES WILL BE ALLOWED BECAUSE OF THE TIME REQUIRED FOR APPROVALS TO BE OBTAINED FROM THE NEW YORK STATE DEPARTMENT OF LABOR.
- 9 - THE WORK AREA WILL BE CLEARED WITH PCM'S.

PROJECT NO. 92-103.03

NY NIAGARA
NY MOHAWK

NIAGARA MOHAWK POWER CORPORATION
STROUSE, N.Y.

SOUTH WASHINGTON STREET

GAS REGULATOR STATION

BUILDING