ASBESTOS ABATEMENT SPECIFICATIONS BID NO. 9423

Abatement for Summer 2007 Transite Panel Replacement



Smith Middle School Wattles Elementary School

Owner

Troy School District

1140 Rankin Street Troy, Michigan 48083

Building(s)

SMITH MIDDLE SCHOOL

5835 Donaldson Drive Troy, Michigan 48085

WATTLES ELEMENTARY SCHOOL

3555 Ellenboro Drive Troy, Michigan 48083

hA Project Number: 07409

Issue Date: Thursday, June 7, 2007

 Pre-Bid:
 4:00 p.m., Thursday, June 14, 2007

 Bids Due:
 3:00 p.m., Thursday, June 21, 2007

ASBESTOS ABATEMENT SPECIFICATIONS BID NO. 9423

Abatement for Summer 2007 Transite Panel Replacement



Smith Middle School Wattles Elementary School

Owner Troy School District 1140 Rankin Street

1140 Rankin Street Troy, Michigan 48083

Buildings

SMITH MIDDLE SCHOOL

5835 Donaldson Drive Troy, Michigan 48085

WATTLES ELEMENTARY SCHOOL

3555 Ellenboro Drive Troy, Michigan 48083

AHERA PROJECT DESIGNER ASBESTOS CONSULTANT

Name: Korwin C. Stevens
State of Accreditation: Michigan

State of Accreditation: Michigan
Accreditation Number: A32108

State Expiration Date: September 13, 2007
Training Expiration Date: September 1, 2007

healthAIR, inc. 23937 Research Drive Farmington Hills, Michigan 48335

> Phone: (248) 426-0165 Fax: (248) 427-0305

TABLE OF CONTENTS

Page
SECTION I
Bid Advertisement and Project Summary 1-
Bid Advertisement
RFQ Packet
Bidder's Agreement & Certification and Bidder Acknowledgment
SECTION II
Project Scope of Work and Requirements
Bid No. 07.06 - Smith Middle School and Wattles Elementary School18-2Project Schedule Information29-3
SECTION III
General Conditions37-4General Procedures for Asbestos Abatement46-6Bidder's Checklist for RFQ Submittals7Project Designer Accreditation Information7Prevailing Wage Rate Information72-9
SECTION IV
Pre-Project Submittals

SECTION I

BID ADVERTISEMENT and PROJECT SUMMARY RFQ PACKET

BID ADVERTISEMENT

Troy School District will receive sealed **Request for Quotation** (*RFQ*) **Packets** until 3:00 p.m. Local Time, Thursday, June 21, 2007 for:

Asbestos Abatement / Bid No. 9423

21

Smith Middle School Wattles Elementary School

Summer 2007 Transite Panel Replacement

A General Pre-Bid Examination will be held to review and answer questions relating to the projects:

Time: 4:00 p.m. Local Time on Thursday, June 14, 2007

At: Smith Middle School 5835 Donaldson Drive Troy, Michigan 48085

Directions: A map of the TSD buildings discussed in this Bid Advertisement follows the Project Summary.

Schedule: The format of the Pre-Bid Examination will be an initial presentation on the bidding process and the scope

of work. This activity will be conducted in the Cafeteria from approximately 4:00 p.m. to 5:00 p.m. Afterwards, healthAIR, inc. will provide brief building tour of the building and host a question & answer session for interested bidders. The building specific review with healthAIR, inc. is not required, but is

encouraged.

All Request For Quotation Packets must be mailed or delivered to the Troy School District's Purchasing Office:

Format: All Request for Quotation Packets shall be submitted in a sealed envelope and labeled as outlined below.

Mail To: SEALED BID: ASBESTOS

Summer 2007 Transite Panel Replacement - Bid No. 9423

Attn: Purchasing Office Troy School District 1140 Rankin Street Troy, Michigan 48083

All Request for Quotation Packets must be received by the Troy School District' Purchasing Department no later than:

Time: 3:00 p.m. Local Time, Thursday, June 21, 2007

At: Troy School District

Purchasing Office 1140 Rankin Street Troy, Michigan 48083

Format: All official hard copy Request for Quotation Packets must be received prior to the date and time specified

in order to be accepted.

All Request for Quotation Packets will be publicly opened:

Time: 3:00 p.m. Local Time, Thursday, June 21, 2007

At: Troy School District

Purchasing Office 1140 Rankin Street Troy, Michigan 48083

Format: Complete Bid Tabulations will be faxed to all plan holders by 12:00 p.m., Friday, June 22, 2007. The

Owner and Owner's Representatives request that no Bidders call for bid results prior to 12:00 p.m., Friday,

June 22, 2007.

Troy School District intends to formally award the projects no later than:

Event: Troy School District' Board of Education Meeting - Wednesday, July 10, 2007

At: Troy School District

Services Building Board Room

4420 Livernois Road Troy, Michigan 48098

Note: healthAIR, inc. w

healthAIR, inc. will issue a formal letter of intent to the low, qualified Bidder no later than Friday, June

22, 2007 to allow the recommended contractor the opportunity to prepare for the project, submit the project potification and accurately consider other hids

notification and accurately consider other bids.

Questions Regarding Project Specifications:

All questions regarding the Project Specifications should be addressed to:

Mr. Korwin Stevens, healthAIR, inc.

Office: (248) 426-0165 Mobile: (734) 576-1887 Email: kory@health-air.com

Mr. Jeff Heydanek, healthAIR, inc.

Office: (248) 426-0165 Mobile: (734) 644-1296 Email: jsh@health-air.com

All official changes and interpretations to the Project Specifications will be made via addenda only. Bidders are encouraged to fax [(248) 427-0305] or email (to the email address(es) listed above) all questions regarding the specifications, bidding procedures, etc. to healthAIR, inc.

Building/Site Visits:

All Bidders are encouraged to visit the site on their own following the Pre-Bid Examination. All Bidders must check in with the building office as soon as they reach the building. The building is open and available during the school year Monday - Friday from 4:00 p.m. - 10:00 p.m.. Due to building security, access may be limited in evening hours. It is recommended that all Bidders contact healthAIR, inc. earlier in the day to allow for notification to the building/TSD Administration.

Project Specification Documents:

Project Specification Documents will be available at available at www.health-air.com beginning on Thursday, June 7, 2007. Project Specification Documents can also be picked up by visiting healthAIR, inc.'s office at 23937 Research Drive, Farmington Hills, Michigan, between 9:00 a.m. and 4:00 p.m. starting Thursday, June 7, 2007. There will be a \$50.00 per set (non-refundable) charge for all hard copies of Project Specification Documents. Bidders must notify healthAIR, inc. twenty-four (24) hours in advance. healthAIR, inc. recommends calling the Farmington Hills office [(248) 426-0165] first to arrange for pick-up of the specifications. Project Specification Documents have not been provided by healthAIR, inc. to any advertising agencies. Specifications will not be mailed to Bidders unless pre-paid with postage.

Bidders desiring more than one (1) set of documents may obtain additional sets for \$50.00 per set (non-refundable), up to a maximum of three (3) sets. All checks should be made payable to "healthAIR, inc." Specifications will be mailed to Bidders upon receipt of pre-payment of the a non-refundable charge (\$30.00) for shipping and handling.

Bonding Requirements:

Troy School District requires that all bidders submit a Bid Bond in accordance with the requirements summarized below

and that all selected Contractors submit Performance and Labor and Materials Bonds in accordance with the requirements summarized below:

Bid Bond

Amount:

5%

Requirements:

The Bidder shall submit the required Bid Security in the form of a Bid Bond by a Treasury approved surety licensed to do business in the State of Michigan, a Cashier's Check, or a Certified Check in the amount of 5% of the bid price. The Bid Security shall be submitted with the understanding that if the bid is accepted, the Bidder will enter into a formal contract with the Owner and that the required Performance and Labor and Material Payment Bonds (as listed below and fully detailed in the General Conditions section) will be provided by the Contractor. The Bid Security oblige is Troy School District. Bidders shall agree not to withdraw proposals for a period of thirty (30) days after the bid due date

Performance Bond & Labor and Material Payment Bonds

Amount:

100%

Requirements:

The accepted Contractor will be required to furnish, in the amount of 100% of the Contract Price, satisfactory Performance Bond and Labor and Material Payment Bond by a Treasury approved surety licensed to do business in the State of Michigan. The accepted Contractor will be required to furnish the bonds prior to the start of the project. Mobilization to the project site will not begin until acceptable bonds are furnished by the accepted Contractor.

Additional Information for Bidders:

All applicable insurance policies (including asbestos specific) will be required of each accepted Bidder. Bidders must submit copies of the Contractor's current State of Michigan Asbestos Abatement License. This project is not tax exempt from State Sales Tax and/or Use Tax. All materials and supplies incorporated and used in construction and becoming a permanent part of this project will not be exempt from State Sales Tax and/or Use Tax. Prevailing wages are requested for this project.

Request for Quotation Packet - Submittal Requirements:

The <u>RFQ Packet (Pages 9-16)</u> shall be submitted on the forms furnished in this specification. The <u>RFQ Packet</u> must be submitted in duplicate. The <u>RFQ Packet</u> and all additional information requested must be submitted as follows:

Item	Item Description	Page No.
1.	RFQ Submittal Packet Cover Sheet	9
2.	Bidder's Agreement and Certification and Bidder Acknowledgment	10-11
3.	Bid No. 07.06 - Smith Middle School and Wattles Elementary School	12
4.	Familial Relationship Disclosure Statement	13
	[STATE REQUIREMENT - BID WILL NOT BE ACCEPTED WITHOUT THIS SIGNED AND	
	NOTARIZED STATEMENT]	
5.	Bidder's Statement of Qualifications and Statement of Bid Preparation	14-16
6.	Bidder's Response to Statement of Qualifications and Statement of Bid Preparation	Submit
7.	Bid Security	Submit
8.	Contractor's Current State of Michigan Asbestos Abatement License	Submit
9.	Proof of Insurance	Submit
10.	Additional Information Submitted by Bidder	Submit

healthAIR, inc. and Troy School District request that the Bidder enter "NO BID" on the bid forms in lieu of omitting the page.

- Bid No. 07.06 -

Smith Middle School and Wattles Elementary School [Project Summary for Bid Advertisement]

This project summary provides a summary of the asbestos-containing materials and non-asbestos-containing materials which will be removed as part of the bid. The scope of work, project requirements and project schedule are provided in the specification documents. The Contractor is encouraged to review all aspects of the scope-of-work when preparing the bid and is instructed not to use this summary when preparing this bid.

[ABATEMENT]

- Project T1 "Smith Middle School Transite Panel Abatement"
 - The first project for abatement at Smith Middle School includes the removal of all asbestos transite fascia panels and asbestos transite window panels from the exterior of the building. This project at Smith Middle School will involve multiple regulated areas to remove the asbestos transite materials using Class II intact/non-friable removal procedures. The projects will begin on Wednesday, July 11, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work day on Wednesday, July 18, 2007. The project schedule allows for a total of six (6) work days to complete the project, including tear down activities.
- Project T2 "Wattles Elementary School Transite Panel Abatement"

The first project for abatement at Wattles Elementary School includes the removal of all asbestos transite fascia panels and asbestos transite window panels from the exterior of the building. This project at Wattles Elementary School will involve multiple regulated areas to remove the asbestos transite materials using Class II intact/non-friable removal procedures. The projects will begin on Thursday, July 19, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work day on Tuesday, July 24, 2007. The project schedule allows for a total of four (4) work days to complete the project, including tear down activities.

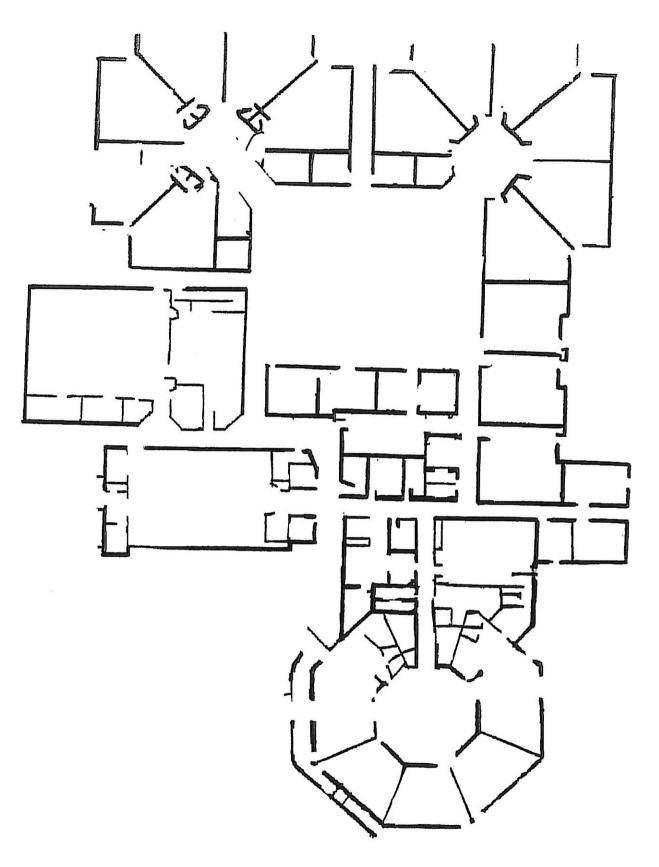
[REINSULATION]

• There are no reinsulation activities associated with this bid.

[DEMOLITION]

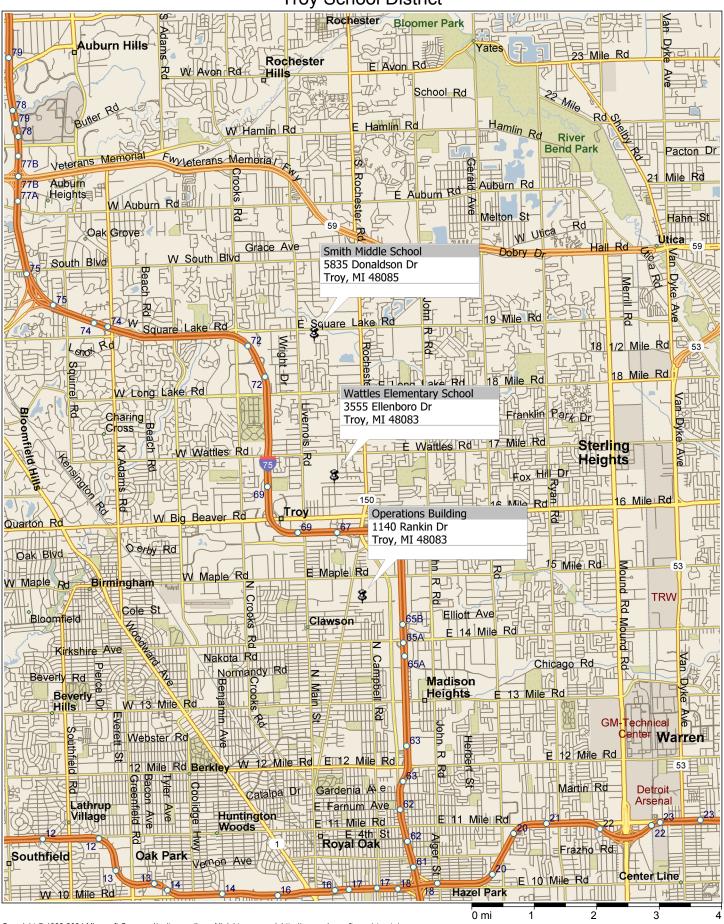
 There are no notable demolition activities performed outside of an asbestos regulated area associated with this bid.

ART ROOM TECH LAB HOME BC. . 19 HINI LAB HOME EC. 11 M œ 耳ららほ ক SHEUD 異盟じ CAPETORIUM KITCHEN GIRES COCKER-ROOM 2 m GIRLS LOCKER Storage GIRNAISIUN 12 BAND COURT POOF, BOYES 13 CHORAL Storage MAIN CENTER CENTER CENTER BOYS LOCKER-ROOM Smith Middle School MEDIA (01-B 14 U TENORER LOUNGE 甲子 15 U 17 16 0 20 33 36 18 19 34 35 2 32 26 23 22 31 30 M



Wattles Elementary School
Troy School District

Troy School District



REQUEST FOR QUOTATION SUBMITTAL PACKET

Abatement for Summer 2007 Transite Panel Replacement

(a)

Smith Middle School Wattles Elementary School

Owner

TROY SCHOOL DISTRICT

1140 Rankin Street Troy, Michigan 48083

Buildings

SMITH MIDDLE SCHOOL

5835 Donaldson Drive Troy, Michigan 48085

WATTLES ELEMENTARY SCHOOL

3555 Ellenboro Drive Troy, Michigan 48083

	BIDDER INFORMATION	
Contractor Name:		_
Address:		
Phone/Fax:	P: F:	-
E-Mail:		
Representative:		

BIDDER'S AGREEMENT AND CERTIFICATION

The undersigned Bidder, having fully examined the Project Specification Documents [including, but not limited to, Section I (the Bid Advertisement, the Project Summary and the RFQ packet), Section II (the Project Scope of Work and Requirements) and Section III (the General Conditions and the General Procedures for Asbestos Abatement)], as well as all other associated information (including the addenda listed and acknowledged on the following page), and having familiarized himself with the conditions to be encountered affecting the cost of the work, does hereby propose to satisfactorily complete all activities required to be performed and to furnish all of the labor, materials, tools, equipment and all other necessary additional services needed to complete the Asbestos Abatement Activities required in connection with this project. Addenda issued by Troy School Districtor healthAIR, inc. and acknowledged by the Bidder, are made part of the Project Specification Documents and are listed on the following page.

All Bidders were provided the opportunity to attend the Pre-Bid Examination on Thursday, June 14, 2007, and provided the opportunity for an accompanied tour of the building, and all Bidders have been encouraged, and provided the opportunity, to examine the project site/building and familiarize themselves with the work described in the Project Specification Documents. The submission of a bid for the projects described in the Project Specification Documents shall be deemed conclusive evidence that the Bidder has thoroughly examined all documents constituting this specification (including, but not limited to, those items and sections listed above), has familiarized himself with the work and requirements described and shall constitute a waiver by each of all claims of error in bid, withdrawal of bid, or payment of extras, or combination thereof, under the executed Contract, or any revision thereof. All figures set forth in the Project Specification Documents referencing sizes, amounts, or materials are estimates only and are provided for the convenience of the Bidder. The Bidder is solely and completely responsible for his own measurements and for his own determination regarding the scope of the project(s).

These specifications including, but not limited to, the Bid Advertisement, the Project Scope of Work and Requirements, the General Conditions and the General Procedures for Asbestos Abatement, have attempted to detail and address all aspects of the projects being performed for Troy School District. Nonetheless, the successful completion of the projects in a safe manner and in compliance with all applicable regulations remains as the foremost concern of Troy School District. To insure that this goal is met, it is expressly agreed by and between the parties to the contract, hereinafter to be signed between Troy School Districtand the Contractor, that Troy School Districtand/or healthAIR, inc., as the Owner's Representative, have complete control over the manner in which the projects shall proceed and may, in their sole discretion, waive provisions of these Project Specifications or require and enforce more stringent or different provisions should they, in their discretion, determine that such changes will or may more fully protect Troy School District, the Contractor, their subcontractors, agents, servants or others under their control or direction or the general public from any risks and/or situations associated with the said projects.

This provision in no way constitutes a waiver by the Contractor of his/her responsibilities to conduct said projects in accordance with all applicable regulations and in accordance with these specifications. This provision is set forth and is intended to provide Troy School Districtand/or healthAIR, inc. with the power to require additional steps to be taken to ensure that the projects proceeds in a manner to fully, to the utmost extent possible, protect Troy School Districtand/or healthAIR, inc., as well as the general public, from risks and liability associated with such projects.

After the bids are received, tabulated and evaluated by healthAIR, inc., and the apparent lowest Bidder(s) for each Bid has been determined, the Bidder(s) agrees to meet with healthAIR, inc., if so requested. For purposes of these meetings, the Bidder agrees to provide any post bid information as listed in the General Conditions. The Bidder, if awarded a contract, agrees to commence all pre-project planning and preparation activities upon receipt of a written "Notice to Proceed/Letter of Intent" and to fully complete their work in accordance with and to conform to the milestone activity dates and durations set forth in the Project Specification Documents.

The signature of a representative for the Bidder on each applicable project constitutes a full and complete agreement with the Project Specifications and the Bidder's Agreement and Certification. All Bid Forms must be completed. Bids which are not submitted should be marked "N/A", or have similar notations.

BIDDER ACKNOWLEDGMENTS			
Acknowledgment of Addenda: The Bidder has received and reviewed th	e following addenda:		
Addendum No.	Addendum No.	Addendum No	0
Dated	Dated	Dated	
Acknowledgment of Pre-Bid Conferen The Bidder has received and reviewed th [] Check here if not issued		inutes dated	
Type of Business:			
The Bidder is a (check one):	Partnership	Corporation	
The Bidder is (check all that apply):	Minority	Woman Owned	Small Business Enterprise
The Bidder hereby discloses and describes (or any officer, agent, or employee of the School District, healthAIR, inc., Barton I state in the space provided.	Bidder) and any officer,	, employee, agent, board mem	nber, or owner of Troy
		Attach ad	ditional pages if necessary
Signature of Chief Executive Office (or e	equivalent)		
Acknowledgment of Specification Deta The Bidder acknowledges that the Bidder and understands that the Bidder will not be similar oversights. The Bidders also acknown the bid forms.	r has reviewed each section be released from the Bid(s	s) due to missed abatement rel	lated activities or other
Signature of Chief Executive Office (or e	equivalent)		

Bid No. 07.06 -	
Smith Middle School	
Wattles Elementary School	
Summer 2007 Transite Panel Replacement	
The Bidder hereby agrees and certifies to comply with all require the listed and acknowledged Addenda and agrees to accept a pay	
	dollars (\$)
for all work regarding this bid as described in the "Project Scop Summary, Abatement Activities, Abatement Requirements, Addit and the Time Schedule.	
The Bidder agrees and certifies that the above stated cost includes supplies, equipment, disposal costs, general conditions, supervision and fees. The Bidder hereby agrees and certifies that if the project will accept a penalty as described in the project specifications.	n, insurance, overhead, profit and incidental expenses
The Undersigned, a Representative of the Bidder, hereby author furnish any information requested by Troy School District and/c comprising the Bidder's Statement of Qualifications. When rec submitted following award of a contract.	or their Representatives in verification of the recitals
COMPANY NAME	
PRINT NAME	
TITLE	
Alternate Bids Provided: [] None [] Attached - List Below:	
Bidder Noted Conditions/Restrictions on Bid:	
[] None [] Listed Below:	

FAMILIAL RELATIONSHIP DISCLOSURE STATEMENT

Important: This disclosure statement must be included with your bid as required by state law (Public Act 232 of 2005).

As required by Public Act 232 of 2005, all bids shall be accompanied by a sworn and notarized statement disclosing any familial relationship that exists between the owner or any employee of the bidder and any member of the Troy School District' Board of Education or the Superintendent of Schools. <u>The Board of Education shall not accept</u> a bid that does not include this sworn and notarized disclosure statement.

++++

The undersigned, the owner or authorized officer of				
	Attach additional pages if necessary			
Ву:	(bidder signature)			
Title:	(type or print)			
Date:				
Subscribed and Sworn to Before Me:				
This day of, 20 A.D., in	and for the County of,			
Michigan. My commission expires				
Signature of Notary				

BIDDER'S STATEMENT OF QUALIFICATIONS and STATEMENT OF BID PREPARATION

All questions must be answered clearly and in a comprehensive manner on Bidder supplied answer sheets. Do not submit answers on this sheet. Any Bidder failing to answer all questions may be rejected on these grounds. It is understood that the by submitting a signed bid, the Bidder is certifying the correctness of all statements and is hereby under oath. All answer sheets that are used must have a reference to this Statement of Qualifications and/or a reference to the project or Troy School District. The Bidder may submit any additional information which may be of assistance in evaluating the qualification of the Bidder. Information will only be released by Troy School District following a written request.

Corporate Information

- 1. Name of Bidder
- 2a. Permanent Main Office Address, Phone Number and Fax Number
- 2b. Additional Offices Number, Locations, Addresses, Phone Numbers and Fax Numbers

Corporate History

- 3. When was (Name of Bidder) Organized?
- 4. If a Corporation, where is (Name of Bidder) Incorporated?
- 5. How many years has (Name of Bidder) been operating under the (Name of Bidder) name?
- 6. How many years has (Name of Bidder) been licensed in the State of Michigan for Asbestos Abatement?
- 7a. What other names are the principals of (Name of Bidder) operating under that are associated with the asbestos abatement industry?
- 7b. What other names have the principals of (Name of Bidder) operated under that have been associated with the asbestos abatement industry?
- 8. Have the principals of (Name of Bidder) filed for Chapter 11 or Chapter 13 for protection of (Name of Bidder) or for any other asbestos abatement related firm, company or organization, in the last five years? Describe.

Corporate Experience and References

- 9. Please list contracts currently on hand, including those projects which are in progress. Please provide a schedule (with actual or anticipated commencement and completion dates) and approximate gross dollar amount of each contract. Specifically highlight non-TSD projects which will be conducted at the same time as this project.
- 10. Please list all specifications (Name of Bidder) is currently submitting bids for which have overlapping project dates. Please provide a schedule with anticipated commencement and completion dates.
- 11. Have you (Name of Bidder and other entities identified in Questions 7a and 7b answers) ever failed to complete any work awarded to you?
- 12. Have you (Name of Bidder and other entities identified in Questions 7a and 7b answers) ever been disqualified from bidding in Troy School District?
- 13. Have you (Name of Bidder and other entities identified in Questions 7a and 7b answers) ever not been recommended for bid contracts when you were the low bidder in Troy School District?

- 14. Have you (Name of Bidder and other entities identified in Question 7a and 7b answers) ever not been recommended for bid contracts when you were the low bidder on a project designed by healthAIR, inc. (J. Scott Environmental, Inc.)?
- 15. Please list all projects (Name of Bidder) completed in Troy School District in the last three (3) years.
- 16. Please list all projects over \$15,000 completed by (Name of Bidder) in the last twelve (12) months (projects with Troy School District do not need to be listed in response to this question), stating approximate gross dollar amount, and the month and year completed.
- 17. Please list the experience of (Name of Bidder) in work similar to this project. Project references must include: names, addresses, and phone numbers of Building Owner's for whom projects were performed (minimum of four). This list should include only AHERA projects, which include the removal of surfacing materials as a portion of the scope-of-work.

Corporate Compliance History

- 18. Please list any and all citations with or without monetary penalty received, pending, paid or disputed by (Name of Bidder and other entities identified in Question 7a and 7b answers) during the past 3 years for failure to comply with applicable federal, state or local regulations. Describe in detail the type of citation, the reason for the citation and the ultimate disposition of same. Provide copies of all citations received in the last three (3) years and all correspondence associated with the citations.
- 19. Please provide the dates and results of the last on-site inspection by the Michigan Department of Labor & Economic Growth (Consumer & Industry Services) and the Michigan Department of Environmental Quality.
- 20. Please list all penalties incurred through non-compliance with asbestos abatement project specifications, including projects designed by firms other than healthAIR, inc., including liquidated damages/penalties, overruns in scheduled time limitations and any subsequent resolutions for (Name of Bidder) in the last three (3) years.

Corporate Resources

- 21. Please list (Name of Bidder)'s staff size, including number of foreman (accredited competent persons), number of workers and common sources for additional manpower. Estimated number of new hires for "peak" season may be listed with this response.
- 22. Please list (Name of Bidder)'s staff size, including number of foreman (accredited competent persons), number of workers and common sources for additional manpower that will be used for this project. List information for all buildings.
- 23. Please list of (Name of Bidder)'s major equipment (as of the submitting of this bid) which will be available specifically for this contract. Do not provide an inventory list. The response to this questions must specifically reference the equipment which will be available for this project. Please indicate the number of equipment, such as AFDs, showers, scaffolds, etc. which will be on-site for the duration of the project.
- 24. Please provide (Name of Bidder)'s bank references.
- 25. Please provide the name of the Bonding Company and the name and address of agent used for this bid.

Bidder's Bid Preparation Information and Miscellaneous Acknowledgments

- 26. Did a representative of the Bidder attend the Pre-Bid Examination on Thursday, June 14, 2007?
- 27. Did a representative of the Bidder conduct a field review to review the project scope of work? If yes, list the dates and times of each visit.
- 28. After a thorough review of the "Project Scope of Work and Requirements," including the Project Summary,

- Abatement Activities, Abatement Requirements, Additional Requirements and Information and the Time Schedule, did the Bidder note any project scope of work discrepancies or omissions?
- 29. Did the Bidder review and understand the "General Procedures for Asbestos Abatement", specifically the procedures outlined for asbestos flooring removal, non-asbestos carpet removal, glovebag removal activities and non-friable transite removal?
- 30. Did a representative of the Bidder review the Project Penalties section?
- 31. Did a representative of the Bidder review the Project Notifications section? Will the Contractor be able to submit the notification prior to the start of the project? Please provide any conditions relevant to the project notification.
- 32. Did a representative of the Bidder review the information regarding insurance and bonding? Does the Bidder understand that the project cannot begin until the requested Certificate of Insurance and the Performance/Payment Bonds have been submitted and approved?
- 33. Does the bid provided by the Bidder contain any work scope adjustments or qualifications, such as locations of material/quantity inconsistencies or locations of omitted materials?
- 34. Are there any submittals that the Contractor will not be able to submit prior to the start of the project?
- 35. Please list all work hour restrictions that the Bidder proposes, such as days the Contractor will not work in the event of meeting the project schedule.
- 36. Please provide a summary of all bid limitations.

Additional Information

- 37. Please provide a Bidder's Statement of Qualifications for all sub-contractors who will be used on this project. (A subcontractor does not include suppliers). Subcontractors not listed in this response will not be allowed for use on the project without the expressed written permission of healthAIR, inc. and the Owner.
- 38. Please feel free to provide any additional information which may assist the Owner and healthAIR, inc. with a complete and thorough evaluation of the bids.

SECTION II

PROJECT SCOPE of WORK and REQUIREMENTS

- Bid No. 07.06 -

Smith Middle School and Wattles Elementary School [Project Scope of Work and Requirements]

PROJECT SUMMARY -

Project Description: Bid No. 07.06 is for the necessary asbestos abatement projects at Smith Middle School and Wattles Elementary School prior to renovation activities. The projects, which will be conducted in July 2007, will include the removal and disposal of all asbestos transite fascia panels from the exteriors of the buildings.

Project Sequencing: There will be two (2) project groups for the asbestos abatement activities at Smith Middle School and Wattles Elementary School. The projects include:

Project T1 - "Smith Middle School - Transite Panel Abatement"

The first project for abatement at Smith Middle School includes the removal of all asbestos transite fascia panels and asbestos transite window panels from the exterior of the building. This project at Smith Middle School will involve multiple regulated areas to remove the asbestos transite materials using Class II intact/non-friable removal procedures. The projects will begin on Wednesday, July 11, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work day on Wednesday, July 18, 2007. The project schedule allows for a total of six (6) work days to complete the project, including tear down activities.

Project T2 - "Wattles Elementary School - Transite Panel Abatement"

The first project for abatement at Wattles Elementary School includes the removal of all asbestos transite fascia panels and asbestos transite window panels from the exterior of the building. This project at Wattles Elementary School will involve multiple regulated areas to remove the asbestos transite materials using Class II intact/non-friable removal procedures. The projects will begin on Thursday, July 19, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work day on Tuesday, July 24, 2007. The project schedule allows for a total of four (4) work days to complete the project, including tear down activities.

SCOPE OF WORK and REQUIREMENTS -

The "Abatement Activities", "Summary of Locations", "Abatement Requirements", "Final Clearance Sample Requirements", "Project Schedule" and "Project Diagrams" for the asbestos abatement projects are provided on the following pages. Information for each project is generally formatted in the following manner (by section):

• Abatement Activities

This section provides a summary of all asbestos materials and non-asbestos materials required to be removed and disposed of by the Contractor.

• Summary of Locations

For projects with more than one functional space (location), this section provides a tabular summary for all materials identified in the "Abatement Activities" section. When present, room entries and closets are included in the classroom area and are not listed individually.

• Abatement Requirements

This section provides a summary of all set-up, removal and cleaning requirements relating to the removal of the materials identified in the "Abatement Activities" section.

• Final Clearance Sample Requirements

This section provides a summary of the types of clearance samples scheduled to be collected, the number of samples to be collected and the clearance level.

• Project Schedule

This section provides a summary of the project schedule, including project start and end dates. For certain projects, additional milestone dates may be provided.

Project Diagrams

This section provides a graphical representation of the limits of the regulated area, showing all functional spaces included in the project.

"General Information and Requirements" relating to the entire bid are located after the information for Smith Middle School and Wattles Elementary School.

• General Information and Requirements

This section provides general project information and project requirements relating to all activities associated with the work at each of the Troy School District's buildings.

Project Summary:

The first project for abatement at Smith Middle School includes the removal of all asbestos transite fascia panels and asbestos transite window panels from the exterior of the building. This project at Smith Middle School will involve multiple regulated areas to remove the asbestos transite materials using Class II intact/non-friable removal procedures. The projects will begin on Wednesday, July 11, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work day on Wednesday, July 18, 2007. The project schedule allows for a total of six (6) work days to complete the project, including tear down activities.

Abatement Activities:

- 1. Remove and dispose of all asbestos transite fascia panels from the exterior of Smith Middle School.
- 2. Remove and dispose of all asbestos transite window panels from the exterior of Smith Middle School.

Summary of Locations:

Room / Location	Materials ->	TFP	TWP
Exterior		x	x
Courtyard		x	х

Key for Table

TFP Asbestos Transite Fascia Panels
TWP Asbestos Transite Window Panels
x Material present in the functional space

Abatement Requirements:

The Contractor will be allowed construct multiple negative pressure enclosures for the complete removal of all of the materials detailed in the "Abatement Activities" for Project T1.

- 1. The Contractor is responsible for all of the materials listed in the "Abatement Activities" located inside of the project areas. The project areas include all portions of the functional spaces listed in the "Summary of Locations" table.
- 1. Prior to the start of removal activities, the Owner will move all necessary furniture, fixtures, etc. a minimum of 10' from all asbestos transite window panel locations.
- 2. The regulated area will extend from approximately 8' out from the exterior wall of the building and will extend approximately 8' into the interior of the building. The regulated area will be set-up as follows:
 - Asbestos warning sign on the interior side of the regulated area (visible from inside the building).
 - Asbestos banner tape outside of the building extending a minimum of 8' from the exterior windows and fascia.
 - A minimum of one (1) layer of six-mil polyethylene sheeting will be set-up on the ground and will be secured to the building below the windows. The polyethylene sheeting will be sufficient in length to catch all debris and wrap the asbestos transite panels for disposal.
 - A minimum of one (1) layer of six-mil polyethylene sheeting will be set-up on the interior side of the windows and will be secured to the wall below the windows. The polyethylene sheeting will be sufficient in length to catch all debris and wrap the asbestos transite panels for disposal.
 - AFDs and decontamination units will not be required, unless special conditions exist (as described further in this section).
- 3. The Contractor will be required to complete all abatement activities from the outside, however, the Contractor will be allowed to access the window system from the interior. The Contractor must provide scaffolding or lifts

that comply will all required safety regulations.

- 4. The Contractor will be responsible for providing a negative exposure assessment for this project <u>or</u> will be required to wear disposable coveralls and respiratory equipment for three (3) entire work shifts to develop a negative exposure assessment. If the contractor will be using a negative exposure assessment from similar, previously monitored activities, a copy of the materials must be present of site.
- 5. All asbestos transite panels will be removed using intact removal methods. The Contractor will not be allowed to cut through any transite panel material using mechanical means. The competent person will be required to ensure all panels are removed intact and that all procedures related to the removal are strictly followed.
- 6. Wet methods will be used during abatement. The Contractor will wet down all asbestos transite panel material, prior to removal.
- 7. All of the materials will be wrapped in a minimum of one (1) layer of six-mil polyethylene sheeting and disposed of as a Category II non-friable material at an appropriate landfill.
- 8. Final cleaning activities will include wet-wiping and HEPA vacuuming of all openings and all vertical and horizontal surfaces <u>inside</u> building between the exterior wall and extending approximately 8' into the building.. Final cleaning will also include a review outside the building to ensure that all debris has been cleaned up from the grass.
- 9. At the conclusion of final cleaning activities in each regulated area, a visual inspection will be completed in accordance with the listed "Visual Inspection Procedures" (Item #3, "General Requirements and Information").
- 10. For all locations of asbestos transite window panel removal, the Contractor will be required to board any openings following abatement activities. This activity will be completed for building security purposes.
- 11. For all locations of asbestos transite fascia panel removal, the Contractor will be required to cover any openings with at least one (1) layer of six-mil polyethylene sheeting following abatement activities. This activity will be completed to prevent weather damage to the structure under the fascia.

Final Clearance Sample Requirements:

Each of the regulated areas established for the removal of the materials described in Project T1 will be cleared using Phase Contrast Microscopy (PCM). Pursuant to the requirements of AHERA, five (5) PCM samples will be collected from each regulated area. All five samples must be analyzed below 0.01 fibers per cubic centimeter allow for tear down of the enclosure. All PCM air samples will be collected in accordance with the AHERA regulation and all EPA recommended guidelines. healthAIR, inc. reserves the right to reduce the number of clearance air samples to one (1) for transite panel removal projects.

Project Schedule:

The Contractor will start the project on Wednesday, July 11, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work shift on Wednesday, July 18, 2007. The building will be available each work day from 7:00 a.m. - 5:30 p.m. The Contractor will be allowed six (6) work days (Wednesday - Friday, Monday - Wednesday) to complete the project including tear down activities. Additional project dates include:

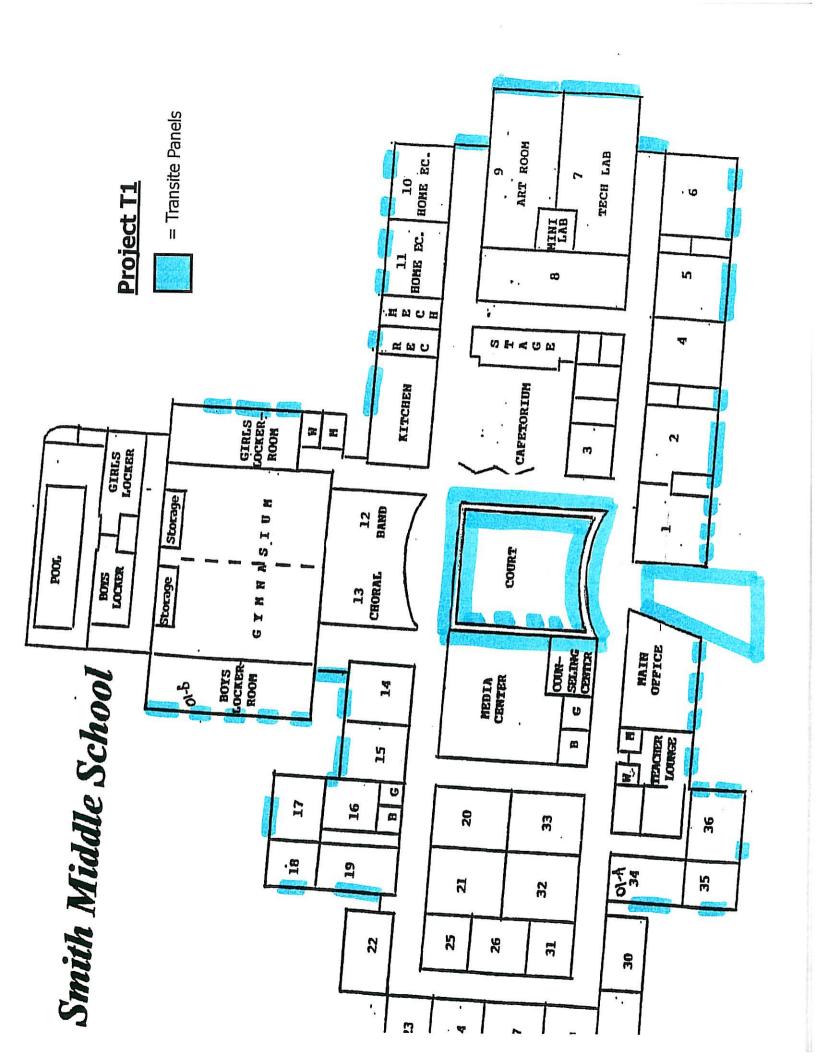
#	Location	Start	Ready for PAs	End	# Days
Т1	Smith Middle School	Wednesday, 7-11-07	Daily	Wednesday, 7-18-07 @ 5:30 p.m.	6 w/td

Schedule Restrictions - Set-up:

The Contractor will not be allowed to mobilize to the project site until Wednesday, July 5, 2006.

n		•		-	•				
ν	rn	16	ጉተ	I)	i9	σr	am	C	•

There is one (1) project diagram provided for Project T1. The attached diagram shows the approximate locations of asbestos transite panel materials to be removed and approximate boundaries of the regulated areas.



Project Summary:

The first project for abatement at Wattles Elementary School includes the removal of all asbestos transite fascia panels and asbestos transite window panels from the exterior of the building. This project at Wattles Elementary School will involve multiple regulated areas to remove the asbestos transite materials using Class II intact/non-friable removal procedures. The projects will begin on Thursday, July 19, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work day on Tuesday, July 24, 2007. The project schedule allows for a total of four (4) work days to complete the project, including tear down activities.

Abatement Activities:

- 1. Remove and dispose of all asbestos transite fascia panels from the exterior of Wattles Elementary School.
- 2. Remove and dispose of all asbestos transite window panels from the exterior of Wattles Elementary School.

Summary of Locations:

Room / Location	Materials ->	TFP	TWP
Exterior		х	х

Key for Table

TFP Asbestos Transite Fascia Panels
TWP Asbestos Transite Window Panels
x Material present in the functional space

Abatement Requirements:

The Contractor will be allowed construct multiple negative pressure enclosures for the complete removal of all of the materials detailed in the "Abatement Activities" for Project T2.

- 1. The Contractor is responsible for all of the materials listed in the "Abatement Activities" located inside of the project areas. The project areas include all portions of the functional spaces listed in the "Summary of Locations" table.
- 1. Prior to the start of removal activities, the Owner will move all necessary furniture, fixtures, etc. a minimum of 10' from all asbestos transite window panel locations.
- 2. The regulated area will extend from approximately 8' out from the exterior wall of the building and will extend approximately 8' into the interior of the building. The regulated area will be set-up as follows:
 - Asbestos warning sign on the interior side of the regulated area (visible from inside the building).
 - Asbestos banner tape outside of the building extending a minimum of 8' from the exterior windows and fascia.
 - A minimum of one (1) layer of six-mil polyethylene sheeting will be set-up on the ground and will be secured to the building below the windows. The polyethylene sheeting will be sufficient in length to catch all debris and wrap the asbestos transite panels for disposal.
 - A minimum of one (1) layer of six-mil polyethylene sheeting will be set-up on the interior side of the windows and will be secured to the wall below the windows. The polyethylene sheeting will be sufficient in length to catch all debris and wrap the asbestos transite panels for disposal.
 - AFDs and decontamination units will not be required, unless special conditions exist (as described further in this section).
- 3. The Contractor will be required to complete all abatement activities from the outside, however, the Contractor will be allowed to access the window system from the interior. The Contractor must provide scaffolding or lifts that comply will all required safety regulations.

- 4. The Contractor will be responsible for providing a negative exposure assessment for this project <u>or</u> will be required to wear disposable coveralls and respiratory equipment for three (3) entire work shifts to develop a negative exposure assessment. If the contractor will be using a negative exposure assessment from similar, previously monitored activities, a copy of the materials must be present of site.
- 5. All asbestos transite panels will be removed using intact removal methods. The Contractor will not be allowed to cut through any transite panel material using mechanical means. The competent person will be required to ensure all panels are removed intact and that all procedures related to the removal are strictly followed.
- 6. Wet methods will be used during abatement. The Contractor will wet down all asbestos transite panel material, prior to removal.
- 7. All of the materials will be wrapped in a minimum of one (1) layer of six-mil polyethylene sheeting and disposed of as a Category II non-friable material at an appropriate landfill.
- 8. Final cleaning activities will include wet-wiping and HEPA vacuuming of all openings and all vertical and horizontal surfaces <u>inside</u> building between the exterior wall and extending approximately 8' into the building. Final cleaning will also include a review outside the building to ensure that all debris has been cleaned up from the grass.
- 9. At the conclusion of final cleaning activities in each regulated area, a visual inspection will be completed in accordance with the listed "Visual Inspection Procedures" (Item #3, "General Requirements and Information").
- 10. For all locations of asbestos transite window panel removal, the Contractor will be required to board any openings following abatement activities. This activity will be completed for building security purposes.
- 11. For all locations of asbestos transite fascia panel removal, the Contractor will be required to cover any openings with at least one (1) layer of six-mil polyethylene sheeting following abatement activities. This activity will be completed to prevent weather damage to the structure under the fascia.

Final Clearance Sample Requirements:

Each of the regulated areas established for the removal of the materials described in Project T2 will be cleared using Phase Contrast Microscopy (PCM). Pursuant to the requirements of AHERA, five (5) PCM samples will be collected from each regulated area. All five samples must be analyzed below 0.01 fibers per cubic centimeter allow for tear down of the enclosure. All PCM air samples will be collected in accordance with the AHERA regulation and all EPA recommended guidelines. healthAIR, inc. reserves the right to reduce the number of clearance air samples to one (1) for transite panel removal projects.

Project Schedule:

The Contractor will start the project on Thursday, July 19, 2007, and will be complete with all abatement activities, including tear down activities, by the end of the work shift on Tuesday, July 24, 2007. The building will be available each work day from 7:00 a.m. - 5:30 p.m. The Contractor will be allowed four (4) work days (Thursday - Friday, Monday - Tuesday) to complete the project including tear down activities. Additional project dates include:

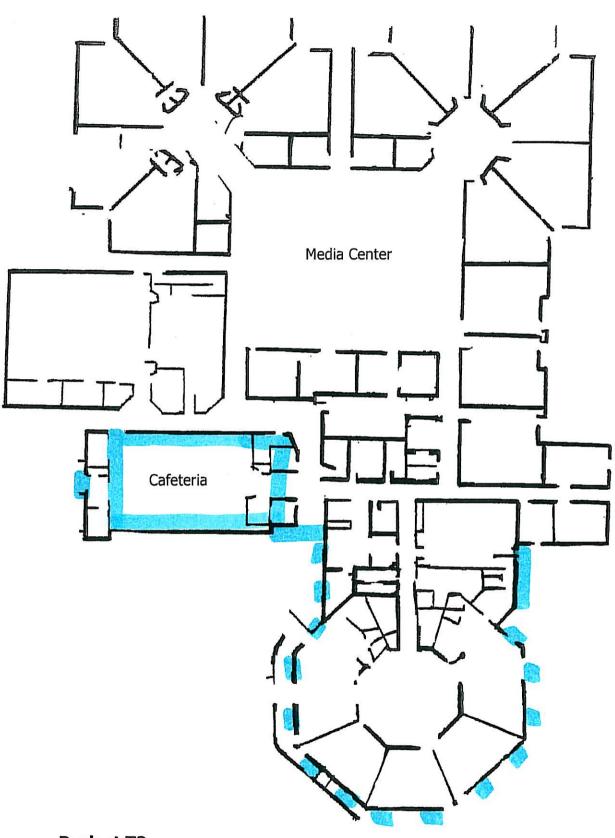
#	Location	Start	Ready for PAs	End	# Days
Т2	Wattles Elementary School	Thursday, 7-19-07	Daily	Tuesday, 7-24-07 @ 5:30 p.m.	4 w/td

Schedule Restrictions - Set-up:

The Contractor will not be allowed to mobilize to the project site until Wednesday, July 5, 2006.

Project Diagrams:

There is one (1) project diagram provided for Project T2. The attached diagram shows the approximate locations of asbestos transite panel materials to be removed and approximate boundaries of the regulated areas.



Project T2



= Transite Panel Locations

Wattles Elementary School Troy School District

GENERAL REQUIREMENTS and INFORMATION:

The following general project requirements and information pertain to all of the asbestos abatement projects at Smith Middle School and Wattles Elementary School.

- 1. The Contractor will be responsible for providing a manometer to provide a reading of the negative pressure in all negative pressure enclosures and will also be responsible for providing smoke testing of the negative pressure enclosures and glovebags, as required by OSHA. Abatement will not begin inside of a negative pressure enclosure unless a manometer is installed and indicates the proper negative pressure. All air filtration devices must be ducted outside the building. The Contractor will be responsible for properly securing the exhaust tubes in the exterior windows and/or doorways to prevent unauthorized access to the building during after work hours. All of the exterior window frames are scheduled to be remain and the Contractor will not be allowed to screw/nail into the frames. Any and all damage to the windows/frames is the responsibility of the Contractor.
- 2. Dumpsters may be placed at the site for these project activities. Dumpsters may not be delivered prior to the start of the project. All dumpsters must be placed on plywood to prevent damage to the paved parking areas and all dumpsters must be removed by the end of the day on <Date>.
- 3. The Contractor is strongly encouraged to document all existing conditions prior to the start of the project in order to support pre-project damage. In all situations where damages are listed on work lists or punch lists by the Owner or Construction Manager, the Contractor will be provided two weeks (fourteen 14 calendar days) to complete corrective measures. After the fourteen day period, the Owner, Construction Manager or healthAIR, inc. will complete the corrective measures at the Contractor's expense. The Contractor will be required to dedicate two laborers for general clean-up activities throughout the building (as directed by the Owner or healthAIR, inc.) for two days for each project to address "punch list" type items such as pieces of tape/poly or tape/glue residue. The dates will be coordinated at the completion of all abatement activities.

4 Visual Inspection Procedures:

At the conclusion of final cleaning activities for each individual regulated area, a visual inspection will be completed in accordance with the following procedures:

- Prior to each visual inspection in a negative pressure enclosure, the Contractor will replace the prefilters on all of the air filtration devices with new clean filters. healthAIR, inc.'s Project Manager and the Contractor's competent person will conduct a thorough visual inspection of the project area to ensure that all materials have been completely removed and all surfaces have been properly cleaned. The visual inspection will not be conducted until all areas have been final cleaned and all non-essential equipment and supplies have been removed from the enclosure.
- Prior to each visual inspection in a negative pressure enclosure, the Contractor will remove all excess equipment, including all ladders, scaffolds, hoses, bags, tools, etc. from the enclosure. The Contractor will also clean the exterior of all air filtration devices. Minimal ladders and scaffolds will be left in the enclosure to allow for the visual inspection.
- healthAIR, inc.'s on-site Project Manager and the Contractor's competent person will conduct a
 thorough visual inspection of each regulated area to ensure that all materials have been completely
 removed and all surfaces have been properly cleaned.
- The Contractor will not be allowed to conduct the lock down activities until after completion of the visual inspection. All polyethylene sheeting/barriers must be re-checked prior to lock down to minimize the potential of leaks behind the barriers. The Contractor will only be allowed to use a clear drying encapsulant for lock down.
- 5. The Owner reserves the right to re-order projects following award of contract. The initial schedule provided in this specification was developed during a meeting with healthAIR, inc. and the Owner. Should the order of any projects change, all durations, including scheduled Saturday work days, will remain the same.

6.	All procedures specific to the removal of non-asbestos carpet material and non-friable asbestos floor tile can be found in the "General Procedures of Asbestos Abatement" located at the end of this specification.

PROJECT SCHEDULE INFORMATION

[For All Projects]

The awarded Contractor will be held to all provisions of this Project Schedule. The Project Schedule detailed below covers project time lines for all bids and expands on the Project Schedule listed within the individual bids. The schedule will be made part of the Contract Documents and will be strictly enforced by the Owner and healthAIR, inc. Any and all variances to this schedule must be cleared by Troy School District and healthAIR, inc. prior to the commencement of the projects. If the projects are not completed within the time period outlined below, Troy School District may impose project penalties.

The following information is provided in the "Project Schedule Information":

- Asbestos Project Notification
 - Due dates for project notifications for projects at Smith Middle School and Wattles Elementary School.
- Project Dates
 - Table of project dates for each individual project area at Smith Middle School and Wattles Elementary School.
- Site Availability
 - Summary of all building hours for project activities at Smith Middle School and Wattles Elementary School.
- Asbestos Clearance Testing
 - Summary of all types of clearances samples for the projects at Smith Middle School and Wattles Elementary School.
- Project Penalties
 - Summary of project penalties that the contractor will incur by not submitting the proper notifications, not meeting project dates or by failing clearance sampling

ASBESTOS PROJECT NOTIFICATIONS

All regulatory agencies including, but not limited to, the Environmental Protection Agency, the Michigan Department of Labor & Economic Growth, the Michigan Department of Environmental Quality (Department of Natural Resources) and/or all other applicable Federal, State, County or City municipalities should be notified within the proper notification period in order to start on the first start date listed below. The Contractor shall also be solely responsible for payment of all applicable fees and charges. Failure to notify in a timely manner will not excuse a Contractor from project penalties or from any citations for performing abatement activities without a proper notification. The Contractor(s) shall be responsible for submitting a notification which adequately covers all projects at the schools. By submitting a bid, the Contractor agrees to be fully responsible for the notification process.

The Contractor will be responsible for submitting all necessary notifications to the appropriate federal, state and local agencies. The Contractor will be responsible for submitting a NESHAPs notification for all projects involving the removal of greater than 160 square feet/260 linear feet of friable asbestos material (including the removal of more than 160 square feet of transite, a Category II non-friable material that may become crumbled during removal) and a Michigan Department of Labor & Economic Growth notification for all projects involving the removal of greater than 10 lineal/15 square feet.

The Contractor must submit a copy of the notification to healthAIR, inc. prior to commencement of the project and in sufficient time to make corrections, if necessary. Copies of all revised notifications should also be provided to healthAIR, inc. in a timely manner. The Contractor will be required to submit a copy of each notification to healthAIR, inc. for review prior to being submitted to the appropriate agencies.

The Contractor will submit the notification no later than the dates listed below. The Contractor will have the option to cancel the notification if contractual arrangements between the Contractor and Troy School District are not to the satisfaction of the Contractor. The notice of cancellation should be made in writing to either healthAIR, inc. or Troy School District forty-eight (48) hours prior to the start of the project. Failure to notify in a timely manner will not excuse a Contractor from project penalties listed in the upcoming section of the specification.

Notification Dates

The project notifications are due for the projects as follows (to allow for sufficient time including holidays):

Smith Middle School and Wattles Elementary School

MDLEG NESHAPs

Not Required Not Required

PROJECT DATES

All projects outlined in this specification will be completed by the Contractor according to the following project calendar:

Bid No. 07.06 Smith Middle School and Wattles Elementary School					
Project #	Start Date	Ready for PAs	Completion Date	# Work Days	
Abatement Project T1	Wednesday, 7-11-07	Daily	Wednesday, 7-18-07	6 w/TD [W-F, M-W]	
Abatement Project T2	Thursday, 7-19-07	Daily	Tuesday, 7-24-07	4 w/TD [Th-F, M-Tu]	

Notes on Project Dates

- Note 1: In the event of conflicting dates between the information provided in this section and dates listed in other parts of the specification, the dates listed with the scope of work will take precedence.
- Note 2: "Ready for PAs" means that the Contractor has completed all final cleaning activities, passed the visual inspection and completed lock down activities (for PCM clearance) in the final project area.
- Note 3: All project durations will remain the same should an individual project be completed early. The end date will be moved forward should the project be completed at an early date.
- Note 4: The Owner reserves the right to re-order projects following award of contract. The initial schedule provided in this specification was developed during a meeting with healthAIR, inc. and the Owner. Should the order of projects be changed, all durations will remain the same.

SITE AVAILABILITY

All on-site work for each of the projects outlined in this specification will be completed by the Contractor according to the following site availability:

Smith Middle School and Wattles Elementary School

Monday - Friday 7:00 a.m. to 5:30 p.m.

Approval of Additional On-Site Hours

The Contractor will be allowed to work additional hours and work days at these buildings with only with prior approval from healthAIR, inc. and Troy School District. The Contractor may also be required to cover additional custodial overtime in excess of 30 minutes before and 30 minutes after the Contractor's state start and finish time.

Additional Details to Project Schedules

More specific abatement project schedules are listed in the individual bids. As detailed above, the Contractor will be responsible for fulfilling all notification requirements (including breakdowns for all projects). All projects will be considered complete for schedule purposes when the project site has passed required clearance testing, the Contractor has completed the removal of all supplies and equipment from the project area and the Contractor has returned the building to Troy School District in a condition that satisfies Troy School District and healthAIR, inc.

ASBESTOS CLEARANCE AIR TESTING

PCM (Phase Contrast Microscopy)

PCM Clearance Air Samples will be collected, analyzed and results verbally expressed to Troy School District and to the Contractor within twenty-four (24) hours, with the time period beginning at the completion of the lock down activities. Delays in clearance testing, after the accepted final visual inspection and lock down, will be cause for a proportional extension of the project completion date.

It will be in the judgement of healthAIR, inc. as to when PCM Air Clearance Samples will be collected. All PCM Clearance Air Samples will be analyzed on-site. Every effort will be made to collect the samples in the same work shift as the final visual inspection and lock down. "Drying time" will depend on factors such as project size, types of materials, negative pressure and air flow inside the enclosure and results of personal air samples collected during abatement and final cleaning. "Drying time" will range from thirty (30) minutes to twelve (12) hours.

The following projects have PCM Clearance (project listed as "Project Group" have multiple sets of PCM clearance samples):

School	Project #
Smith Middle School	T1
Wattles Elementary School	Т2

TEM (Transmission Electron Microscopy)

TEM Clearance Air Samples will be collected, analyzed and results verbally expressed to Troy School District and to the Contractor within forty-eight (48) hours, with the time period beginning at the completion of the lock down activities. Delays in clearance testing, after the accepted final visual inspection and lock down, will be cause for a proportional extension of the project completion date.

It will be in the judgement of healthAIR, inc. as to when TEM Clearance Air Samples will be collected. healthAIR, inc. anticipates using APEX Research, Inc., Whitmore Lake, Michigan, for analysis of all TEM Clearance Air Samples. However, all TEM Clearance Air Samples will be analyzed at a NVLAP accredited laboratory of the Owner's or Owner's Representative's choosing. Troy School District will not authorize any turn-around time of less than twenty-four (24) hours. The Contractor may request turn-around times of less than twenty-four hours and will be responsible for any additional costs. Samples collected on Saturdays may not be available until 12:00 p.m. on Monday.

The Contractor may use another NVLAP accredited laboratory of their own choosing under the following stipulations:

- The laboratory must be NVLAP accredited.
- The laboratory must provide a fax copy of the clearance sample results to healthAIR, inc. prior to tear down
- The laboratory must provide a final hard copy of the report to healthAIR, inc. prior to release of contract retainage.
- The Contractor will be responsible for the full cost of sample analysis.
- The Contractor will be responsible for proper chain of custody procedures/forms (including sample delivery) once the samples are sealed and relinquished by healthAIR, inc.

The following projects have option for TEM Clearance:

<u>School</u>	Project#
None	None

PROJECT PENALTIES

By submitting a bid for this project, the Contractor understands that the District will charge the Contractor a monetary penalty if any individual project is not completed by the required completion date or if the clearance air samples do not pass the required levels set by the Environmental Protection Agency's AHERA Regulation, any other applicable government agency, or by the specifications. In addition, the Contractor understands that the District will charge the Contractor a monetary penalty if the project does not start due to failure to submit a notification.

Failure to Submit Proper Notifications

If the Contractor does not start the project per the established schedule due to a failure to submit proper notifications, the Contractor will be assessed a monetary penalty in the amount of **1,500 dollars**. This penalty will be assessed on a daily basis, including weekends and holidays, until the project begins.

At a minimum, said penalties will be withheld ("retained") by Troy School District until the reinstallation projects are completed. Troy School District will be responsible for all final decisions regarding the assessment of all penalties due to failure to submit proper notifications. Troy School District may impose project penalties even if no project delays were incurred to other trades. Troy School District may withhold the penalties and cancel the penalties at a later date if the Contractor regains the overall project schedule to the satisfaction of the Owner. healthAIR, inc. will have no decision or recommendation in the assessment of penalties.

Late Projects

If the Contractor does not complete the project detailed in the Scope-of-Work within the specified time allotment, the Contractor will be assessed a monetary penalty in the amount of **1,500 dollars plus additional healthAIR**, inc. costs. This penalty will be assessed on a daily basis if the project is one or more days late. healthAIR, inc. costs include, but are not limited to, on-site project management/air monitoring costs, air sample analysis costs and if necessary, management time for meetings and on-site project reviews by the Project Coordinator and/or Project Administrator. "Additional healthAIR, inc. costs" will be determined based on the total number of allowed work days (per the schedule in the specification documents) vs. the total number of days worked by the Contractor. healthAIR, inc. costs will be a minimum of \$654.00 per day. While the Owner may impose a penalty for completing a project two days late, there may not be any additional healthAIR, inc. costs if the Contractor was late because project days (such as two consecutive Saturdays) were skipped.

At a minimum, said penalties will be withheld ("retained") by Troy School District until the reinstallation projects are completed. Troy School District will be responsible for all final decisions regarding the assessment of all penalties due to late projects. Troy School District may impose project penalties even if no project delays were incurred to other trades. Troy School District may withhold the penalties and cancel the penalties at a later date if the Contractor regains the overall project schedule to the satisfaction of the Owner. healthAIR, inc. will have no decision or recommendation in the assessment of penalties.

Failed Clearance Air Samples

If any individual project does not pass the clearance air sampling tests as required by AHERA, or by the State of Michigan Public Act No. 147 (as amended) if the clearance air sample is not required by AHERA, by any other applicable governmental agency, or by the specifications, the Contractor will be responsible for all additional healthAIR, inc. costs for each day needed to perform additional cleaning. healthAIR, inc. costs include, but are not limited to, on-site project management/air monitoring costs, air sample analysis costs and if necessary, management time for meetings and on-site project reviews by the Project Coordinator and/or Project Administrator. It should be noted that the Contractor is responsible for these additional costs even if the project completion date has not been surpassed. The Contractor shall also be solely responsible for payment of all costs incurred by Troy School District due to the delay, including but not limited to additional charges for the healthAIR, inc., any and all additional sampling costs incurred due to the failure of the project enclosure/regulated area to meet the clearance requirements (including any and all air samples collected during the additional cleaning) and any and all overtime charges required for custodial personnel. The Contractor will be involved in decisions regarding turn-around time of additional clearance air samples. These additional costs shall be cumulative and shall occur each and every time the Contractor fails the clearance air sampling tests, as defined by federal and state regulations and this specification. Said additional charges will be deducted from the contract price immediately (via purchase order change request/change order) upon the occurrence of such charges. Troy School District may withhold the penalties and cancel the penalty at a later date if the Contractor regains the overall project

schedule to the satisfaction of the Owner. of penalties.	healthAIR, inc. will have no decision or recommendation in the assess	sment

SECTION III

GENERAL CONDITIONS
GENERAL PROCEDURES FOR ASBESTOS ABATEMENT
BIDDER'S RFQ SUBMITTAL CHECKLIST
PROJECT DESIGNER ACCREDITATION INFORMATION
PREVAILING WAGE RATE INFORMATION

GENERAL CONDITIONS

The Information provided in the General Conditions section are specific to this project, necessary for the progress of the work, and shall be provided as described herein. Throughout this Conditions section, the successful bidder is referred to as the "Contractor." All other parties involved and contracted by Troy School District are referred to as the "Owner's Representatives." Representatives include healthAIR, inc. and the Construction Manager.

1. Bidding Information

- The RFQ Packet shall be filled in completely, providing all information as requested. Should any bidder refuse to hold its bid firm for the required period or refuse to enter into a contract in accordance with the terms of its proposal, Troy School District reserves the right to disqualify the bid and may consider this a factor with respect to any future bids made by him/her, and may refuse to consider the same for that reason.
- All pages and documents, and the information requested within the RFQ Packet section, must be furnished completely in strict compliance with the bidding submittal requirements. The manner of submission is essential to permit prompt evaluation of all bids on a fair and uniform basis. Accordingly, Troy School District reserves the right to declare as non-responsive, and reject, any bid which is incomplete or where material information requested is not furnished, or where indirect or incomplete answers or information is provided. The Bidder is encouraged to follow the Bidder's Checklist (located at the end of the specification) while preparing the RFQ Packet.
- Bidders are cautioned that any alternate bids, unless specifically requested, or any changes, insertions, or omissions to the terms and conditions of these specifications, may be considered non-responsive and at the option of Troy School District may result in rejections of the bid(s).
- Any bid(s) received at the office designated herein, after the exact time specified for receipt, may not be considered. Troy School District reserves the right to deny or accept late bids based on mitigating circumstances. The decision will be made by Troy School District representative present at the Bid Opening.
- 1.5 Troy School District reserves the right to postpone the bid opening for its own convenience.
- Bidders shall fill in the number and date of each addendum on the "Bidder's Agreement and Certification" of the *RFQ Packet*. By acknowledging each addendum in this manner, the Bidder agrees that each portion of the addendum has become an official part of the bidding documents, that the Bidder has fully reviewed the addendum and that the Bidder agrees to comply with all provisions detailed in the addendum. Bidders not acknowledging any addendum may be subject to disqualification.
- 1.7 Bidders shall fill in the date of the Pre-Bid Minutes on the "Bidder's Agreement and Certification" of the *RFQ Packet*. By acknowledging the Pre-Bid Minutes in this manner, the Bidder agrees that each portion of the minutes has become an official part of the bidding documents, that the Bidder has fully reviewed the minutes and that the Bidder agrees to comply with all provisions detailed in the minutes. Bidders not acknowledging the Pre-Bid Minutes may be subject to disqualification.
- 1.8 Bidders shall fill in the type of business information on the "Bidder's Agreement and Certification" of the RFQ Packet.
- Should a Bidder find apparent discrepancies in, or omissions from, the bidding documents, or should it be in doubt as to their true meaning, or should it have any questions regarding any work or materials intended by the bidding documents, then such Bidder, either Contractor or Subcontractor, shall immediately notify Troy School Destructor Owner's Representative of such questions. Troy School Destructor Owner's Representative will issue an addendum to all Bidders recorded in its office for the specific project. It shall be the responsibility of the Bidders on record to provide all their Subcontractors with the information contained in these addenda. Failure to submit any type of questions during the bidding process or note any bid qualifications on the "Bidder's Statement of Qualifications and Statement of Bid Preparation" indicates that the Contractor agrees

to the "intent" of the project design during interpretations made in the field.

- The Bidder is required to completely and accurately provide information in the *Bidder's Statement of Qualifications and Statement of Bid Preparation*. Failure to completely and accurately provide information in the *Bidder's Statement of Qualifications and Statement of Bid Preparation* is grounds for dismissal and disqualification of the bid(s) provided by the Bidder.
- Troy School District reserves the right to accept or reject any or all bids and to waive informalities and major irregularities in the bids received.
- 1.12 Troy School District reserves the right to waive any information in the bids, or reject any or all bids, in whole or in part, should it be deemed in the best interest of Troy School District to do so.
- Each *RFQ Packet* shall be accompanied by a certified check, cashier's check, or Bid Bond by a Treasury approved surety that is licensed to do business in the State of Michigan made payable to Troy School District in an amount not less than 5% of the bid(s) as a proposal guarantee. Bid bonds, or certified checks and cashier's checks submitted in lieu of a formal bid bond, will be returned at the request of the Contractor following the formal acceptance of the recommended contractor.
- Each low bidder will be contacted following review of the *RFQ Packet* to set-up a Post-Bid Review Meeting. The topics, requirements, etc. of the Post-Bid Review Meeting are further detailed in Section 13 of these General Conditions.
- The Troy School District' Board of Education cannot accept any bid without a signed and notarized "Familial Relationship Disclosure Statement". A bid without the signed and notarized statement will not be read and will be disqualified.

2. Contract Information

- Troy School Destructor healthAIR, inc. will submit a formal contract agreement to a Contractor designated by Troy School District for review and execution by signature. A formal contract agreement includes a written Purchase Order from Troy School District.
- 2.2 It shall be understood and agreed by all parties submitting proposals on any part of the work that the requirements contained in all contract documents shall apply to all addenda issued before the time set for receiving bids, that the general character of work called for in the addenda shall be the same as originally required for similar work, unless otherwise mentioned, and that all incidental work necessitated shall be included, even though not particularly specified therein.
- 2.3 Within one (1) week of award of the work by Troy School District, healthAIR, inc. will submit a written request (via formal letter, facsimile or electronic mail) to Troy School District for a contract or a purchase order.
- The Bidder to whom the contract is awarded shall, within fifteen (15) calendar days after receipt of the "Intent to Award" from healthAIR, inc., sign and deliver the required copies to Troy School District. Certificates of insurance and performance, labor and materials bonds shall also be submitted to Troy School District at this time. The Bidder to whom the contract is awarded will not be required to sign and return a copy of the Purchase Order.
- 2.5 The Contractor shall defend, indemnify, save harmless and exempt Troy School District, its officers, agents, servants, and employees from and against any and all suits, actions, legal proceedings, claims, demands, damages, costs, expenses, and attorney fees incidental to any work done in the performance of this contract; provided, however, the Contractor shall not be liable for any claims, demands, damages, cost, expenses, and attorneys fees arising out of an act or omission of Troy School District, its officers, agents, servants, and employees.
- 2.6 The project will be awarded to that responsible Bidder whose bid(s), conforming to this solicitation, will be

most advantageous to Troy School District, price and other factors considered (such as late completion of projects on previous district of healthAIR, inc. projects).

2.7 Troy School District reserves the right to waive the requirement of a formal contract agreement and issue a Troy School District purchase order to complete the scope of work.

3. Bonding Information

- Simultaneously with the execution and delivery of an "Intent to Award" from healthAIR, inc.,. the Contractor shall qualify for, sign and deliver to Troy School District an executed Performance Bond and an executed Labor and Materials Payment Bond secured by a Treasury approved surety licensed to do business in the State of Michigan and approved by Troy School District. Each such bond shall be in the amount of 100% of the contract agreement. All bonds shall be attached to and made part of the contract agreement between Troy School District and the Contractor. Attorneys-in-fact who signed the contract bonds must file with each bond a certified copy of their power of attorney to sign said bonds. The Contractor shall include the full cost of all bonds in its bid. All bonds will be submitted to healthAIR, inc. along with Submittal A1 (located in Section IV, Pre-Project Submittals). The project will not be started until the required bonds have been received from the Contractor. Please see Question #32 in the Bidder's Statement of Qualifications and Statement of Bid Preparation which acknowledges that the bonds will be provided prior to the start of abatement.
- 3.2 Bonds and certificates of insurance shall be approved by Troy School Destructor the Construction Manager before the successful Bidder may proceed with the work. Failure or refusal of the successful Bidder to provide bonds or certificates of insurance in a form satisfactory to Troy School District shall not justify an extension of the time parameters as set forth in the attached time schedule and may, at the Owner's option, be cause for rejection or cancellation of the contract. The Contractor may be directed to not start the project until the bonds and certificates of insurance are received and approved. Faxed copies of the bonds and insurance will be sufficient to start the project. Applications for payment will be returned to the Contractor if actual bonds and certificates of insurance have not been submitted.
- No proposal shall be considered binding upon Troy School District until a written contract (or purchase order) has been properly executed and satisfactory bonds have been furnished. Failure to execute and return the contract and satisfactory bonds within the prescribed period of time shall be cause for annulment of the award. The bid security of the Bidder will be realized upon or retained by Troy School District.

4. Insurance Requirements

- The Contractor shall protect, defend and indemnify Troy School District, its officers, agents, servants, volunteers, and employees from any and all liabilities, claims, liens, demands, and costs of whatsoever kind and nature which may result in injury or death to any persons, and for any that result in injury or death to any persons, and for loss or damage to any property, including property owned or in the care, custody, or control of Troy School District in connection with or in any way incident to or arising out of the occupancy, use, service, operations, or performance of work in connection with this Agreement resulting in whole or in part from negligent acts or omissions of the Contractor, any Subcontractor, or any employee, agent, or representative of the Contractor or any Subcontractor.
- 4.2 The Contractor shall maintain, at its expense, during the term of this contract the following insurance:
 - a. Worker's Compensation and Employer's Liability Insurance with Michigan statutory limits.
 - b. Comprehensive General Liability Insurance with a minimum combined single limit of \$2,000,000 per occurrence in the same amount made for bodily injury and property damage, per awarded building. Policy to include products and completed operations, cross liability, broad form property damage, independent Contractors, and contractual liability coverage. Policy shall be endorsed to provide sixty (60) days written notice to Troy School District of any material change of coverage, cancellation, or non-renewal of coverage.
 - c. Asbestos Specific General Liability Insurance, specific for asbestos abatement, with a minimum

- combined single limit of \$2,000,000 per occurrence made for bodily injury and property damage in the same amount, per awarded building.
- d. If Subcontractors are likely to be used, the Comprehensive General Liability policy shall include coverage for independent Contractors.
- e. Automobile Liability Insurance covering all owned, hired, and non-owned vehicles with personal protection insurance and property insurance to comply with the provisions of the Michigan No-Fault Insurance Law, including residual liability insurance with a minimum combined single limit of \$1,000,000 each occurrence of bodily injury and property damage.
- All insurance companies issuing the insurance policies must be domestic (on-shore) companies and have an A rating by AM Best.
- 4.4 The Contractor shall be responsible for payment of all deductibles contained in any insurance policy required in this contract.
- 4.5 All insurance certificates must identify healthAIR, inc. as an additional insured.
- 4.6 All insurance certificates will be reviewed by the Owner, healthAIR, inc. and/or the Construction Manager for satisfactory conditions/compliance with the stated requirements. The Contractor will be notified by the healthAIR, inc. of any required changes to the insurance certificates.
- 4.7 The Contractor will not be allowed to mobilize to the project site until all Certificates of Insurance have been submitted to healthAIR, inc. and approved. All certificates of insurance will be submitted to healthAIR, inc. along with Submittal A1 (located in Section IV, Pre-Project Submittals). The project will not be started until the required certificates of insurance have been received from the Contractor. Please see Question #32 in the Bidder's Statement of Qualifications and Statement of Bid Preparation which acknowledges that the certificates of insurance will be provided prior to the start of abatement.

5. Project Examination - Reference Documents

- A **Pre-Bid Examination** of the premises will be conducted at the time and date indicated in the *Bid Advertisement*. The Pre-Bid Examination is not required, but all Bidders are requested to attend. Questions regarding the bidding or the project may be asked at the examination, but all final interpretations or revisions to the bidding documents shall be made by an issued addendum.
- Before submitting proposals for the work, each Bidder should have examined the premises, and satisfied itself as to the conditions under which it will be obligated to operate in performing its part of the work, or that will in any manner affect the work under its contract. Any Bidder not allowed the opportunity to review the project site at the times stated in the *Bid Advertisement* should note that in the bid.
- All Bidders shall tour the building(s), and familiarize themselves with the work described in the bidding documents. Submission of a bid shall be deemed conclusive evidence that the Bidder has familiarized itself with the work contemplated by the bid and shall constitute a waiver by each of all claims of error in bid, withdrawal of bid, or payment of extras, or combination thereof, under the executed contract, or any revision thereof. All figures set forth in the Bidding Documents referencing sizes, amounts, or materials are estimates only and are provided for the convenience of the Bidder. The Bidder is solely and completely responsible for his own measurements and for his own determination regarding the scope of the project(s).

6. Workers Rights

The Contractor shall comply with the Michigan Civil Rights Act which states that Contractors shall not discriminate in hiring or in its terms and conditions of employment on the basis of race, religion, creed, national origin, color, sex, marital status, age, height or weight, nor on bona fide job requirements. Neither shall a Contractor discriminate in the sales of products or the rendering of services pursuant to this contract on the basis of any of those categories.

7. Contractor Responsibility

- The Contractor shall exercise proper precaution at all times for the protection of persons and property (including the protection of property on-site from theft) and shall be responsible for all the damages to persons or property either on or off the site, which occur as a result of its fault or negligence in connection with the execution of work. The safety provisions of applicable laws and OSHA standards shall be observed and the Contractor shall take or have cause to be taken such additional safety and health measures as Troy School District or healthAIR, inc. may determine to be reasonably necessary to protect Contractor employees or other workers at the building.
- Neither the final certificate nor final payments, nor any provision in the contract documents shall relieve the Contractor of responsibility for defects in workmanship or faulty work or materials. The Contractor shall correct any defects due to faulty work or materials and pay for the damage to other work resulting therefrom, which shall appear within a period of one year from the date of completion unless otherwise stated in this document, including additional "punch list" type items attributed to the Contractor. Troy School District shall notify the Contractor of observed defects with reasonable promptness.
- 7.3 The Contractor shall furnish Troy School District with a written guarantee to remedy any defects due to faulty materials or workmanship which appear in the work within one year from the date of final acceptance by Troy School District.
- 7.4 It is the intent of Troy School District to award the contract to Contractors fully capable, both financially and with regards to experience, to perform and complete the work in a satisfactory manner. Troy School Destructor healthAIR, inc. may contact any and all references listed in the Bidder's Statement of Qualifications during the bid review process and may be asked for additional references, if necessary.
- 7.5 The Contractor shall have a representative available for all meetings, presentations and public relation appearances deemed necessary by Troy School District. The Contractor will be made available for such activities for one year following the signed contract.
- 7.6 The Contractor will turn in all submittals listed in Section IV "Pre-Project Submittals" prior to the start of the project. By submitting a bid, the Bidder understands and acknowledges that delays to the start of the project due to lack of submittals will not change the end date of the project and that the Contractor will be responsible for any and all costs associated with the delay(s).

8. Liens

- All work and materials involved in this contract are subject to the lien laws of the State of Michigan. Partial waivers will be required for progress payments.
- Before the final payment or the retained percentages is released, the Contractor shall deliver to Troy School District, a complete release for work and materials arising out of this contract.
- 8.3 Troy School District may elect to withhold the final payment or any retained percentage due until the Contractor shall deliver to Troy School District a complete release of all liens arising out of the performance of the work contemplated by this specification. The releases and receipts shall include all labor and material for which a lien could be filed, but the Contractor may, if any Subcontractors refused to furnish a release or receipt in full, furnish a bond satisfactory to Troy School District, to indemnify him/her against any lien. If any lien remains unsatisfied after all payments are made, the Contractor shall refund to Troy School District all monies that the latter may be compelled to pay in discharging such a lien, including all costs and attorney's fees.

9. Pre-Start Job Meeting

- The awarded Contractor shall attend a Pre-Start Job Meeting. This meeting is discussed thoroughly in Section 2 of the *General Procedures for Asbestos Abatement* of this bidding document.
- 9.2 Troy School District or healthAIR, inc. may choose to waive a formal Pre-Start Job Meeting and ask the Contractor to submit all necessary materials for review instead.

9.3 The Contractor may be asked to attend one, or more, job site construction meetings, in addition to the Pre-Start Job Meeting.

10. Permits, Fees, Regulations and Taxes

- The Contractor shall obtain and pay for all permits, assessments, fees, bonds, and other charges as necessary to perform and complete the work of this contract, including connection charges and inspections fees.
- The Contractor shall be responsible for obtaining all permits and licenses (building, electrical, heating, and ventilation, and plumbing permits) necessary for the proper completion of said project(s). Permits and licenses are available from the appropriate agencies having jurisdiction. The Contractor shall give all notices, pay all fees and comply with all laws, ordinances, rules and regulations bearing on the work. If any of the work of the Contractor is done contrary to such laws, ordinances rules and regulations without such notice, he shall bear all costs arising therefrom. The Contractor shall include all costs and taxes in its bid, and make proper provisions for payment of all other State and Federal applicable taxes, fees or other costs.
- The Contractor shall present at the Pre-Start Job Meeting evidence of all required permits. The Contractor is advised that timely inspections by the applicable inspection departments are a requirement of this contract and are a condition of progress and final payments. All inspections will be final and a certificate of occupancy, where applicable, will be required before final payment will be made.
- Troy School District is <u>NOT</u> automatically exempt from State of Michigan Sales and Use Taxes. Troy School District must pay these taxes when materials are to be incorporated into realty. Hence, for materials that are permanently attached, built-in, incorporated or otherwise made part of the structure all applicable taxes shall be paid by the Contractor. Troy School District is exempt from sales and use taxes if the materials are moveable and are not permanently made part of the structure.

11. Patents and Royalties

The Contractor shall also comply with the following provision excerpted in part from AIA Document A201/CM 4.17.1.

"The Contractor shall pay all royalties and license fees, shall defend all suits or claims for infringement of any patent rights and shall save Troy School District and healthAIR, inc. harmless from loss on account thereof, except that Troy School District, or healthAIR, inc. as the case may be, shall be responsible for all such loss when a particular design, process or the product of a particular manufacturer or manufacturers is selected by such person or such person's agent. If the Contractor has reason to believe that the design, process or product selected is an infringement of a patent, that party shall be responsible for such loss unless such information is promptly given to Troy School District and/or healthAIR, inc."

Troy School District and healthAIR, inc. have not recommended or required the specific use of any specific name brand product for the projects described within the specification.

12. Prevailing Wages

- The project, herein defined, is a prevailing wage rate project. Any and all contractor and subcontractor personnel associated with the work stated herein will be payed in accordance with the prevailing wage rates included within this document. A determination by the Michigan Department of Labor that the prevailing wage law has been violated shall constitute a material breach of the contract agreement.
- 12.2 Certified payrolls for all Contractor and Sub-Contractor personnel supporting this project will be required on a weekly basis. All certified payrolls are to be submitted directly to the Construction Manager. Payments may be withheld if certified payrolls have not been received.
- The review of current prevailing wage rates and overtime requirements/provisions has been requested by the Owner and is located in the final section of the specification.

[General Conditions Specific to Troy School District-]

13. Post Bid Information

- After the bids are received, tabulated and evaluated by the healthAIR, inc., the apparent lowest Bidder(s) shall meet with the healthAIR, inc., and if deemed necessary, the Owner, Architect or Construction Manager at a post-bid meeting for the purposes of determining any contract overlaps or omissions and shall provide the following information:
 - Designation of the work to be performed by the Bidder with their own forces and that to be subcontracted.
 - 13.1.2 Complete detailed cost breakdown including manpower requirements, supplies and project disposal costs.
 - A list of names of the subcontractors or other entities (including those who are to furnish supplies, services, materials and/or equipment) proposed for the principal portion of the work. The list shall further include the value of the subcontracts and their percentage of value of the Bidder's total bid. The Bidder will be required to establish to the satisfaction of the healthAIR, inc. the reliability and responsibility of the persons or entities proposed.
 - 13.1.4 Within fifteen (15) calendar days of the "Intent to Award" or a date specified by the healthAIR, inc., each Contractor shall submit a bar chart abatement schedule of all activities contained in the Contractor's scope of work. This schedule shall include activity descriptions and duration's in working days for set-up, abatement and tear down of all enclosures. The activities on the schedule must be at a level of detail approved by the healthAIR, inc. and agree with the terminology and building sequencing established by the healthAIR, inc. The healthAIR, inc. will compile all of the Contractors' schedules and develop a project master abatement schedule. This schedule will become the project plan for abatement.
- The Bidder will be required to submit information regarding the names and backgrounds of the Contractor's superintendent and assistants and establish to the satisfaction of the healthAIR, inc. the reliability and responsibility of the persons or entities proposed to perform the work described in the Project Specification Documents.
- Prior to the award of a contract, the healthAIR, inc. will notify the Bidder in writing if either the Owner, healthAIR, inc., Construction Manager and/or Architect has reasonable objection to any such proposed person or entity. The Bidder shall submit an acceptable substitute person or entity with an adjustment in their bid price (if applicable) to cover the difference in cost occasioned by such substitution. The Owner may, at their discretion, accept the adjusted bid price or they may disqualify the Bidder. In the event of either withdrawal or disqualification of a bid, the bid security will be forfeited.

14. Payments and Change Orders

- All processes for payments and change orders have been developed and implemented by the Owner and healthAIR, inc.
- Prior to the start of the project, the Contractor will submit a Schedule of Values, listing the breakdown of the contract by building and by individual project. If one has been submitted during a post-bid meeting, it does not need to be submitted unless changes have been made. Applications for payment will be returned if a Schedule of Values is not received.
- For any projects where the Contractor will submit multiple billings, all payment requests must be made on healthAIR, inc. "Troy School District- 2004 Bond Issue Construction Program Applications for Payment" forms. The forms include a sworn statement, which must be signed along with the payment request. All payment requests must be made in duplicate all with original signatures. All payment requests submitted on other forms will be marked "Void Resubmit on Proper Forms" and returned to the Contractor.

- All drafts payment requests must be submitted to healthAIR, inc. on or before the last day of the month. The draft payment request can include all work up to and including the 5th of the month. healthAIR, inc. will review the draft payment request and return it to the Contractor by the 3rd of the month. All final payment requests, for work through the 5th of the month, must be received by the 7th of the month for processing. Payments sent directly to Troy School District will be forwarded to healthAIR, inc. and will be considered a draft.
- Payment requests received after the 7th of the month will not be submitted until the following month, unless the 7th is Saturday or Sunday, which will push the due date to the following Monday.
- The payment request will be reviewed by healthAIR, inc. for completeness and accuracy. A copy of the approved, and if necessary, modified, payment request will be mailed to the Contractor for their records.
- The Contractor will not be allowed to submit for payment on any change orders unless submitted **and signed** by healthAIR, inc. (order routed for processing) prior to the 7th of the month.
- The Owner reserves the right to alter payment requests submitted by the Contractor and approved by healthAIR, inc. The Owner also reserves the right to hold or cancel any applications for payment submitted by the Contractor and approved by healthAIR, inc.
- 14.9 A 10% retainage will be held until approved for release by the Owner and/or healthAIR, inc. The retainage will be held at least ninety (90) days for each of the projects. The Construction Manager and Architect prepared punch list must be reviewed and all items must be satisfied prior to the release of funds. Final Owner and Architect prepared punch lists will not be available until at ninety (90) days from completion of all abatement. Applications for final retainage will not be accepted until the listed billing cycles. Retainage amounts will not be lowered to 5%. Once closeout requests are received from the Contractor, healthAIR, inc. will have a building review meeting with the Owner. The application for payment until the Owner has completed the review and all aspects of the work are satisfactory to the Owner.
- All approved payment requests will be submitted to the Owner on the 10th of each month for processing or the first business day after the tenth. Checks will be mailed out to the Contractor approximately thirty days after the tenth. Contractor may be requested to sign a waiver that will accompany the check. The Contractor must sign and return the waiver/release form which will accompany each check. The Owner has forty-five (45) days from the tenth to provide the check to the Contractor.
- healthAIR, inc. reserves the right to hold any payment due to project related deficiencies such as, but not limited to, late abatement projects or submittals. Regardless of the completion of all punchlist items at the building and the successful completion of the project, healthAIR, inc. will hold the final 5% retainage until receipt of all requested project documentation.
- The Owner reserves the right to hold all payment requests until substantial completion of the project and make one single payment (per the above dates) for 90% of the project.
- 14.14 The approval of the final payment will not be approved and sent to the Owner unless the Contractor has submitted the following documentation along with the payment request:
 - Final Consent of Surety
 - Full Unconditional Waiver of Lien
 - All Project Closeout Documentation

15. Written Project Documentation

- Under the direction of the Owner, healthAIR, inc. is required to submit the following written documentation to the Owner, Construction Manager and/or Contractor during the course of the contract:
 - 15.1.1 Post-Bid Meeting Minutes: A summary of issues and comments from the Post-Bid Meeting. The

- minutes are issued to the Construction Manager and a copy is provided to the Contractor and a copy is attached to the contract.
- 15.1.2 Intent to Award: A written notification issued to the Contractor regarding the recommendation sent to the Board of Education. The letter is issued to the Contractor and a copy is provided to the Owner. The Contractor will use this letter to submit all requests for bonds and insurance and the project notification. The contract (or purchase order, see 15.1.5) will follow before the first day of the project.
- 15.1.3 Recommendation Letter: A recommendation of the lowest qualified Bidder for approval by the Board of Education. The letter is issued to the Owner and copies are provided to the Construction Manager and the Contractor.
- 15.1.4 Contractor Procedures Manual: A detailed summary of all pertinent information and procedures relating to Troy School District. The manual is issued to the Contractor.
- 15.1.5 Contract: The contract (an AIA standard form of agreement between the Owner and the Contractor) is prepared by healthAIR, inc. on behalf of the Owner and submitted to the Contractor for approval and signatures. It is the Contractor's responsibility to forward the signed contract with the necessary attachments to the Owner for execution. The Owner may decide to prepare a written purchase order in lieu of a contract.
- 15.1.6 Pre-Start Job Meeting Minutes: A summary of issues and comments from the Pre-Start Job Meeting, if held. The minutes are issued to the Contractor and a copy is provided to the Owner and Construction Manager. If no specific issues or questions are raised during the Pre-Start Job Meeting, the meeting minutes may not be issued.
- 15.1.7 *Pre-Start Notice of Responsibility*: A reminder issued to the Contractor prior to the start of the project to document existing conditions in the building. A copy is provided to the Owner and Construction Manager.
- 15.1.8 Application for Payment Approvals: Review monthly requests for payment, modify (if necessary) and submit to the Owner. A copy is provided to the Contractor.
- 15.1.9 Notice of Non-Compliance: If at any time, the Contractor does not complete a specific abatement project in accordance with the established project dates, the Contractor will receive a "Notice of Non-Compliance". Copies are issued to the Owner and the Construction Manager. If the Contractor is able to regain completion of specific abatement projects within the established schedule, a written summary of this fact will also be prepared.
- 15.1.10 Final Project Reports: Final project reports will be prepared and submitted at the completion of the project. Personal results are posted daily and should be saved be the Contractor until completion of the project reports. Final project reports will be prepared and provided to the Contractor within one year of closeout of the contract/purchase order.

GENERAL PROCEDURES FOR ASBESTOS ABATEMENT

The following are general procedures which shall be strictly enforced by Troy School District hereafter referred to as the "Owner." The Asbestos Abatement Contractor will hereinafter be referred to as the "Contractor" for the asbestos abatement project and the Project Managers/Air Monitors (healthAIR, inc.) will hereinafter be referred to as the "Owner's Consultant" or "Owners Representative."

Part I - INITIAL REQUIREMENTS

1. General Terms

- 1.1 By submitting a bid, the Contractor acknowledges that he has investigated and satisfied himself as to:
 - 1.1.1 The conditions affecting the work, including but not limited to the physical conditions of the site, handling and storage of tools and materials, access to water, electricity or other utilities that otherwise may affect the performance of required activities;
 - 1.1.2 The character and quantity of all surface and sub-surface material or obstacles to be encountered insofar as this information is reasonably ascertainable from an inspection of the site, including exploratory work done by the Building Owner or a designated Consultant, as well as information presented in drawings and specifications included with this specification. The Contractor is also responsible for a full exploratory examination of the building. Any failure by the Contractor to acquaint himself with available information will not relieve him of the responsibility of determining properly the difficulty, safety concerns or cost of successfully performing the work. The Building Owner and/or the Owner's Consultant is not responsible for any conclusions or interpretations made by the Contractor on the basis of the information made available by the Building Owner and/or the Owner's Consultant.
 - 1.1.3 The methods and procedures detailed within the general procedures of this bid package are merely illustrative of the procedures to be utilized on the asbestos abatement projects for Troy School District. Other procedures, which are the equivalent of those described, are encouraged at the option of the Contractor but are always subject to Troy School District and/or the Owner's Consultant approval.
- 1.2 The Contractor shall furnish all labor, materials, services, insurance, and equipment necessary to perform the asbestos abatement activities contemplated by this specification.
- 1.3 Additional work in the form of change orders, written or verbal agreements must also be completed in accordance with these General Procedures for Asbestos Abatement as well as all other sections of this specification document.
- 1.4 Additional general terms are outlined in Section 23 "Definitions."

2. Pre-Start Meeting

- Prior to the commencement of work, the Contractor shall meet with Troy School District and Owner's Consultant to present and review the items listed below. At that time, the Contractor shall designate at least one "competent" (as described by OSHA 1926.1101) individual who shall be on-site throughout the project with full authority to act on the Contractor's behalf and this person shall attend the Pre-Start Job Meeting. This meeting is arranged to discuss and set procedures to be followed throughout the performance of the contract. At this meeting and in the on-site logbook, the Contractor shall provide:
 - 2.1.1 Proof of Contractor licensing to conduct asbestos abatement activities in the State of Michigan in accordance with Act 135 P.A. 1986 (Asbestos Abatement Licensing Act) and any subsequent State of Michigan Acts.

- 2.1.2 A list of all employees who will participate in the project, including delineation of experience and assigned responsibilities. This list should include a list of all subcontractors' employees who may enter the work area.
- 2.1.3 Proof that the "competent person" to be responsible for the execution of this project has had training in accordance with AHERA and OSHA and is accredited through the Michigan Department of Consumer and Industry Services. This person shall be on-site at all times.
- 2.1.4 Proof that employees who will work on this project have had a minimum of twenty-four (24) hours of training in accordance with 40 CFR, Part 763, Subpart E.
- Copies of all worker's Michigan State Accreditation "Cards" must be provided to the Owner's Consultant prior to being allowed within the project area. For any employee(s) who have approval but do not yet have cards in their possession; the Contractor must provide a signed statement (on company letterhead) stating that state approval has been given to that/those employee(s). This statement must include the name of the state employee who granted verbal approval. In addition to this letter, the Contractor must provide a copy of the employee's training certificate, appropriate fit test(s) and doctor's written opinion.
- Proof that employees who work on this project have had proper medical screening as required by OSHA.
- 2.1.7 Proof that employees who work on this project have had proper respirator fit testing for all personnel who wear negative pressure respirators (when allowed).
- 2.1.8 A detailed written explanation of the following items:
 - 2.1.8.1 Preparation of the work area.
 - 2.1.8.2 Decontamination procedure for personnel, work area and equipment.
 - 2.1.8.3 Abatement methods and procedures to be utilized.
 - 2.1.8.4 Procedures for handling and disposing of waste materials including the name and address of the landfill to be used.
 - 2.1.8.5 Emergency Planning Procedures (see Section 8.0 of these specifications).
 - 2.1.8.6 A sequence of work and a performance schedule.

The items discussed in this section must be presented at the Pre-Start Job Meeting and a copy must also be kept in a log book which will be in view at the job site at all times. The items listed in the "Regulations" section of this specification must also be included in this log book. Proof of Contractor Licensing and Emergency Procedures as outlined above must also be posted in view near the decontamination chamber entrance as well as the notification addressed in Section 5 and the sign-in sheet addressed in Section 10 of these specifications.

At this meeting the Contractor and Owner shall agree on the existing conditions of the work area and the areas immediately surrounding this area.

3. Log Book/Regulations

- The Contractor shall have the items listed below in view at the job site at all times. These items must be kept in a log book as described in the "Pre-Start Job Meeting" section and include all items stated in Section 2.1.
 - OSHA Asbestos Regulation.
 - Environmental Protection Agency 40 CFR, Part 61 Subpart M: (National Emission Standard for Hazardous Air Pollutants).
 - Environmental Protection Agency 40 CFR, Part 763 (AHERA).
 - A complete set of these specifications.
 - Appropriate MSDS's.

Whenever during the course of this contract the Contractor, his subcontractor or his employees encounter asbestos, the Contractor shall handle, remove, and dispose of the asbestos strictly in accordance with the rules, guidelines, and regulations specified by EPA, OSHA, the Michigan Department of Public Health, the Michigan Department of Environmental Quality, and all other applicable regulatory agencies. The most recent edition or revision of any relevant regulation, standard, document or code shall be controlling. Where conflict among the requirements or with these specifications exists, the most stringent requirements shall be utilized.

4. Submittals to Owner's Consultant

- 4.1 The following shall be submitted for all employees who will participate in the project, to healthAIR, inc. before the project begins (as discussed in Section 2):
 - Copy of Employee Training Certificates.
 - Copy of MDLEG accreditation cards or letter by Contractor with verbal acceptance from MDLEG (see 2.1.7).
 - Copy of dated fit test.
 - Copy of doctors written opinion.
- 4.2 The Contractor shall submit copies of all project notifications to the Owner's Consultant prior to the start of the project.

5. Notification Procedures

- 5.1 The Contractor will make all necessary notifications to the appropriate federal, state and local agencies.
- The National Emission Standards for Hazardous Air Pollutants (NESHAP), Asbestos regulation 40 CFR 61, Subpart M requires that in a facility being renovated, if the combined amount of regulated asbestos containing materials being removed is at least 80 linear meters (260 linear feet) on pipes or at least 15 square meters (160 square feet) on other facility components, or is at least 1 cubic meter (35 cubic feet) off of facility components where the length or area could not be measured previously, all the requirements of 61.145 apply. Theses requirements are outlined thoroughly in the "Notifications" section of Section III. The notification made to the Michigan Department of Environmental Quality must be made a minimum of 10 business days prior to the start of the project.
- A minimum ten (10) calendar day prior notification which includes items under 5.2 (above) must be made to the Michigan Department of Public Health in accordance with their requirements for any project that exceeds ten (10) linear feet or fifteen (15) square feet or both of friable asbestos-containing material.
- All other agency notifications must be made on a timely basis as deemed necessary by those agencies.
- Payments of all applicable regulatory required fees and/or charges are the sole responsibility of the Contractor and should be included in the Contractor's bid.
- Copies of all notifications should be provided to the Owner's Consultant prior to the start of the project. All notifications will be submitted to healthAIR, inc. along with Submittal A2 (located in Section IV, Pre-Project Submittals). The project will not be started until the required notifications have been received from the Contractor. Please see Question #31 in the Bidder's Statement of Qualifications and Statement of Bid Preparation which acknowledges that the notifications will be provided prior to the start of abatement.

Part II - ABATEMENT REQUIREMENTS

6. Worker's Personal Protection/Safety Equipment

- Worker's clothing shall be provided by the Contractor as required by the current OSHA regulation. Rips and tears in the coveralls shall be repaired, or else the coveralls shall be replaced.
- 6.2 The Contractor shall provide protective clothing for the Owner's Consultant, and inspection personnel.
- Worker's clothing shall consist of disposable full body coveralls (coveralls should be of disposable paper such as TyvexTM), underwear, head covers, gloves, and boots. The Contractor shall supply whatever safety gear is necessary to protect those people authorized to enter the work site, including if necessary, hard hats and eye protection. OSHA approved footwear is mandatory while at the project site (inside and outside of the enclosure). No street clothing shall be worn under coveralls.
- The Contractor shall have an appropriately rated fire extinguisher in the dirty room and clean room of each enclosure.
- The Contractor shall adhere to all OSHA and other regulatory agency requirements regarding the safety of the employees, including, but not limited to:
 - Fire Safety
 - Lighting
 - Noise
 - Ladders
 - Scaffolding
 - Confined Spaces
 - Fall Protection
 - Electrical Protection
- 6.6 The Contractor will provide scaffolding, ladders and fall protection in accordance with all state and federal OSHA regulations to all persons working inside of the enclosure. The Owner's Consultant may shut the project down for improper working conditions until the project is corrected.
- 6.7 The Contractor is responsible for ALL WORKER SAFETY ISSUES, including the proper operation of all equipment and personal protection equipment. healthAIR, inc. is the Owner's Representative for asbestos regulations only and has no project management responsibilities for all other worker safety issues. At the conclusion of the project the Contractor will be required to submit a daily safety review form and a weekly safety meeting review form in order to receive the final 5% of the retainage.
- 6.8 Even though the Contractor is responsible for all worker safety issues, the Owner, the Owner's Construction Manager or the Owner's Consultant may shut the project down for improper working conditions until the project is corrected if either party feels there is a risk, perceived risk or potential risk to any person working on the site."

7. Respiratory Protection

- 7.1 Respirator protection for workers shall be provided by the Contractor as required by current OSHA regulation.
- 7.2 Respiratory protection consisting of powered air purifying respirators (P.A.P.R.) with full-face piece and HEPA filters will be provided and used by all asbestos abatement workers. Half-face cartridge respirators may be used for setting up, tearing down, pre-cleaning and post cleaning work area(s) with the approval and/or at the discretion of healthAIR, inc. For all Class I activities, the Contractor will be required to conduct all abatement activities using full-face PAPRs until an exposure assessment is produced showing that half-face negative pressure respirators afford acceptable protection. Abatement activities using negative pressure half-face respiratory protection will be allowed only with approval of healthAIR, inc. Workers will always wear a respirator when in the work area. While wearing the respirator, workers will not pull the respirator away from

his/her face to talk, smoke, eat, or drink. These activities will be cause for immediate dismissal from the project site. No workers will be permitted to wear a half-face respirator unless clean shaven. If half-face cartridge respirators are used as described above, then a qualitative fit test for each employee engaged in this work must be completed. These fit tests must be completed in accordance with OSHA regulations.

- 7.3 Combination cartridges (Asbestos and Organic Vapor) are required during the removal of mastic materials.
- An adequate supply of cartridges and respirators must be on-site and available for workers (regardless of respirator type) and the Owner's Consultant.

8. Emergency Planning

- Emergency planning shall be developed prior to abatement initiation and agreed to by the Contractor and Troy School District. All plans must be detailed in writing and posted at the job site (in view near the decontamination chamber entrance).
- 8.2 Emergency planning shall include written procedures for the following emergencies:
 - 8.2.1 The Contractor must explain his contingency plan for the possibility of the air filtration devices blowing a fuse, tripping a circuit breaker, or losing power.
 - 8.2.2 The Contractor must explain his contingency plan for the possibility that a disposal bag may break or leak outside the negative pressure enclosure.
 - 8.2.3 The Contractor must explain his contingency plan for the possibility that a glovebag may break or leak during glovebag removal activities.
 - 8.2.4 The Contractor must explain his contingency plan for the possibility of an injury.
 - 8.2.5 For non-life-threatening situations employees injured or otherwise incapacitated shall decontaminate following normal procedures with assistance from fellow workers if necessary, before exiting the work place to obtain proper medical treatment.
 - 8.2.6 For life-threatening injury or illness, worker decontamination shall take least priority after measures to stabilize the injured worker, remove him/her from the work place and secure proper medical treatment.
 - 8.2.7 The Contractor must detail emergency evacuation routes in case of fire, explosion, or toxic atmosphere, etc. The Contractor should mark all exit routes inside the enclosure using a bright visible paint or similar method.
- The Contractor shall take all necessary precautions and actions to protect his employees, subcontractors, Owner's Representatives, Owner's Consultants, government inspectors, general public, and the building and structure from exposure to asbestos.

9. Preparation of Work Area for Asbestos Abatement

- Troy School District shall attempt to furnish utility services for the Contractor's use, including electrical outlets (25 ampere) and water taps in or adjacent to the work area in sufficient quantities and located such that the Contractor can use them for equipment and abatement/decontamination practices. However, should such utility access not be available, the Contractor is solely responsible for the provision of the necessary services. In the event of power failure (regardless of fault), the Contractor is responsible for continuing work using adequate generator power.
- Danger signs will be posted at a distance sufficiently far enough from the asbestos abatement work area to permit an employee to read the sign and take necessary protective measures to avoid exposure. Signs shall be in accordance with EPA and OSHA regulations. All possible entrances to the work area shall be posted.

Additional signs and/or warning tape will be placed at areas designated by the Owner's Consultant.

- 9.3 The building personnel shall attempt to shut down and lock out all heating, cooling, and air conditioning system components that are in, supply, or pass through the work areas. If the building personnel are unavailable or unable to so do, it is the sole responsibility of the Contractor to lock out these systems. The Contractor will seal all intake and exhaust vents in the work area with tape and six-mil polyethylene, as well as any seams in system components that pass through the work area. All affected heating, ventilation and air conditioning system filters will be removed and placed in six-mil polyethylene bags for disposal as asbestos waste.
- 9.4 The Contractor may be required to pre-clean all movable objects within the work area using a HEPA filtered vacuum and/or wet cleaning methods. Pre-cleaning will be conducted by the Contractor as deemed necessary by Troy School Destructor the Owner's Consultant. After cleaning, these objects shall be removed from the work area by the Contractor and carefully stored in an uncontaminated location as designated by the Owner's Consultant. Carpeting, drapes, clothing, furniture, and other fabric items contaminated with asbestos may be required to be disposed of as asbestos contaminated waste.
- The Contractor may be required to pre-clean all fixed objects in the work area using HEPA filtered vacuums and/or wet-cleaning methods. Pre-cleaning will be conducted by the Contractor as deemed necessary by Troy School Destructor the Owner's Consultant. The extent of the pre-cleaning will be determined by, but not limited to the following factors: the particular application of the asbestos-containing material, its present condition, friability, asbestos content, visible debris and the type of surface to which the material is applied.
- Where doors or other such building fixtures are removed by the Contractor prior to abatement activities, the Contractor is responsible for replacing doors and/or fixtures upon completion of abatement. Each door and/or fixture shall be sufficiently marked or otherwise identified by the Contractor to insure replacement in the proper location.
- 9.7 The Contractor shall seal all windows, doorways, elevator openings, corridor entrances, drains, ducts, grills, grates, diffusers, skylights and all other openings between the work area and the areas outside the work area with, at a minimum, four-mil polyethylene sheeting.
- Walls will be covered with a minimum of one layer of four-mil polyethylene sheeting, unless a greater thickness is specified in the abatement requirements. Walls that are non-porous and will not be damaged by water, surfactant, or encapsulation do not necessarily need protection. They can be decontaminated using HEPA vacuums and wet cleaning techniques. Troy School Destructor the Owner's Consultant will advise the method deemed most appropriate and the Contractor shall comply with the method chosen.
- 9.9 Floors shall be covered with at least three layers of six-mil polyethylene sheeting. Terrazzo floors require a minimum of one layer.
- 9.10 No equivalent polyethylene sheeting shall be used.
- Non-waterproof tape may not be used for attaching polyethylene sheeting or for sealing polyethylene leaks. High quality duct tape shall be used for this purpose.
- 9.12 Troy School Destructor the Owner's Consultant must approve the decontamination chamber location, Contractor parking, dumpster location and entrances that the Contractor will use for the movement of supplies and personnel.
- Equipment storage, bathroom usage designation, foreman's office and designated break areas (if available) will be determined by Troy School Destructor the Owner's Consultant. Only project areas and designated areas are to be used.
- 9.14 No asbestos abatement shall begin until the Owner's Consultant has inspected and approved the enclosure built around the work area.

10. Decontamination

- 10.1 The Contractor will construct decontamination facilities in a predesignated area which will house the clean room, shower room, dirty room, and, when feasible, an equipment room. This facility will be, at minimum, three-chambered with an entrance airlock and with shower facilities in the central chamber. The dimensions of these chambers will be adequate for the number of men needed for the project. At least two layers of six-mil polyethylene will be placed on the floor of the entire decontamination chamber, to prevent leakage of water from the showers. The walls, floor, and ceiling covering of the airlock construction will be seamed to each other in a fashion making them air and water tight. One end of this construction will exit to the clean area outside the containment barrier walls. The other end of this construction will exit inside or at the containment barrier walls. Except for these doors, all three chambers will be partitioned from each other with air and water tight flaps made of six-mil polyethylene. Four (4) flapped doors will be constructed with two (2) layers of sixmil polyethylene. One door will be at the entrance of the clean room, one door at the entrance to the shower, one door at the entrance to the dirty room, and the last door at the entrance to the work area. Both layers will be attached to the side of the door which faces toward the work area. The first layer of polyethylene will be attached at the top, bottom, and sides of the door opening. It will be slit down the middle. The second layer of polyethylene will be attached only at the top of the door on the dirty side of the door opening. It will be wider than the slit made in the first layer and will hang like a flap. When air is drawn from the clean side of the airlock into the work area it will cause the door flaps to lift. It air attempts to move from the work area end of the airlock toward the clean end or outside of the enclosure, it will force the flaps shut, closing the slit in the first polyethylene layer and thus stopping the air flow. All four (4) door openings or flaps will be constructed to allow clean air into the enclosure, but stopping air from exiting the enclosure. The central chamber will contain shower(s). Each shower stall will sit in a pan with at least six-inch sides. Suitable hoses will be used to supply hot and cold water to the showers. A sump pump or other suitable and safe device will be used to filter and dispose of the shower waste water through a special HEPA filter. No water may leave the work area without undergoing HEPA filtration or being treated as asbestos waste. Black polyethylene sheeting may be used for privacy on the decontamination facility.
- The Contractor may construct a two-chambered decontamination airlock to serve as a debris port. All asbestos waste will be moved out through this port or through the decontamination unit. The chamber will be constructed in the same manner as the main decontamination airlock, but excluding the shower facility. As each bag is filled, it will be set into the first room for temporary storage. Three workers will be needed to complete the waste decontamination process. A worker in the first room will wash and hand the bag to a worker in the second room where he/she will then double-bag the material. The second worker will then hand the double-bagged material to a third worker who loads the material on the transport vehicle (airlocks must exist between each room, as in the main decontamination facility). The third worker will apply a proper waste generator label to the bag. If a debris port is not possible, all precautions should be taken when hauling waste through the main decontamination facility, where all bags will go through the decontamination process. If a separate decontamination facility is constructed, the debris port shall be sealed while not in use.
- All workers, without exception, will change street clothes in designated areas (clean room) prior to the start of each days work. Lockers or acceptable substitutes will be provided by the Contractor for street and work clothes. After workers are properly dressed in protective gear, they will walk through the shower and dirty room into the work area. All workers and entrants to the enclosure will sign in on Contractor provided forms before entering the clean room.
- At the end of the work shift, and anytime the worker leaves the work area, he/she will decontaminate by removing all contaminated work clothes in the dirty room, but leaving his/her respirator on. He/she will then proceed to the showers and properly wash. Respirators will be worn while showering and remain on until the respirator is clean of asbestos. The cartridges will then be removed and disposed of as asbestos waste and the respirator stored in the clean room. Workers will shower before breaks, lunch and at the end of each day's work. Hot water, towels, soap and hygienic conditions shall be provided by the Contractor.
- Adequate toilet facilities may be located outside of the work area and decontamination for this purpose will be employed. Where such facilities do not exist, the Contractor will provide portable service.

- No smoking, eating or drinking is to take place in the work area. Prior to smoking, eating, drinking or using toilet facilities, workers will fully decontaminate by showering. A new coverall will then be used to re-enter the work area.
- Procedures developed for evacuation of injured workers (see 8.0, Emergency Planning) will be used. Aid for a seriously injured worker will not be delayed for reasons of decontamination.
- Worker's footwear will remain inside the work area until the completion of the job. If the footwear must be removed from the enclosure, it must be washed to remove gross debris and then sealed in an polyethylene sheeting.
- All waste water must be passed through a HEPA filter or collected in an air tight container and disposed of as asbestos waste.
- All Contractor's tools and supplies, including large items such as ladders and scaffolding must be properly decontaminated when removing them from the project area.

11. Methods of Asbestos Abatement - Standard Work Practices for Specific Materials

Non-Asbestos Carpet Material Removal Procedures:

All non-asbestos carpet material will be removed and disposed of in accordance with the following procedures (please note that carpet is not reflected in the scope of work and is the responsibility of the Contractor to review):

- The Contractor may remove all non-asbestos carpet material and any associated non-wood/non-ceramic floor molding at the conclusion of set-up activities (after the establishment of the negative pressure enclosure). The carpet materials may be disposed of as non-asbestos waste as long as there are no asbestos floor tile materials removed with the carpet and no asbestos floor tile materials are found broken below the carpeting. If asbestos floor tile materials are attached to the carpeting or are found to be cracked and broken, the carpet will be wrapped in polyethylene sheeting for packaging as non-friable asbestos waste. The floor molding may be disposed of as non-asbestos waste.
- The Contractor will be responsible for removing multiple layers of carpet, when present, in the work area. The locations of second layers of carpet are not detailed within the scope of work. The same removal conditions as described in the previous item exist.
- If the Contractor removes the carpet from any location in the work area and finds that there is no floor tile present (or no tile was expected to be present), the Contractor will be required to remove any and all carpet backing material adhered to the floor. Yellow carpet adhesive is not considered carpet backing and does not need to be removed (unless specifically identified in the abatement activities).
- When removing floor molding from any location in the building, the Contractor will be required to remove all associated adhesives (including, but not limited to, all glues, mastics and caulks) remaining on the wall in the area of the floor molding. The associated adhesive materials will be removed using a sharp scraper to remove the excess materials. All waste generated during this activity will be disposed of with the asbestos floor tile. The floor molding materials may be disposed of as a non-asbestos waste.

11.2 Class II Non-Friable Asbestos Floor Tile Abatement Procedures:

The procedures in this section assume that the material cannot and/or will not be removed in an intact condition following the OSHA Floor Tile Settlement Procedures. All non-friable asbestos floor tile abatement activities will be completed in accordance with the following procedures (regulated area set-up and removal techniques):

Set-up of Regulated Area:

All Class II work shall be supervised by a competent person (accredited asbestos supervisor).

- Critical barriers shall be placed over all openings to the regulated area, including all doors, windows, vents and HVAC system openings. Critical barriers shall be placed over all doors leading to non-project areas, such as, but not limited to, adjacent rooms, storage areas, closets and bathrooms.
- To assist with final cleaning activities, one (1) layer of six-mil polyethylene sheeting will be placed over all wall surfaces below the ceilings (up to 10') and all counter tops, sink cabinets, etc. in each of the project areas. Prior to the installation of the polyethylene wall, the Contractor will remove all non-wood/non-ceramic floor molding in the work area and dispose of the material as non-asbestos waste.
- Air filtration devices shall be placed inside of the regulated area and exhausted outside of the building. A minimum of one (1) air filtration device will be placed in each functional space to provide a sufficient air exchange and appropriate air flow through the regulated area.
- A flapped critical barriers will be used to allow for access into the regulated area. Project areas with more than one doorway will have only one access location.
- The set-up of a full, three chamber decontamination unit, complete with an operable shower chamber, will be set-up at the entrance to the regulated area. The Contractor will be responsible for providing water from an access point in the building to the shower via hoses. The Contractor will be allowed to use alternate decontamination procedures, as allowed by the OSHA Asbestos Standard for Class II projects, if the only water sources are in excess of 200' from an access point for the enclosure.
- Asbestos warning signs will be placed on the outside of the critical barriers prior to the commencement of abatement activities.

Removal Procedures:

- All floor tile materials will be removed in a non-friable manner using non-aggressive removal techniques. The set-up requirements listed above provide sufficient containment for the use of non-aggressive non-intact removal methods (i.e., the use of human powered floor scrapers/spuds).
- Mechanical chipping (including use of pneumatic chippers, TerminatorsTM, PirhanasTM and similar devices) and the use of aggressive removal techniques are prohibited. The use of aggressive removal techniques will require additional project considerations, including, but not limited to, TEM clearance sampling and project notifications (all of which will be the responsibility of the Contractor) on AHERA projects. All TEM clearance sampling required due to the use of mechanical and/or aggressive removal methods will be completed by healthAIR, inc. and will be the financial responsibility of the Contractor.
- The Contractor will be responsible for providing water from an access point in the building to the enclosure via hoses. The Contractor will be allowed to use alternate water distribution techniques (such as "piss-pumps" or buckets) if the only water sources are in excess of 200' from an access point for the enclosure.
- All floor tile materials will be placed in lined fiber drums for disposal. The Contractor may dispose of the materials as non-friable asbestos waste, but all materials must be packaged as specified prior to removal from the regulated area. This additional requirement is intended to eliminate the potential for visible emissions (i.e., small pieces of floor tile) outside of the enclosure or near the dumpster/waste transportation vehicle. Fiber drums may be lined, placed in the clean room and filled with sealed bags in lieu of double bagging the waste or using the drums inside of the enclosure.
- At all locations where tile must be cut or broken, such as the edge of cabinets, casework or partition walls, the Contractor will remove all jagged edged tile and all loose tile which remains. At all doorway locations, the Contractor will remove full tiles and will not leave any damaged portions of tile adhered to the floor.
- Flooring and its backing will not be sanded.
- Vacuums equipped with HEPA filters, disposable dust bags and metal floor tools (no brushes) shall be used to clean the floors.
- Dry sweeping is prohibited.

Personal Protection Equipment and Procedures:

- All employees performing Class II work practices inside of the regulated area established by these procedures will wear respiratory protection (minimum = half-face negative pressure respirator).
- The Contractor will not be allowed to cite an initial negative exposure assessment or any other previous monitoring to forgo respiratory protection. An initial negative exposure assessment will be

- allowed to establish a half-face negative pressure respirator as adequate respiratory protection.
- All employees performing Class II work practices inside of the regulated area established by these
 procedures will wear disposable coveralls.
- All workers will be required to properly decontaminate when exiting the regulated area.
- Any worker found in violation of these requirements and procedures will be removed from the project site for the duration of the project. healthAIR, inc.'s on-site Project Manager will contact the Contractor's Main Office to inform the Contractor of the need to relocate the employee.

Final Cleaning Procedures:

- All vertical sections of polyethylene sheeting will be rinsed following completion of gross removal
 activities.
- All horizontal sections of the polyethylene sheeting will be cleaned using a combination of wet wiping and HEPA vacuuming.
- All flooring surfaces inside of the enclosure will be cleaned using a combination of wet wiping and
 HEPA vacuuming. All flooring surfaces will be visually inspected to confirm the removal of all
 asbestos floor tile debris, including all pieces in corners, along cabinets/casework and all grittiness
 found on the floor.
- All surfaces inside of the enclosure will be sprayed with a clear drying lockdown encapsulant following the visual inspection.
- All rooms at the perimeter of the regulated area will be inspected at the conclusion of final cleaning.
 Any locations where pieces of floor tile are found will be HEPA vacuumed in accordance with this section of the procedures.

General Requirements:

All work conducted by the Contractor will use the following engineering controls and work practices regardless of the levels of exposure:

- 1. Vacuum cleaners equipped with HEPA filters to collect all debris and dust.
- 2. Wet methods to control employee exposures during all handling of asbestos.
- 3. Prompt clean-up and disposal of wastes and debris in leak tight containers.
- 4. Local exhaust ventilation equipped with HEPA filters.
- 5. Enclosure or isolation of processes producing asbestos dust.
- 6. Ventilation of the regulated area to move contaminated air away from the breathing zone of employees and toward a filtration or collection device equipped with a HEPA filter.

Prohibited Work Practices:

The following work practices and engineering controls shall not be used for these projects regardless of the level of exposure:

- 1. High-speed abrasive disc saws that are not equipped with point of cut ventilator or enclosures with HEPA filters.
- Compressed air used to remove asbestos unless the compressed air is used in conjunction
 with an enclosed ventilation system designed to capture the dust cloud created by the
 compressed air.
- 3. Dry sweeping, dry shoveling or other dry clean-up of asbestos waste and debris.
- 4. Employee rotation as a means of reducing employee exposure to asbestos.

11.3 Class II Non-Friable Asbestos Floor Tile Mastic Abatement Procedures:

All non-friable asbestos floor tile mastic abatement activities will be completed in accordance with the following procedures (regulated area set-up and removal procedures):

Set-up of Regulated Area:

• The Contractor will complete the removal of the asbestos floor tile mastic materials inside of the same regulated area set-up for the removal of Class II non-friable asbestos floor tile materials. The same set-up will be used for non-asbestos floor tile when asbestos floor tile mastic is present.

Removal Procedures:

- The Contractor will be allowed to use chemical mastic remover for the removal of the asbestos floor tile mastic. The Contractor will note in the bid any specific conditions to the use of chemical mastic remover.
- The Contractor will be allowed to use grinding methods for the removal of asbestos floor tile mastic if the removal is inside of a negative pressure enclosure with TEM clearance sampling.
- The Contractor will not be allowed to use a "shot blaster" type device for the removal of the asbestos
 floor tile mastic.
- All removal of asbestos floor tile mastic will be completed using wet methods.
- All floor tile mastic materials will be placed in lined fiber drums or six-mil polyethylene bags for disposal.
- Flooring and its backing will not be sanded.
- Vacuums equipped with HEPA filters, disposable dust bags and metal floor tools (no brushes) shall be used to clean the floors.
- Dry sweeping is prohibited.

Personal Protection Equipment and Procedures:

The Contractor will complete the removal of the asbestos floor tile mastic with the same personal
protection equipment requirements and procedures in place for the removal of Class II non-friable
asbestos floor tile materials.

Final Cleaning Procedures:

- The Contractor will complete the removal of the asbestos floor tile mastic with the same final cleaning procedures in place for the removal of Class II non-friable asbestos floor tile materials.
- In addition, if the Contractor uses a chemical floor tile mastic remover during the project, the Contractor will be required to complete floor cleaning per the manufacturers recommendation. The Contractor will submit a signed attestation indicating that "all manufacturers recommendations were followed during the removal of asbestos floor tile mastic using chemical mastic remover". This attestation must be received prior to release of final payment.

General Requirements:

• The Contractor will complete the removal of the asbestos floor tile mastic with the same general conditions as the removal of Class II non-friable asbestos floor tile materials.

Prohibited Work Practices:

• The Contractor will complete the removal of the asbestos floor tile mastic with the same general conditions as the removal of Class II non-friable asbestos floor tile materials.

11.4 Class I Glovebag Abatement Procedures:

All glovebag abatement activities for asbestos thermal system insulation will be completed in accordance with the following procedures (regulated area set-up and removal techniques):

Set-up of Regulated Area:

- All Class I work, including set-up of the glovebags and other control systems, shall be supervised by a competent person (accredited asbestos supervisor).
- Critical barriers shall be placed over all openings to the regulated area, including all doors, operable windows and vents. Openings will include openings between rooms once ceilings have been removed. Critical barriers shall be placed over all doors leading to non-project areas, such as, but not limited to, adjacent rooms, storage areas, closets and bathrooms. These requirement may be eliminated if less than 10 square/25 lineal feet of material will be removed and no other workers are in the areas adjacent to the regulated area.
- Two critical barriers shall be placed over all HVAC system openings inside of the regulated area.
- Impermeable drop cloths shall be placed on all surfaces below the removal activity.
- All objects within the regulated area shall be covered with impermeable drop cloths or plastic sheeting

- which is secured by duct tape.
- Air filtration devices shall be placed inside of the regulated area and exhausted outside of the building. A minimum of one (1) air filtration device will be placed in each functional space to provide a sufficient air exchange and appropriate air flow through the regulated area.
- For all projects involving the removal of more than 25 lineal feet of friable material using glovebags, a full, three chamber decontamination unit, complete with an operable shower chamber, will be set-up at the adjacent to the regulated area. The Contractor will be responsible for providing water from an access point in the building to the shower via hoses. The Contractor will be allowed to use alternate decontamination procedures, as allowed by the OSHA Asbestos Standard for Class I projects, if the only water sources are in excess of 200' from an access point for the enclosure.
- Asbestos warning signs will be placed on placed on the outside of the critical barriers prior to the commencement of abatement activities.

Set-up and Use of Glovebags:

- All glovebags shall be made of six mil polyethylene sheeting and shall be seamless at the bottom.
- Each glovebag shall be installed so that it completely covers the circumference of the pipe.
- Glovebags shall be smoke-tested for leaks and any leaks sealed prior to use.

Removal Procedures

- Glovebags shall be used only once and may not be moved.
- Glovebags shall not be used on surfaces whose temperatures exceed 150° F.
- Prior to disposal, glovebags shall be collapsed by removing air within them using a HEPA vacuum.
- Before beginning the operation, loose and friable material adjacent to the glovebag operation shall be wrapped and sealed in two layers of six mil polyethylene sheeting or otherwise rendered intact.
- At least two persons shall perform Class I glovebag removal procedures.

Personal Protection Equipment and Procedures:

- All employees performing Class I work practices inside of the regulated area established by these procedures will wear respiratory protection (minimum = half-face negative pressure respirator).
- All employees performing Class I work practices inside of the regulated area established by these
 procedures will wear disposable coveralls.
- All workers will be required to properly decontaminate when exiting the regulated area.
- Any worker found in violation of these requirements and procedures will be removed from the project site for the duration of the project. healthAIR, inc.'s on-site Project Manager will contact the Contractor's Main Office to inform the Contractor of the need to relocate the employee.

Final Cleaning Procedures:

- All drop cloths will be removed and disposed of as asbestos waste. This will be completed as the final
 activity of final cleaning.
- All exposed ends on piping systems will be neatly sealed with bridging encapsulant.

General Requirements:

All work conducted by the Contractor will use the following engineering controls and work practices regardless of the levels of exposure:

- 1. Vacuum cleaners equipped with HEPA filters to collect all debris and dust.
- 2. Wet methods to control employee exposures during all handling of asbestos.
- 3. Prompt clean-up and disposal of wastes and debris in leak tight containers.
- 4. Local exhaust ventilation equipped with HEPA filters.
- 5. Enclosure or isolation of processes producing asbestos dust.
- 6. Ventilation of the regulated area to move contaminated air away from the breathing zone of employees and toward a filtration or collection device equipped with a HEPA filter.

Prohibited Work Practices:

The following work practices and engineering controls shall not be used for these projects regardless of the

level of exposure:

- 1. High-speed abrasive disc saws that are not equipped with point of cut ventilator or enclosures with HEPA filters.
- Compressed air used to remove asbestos unless the compressed air is used in conjunction
 with an enclosed ventilation system designed to capture the dust cloud created by the
 compressed air.
- 3. Dry sweeping, dry shoveling or other dry clean-up of asbestos waste and debris.
- 4. Employee rotation as a means of reducing employee exposure to asbestos.

11.5 Class II Intact/Non-Friable Transite Panel Abatement Procedures:

All non-friable asbestos transite panels, which includes siding, shingles, soffits and panels in window frames, abatement activities will be completed in accordance with the following Class II intact removal procedures (regulated area set-up and removal techniques):

Set-up of Regulated Area:

- All Class II work shall be supervised by a competent person (accredited asbestos supervisor). The competent person will be required to ensure that all panels are removed intact and that all procedures relating to the removal are strictly followed.
- The Contractor will set-up asbestos warning signs and asbestos banner tape to mark the regulated area.
- The need for additional set-up/engineering controls, such as critical barriers or AFDs, will be on a site specific basis and will be added when necessary. In most cases, these will be added when abatement is completed inside of the building.

Removal Procedures:

- Cutting, abrading or breaking the transite panels shall be prohibited unless the Contractor can demonstrate that methods less likely to result in asbestos fiber release cannot be used.
- Each panel shall be sprayed with amended water prior to removal.
- All nails shall be cut with flat, sharp instruments.
- The panels will be carefully removed intact and immediately lowered to the ground using a dust-tight chute, crane or hoist, or placed in an impervious waste bag or wrapped in plastic sheeting and lowered to the ground no later than the end of the work shift. The panels will not be dropped, thrown, slide or otherwise moved in manner with may damage or disturb the asbestos material.
- Cracked or broken panels will not be left inside of a regulated area. The Contractor will remove all portions of cracked, broken or otherwise damaged panels.
- All of the materials will be wrapped in a minimum of one layer of six-mil polyethylene sheeting and disposed of as a Category II non-friable material at a Type II construction landfill.

Personal Protection Equipment and Procedures:

- All employees performing Class II work practices inside of the regulated area established by these procedures will wear respiratory protection (minimum = half-face negative pressure respirator) unless an initial negative exposure assessment has been produced for this operation and is present at the project site.
- All employees performing Class II work practices inside of the regulated area established by these procedures will wear disposable coveralls unless an initial negative exposure assessment has been produced for this operation and is present at the project site.
- A polyethylene drop cloth will be set-up to all a location for workers to decontaminate their clothing, tools and equipment at the conclusion of removal activities unless an initial negative exposure assessment has been produced for this operation and is present at the project site.
- Any worker found in violation of these requirements and procedures will be removed from the project site for the duration of the project. healthAIR, inc.'s on-site Project Manager will contact the Contractor's Main Office to inform the Contractor of the need to relocate the employee.

Final Cleaning Procedures:

All drop cloths will be removed and disposed of as asbestos waste. This will be completed as the final

- activity of final cleaning.
- All exposed ends on adjacent panels will be neatly sealed with bridging encapsulant.
- Any remaining tracking, such as those present with windows, will be final cleaned using a combination of HEPA vacuuming and wet-wiping.

General Requirements:

All work conducted by the Contractor will use the following engineering controls and work practices regardless of the levels of exposure:

- 1. Vacuum cleaners equipped with HEPA filters to collect all debris and dust.
- 2. Wet methods to control employee exposures during all handling of asbestos.
- 3. Prompt clean-up and disposal of wastes and debris in leak tight containers.

Prohibited Work Practices:

The following work practices and engineering controls shall not be used for these projects regardless of the level of exposure:

- 1. High-speed abrasive disc saws that are not equipped with point of cut ventilator or enclosures with HEPA filters.
- Compressed air used to remove asbestos unless the compressed air is used in conjunction
 with an enclosed ventilation system designed to capture the dust cloud created by the
 compressed air.
- 3. Dry sweeping, dry shoveling or other dry clean-up of asbestos waste and debris.
- 4. Employee rotation as a means of reducing employee exposure to asbestos.

Note: These procedure described in this section do not apply to transite ceilings, circumstances where the material cannot be removed substantially intact or any circumstances were friable removal techniques are employed.

12. Methods of Asbestos Abatement - Additional Work Practices

- 12.1 The asbestos material will be sprayed with either removal encapsulant or "amended water" (which contains an additive to enhance penetration). A fine spray of either solution will be applied to prevent fiber disturbance preceding the removal of the asbestos material. The asbestos will be sufficiently saturated to prevent emission of airborne fibers in excess of the exposure limits prescribed in the OSHA standards referenced in these specifications. The Contractor shall not, however, allow excessive water to accumulate in the work area. If removal encapsulant water is not used, surrounding areas will be periodically sprayed and kept wet to facilitate removal with minimum fiber release. A high humidity will be maintained in the work area to assist in fiber settling. If at any time the Owner's Consultant determines the material is not kept adequately wet, misters and/or sprinklers will be mandatory.
- Removal of asbestos material will be done in manageable sections with two-person teams (if needed). Material will be removed as intact sections or components whenever possible and carefully lowered to the floor.
- The waste material will be packed in labeled six-mil polyethylene bags (held within 55 gallon drums with the required EPA & OSHA labels where appropriate) prior to starting the next section to prevent the material from drying. Double bagging will always be used. Bags shall not be over-filled and will be securely taped or sealed at the top to prevent accidental opening or leakage during removal, storage and transport. All bags and/or drums shall have all appropriate warnings and labels attached to them.
- Large components removed intact will be wrapped in two layers of six-mil polyethylene sheeting secured with tape properly labeled for transport to the landfill. Such packaging shall have all appropriate warnings and labels attached to them.
- When removal of building materials (electrical, light, duct work, etc.) is necessary, the Contractor shall develop drawings indicating existing materials and their exact locations.

- Personnel knowledgeable and experienced in electrical work must be used when installing or making connections to any electrical components within the facility, as well as when removing and/or replacing lights.
- 12.7 All ceiling demolition, including but not limited to wires, hangers, steel bands, nails, screws, metal lath, tin sheeting, and other objects may be required to be treated as asbestos waste. These materials have sharp edged components that will tear the polyethylene bags and sheeting. This waste must be placed into fiberglass or fiberboard drums for disposal and labeled appropriately. All drums used inside the enclosure will be completely sealed in polyethylene sheeting.
- No bags shall be thrown or dropped at any time.
- All containerized asbestos waste that is stored on-site (if allowed) shall be properly labeled and placed in a locked or secured location until ready for final disposal. Labels shall be of sufficient size and contrast to be readily visible and legible. The sign shall read:

"Danger Contains Asbestos Fibers Avoid Creating Dust Cancer and Lung Disease Hazard"

- All asbestos abatement projects will be completed with the use of HEPA air filtration devices. Each unit must have three filters, including a HEPA filter capable of removing minute asbestos fibers. Each unit has ducts that must be exhausted to the outside air. Inlet and outlet ports of the air filtration devices must be covered with tape and 4-mil polyethylene sheeting when not in use. HEPA air filtration devices will be set up so that the air in the enclosure is drawn away from the abatement worker. Removal and cleaning operations will always move towards the air filtration devices. HEPA air filtration devices will be run until the completion of the project.
 - 12.10.1 The Contractor will provide and maintain a pressure differential strip gauge. It will be activated prior to removal of any building material and continue operating until the final clearance results have been determined. Placement of the differential strip gauge is subject to the approval of the Owner's Consultant. The Owner's Consultant may, at their discretion, utilize additional pressure differential strip gauges or other devices to measure the pressure differential.
 - 12.10.2 A minimum reading of 0.020 inches of water on a differential pressure gauge shall be maintained at all parts of the enclosure.
 - 12.10.3 Sufficient negative pressure will be used in the enclosure to evacuate the air once every 15 minutes (minimum).
- All air filtration devices must be ducted to the outside of the building from a position that is securable. Flexible duct will be used and placed at a location approved by healthAIR, inc.
- 12.12 All gross amounts of asbestos debris shall be cleaned up, bagged, and sealed at the end of each working day.
- 12.13 The Contractor shall transport materials to the ground via leak-tight chutes or such other containers if the material is being removed or stripped more than 50 feet above ground level and not removed as units or in sections.
- 12.14 A thick encapsulant such as "viac" shall be applied to any exposed pipe insulation ends leading away from the enclosure area, regardless of material make-up.
- Only vacuums and air filtration devices with "HEPA" filters will be allowed. No "shop-vacs," homemade hybrid vacuums or air filtration devices will be allowed on site.
- 12.16 The Contractor will only be allowed to use open top dumpsters if the dumpsters are placed inside of a 10' high

fenced in area which can be locked and secured at the end of the work day.

12.17 No "Vac-Loaders" or similar type abatement equipment will be allowed on the Owner's Property. This includes the use of the equipment as an "air filtration device".

13. Post Abatement Clean-Up

- After completion of all removal and stripping, all surfaces within the work area will be wire-brushed and/or wet-wiped to remove all visible residue.
- All visible accumulations of asbestos-containing materials and asbestos-contaminated debris will be removed and containerized. Durable plastic shovels must be used in place of metal shovels in order to minimize damage to floor sheeting.
- Tools will be decontaminated by removing any gross amounts of asbestos from them in the work area. Following this, they will be wiped off in the dirty room and then sprayed down with water in the shower area. All hand tools will then be sealed in plastic bags. Workers will wear protective equipment throughout this process. (Where space allows, a separate equipment room will be built inside the enclosure. This will eliminate the accumulation of gross asbestos on tools and equipment and will facilitate decontamination of these items.) No tools or equipment will be allowed to leave the work area without being decontaminated.
- Following the cleanup of visible accumulations, the top layer of polyethylene sheeting will be removed from the walls and ceiling, and the interior layer will be removed from floors. At this point any asbestos that has fallen behind the polyethylene will be cleaned up. All barriers to doors and windows, and other critical barriers to clean areas will be left in place until final air checks are completed.
- Following clean up of visible accumulations of asbestos waste, the entire area will be wet-wiped. During setting/drying periods no entry, activity, or ventilation into the work area will be allowed. The HEPA air filtration devices will continue to operate during this period.
- All removed polyethylene, tape, cleaning material, and contaminated clothing will be placed in 6-mil polyethylene bags or polyethylene lined drums, sealed and labeled (as previously described) for disposal as asbestos waste material.
- Only clear drying encapsulants and amended solutions may be used, unless directed in the "Abatement Activities" section.
- Prior to final clearance sampling, all items will be removed from the dirty room and all three chambers of the decontamination chamber will be wet-wiped and HEPA vacuumed.

14. Acceptance Criteria for Area Re-Occupancy

- 14.1 The Contractor will clean all work site surfaces in a proper manner with appropriate equipment in accordance with Section 14 of these General Procedures.
- 14.2 After completion of the cleaning operations, the following activities shall be performed:
 - 14.2.1 A complete visual inspection to insure dust free conditions. The Contractor shall tour and inspect the entire work area, including but not limited to: ventilation openings, doorways, windows, and other openings; he/she shall look for debris from any sources, residue on surfaces, or any other matter. If any debris or residue is found, repeat the final cleaning until visual inspection is passed. It shall be the right of the Owner's Consultant(s) to accompany the Contractor during the inspection and determine if additional cleaning is necessary.
 - 14.2.2 A clear drying encapsulant will be used to seal all surfaces of the work area. Non-clear drying encapsulants can only be used upon approval by Troy School District and/or Owner's Consultant.

- 14.3 Air samples will be collected following completion of all cleaning operations as specified in 14.1 14.7, following encapsulation as specified in 14.2.2, and after the work area is completely dry.
- 14.4 Clearance air samples collected from an area in which less than or equal to 160 square feet, or 260 linear feet of ACBM have been removed, enclosed or encapsulated, may be analyzed using Phase Contrast Microscopy (PCM). If more than 160 square feet, or 260 linear feet of ACBM are removed, or encapsulated the postabatement air samples collected must be analyzed by Transmission Electron Microscopy (TEM).

14.4.1 Transmission Electron Microscopy (TEM) Clearance

When the work site has become completely dry, the Owner's Consultant shall collect at least ten clearance air samples according to 40 CFR, Part 763 (AHERA Regulations). At least five samples shall be taken in the abatement site; and five samples shall be taken at locations representative of air entering the abatement site. A minimum of 1,200 liters per air sample and a maximum of 1,800 liters per air sample shall be collected using aggressive sampling techniques. If the post-abatement test reveals fiber levels in excess of 0.01 fibers/cc, and/or if the Z-Test analysis in accordance with AHERA does not pass, the cleaning and measurement operations specified in Sections 13 and 14 of these General Procedures will be repeated until the area is in compliance. Analysis of the "outside" samples and performing the Z-Test analysis is solely at the discretion of the Owner's Consultant.

14.4.2 Phase Contrast Microscopy (PCM) Clearance

When the work site has become completely dry, the Owner's Consultant shall collect at least five clearance air samples according to 40 CFR, Part 763 (AHERA Regulations). Five samples shall be taken in the abatement site. A minimum of 2,000 liters per air sample shall be collected using aggressive sampling techniques. If the post-abatement test reveals fiber levels in excess of 0.01 fibers/cc, the cleaning and measurement operations specified in Section 14 of these General Procedures will be repeated until the area is in compliance.

After the work area is found to be in compliance, all entrances and exits are unsealed, and the polyethylene sheeting, tape and any other trash and debris shall be placed in double sealed polyethylene bags (6-mil minimum) or barrels lined with one polyethylene bag (6-mil minimum), and labeled and disposed of properly.

15. Disposal of Asbestos Material and Related Debris

- All asbestos materials and miscellaneous debris in properly labeled polyethylene bags (double bagged) or other containers will be transported to the predesignated disposal site in accordance with the guidelines of the U.S. Environmental Protection Agency and the Michigan Department of Environmental Quality. Asbestos disposal forms will be completed to document proper disposal of asbestos waste. (These must be submitted before final payment will be made.)
- All containers bagged or wrapped materials with asbestos-containing materials shall be labeled with the name and address at which the waste was generated, prior to materials being transported off the facility site.
- Workers unloading the polyethylene bags and machinery operators will wear respirators when handling material at the disposal site.
- 15.4 All pertinent DOT rules and regulations will be followed when transporting asbestos.
- 15.5 All asbestos-containing materials shall be transported in covered vehicles.
- All dumpsters, trucks or other containers used to transport asbestos contained materials shall be properly labeled during the loading and unloading of waste.

16. Submittals Prior To Contractor Release & Final Payment

Damages: The Contractor shall promptly repair any and all damages caused to facilities at no cost to Troy School District.

- The following must be submitted prior to final payment:
 - 16.2.1 Copies of Disposal receipts of all asbestos contaminated material, plus copies of all transport manifests, trip tickets, or other disposal documentation.
 - 16.2.2 All documentation requested in Submittals to Owner's Representative, Section 4.1.

PART III. WORK/CONDUCT REQUIREMENTS

17. Supervision, Personnel and Misconduct

- A "competent person" as defined in 29 CFR 1926.1101 must be on-site at all times throughout the duration of the project(s). This competent person, as designated prior to the start of said project(s) must remain the same throughout the duration of the project(s).
- 17.2 The Owner's Consultant IS NOT THE CONTRACTOR'S OUT-MAN. The Contractor must provide one outman for each enclosure (unless the decontamination chambers are within "talking" distance of each other). The out-man must always remain within talking distance of the enclosure they are assigned to.
- A Foreman with competent-person training must remain within the enclosure at all times during the project.
- 17.4 Contractors employees are subject to immediate dismissal if any of the following, but not limited to the following, occurs:
 - Failure to follow proper abatement procedures, including but not limited to respiratory protection and the throwing of asbestos disposal bags outside of the enclosure.
 - 17.4.2 Physical threats and violence to the Owner's Consultant or any other person.
 - 17.4.3 Property damage or theft.
 - 17.4.4 Reckless driving on Owner's property.
 - 17.4.5 Discourteous and ill-mannered statements made to Troy School District, Owner's employees or Owner's Consultant.
 - 17.4.6 Consumption of alcohol or use of controlled substances on Owner's premises.

18. Site Security/Site Cleanliness

- The work area is restricted to only authorized, trained and protected personnel. These personnel may include the Contractor's employees, employees of subcontractors, Owner's employees and Representatives, state and local inspectors, and any other designated individuals. The list of employees who will participate in the project as defined in 2.1.2 of these General Procedures will be the only employees allowed to enter the work area. Additional employees assigned to this project **must** be cleared through Troy School Destructor the Owner's Consultant. Documentation of all training, medical, and other pertinent requirements are needed before the employees participation.
 - An employee shall not remain on the Owner's premises if he/she is prohibited from participating in the project as a result of insufficient paperwork or if the Owner's Consultant determines the employee, in any manner, is detrimental to the safe completion of the project.
 - 18.1.2 The Contractor shall record the names and social security numbers of all people on a sign-in sheet who enter the work site, and maintain this record for thirty years.
- Entry into the work area by unauthorized individuals shall be strictly prohibited.

- Access to the work area shall be through a single worker decontamination system. All other means of access (doors, windows, hallway, etc.) shall be blocked or locked so as to prevent entry to or exit from the work area. The only exceptions for this rule are the waste pass-out airlock which shall be sealed except during the removal of containerized asbestos waste from the work area, and emergency exits in case of fire or accident. Emergency exits shall not be locked from the inside; instead, they shall be sealed with polyethylene sheeting and tape until needed.
- The Contractor shall designate one worker to remain outside each enclosure throughout the duration of the project in order to regulate ingress and egress to the work areas as well as to provide needed supplies and equipment. The worker outside the enclosure will be within hearing range at all times. At least one person, at all times, inside the enclosure must have had "competent person" training.
- All areas occupied or used in any way by the Contractor (all employees), outside the enclosure(s) but within the building shall be kept in an acceptable condition and thoroughly cleaned at the end of each day, to the satisfaction of the Owner's Consultant. If at any time, food containers or debris is found not properly disposed of, eating on premises shall be terminated.
- The Contractor is responsible for maintaining areas outside the building in a condition acceptable to Troy School Destructor the Owner's Consultant. This includes but is not limited to: sanitation, supplies and equipment, and employee driving and substance abuse.

19. Stop Work Orders

- 19.1 If at any time, Troy School Destructor the Owner's Consultant decide that work practices are in violation of the contract specifications or endangering workers, he/she or they will immediately notify the Contractor's on-site Representative of such and operations are to cease until corrective action is taken.
- 19.2 The Contractor shall cooperate fully with Troy School District and Owner's Consultant.

PART IV. AIR MONITORING

20 Sampling Requirements

- The Owner's Consultant shall conduct all air sampling for Troy School District throughout all work associated with this contract.
- All non-post-abatement air samples shall be analyzed using the NIOSH 7400 Method. All post-abatement air samples collected in situations involving removal, enclosure, or encapsulation of more than 160 square feet or 260 linear feet of ACBM shall be analyzed under the "Mandatory Transmission Electron Microscopy Method" defined in 40 CFR, Part 763 (AHERA rules). Post abatement air samples collected in situations involving removal, enclosure, or encapsulation of less than 160 square feet or 260 linear feet of ACBM shall be analyzed using the NIOSH 7400 Method.
- The Owner's Consultant will collect and analyze personal samples (including STELs short term excursion limit samples) during abatement activities. The personal air samples will be used to determine if the Contractor's employees are wearing the proper respiratory protection. The Owner's Consultant will collect personal air samples on up to two workers inside of the enclosure on each day of abatement and final cleaning and the samples will be collected across the entire work day. All results will be provided to the Contractor. Daily results will be posted on-site near the decontamination chamber. The Contractor will have control on which worker(s) will wear the personal monitoring pump. The Contractor may collect and analyze his own personal air samples if so desired to ensure full compliance with the OSHA asbestos standard. The Contractor may need to collect and analyze additional samples in order to ensure complete representation of employees (i.e., type of work activities monitored or number of employees per activity monitored).
- healthAIR, inc. will immediately cease the collection and analysis of personal samples if the personal air sampling pump assigned to the specific worker is not being properly worn by the worker. A letter will be

issued to the contractor within twenty-four hours notifying the Contractor of the end of sampling.

21. Sampling Types

- Throughout the abatement and cleaning operations, air sampling will be conducted to ensure that the Contractor is complying with all codes, regulations, and ordinances. The following are representative sampling which may take place at the discretion of Troy School District and the Owner's Consultant.
 - 21.1.1 <u>Baseline</u> Collected in various/numerous locations prior to abatement to determine ambient interior fiber levels.
 - 21.1.2 <u>Area</u> Collected in various/numerous locations outside of the work area in order to detect elevated fiber levels during abatement.
 - 21.1.3 Personal Collected in the breathing zone of the asbestos abatement personnel according to Appendix A, 1926.1101 of the OSHA regulations. These samples will be placed on employees who are exposed to representative concentrations of airborne asbestos fibers. Personal sampling will ensure that the workmen performing the asbestos abatement projects are not exposed to asbestos contamination exceeding STEL (short term excursion limit) requirements and levels which exceed their respirator protection or otherwise endanger their health. Personal air samples will be collected on individuals as designated by the Contractor's competent person, or, if none are identified, the Owner's Consultant.
 - 21.1.4 <u>STEL (Short Term Excursion Limit)</u> Collected in the breathing zone of the asbestos abatement personnel for a period of 30 minutes.
 - 21.1.5 <u>Clearance (also called Post Abatement)</u> Collected inside and/or outside the work area after the project is completed and the area has been cleaned and dried. This will determine if the job has been done correctly and whether the cleanup process must be repeated. Quantities are determined by all applicable regulations.
 - 21.1.6 Field Blanks Field blanks are collected to ensure that contamination of cassettes has not occurred.

 Each set of samples collected will include ten percent (10%) blanks or a minimum of two blanks.

PART V. ADDITIONAL INFORMATION

22. Definitions/Glossary

- 22.1 Accredited or Accreditation (when referring to a person or laboratory): A person or laboratory accredited in accordance with section 206 of Title II of the Toxic Substances Control Act (TSCA).
- 22.2 Aggressive Method: Removal or disturbance of building material by sanding, abrading, grinding or other method that breaks, crumbles, or disintegrates intact ACM.
- 22.3 Aircell: Insulation normally used on pipes and duct work that is comprised of corrugated cardboard which is frequently comprised of asbestos combined with cellulose or refractory binders.
- 22.4 Air Monitoring: The process of measuring the fiber content of a specific volume of air.
- 22.5 Amended Water: Water to which a surfactant has been added to decrease the surface tension to 35 or less dynes.
- 22.6 Asbestos: The asbestiform varieties of serpentine (chrysotile), riebeckite (crocidolite), cummingtonite-grunerite, anthophyllite, and actinolite-tremolite. For purposes of determining respiratory and worker protection both the asbestiform and non-asbestiform varieties of the above minerals any of these materials that have been chemically treated and/or altered shall be considered as asbestos.

- 22.7 Asbestos-Containing Material (ACM): Any material containing more than one percent by weight of asbestos of any type or mixture of types.
- 22.8 Asbestos-Containing Building Material (ACBM): Surfacing ACM, thermal system insulation ACM, or miscellaneous ACM that is found in or on interior structural members or other parts of a building.
- 22.9 Asbestos-Containing Waste: Any material which is or is suspected of being or any material contaminated with an asbestos containing material which is to be removed from a work area for disposal.
- 22.10 Asbestos Debris: Pieces of ACBM that can identified by color, texture, or composition, or means dust, if the dust is determined by an accredited inspector to be ACM.
- 22.11 Authorized Visitor: Troy School District, healthAIR, inc. or their sub-contractors, testing lab personnel, emergency personnel or a representative of any federal, state, and local regulatory or other agency having authority over the project.
- 22.12 Barrier: Any surface that seals off the work area to inhibit the movement of fibers.
- 22.13 Breathing Zone: A hemisphere forward of the shoulders with a radius of approximately six to nine inches.
- 22.14 Class I Asbestos Work: Activities involving the removal of thermal system insulation and surfacing ACM and PACM and asbestos acoustical ceiling tile material.
- 22.15 Class II Asbestos Work: Activities involving the removal of ACM which is not thermal system insulation or surfacing material. This includes, but is not limited, the removal of asbestos-containing wallboard, floor tile and sheeting, roofing and siding shingles and construction mastics.
- 22.16 Class III Asbestos Work: Repair and maintenance operations, where "ACM" including thermal system insulation and surfacing ACM and PACM may be disturbed.
- 22.17 Class IV Asbestos Work: Maintenance and custodial activities during which employees contact but do not disturb ACM or PACM and activities to clean up dust, waste and debris resulting from Class I, Class II and Class III activities.
- 22.18 Clean Room: An uncontaminated room having facilities for the storage of employees' street clothing.
- 22.19 Competent Person: In addition to the definition in 29 CFR 1926.32(f), one who is capable of identifying existing asbestos hazards in the workplace and selecting the appropriate control strategy for asbestos exposure, who has the authority to take prompt corrective measures to eliminate them, as specified in 29 CFR 1926.32(f); in addition for Class I and Class II work who is specifically trained in a training course which meats the criteria of EPA's Model Accreditation Plan (40 CFR Part 763) for supervisor, or its equivalent and, for Class III and Class IV work, who is trained in a manner consistent with EPA requirements for training of local education agency maintenance and custodial staff as set forth at 40 CFR 763.92 (a)(2).
- 22.20 Containment Area: A work area where asbestos related work or removal operations is performed which is completely isolated from other portions of the building and from the outside through the use of sheet plastic barriers or other impermeable seals. The Containment Area will generally contain multiple homogeneous materials which may or may not contain asbestos and which may or may not have been identified by the Owner's Consultant in performing the building inspection and in developing the Project Specifications.
- 22.21 *Critical Barrier*: One or more layers of plastic sealed over all openings into a work area or any other similarly placed physical barrier sufficient to prevent airborne asbestos in a work area from migrating to an adjacent area. All critical barriers for the work described in this specification will be six-mil thickness polyethylene sheeting.

- 22.22 Decontamination Area: An enclosed area adjacent and connected to the regulated area and consisting of an equipment room, shower area and clean room, which is used for the decontamination of workers, materials, and equipment that are contaminated with asbestos.
- 22.23 *Demolition*: The wrecking or taking out of any building component, system, finish or assembly of a facility together with any related handling operations.
- 22.24 Disposal Bag: A properly labeled 6 mil thick leak-tight plastic bags used for transporting asbestos waste from work and to disposal site.
- 22.25 Disturbance: Activities that disrupt the matrix of ACM or PACM, crumble or pulverize ACM or PACM, or generate visible debris from ACM or PACM. This term includes activities that disrupt the matrix of ACM or PACM, render ACM or PACM friable, or generate visible debris. Disturbance includes cutting away small amounts of ACM or PACM, no greater that the amount which can be contained in one standard sized glovebag or waste bag in order to access a building component. In no event shall the amount of ACM or PACM so disturbed exceed that which shall not exceed 60"x60".
- 22.26 Employee Exposure: The exposure to airborne asbestos that would occur if the employee were not using respiratory protective equipment.
- 22.27 Equipment Room: A contaminated room located within the decontamination area that is supplied with impermeable bags or containers for the disposal of contaminated protective clothing and equipment.
- 22.28 Encapsulant: A material that surrounds or embeds asbestos fibers in an adhesive matrix, to prevent release of fibers. Types of encapsulants include:
 - 22.28.1 Bridging Encapsulant: An encapsulant that forms a discrete layer on the surface of an in situ asbestos matrix.
 - 22.28.2 *Penetrating Encapsulant*: An encapsulant that is absorbed by the in situ asbestos matrix without leaving a discrete surface layer.
 - 22.28.3 Removal Encapsulant: A penetrating encapsulant specifically designed to minimize fiber release during removal of asbestos containing materials rather that for in situ encapsulation.
- 22.29 Encapsulation: Treatment of asbestos containing material, with an encapsulant.
- 22.30 Enclosure: The construction of an air-tight, impermeable, **permanent** barrier around asbestos containing material to control the release of asbestos fibers into the air.
- 22.31 Fiber: A particulate for of asbestos, 5 micrometers or longer, with a length-to-diameter ration of at least 3 to
- 22.32 Filter: A media component used in respirators to remove solid or liquid particles from the inspired air.
- 22.33 Friable Asbestos-Containing Material: Material that contains more than one percent asbestos by weight and that can be crumbled, pulverized, or reduced to powder by hand pressure when dry.
- Functional Space: A room or group of rooms (including the space between a dropped ceiling and the floor or roof deck above), such as classroom(s), a cafeteria, gymnasium, corridor(s), designated by a person accredited to prepare management plans, design abatement projects, or conduct response actions.
- 22.35 Glovebag: Not more than a 60"x60" impervious plastic bag-like enclosure affixed around an asbestoscontaining material, with glove-like appendages through which material and tools may be handled.

- 22.36 *HEPA Filter*: A High Efficiency Particulate Air (HEPA) filter capable of trapping and retaining 99.97% of asbestos fibers greater than 0.3 microns in length.
- 22.37 Homogeneous Area: A type of surfacing material, thermal system insulation material, or miscellaneous material that is uniform in color, texture and application. A homogeneous area may consist of multiple layers within a structure of which any or all layers may contain asbestos. The structure shall be consistent in appearance and application.
- 22.38 Intact: The ACM has not crumbled, been pulverized or otherwise deteriorated so that the asbestos is no longer likely to be bound with its matrix.
- 22.39 Negative Pressure Respirator: A respirator in which the air pressure inside the respiratory inlet covering is positive during exhalation in relation to the air pressure of the outside atmosphere and negative during inhalation in relation to the air pressure of the outside atmosphere.
- 22.40 PACM: "Presumed Asbestos-Containing Material"
- 22.41 Personal Monitoring: Sampling of the asbestos fiber concentrations within the breathing zone of an employee.
- 22.42 Pressure Differential and Ventilation System: A local exhaust system, utilizing HEPA filtration capable of maintaining a pressure differential with the inside of the work area at a lower pressure than any adjacent area, and which cleans recirculated air or generates a constant air flow from adjacent areas into the work area.
- 22.43 Regulated Area: An area established by the employer to demarcate areas where Class I, Class II and Class III asbestos work is conducted and any adjoining area where debris and waste from such asbestos work accumulate and a work area within which airborne concentrations of asbestos exceed or there is a reasonable possibility they may exceed the permissible exposure limit.
- 22.44 *Removal*: All operations where ACM and/or PACM is taken out or stripped from structures or substrates and includes demolition operations.
- 22.45 Renovations: The modifying of any existing structure, or portion thereof.
- 22.46 Repair: Returning damaged ACBM to an undamaged condition or to an intact state so as to prevent fiber release. The overhauling, rebuilding, reconstructing or reconditioning of structures or substrates, including encapsulation or other repair of ACM or PACM attached to structures or substrates.
- 22.47 Respirator: A device designed to protect the wearer from the inhalation of harmful atmospheres.
- 22.48 Surfacing Material: Material that is sprayed, troweled-on or otherwise applied to surfaces (such as acoustical plaster on ceilings and fireproofing materials on structural members, or other materials on surfaces for acoustical, fireproofing or other purposes).
- 22.49 Surfacing ACM: Surfacing material which contains more than 1% asbestos.
- 22.50 Surfactant: A chemical wetting agent added to water to improve penetration, thus reducing the quantity of water required for a given operation or area.
- 22.51 Thermal System Insulation (TSI): ACM applied to pipes, fittings, boilers, breeching, tanks, ducts or other structural components to prevent heat loss or gain.
- 22.52 Thermal System Insulation ACM: Thermal system insulation which contains more than 1% asbestos.
- 22.53 Time Weighted Average(TWA): The average concentration of a contaminant in air during a specific time period.

- *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.
- 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 or diluted removal encapsulant and afterwards thoroughly decontaminated or disposed of as asbestos contaminated waste.
- Work Area: The area where asbestos related work or removal operations are performed. This area is defined by the Contractor's construction of a containment isolating the work area from the surrounding environment through the use of critical barriers, a reduced pressure differential, decontamination facilities, and others. The work area includes the entire volume within this containment from floor to deck and within the containment walls. The containment is constructed to prevent the spread of asbestos dust, fibers or debris, and to prevent the entry of unauthorized personnel. The work area is a regulated area as defined by 29 CFR 1926.

BIDDER'S CHECKLIST FOR RFQ SUBMITTALS

This checklist is provided as a service to the Bidders to assist with complete bid submittals. The Bidder does not need to submit this checklist with the RFQ. All portions of the RFQ's should be submitted as listed below and the entire packet must be submitted in duplicate.

Fre	om Proje	ect Specification
		Item Spec. Page
[]	Signed RFQ Cover Sheet xx
[]	Completed Bidder's Agreement and Certification and Bidder Acknowledgments xx-xx
[]	Completed and signed Bid No. 07.06 - Smith Middle School and Wattles Elementary School xx
[]	Signed and notarized Familial Relationship Disclosure Statement xx
[]	Copy of Bidder's Statement of Qualifications and Statement of Bid Preparation xx-xx
Pro	vided B	y Contractor
[]	Bidder's Response to Bidder's Statement of Qualifications and Statement of Bid Preparation
[]	Bid Security
		[] 5% of Bid Price or 5% of Total Bid Price
		[] Treasury approved surety licensed to do business in the State of Michigan
[]	Bidder's Current State of Michigan Asbestos Abatement Contractor License
[]	Bidder's Proof of Insurance
[]	Any additional information submitted at discretion of Bidder

THIS PAGE DOES NOT NEED TO BE SUBMITTED.

PROJECT DESIGNER ACCREDITATION INFORMATION

Summary of Project Designer Accreditation

As required by the Asbestos Hazard Emergency Response Act (AHERA, 40 CFR 763), these response actions have been designed by an accredited Asbestos Project Designer, as accredited through the State of Michigan's Department of Labor & Economic Growth Asbestos Program.

AHERA Project Designer Information Name: Korwin C. Stevens

State: Michigan
Accreditation #: A32108
Expiration Date: September 13, 2007
Training Expiration: September 1, 2007

Signature:				
	Signature:			

PREVAILING WAGE RATE INFORMATION

The following prevailing wage rate table has been provided by Troy School District for the Smith Middle School Wattles Elementary School projects. Prevailing wage rates are in effect for all asbestos abatement activities at Smith Middle School and Wattles Elementary School.



JENNIFER M. GRANHOLM

DEPARTMENT OF LABOR & ECONOMIC GROWTH LANSING

ROBERT W. SWANSON DIRECTOR

REQUIREMENTS OF MICHIGAN PUBLIC ACT 166 OF 1965, PREVAILING WAGES ON STATE PROJECTS

The Michigan Department of Labor & Economic Growth determines prevailing rates pursuant to the Prevailing Wage Law, Act 166, P.A. of 1965. The purpose of establishing prevailing rates is to provide rates of pay for workers on construction projects for which the state or a school district is the contracting agent and which is financed or financially supported by the state. By law, prevailing rates are compiled from the rates contained in collectively bargained agreements which cover the locations of the state projects. The attached prevailing rates provide an hourly rate which INCLUDES wage and fringe benefit totals for designated construction mechanic classifications. The overtime rates also include wage and fringe benefit totals. Please pay special attention to the overtime and premium pay requirements. The prevailing rate may be satisfied by payment in cash or payment in cash and credit for fringe benefits paid in cash or on behalf of a worker or fringe benefits provided to a worker.

State of Michigan responsibilities under the law:

• The department establishes the prevailing rate for each classification of construction mechanic <u>requested by a contracting agent</u> prior to contracts being let out for bid on a state project.

Contracting agent responsibilities under the law:

- If a contract is not awarded or construction does not start within 90 days of the date of the issuance of rates, a redetermination of rates must be requested by the contracting agent.
- Rates for classifications needed but not provided on the Prevailing Rate Schedule, including rates for registered apprentices, <u>must</u> be obtained <u>prior</u> to contracts being let out for bid on a state project.
- The contracting agent, by written notice to the contractor and the sureties of the contractor known to the contracting agent, may terminate the contractor's right to proceed with that part of the contract, for which less than the prevailing rates of wages and fringe benefits have been or will be paid, and may proceed to complete the contract by separate agreement with another contractor or otherwise, and the original contractor and his sureties shall be liable to the contracting agent for any excess costs occasioned thereby.

Contractor responsibilities under the law:

- Every contractor and subcontractor shall keep posted on the construction site, in a conspicuous place, a copy of all prevailing wage and fringe benefit rates prescribed in a contract.
- Every contractor and subcontractor shall keep an accurate record showing the name and occupation of and the actual wages and benefits paid to each construction mechanic employed by him in connection with said contract. This record shall be available for reasonable inspection by the contracting agent or the department.
- Each contractor or subcontractor is separately liable for the payment of the prevailing rate to its employees.
- The prime contractor is responsible for advising all subcontractors of the requirement to pay the prevailing rate prior to commencement of work.
- The prime contractor is secondarily liable for payment of prevailing rates that are not paid by a subcontractor.
- A construction mechanic <u>shall only</u> be paid the apprentice rate if registered with the United States Department of Labor, Bureau of Apprenticeship and Training and the rate is included in the contract.

Enforcement:

A person who has information of an alleged prevailing wage violation on a state project may file a complaint with the Wage and Hour Division. The department will investigate and attempt to resolve the complaint informally.

Executive Order Number 2003-001 requires that contractors doing business with the State of Michigan be in compliance with state and federal law. A violation of Act 166 of 1965, as amended, the Prevailing Wages on State Projects act or Act 390 of 1978, as amended, the Payment of Wages and Fringe Benefits Act, may result in the <u>debarment</u> of a contractor from being awarded a contract for the provision of goods and services to the State of Michigan for a period of up to eight (8) years.



MICHIGAN DEPARTMENT OF LABOR & ECONOMIC GROWTH WAGE & HOUR DIVISION

OVERTIME PROVISIONS for MICHIGAN PREVAILING WAGE RATE SCHEDULE

1. Overtime is represented as a nine character code. Each character represents a certain period of time after the first 8 hours Monday thru Friday.

	Monday thru Friday	Saturday	Sunday & Holidays
First 8 Hours		4	
9th Hour	1	5	8
10th Hour	2	6	
Over 10 hours	3	7	

Overtime for Monday thru Friday after 8 hours:

the 1st character is for time worked in the 9th hour (8.1 - 9 hours)

the 2nd character is for time worked in the 10th hour (9.1 - 10 hours)

the 3rd character is for time worked beyond the 10th hour (10.1 and beyond)

Overtime on Saturday:

the 4th character is for time worked in the first 8 hours on Saturday (0 - 8 hours)

the 5th character is for time worked in the 9th hour on Saturday (8.1 - 9 hours)

the 6th character is for time worked in the 10th hour (9.1 - 10 hours)

the 7th character is for time worked beyond the 10th hour (10.01 and beyond)

Overtime on Sundays & Holidays

The 8th character is for time worked on Sunday or on a holiday

The last character indicates if an optional 4-day 10-hour per day workweek can be worked without paying overtime after 8 hours worked.

- 2. Overtime Indicators Used in the Overtime Provision:
 - H means TIME AND ONE-HALF due
 - X means TIME AND ONE-HALF due after 40 HOURS worked
 - D means DOUBLE PAY due
 - Y means YES an optional 4-day 10-hour per day workweek can be worked without paying overtime after 8 hours worked
 - N means NO an optional 4-day 10-hour per day workweek *can not* be worked without paying overtime after 8 hours worked

3. EXAMPLES:

HHHHHHHDN - This example shows that the 1½ rate must be used for time worked after 8 hours Monday thru Friday (characters 1 - 3); for all hours worked on Saturday, 1½ rate is due (characters 4 - 7). Work done on Sundays or holidays must be paid double time (character 8). The N (character 9) indicates that 4 ten-hour days is not an acceptable workweek at regular pay.

XXXHHHHDY - This example shows that the $1\frac{1}{2}$ rate must be used for time worked after 40 hours are worked Monday thru Friday *(characters 1-3)*; for hours worked on Saturday, $1\frac{1}{2}$ rate is due *(characters 4 - 7)*. Work done on Sundays or holidays must be paid double time *(character 8)*. The Y *(character 9)* indicates that 4 tenhour days is an acceptable alternative workweek.

ENGINEERS - CLASSES OF EQUIPMENT LIST

UNDERGROUND ENGINEERS

CLASS I

Backfiller Tamper, Backhoe, Batch Plant Operator, Clam-Shell, Concrete Paver (2 drums or larger), Conveyor Loader (Euclid type), Crane (crawler, truck type or pile driving), Dozer, Dragline, Elevating Grader, End Loader, Gradall (and similar type machine), Grader, Power Shovel, Roller (asphalt), Scraper (self propelled or tractor drawn), Side Broom Tractor (type D-4 or larger), Slope Paver, Trencher (over 8' digging capacity), Well Drilling Rig, Mechanic, Slip Form Paver.

CLASS II

Boom Truck (power swing type boom), Crusher, Hoist, Pump (1 or more 6" discharge or larger gas or diesel powered by generator of 300 amps or more, inclusive of generator), Side Boom Tractor (smaller than type D-4 or equivalent), Sweeper (Wayne type and similar equipment), Tractor (pneu-tired, other than backhoe or front end loader), Trencher (8' digging capacity and smaller).

CLASS III

Air Compressors (600 cfm or larger), Air Compressors (2 or more less than 600 cfm), Boom Truck (non-swinging, non-powered type boom), Concrete Breaker (self-propelled or truck mounted, includes compressor), Concrete Paver (1 drum, ½ yard or larger), Elevator (other than passenger), Maintenance Man, Mechanic Helper, Pump (2 or more 4" up to 6" discharge, gas or diesel powered, excluding submersible pump), Pumpcrete Machine (and similar equipment), Wagon Drill Machine, Welding Machine or Generator (2 or more 300 amp or larger, gas or diesel powered).

CLASS IV

Boiler, Concrete Saw (40HP or over), Curing Machine (self-propelled), Farm Tractor (w/attachment), Finishing Machine (concrete), Firemen, Hydraulic Pipe Pushing Machine, Mulching Equipment, Oiler (2 or more up to 4", exclude submersible), Pumps (2 or more up to 4" discharge if used 3 hrs or more a day-gas or diesel powered, excluding submersible pumps), Roller (other than asphalt), Stump Remover, Vibrating Compaction Equipment (6' wide or over), Trencher (service).

HAZARDOUS WASTE ABATEMENT ENGINEERS

CLASS I

Backhoe, Batch Plant Operator, Clamshell, Concrete Breaker when attached to hoe, Concrete Cleaning Decontamination Machine Operator, Concrete Pump, Concrete Paver, Crusher, Dozer, Elevating Grader, Endloader, Farm Tractor (90 h.p. and higher), Gradall, Grader, Heavy Equipment Robotics Operator, Loader, Pug Mill, Pumpcrete Machines, Pump Trucks, Roller, Scraper (self-propelled or tractor drawn), Side Boom Tractor, Slip Form Paver, Slop Paver, Trencher, Ultra High Pressure Waterjet Cutting Tool System Operator, Vactors, Vacuum Blasting Machine Operator, Vertical Lifting Hoist, Vibrating Compaction Equipment (self-propelled), and Well Drilling Rig.

CLASS II

Air Compressor, Concrete Breaker when not attached to hoe, Elevator, End Dumps, Equipment Decontamination Operator, Farm Tractor (less than 90 h.p.), Forklift, Generator, Heater, Mulcher, Pigs (Portable Reagent Storage Tanks), Power Screens, Pumps (water), Stationary Compressed Air Plant, Sweeper, and Welding Machine.

Regular Crane Operators rate shall include: Mechanics, Crane Operators, Dragline Operators, Boom Truck Operators, Power Shovel Operators and Concrete Pumps with booms.

Revised: 09/07/06

State of Michigan Department of Labor and Economic Growth

Wage and Hour Division

6546 Mercantile Way, Suite 5 PO Box 30476

Lansing, MI 48909-7976 Telephone: 517-335-0400 Fax: 517-335-0077

Fax: 517-335-0077 www.michigan.gov/wagehour

Official Request 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT **Project Number:** WATTLES ELEMENTARY & SMITH MIDDLE

Oakland County

Official 2007 Prevailing Wage Rates for State Funded Projects

Issue Date: 6/5/2007

Contract must be awarded by 9/3/2007

Page 1 of 20

		Page 1 of 20				
Clas Name	ssification Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Asbesto	os & Lead Abatement Laborer					
Asbestos	s & Lead Abatement Laborer	MLDC	\$31.30	\$41.83	\$52.35	$H\ H\ H\ X\ X\ X\ X\ D\ Y$
Asbesto	os & Lead Abatement, Hazardous Material Hand	ller				
Asbestos	and Lead Abatement, Hazardous Material Handler	r AS207	\$31.30	\$43.13	\$54.95	$X\ X\ X\ X\ X\ X\ X\ X\ D\ Y$
Boilerm	aker					
Boilerma	ker	BO169	\$48.71	\$68.13	\$87.54	$H \ H \ D \ H \ D \ D \ D \ D \ Y$
	Apprentice Ra	ates:				
	1st 6 months		\$37.07	\$50.67	\$64.26	
	2nd 6 months		\$38.03	\$52.10	\$66.18	
	3rd 6 months		\$39.00	\$53.56	\$68.12	
	4th 6 months		\$39.97	\$55.02	\$70.06	
	5th 6 months		\$40.58	\$56.11	\$71.64	
	6th 6 months		\$42.88	\$59.38	\$75.88	
	7th 6 months		\$44.83	\$62.31	\$79.78	
	8th 6 months		\$46.77	\$65.21	\$83.66	
Bricklay						
Bricklaye	er, stone mason, pointer, cleaner, caulker	BR1	\$47.76	\$71.64	\$95.52	$H\;H\;D\;H\;D\;D\;D\;D\;N$
	Apprentice Ra	ates:				
	First 6 months		\$30.33	\$45.50	\$60.66	
	2nd 6 months		\$32.21	\$48.32	\$64.42	
	3rd 6 months		\$34.10	\$51.15	\$68.20	
	4th 6 months		\$35.98	\$53.97	\$71.96	
	5th 6 months		\$37.86	\$56.79	\$75.72	
	6th 6 months		\$39.73	\$59.60	\$79.46	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

Official Rate Schedule

Issue Date: 6/5/2007

Contract must be awarded by 9/3/2007

Page 2 of 20

Q1 18 11		. 490 - 00				
<u>Classification</u>			Straight	Time and	Double	Out of the Duncated
Name Description ====================================			Hourly	a Half	Time	Overtime Provision
~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~						
Carpenter	(dana mat implicate	CA104F	£40.00	<b></b>	<b>Ф70 С4</b>	
Carpet and Resilient Floor Layer,		CA1045	\$40.22	\$56.42	\$72.61	HHHDDDDN
installation of prefabricated formi						
which is to be paid carpenter rate						
	Apprentice Ra	ates:				
	1st 6 months		\$20.93	\$25.25	\$31.05	
	2nd 6 months		\$24.02	\$31.26	\$39.07	
	3rd 6 months		\$25.64	\$33.59	\$42.17	
	4th 6 months		\$27.26	\$35.95	\$45.33	
	5th 6 months		\$28.87	\$38.28	\$48.43	
	6th 6 months		\$30.50	\$40.64	\$51.57	
	7th 6 months		\$32.11	\$42.96	\$54.67	
	8th 6 months		\$33.73	\$45.30	\$57.79	
Carpenter, piledriver		CA687Z1	\$44.37	\$62.97	\$81.56	HHDHDDDDY
	Apprentice Ra	ates:	•	·		
	1st Year		\$27.63	\$37.85	\$48.08	
	3rd 6 months		\$29.49	\$40.65	\$51.80	
	4th 6 months		\$31.34	\$43.42	\$55.50	
	5th 6 months		\$33.21	\$46.23	\$59.24	
	6th 6 months		\$35.08	\$49.03	\$62.98	
	7th 6 months		\$36.92	\$51.79	\$66.66	
	8th 6 months		\$38.80	\$54.61	\$70.42	
Cement Mason						
Cement Mason		CE514	\$42.63	\$60.13	\$77.63	ннрннннри
	Apprentice Ra		*	*******	*******	
	1st 6 months		\$24.90	\$33.67	\$42.43	
	2nd 6 months		\$26.65	\$36.28	\$45.92	
	3rd 6 months		\$30.15	\$41.55	\$52.93	
	4th 6 months		\$33.66	\$46.80	\$59.94	
	5th 6 months		\$35.40	\$49.43	\$63.44	
	6th 6 months		\$38.92	\$54.70	\$70.47	
Drywall						
Drywall Taper		PT-22-D	\$38.45	\$50.90	\$63.35	HHDHDDDDN
- •	Apprentice Ra	ates:				
	First 3 months		\$26.00	\$32.23	\$38.45	
	Second 3 mon	ths	\$28.49	\$35.96	\$43.43	
	Second 6 mon		\$30.98	\$39.69	\$48.41	
	Third 6 months		\$33.47	\$43.43	\$53.39	
	4th 6 months		\$34.71	\$45.29	\$55.87	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## **Official Rate Schedule**

Issue Date: 6/

6/5/2007

Contract must be awarded by 9/3/2007

Page 3 of 20

Section   Sect	Classification Name Description		. ugo o o. 20 	Straight Hourly	Time and a Half	Double Time	Overtime Provision
Apprentice Rates:	Electrician						
O-1000 hours	Inside Wireman		EC-58-IW	\$46.88	\$64.00	\$81.13	H $H$ $H$ $H$ $H$ $H$ $H$ $D$ $N$
1000-2000 hours   \$28.04   \$35.75   \$43.45   2000-3500 hours   \$29.75   \$38.31   \$46.87   3500-5000 hours   \$31.47   \$40.90   \$50.31   5000-6500 hours   \$34.89   \$46.03   550.01   \$5000-6500 hours   \$34.89   \$46.03   550.01   \$6500-8000 hours   \$34.89   \$46.03   5600-8000 hours   \$34.89   \$46.03   5600-8000 hours   \$34.89   \$46.01   55000-6500 hours   \$34.89   \$46.01   550000-6500 hours   \$34.89   \$46.01   5500000000000000000000000000000000000		Apprentice Rate	es:				
1000-2000 hours   \$28.04   \$35.75   \$43.45   2000-3500 hours   \$29.75   \$38.31   \$46.87   3500-5000 hours   \$31.47   \$40.90   \$50.31   5000-6500 hours   \$34.89   \$46.03   \$57.15   \$64.01   \$65.00-8000 hours   \$34.89   \$46.03   \$57.15   \$64.01   \$65.00-8000 hours   \$34.89   \$46.03   \$57.17   \$64.01   \$64.01   \$65.00-8000 hours   \$34.89   \$46.03   \$67.13   \$64.01   \$65.00-8000 hours   \$34.89   \$36.02   \$55.17   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$64.01   \$6		0-1000 hours		\$26.33	\$33.18	\$40.03	
Sound and Communication Installer/Technician   EC-58-SC   S29.33   \$41.30   \$53.26   H H H H H H H D D Sound and Communication Installer/Technician   EC-58-SC   S29.33   \$41.30   \$53.26   H H H H H H H D D Sound and Communication Installer/Technician   EC-58-SC   S29.33   \$41.30   \$53.26   H H H H H H H D D D D D D D D D D D D		1000-2000 hours	S	\$28.04	\$35.75	\$43.45	
Sound and Communication Installer/Technician   EC-58-SC   \$29.33   \$41.30   \$53.26   H H H H H H D		2000-3500 hours	S	\$29.75	\$38.31	\$46.87	
Sound and Communication Installer/Technician   EC-58-SC   \$29.33   \$41.30   \$53.26   H   H   H   H   H   D   Apprentice Rates:   Period 1   \$17.16   \$23.04   \$28.93   Period 2   \$18.38   \$24.88   \$31.37   Period 3   \$19.59   \$26.69   \$33.79   Period 5   \$20.20   \$30.33   \$36.23   Period 6   \$22.02   \$30.33   \$36.23   Period 5   \$22.02   \$30.33   \$36.23   Period 6   \$23.24   \$32.17   \$41.09		3500-5000 hours	S	\$31.47	\$40.90	\$50.31	
Sound and Communication Installer/Technician		5000-6500 hours	S	\$34.89	\$46.03	\$57.15	
Apprentice Rates:   Period 1		6500-8000 hours	S	\$38.32	\$51.17	\$64.01	
Period 1	Sound and Communication Installer/Technic	cian	EC-58-SC	\$29.33	\$41.30	\$53.26	HHHHHHDN
Period 2		Apprentice Rate	es:				
Period 2		Period 1		\$17.16	\$23.04	\$28.93	
Period 3		Period 2		\$18.38			
Period 5		Period 3		\$19.59	\$26.69		
Period 6   \$23.24   \$32.17   \$41.09		Period 4		\$20.81	\$28.53	\$36.23	
Elevator Constructor Elevator Constructor Elevator Constructor  Apprentice Rates:  1st Year Apprentice \$31.14 \$49.70 \$56.75 \$3rd Year Apprentice \$34.82 \$56.75 \$3rd Year Apprentice \$34.82 \$67.33 \$3rd Year Apprentice \$40.34 \$3rd Year Year Year Year Year Year Year Year		Period 5		\$22.02	\$30.33	\$38.65	
Elevator Constructor    Apprentice Rates:		Period 6		\$23.24	\$32.17	\$41.09	
Apprentice Rates:  1st Year Apprentice \$31.14 \$49.70 2nd Year Apprentice \$34.82 \$56.75 3rd Year Apprentice \$36.66 \$60.28 4th Year Apprentice \$40.34 \$67.33   Glazier  Glazier  Glazier  Glazier  Glazier  Substituting a state of the properties of th	Elevator Constructor						
Apprentice Rates:  1st Year Apprentice \$31.14 \$49.70 2nd Year Apprentice \$34.82 \$56.75 3rd Year Apprentice \$36.66 \$60.28 4th Year Apprentice \$40.34 \$67.33   Glazier  Glazier  Glazier  Glazier  Glazier  Apprentice Rates:  1st 6 months \$29.82 \$37.44 3rd 6 months \$32.72 \$41.72 4th 6 months \$33.72 \$41.72 4th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$335.54 \$50.31 8th 6 months \$335.54 \$50.31 8th 6 months \$341.46 \$54.62	Elevator Constructor		EL 36	\$47.71		\$81.45	D D D D D D D Y
1st Year Apprentice \$31.14 \$49.70 2nd Year Apprentice \$34.82 \$56.75 3rd Year Apprentice \$36.66 \$60.28 4th Year Apprentice \$40.34 \$67.33   Glazier  Glazier  GL-357 \$41.56 \$55.41 HHHHHHHHHHHHHHHHHHHHHHHHHHHHHHHHHHHH	Elevator Constructor						
2nd Year Apprentice \$34.82 \$56.75 3rd Year Apprentice \$36.66 \$60.28 4th Year Apprentice \$40.34 \$67.33   Glazier  Glazier  GL-357 \$41.56 \$55.41 H H H H H H H H  Apprentice Rates:  1st 6 months \$28.36 \$35.29 2nd 6 months \$29.82 \$37.44 3rd 6 months \$32.72 \$41.72 4th 6 months \$34.18 \$43.87 5th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62		Apprentice Rate	es:				
Sacretary   Sacr		1st Year Appren	tice	\$31.14		\$49.70	
## Year Apprentice \$40.34 \$67.33    Glazier   GL-357 \$41.56 \$55.41   H H H H H H H H H H H H H H H H H H		2nd Year Apprer	ntice	\$34.82		\$56.75	
Glazier  GL-357  \$41.56 \$55.41  H H H H H H H H  Apprentice Rates:  1st 6 months \$28.36 \$35.29 2nd 6 months \$29.82 \$37.44 3rd 6 months \$32.72 \$41.72 4th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62		3rd Year Appren	ntice				
Glazier GL-357 \$41.56 \$55.41 HHHHHHHH  Apprentice Rates:  1st 6 months \$28.36 \$35.29 2nd 6 months \$29.82 \$37.44 3rd 6 months \$32.72 \$41.72 4th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62		4th Year Appren	tice	\$40.34		\$67.33	
Apprentice Rates:  1st 6 months \$28.36 \$35.29 2nd 6 months \$29.82 \$37.44 3rd 6 months \$32.72 \$41.72 4th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62	Glazier						
1st 6 months \$28.36 \$35.29 2nd 6 months \$29.82 \$37.44 3rd 6 months \$32.72 \$41.72 4th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62	Glazier		GL-357	\$41.56	\$55.41		H H H H H H H H Y
2nd 6 months \$29.82 \$37.44  3rd 6 months \$32.72 \$41.72  4th 6 months \$34.18 \$43.87  5th 6 months \$35.64 \$46.03  6th 6 months \$37.09 \$48.17  7th 6 months \$38.54 \$50.31  8th 6 months \$41.46 \$54.62		Apprentice Rate	es:				
3rd 6 months \$32.72 \$41.72 4th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62		1st 6 months		\$28.36	\$35.29		
4th 6 months \$34.18 \$43.87 5th 6 months \$35.64 \$46.03 6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62		2nd 6 months		\$29.82	\$37.44		
5th 6 months       \$35.64       \$46.03         6th 6 months       \$37.09       \$48.17         7th 6 months       \$38.54       \$50.31         8th 6 months       \$41.46       \$54.62		3rd 6 months		\$32.72	\$41.72		
6th 6 months \$37.09 \$48.17 7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62		4th 6 months		\$34.18	\$43.87		
7th 6 months \$38.54 \$50.31 8th 6 months \$41.46 \$54.62  Heat and Frost Insulator		5th 6 months		\$35.64	\$46.03		
8th 6 months \$41.46 \$54.62  Heat and Frost Insulator		6th 6 months		\$37.09	\$48.17		
Heat and Frost Insulator		7th 6 months		\$38.54	\$50.31		
		8th 6 months		\$41.46	\$54.62		
Spray Insulation AS25S \$20.14 \$29.14 HHHHHHHHH	Heat and Frost Insulator						
	Spray Insulation		AS25S	\$20.14	\$29.14		H $H$ $H$ $H$ $H$ $H$ $H$ $N$

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: 1

## **Official Rate Schedule**

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 4 of 20

Classification Name Description	. <b>g</b> e : e: <u>_</u> e	Straight Hourly	Time and a Half	Double Time	Overtime Provision
United and French broaded as and Ask action We		========	=======	======	
Heat and Frost Insulator and Asbestos Wo Heat and Frost Insulators and Asbestos Work		\$48.20	\$62.86	\$77.52	нннннн н b y
	pprentice Rates:	Ψ-0.20	Ψ02.00	ψ11.02	
	st Year	\$29.59	\$37.66	\$45.72	
	nd Year	\$37.60	\$47.13	\$56.66	
3	rd Year	\$39.40	\$49.66	\$59.92	
4	th Year	\$42.34	\$54.07	\$65.80	
ronworker					
Fence Erecting	IR-25-F	\$39.87	\$59.58	\$79.29	HHDHHHDDY
Glazing	IR-25-GZ1	\$48.48	\$72.64	\$96.65	HHDHHHDDY
Mesh Iron Work	IR-25-MR	\$42.25	\$60.43	\$78.60	HHDHDDDDN
Pre-engineered Metal Work	IR-25-PE-Z1-Z2	\$39.88	\$50.38	\$60.88	H $H$ $H$ $X$ $X$ $X$ $X$ $D$ $Y$
Α	pprentice Rates:				
	st level	\$22.79	\$27.88	\$32.97	
	nd level	\$24.01	\$29.61	\$35.21	
	rd level	\$25.25	\$31.36	\$37.47	
	th level	\$26.47	\$33.08	\$39.70	
	th level th level	\$27.70 \$28.93	\$34.83 \$36.56	\$41.95 \$44.20	
· ·		Ψ20.33	ψ50.50	Ψ+4.20	
Reinforced Iron Work	IR-25-RF	\$47.46	\$68.09	\$88.71	HHDHDDDDN
Rigging Work	IR-25-RIG	\$52.48	\$78.56	\$104.64	H H H H H H D N
Siding & Decking	IR-25-SD	\$45.10	\$67.43	\$89.75	H H D H H H D D Y
Structural, ornamental, conveyor, welder and Apprentice rates apply to structural, converyoglazing, reinforced, rigging, & siding decking	•	\$52.61	\$78.69	\$104.77	ннонннооу
A	pprentice Rates:				
	evel 1	\$26.51	\$39.54	\$52.57	
	evel 2	\$29.12	\$43.46	\$57.79	
	evel 3	\$31.73	\$47.37	\$63.01	
	evel 4	\$34.34	\$51.29	\$68.23	
	evel 5 evel 6	\$36.94 \$39.57	\$55.19 \$59.13	\$73.43 \$78.69	
	evel 7	\$39.57 \$42.16	\$59.13 \$63.02	\$78.69 \$83.87	
	evel 7 evel 8	\$44.78	\$66.95	\$89.11	
_	0.010	Ψ-1.70	ψ00.93	ψου. Η	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date:

6/5/2007

9/3/2007 Contract must be awarded by

Page 5 of 20

	i age o oi zo				
<u>Classification</u> Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
		======================================	a i iaii =======	======	
Industrial Door erection & construction	IR-25-STR-D	\$34.69	\$46.09	\$57.48	H $H$ $D$ $H$ $H$ $H$ $D$ $D$ $Y$
Laborer					
Construction Laborer, Mason Tender, Carpenter Tender, Drywall Handler, Cement Finisher tender, concrete chute and concrete Bucket Handler, Concrete Laborer, Demolition Laborer	L1076-A-A	\$37.62	\$53.35	\$69.07	H H D H D D D D Y
Apprentice Ra	ites:				
0-1,000 work h	ours	\$31.98	\$44.89	\$57.79	
1,001-2,000 wo	ork hours	\$33.11	\$46.58	\$60.05	
2,001-3,000 wo		\$34.24	\$48.28	\$62.31	
3,001-4,000 wo	ork hours	\$36.49	\$51.66	\$66.81	
Signal man (on sewer & caisson work); air,electric or gasoline tool operator (including concrete vibrator operator,acetylene torch & air hammer operator); scaffold builder, caisson worker	L1076-A-B	\$37.88	\$53.74	\$69.59	H H D H D D D D Y
Lansing Burner, Blaster & Powder Man	L1076-A-C	\$38.37	\$54.47	\$70.57	H $H$ $D$ $H$ $D$ $D$ $D$ $Y$
Furnance battery heater tender, burning bar & oxyacetylene gun, expediter man, top man and/or bottom man (blast furnace work)	L1076-A-D	\$38.12	\$54.10	\$70.07	H H D H D D D D Y
Cleaner/ sweeper laborer, furniture laborer	L1076-A-E	\$32.17	\$45.17	\$58.17	H $H$ $D$ $H$ $D$ $D$ $D$ $Y$
Demolition Laborer	L1076-D	\$37.62	\$53.35	\$69.07	H $H$ $D$ $H$ $D$ $D$ $D$ $D$ $Y$
Plasterer Tender, Plastering Machine Operator  Apprentice Ra	LPT-1	\$37.86	\$53.96	\$70.05	$H\;H\;D\;H\;D\;D\;D\;D\;N$
0 - 1,000 hours		\$30.91	\$43.53	\$56.15	
1,001 - 2,000 h		\$32.02	\$45.20	\$58.37	
2,001 - 3,000 h		\$33.14	\$46.88	\$60.61	
3,001 - 4,000 h	ours	\$35.37	\$50.23	\$65.07	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT
Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

#### Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 6 of 20

Classification  Name Description			Straight Hourly	Time and a Half	Double Time	Overtime Provision
aborer Hazerdoue	=========	=======================================	========	=======		==========
L <b>aborer - Hazardous</b> Class A Laborer - performing work in conj	unction with site	LHAZ-Z2-A	\$36.48	\$51.89	\$67.29	ннннннр
preparation and other preliminary work p		LI IAZ-ZZ-A	ψ50.40	ψ51.05	ψ01.23	
emoval, handling, or containment of haz						
substances not requiring use of personal	protective					
equipment required by state or federal re						
aborer performing work in conjunction w						
nandling, or containment of hazardous wa						
when used of personal protective equipm required.	ent level D is					
•	Apprentice Ra	tes:				
	0-1,000 work h		\$30.91	\$43.53	\$56.15	
	1,001-2,000 wo		\$32.02	\$45.20	\$58.37	
	2,001-3,000 wo		\$33.14	\$46.88	\$60.61	
	3,001-4,000 wc	ork hours	\$35.37	\$50.23	\$65.07	
Class B Laborer - performing work in conj	unction with the	LHAZ-Z2-B	\$37.48	\$53.39	\$69.29	нннннны
removal, handling, or containment of haz						
substances when the use of personal professels "A", "B" or "C" is required.	tective equipment					
and the contract of the contra	Apprentice Ra	ites:				
	0-1,000 work h	ours	\$31.66	\$44.66	\$57.65	
	1,001-2,000 wo	ork hours	\$32.82	\$46.40	\$59.97	
	2,001-3,000 wo	ork hours	\$33.99	\$48.15	\$62.31	
	3,001-4,000 wo	ork hours	\$36.32	\$51.65	\$66.97	
Laborer Underground - Tunnel, Shaft &	k Caisson					
Class I - Tunnel, shaft and caisson labore	r, dump man,	LAUCT-Z1-1	\$32.54	\$43.21	\$53.88	H H H H H H D \
shanty man, hog house tender, testing m watchman.	an (on gas), and					
	Apprentice Ra	ites:				
	0-1,000 work h	ours	\$27.70	\$35.95	\$44.20	
	1,001-2,000 wo	ork hours	\$28.67	\$37.40	\$46.14	
	2,001-3,000 wo		\$29.64	\$38.86	\$48.08	
	3,001-4,000 wo	ork hours	\$31.57	\$41.76	\$51.94	
Class II - Manhole, headwall, catch basin	builder, bricklayer	LAUCT-Z1-2	\$32.65	\$43.38	\$54.10	ннннннр
tender, mortar man, material mixer, fenc guard rail builder.			,		•	
	Apprentice Ra	tes:				
	0-1,000 work h	ours	\$27.79	\$36.08	\$44.38	
	1,001-2,000 wo	ork hours	\$28.76	\$37.54	\$46.32	
	2,001-3,000 wo		\$29.73	\$39.00	\$48.26	
	3,001-4,000 wc		\$31.68	\$41.92	\$52.16	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 7 of 20

Classification  Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Class III - Air tool operator (jack hammer man, bush hammer man and grinding man), first bottom man, see bottom man, cage tender, car pusher, carrier man, cor man, concrete form man, concrete repair man, cemen invert laborer, cement finisher, concrete shoveler, convan, floor man, gasoline and electric tool operator, gu man, grout operator, welder, heading dinky man, insid lock tender, pea gravel operator, pump man, outside lot tender, scaffold man, top signal man, switch man, trace man, tugger man, utility man, vibrator man, winch open pipe jacking man, wagon drill and air track operator acconcrete saw operator (under 40 h.p.).	crete t reyor nnite de ock k rator,	\$32.71	\$43.47	\$54.22	
Apprentic	e Rates:				
0-1,000 wo	ork hours	\$27.83	\$36.14	\$44.46	
· · · · · · · · · · · · · · · · · · ·	0 work hours	\$28.81	\$37.62	\$46.42	
	0 work hours	\$29.78	\$39.07	\$48.36	
3,001-4,00	0 work hours	\$31.73	\$42.00	\$52.26	
Class IV - Tunnel, shaft and caisson mucker, bracer mainer plate man, long haul dinky driver and well point m		\$32.89	\$43.74	\$54.58	ннннннрү
Apprentic	e Rates:				
0-1,000 wo	ork hours	\$27.97	\$36.36	\$44.74	
1,001-2,00	0 work hours	\$28.95	\$37.82	\$46.70	
	0 work hours	\$29.94	\$39.31	\$48.68	
3,001-4,00	0 work hours	\$31.91	\$42.26	\$52.62	
Class V - Tunnel, shaft and caisson miner, drill runner, keyboard operator, power knife operator, reinforced stor mesh man (e.g. wire mesh, steel mats, dowel bars)	LAUCT-Z1-5 eel	\$33.14	\$44.11	\$55.08	ннннннрү
Apprentic	e Rates:				
0-1,000 wo		\$28.16	\$36.64	\$45.12	
·	0 work hours	\$29.15	\$38.12	\$47.10	
	0 work hours	\$30.15	\$39.62	\$49.10	
3,001-4,00	0 work hours	\$32.14	\$42.61	\$53.08	
Class VI - Dynamite man and powder man.	LAUCT-Z1-6	\$33.47	\$44.61	\$55.74	нннннн b Y
Apprentic	e Rates:				
0-1,000 wo	ork hours	\$28.40	\$37.00	\$45.60	
1,001-2,00	0 work hours	\$29.42	\$38.53	\$47.64	
2,001-3,00	0 work hours	\$30.43	\$40.04	\$49.66	
3,001-4,00	0 work hours	\$32.46	\$43.09	\$53.72	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 8 of 20

	. ugo o o. <u>-</u> o				
Classification		Straight	Time and	Double	0 " 0 "
Name Description		Hourly ======	a Half =======	Time ======	Overtime Provision
Class VII - Restoration laborer, seeding, sodding, pla	anting, LAUCT-Z1-7	\$26.75	\$34.53	\$42.30	ннннннр
cutting, mulching and topsoil grading and the restor		Ψ20.70	φο-1.00	Ψ-12.00	
property such as replacing mail boxes, wood chips,					
poxes and flagstones.	piaritor				
Appren	tice Rates:				
0-1,000	work hours	\$23.36	\$29.44	\$35.52	
1,001-2	,000 work hours	\$24.04	\$30.46	\$36.88	
2,001-3	,000 work hours	\$24.72	\$31.48	\$38.24	
3,001-4	,000 work hours	\$26.07	\$33.50	\$40.94	
Landscape Laborer					
Landscape specialist includes; air, gas, and diesel	LLAN-Z1-A	\$23.38	\$32.46	\$41.54	XXHXXXHD
equipment operator, lawn sprinkler installer.	20 2	420.00	ψο=ο	Ψσ.	
Landscape laborer; small power tool operator, lawn	LLAN-Z1-B	\$19.16	\$26.13	\$33 10	XXHXXXHD
sprinkler installer helper, material mover, truck drive		ψ10.10	Ψ20.10	ψου. το	X X II X X X II B
Marble Finisher					
Marble Finisher	TT32-MF	\$38.37	\$48.46	\$58.54	HHDHDDDI
	itice Rates:	ψου.στ	Ψ-1010	ψου.υ-ι	
Level 1		\$18.73	\$24.22	\$29.71	
Level 2		\$19.79	\$25.81	\$31.83	
Level 3		\$23.93	\$30.38	\$36.83	
Level 4		\$25.23	\$32.33	\$39.43	
Level 5		\$26.56	\$33.85	\$41.14	
Level 6		\$27.99	\$35.64	\$43.28	
Level 7		\$29.48	\$37.17	\$44.85	
Level 8		\$30.80	\$38.73	\$46.65	
Marble Mason					
Marble Mason	TT32-MM	\$44.26	\$57.29	\$70.32	HHDHDDDDI
Appren	tice Rates:				
Level 1		\$24.21	\$31.14	\$38.06	
Level 2		\$26.93	\$34.56	\$42.20	
Level 3		\$29.70	\$37.59	\$45.48	
Level 4		\$32.10	\$40.83	\$49.56	
Level 5		\$34.18	\$43.17	\$52.16	
Level 6		\$37.52	\$48.11	\$58.71	
Level 7		\$38.55	\$49.53	\$60.51	
Level 8		\$39.18	\$50.47	\$61.77	
Operating Engineer					
Crane with boom & jib or leads 120' or longer	EN-324-A120	\$49.26	\$65.97	\$82.68	HHDHDDDD
,					

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 9 of 20

Classification Name Description	. ugo o o. 20	Straight Hourly	Time and a Half	Double Time	Overtime Provision
Crane with boom & jib or leads 140' or longer	EN-324-A140	\$50.08	\$67.20	\$84.32	H $H$ $D$ $H$ $D$ $D$ $D$ $Y$
Crane with boom & jib or leads 220' or longer	EN-324-A220	\$50.38	\$67.65	\$84.92	H $H$ $D$ $H$ $D$ $D$ $D$ $D$ $Y$
Crane with boom & jib or leads 300' or longer	EN-324-A300	\$51.88	\$69.90	\$87.92	H $H$ $D$ $H$ $D$ $D$ $D$ $D$ $Y$
Crane with boom & jib or leads 400' or longer	EN-324-A400	\$53.38	\$72.15	\$90.92	H $H$ $D$ $H$ $D$ $D$ $D$ $Y$
Compressor or welding machine	EN-324-CW	\$38.41	\$49.70	\$60.98	H $H$ $D$ $H$ $D$ $D$ $D$ $Y$
Forklift, lull, extend-a-boom forklift	EN-324-FL	\$45.72	\$60.66	\$75.60	H $H$ $D$ $H$ $D$ $D$ $D$ $D$ $Y$
Fireman or oiler	EN-324-FO	\$37.38	\$48.15	\$58.92	H $H$ $D$ $H$ $D$ $D$ $D$ $D$ $Y$
Regular crane, job mechanic, concrete pump	EN-324-RC	\$48.40	\$64.68	\$80.96	$H\ H\ D\ H\ D\ D\ D\ Y$
Regular engineer, hydro-excavator, remote controlled concrete breaker	EN-324-RE	\$47.43	\$63.23	\$79.02	$H\ H\ D\ H\ D\ D\ D\ D\ Y$
Apprentice R	ates:				
Period 1		\$37.85	\$48.90	\$59.96	
Period 2		\$39.43	\$51.28	\$63.12	
Period 3		\$41.02	\$53.66	\$66.30	
Period 4		\$42.59	\$56.01	\$69.44	
Period 5		\$44.17	\$58.39	\$72.60	
Period 6		\$45.76	\$60.77	\$75.78	
Operating Engineer - Marine Construction					
Diver/Wet Tender, Engineer (hydraulic dredge)	GLF-1	\$49.29	\$64.74	\$80.19	X X H H H H H D Y
Holidays paid at \$95.64 per hour					
<u>Subdivision of county</u> all Great Lakes, islands the	erein, & connecting & trib	utary waters			
Crane/Backhoe Operator, Mechanic/Welder, Assistant Engineer (hydraulic dredge), Leverman (hydraulic dredge) Diver Tender	GLF-2	\$47.79	\$62.49	\$77.19	X X H H H H H D Y
Holidays paid \$91.89 per hour <u>Subdivision of county</u> All Great Lakes, islands th	erein, & connecting & trib	outary waters			
Deck Equipment Operator, Machineryman, Maintenance of Crane (over 50 ton capacity) or Backhoe (115,000 lbs. or more), Tug/Launch Operator, Loader, Dozer and like equipment on Barge, Breakwater Wall, Slip/Doc or Scow, Deck Machinery	GLF-3	\$44.59	\$57.69	\$70.79	X X H H H H H D Y

Holidays paid at \$83.89 per hour

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: 1

#### Official Rate Schedule

**Issue Date:** 6/5/2007

Contract must be awarded by 9/3/2007

Page 10 of 20

Classification Name Description		. ugo 10 01 <b>2</b> 0	Straight Hourly	Time and a Half	Double Time	Overtime Provision
Subdivision of county	All Great Lakes, islands there	ein, & connecting & trib	outary waters			
Deck Equipment Operator, (Ma equipment units or more), Decl Crane Maintenance 50 ton capa weighing 115,000 lbs or less, A	k Hand, Deck Engineer, & acity and under or Backhoe	GLF-4	\$40.19	\$51.09	\$61.99	ххннннно
Holidays paid at \$72.89 per ho		in O composition O tall				
Subdivision of county	All Great Lakes, islands there	ein, & connecting & trit	outary waters			
Operating Engineer Hazardo			_			
Level A - Fully encapsulating of pressure demand, full face piece supplied air respirator w/ escap available level of respiratory, sk	ce SCBA or pressure demand on SCBA. The highest	EN-324-HWCI-Z1A	\$46.22	\$61.89	\$77.55	ннннннру
	Apprentice Rate	s:				
	1st 6 months 2nd 6 months		\$36.62 \$38.18	\$47.58 \$49.92	\$58.55 \$61.67	
	3rd 6 months		\$39.75	\$52.28	\$64.81	
	4th 6 months 5th 6 months		\$41.31 \$42.89	\$54.62 \$56.99	\$67.93 \$71.09	
	6th 6 months		\$44.45	\$59.33	\$74.21	
Level B & C protection. B - Pre or pressure demand supplied a w/chemical resistant clothing. purifying canister-equipped resclothing.	ir respirator w/ escape SCBA C - Full face piece, air	EN-324-HWCI-Z1B	\$45.27	\$60.46	\$75.65	ннннннру
5	Apprentice Rate	s:				
	1st 6 months		\$35.95	\$46.59	\$57.21	
	2nd 6 months		\$37.48	\$48.88	\$60.27	
	3rd 6 months		\$39.00	\$51.16	\$63.31	
	4th 6 months		\$40.52	\$53.44	\$66.35	
	5th 6 months		\$42.04	\$55.72	\$69.39	
	6th 6 months		\$43.56	\$58.00	\$72.43	
Level D - Coveralls, safety boot goggles and hard hats.	ts, glasses or chemical splash	EN-324-HWCI-Z1D	\$43.97	\$58.51	\$73.05	ннннннру
	Apprentice Rate	s:				
	1st 6 months		\$35.05	\$45.23	\$55.41	
	2nd 6 months		\$36.51	\$47.43	\$58.33	
	3rd 6 months		\$37.95	\$49.58	\$61.21	
	4th 6 months		\$39.42	\$51.79	\$64.15	
	5th 6 months		\$40.86 \$42.33	\$53.95 \$56.13	\$67.03 \$69.95	
	6th 6 months		\$42.32	\$56.13	Ф09.95	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 11 of 20

	raye ii oi zu				
Classification Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Level D When Capping Landfill Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HWCI-Z1DCL	\$43.72	\$58.14	\$72.55	ннннннрү
Apprentice Rate	es:				
1st 6 months		\$34.87	\$44.96	\$55.05	
2nd 6 months		\$36.31	\$47.12	\$57.93	
3rd 6 months		\$37.76	\$49.30	\$60.83	
4th 6 months		\$39.20	\$51.45	\$63.71	
5th 6 months		\$40.63	\$53.60	\$66.57	
6th 6 months		\$42.08	\$55.78	\$69.47	
Operating Engineer Hazardous Waste Class II					
Level A - Fully encapsulating chemical resistant suit w/ pressure demand, full face piece SCBA or pressure demand supplied air respirator w/ escape SCBA. The highest available level of respiratory, skin and eye protection.	EN-324-HWCII-Z1A	\$41.99	\$55.54	\$69.09	ннннннрү
Level B & C protection. B - Pressure demand, full face SCBA or pressure demand supplied air respirator w/ escape SCBA w/chemical resistant clothing. C - Full face piece, air purifying canister-equipped respirator w/chemical resistant clothing.	EN-324-HWCII-Z1B	\$41.04	\$54.12	\$67.19	ннннннрү
Level D - Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HWCII-Z1D	\$39.74	\$52.17	\$64.59	нннннн b Y
Level D When Capping Landfill Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HWCII-Z1DCL	\$39.49	\$51.79	\$64.09	ннннннрү
Operating Engineer Hazardous Waste Crane w/ Boom & .	Jib				
leads 140' or longer					
Level A - Fully encapsulating chemical resistant suit w/ pressure demand, full face piece SCBA or pressure demand supplied air respirator w/ escape SCBA. The highest available level of respiratory, skin and eye protection.	EN-324-HW140-Z1A	\$48.87	\$65.86	\$82.85	нннннннрү
Level B & C protection. B - Pressure demand, full face SCBA or pressure demand supplied air respirator w/ escape SCBA w/chemical resistant clothing. C - Full face piece, air purifying canister-equipped respirator w/chemical resistant clothing.	EN-324-HW140-Z1B	\$47.92	\$64.44	\$80.95	H H H H H H D Y
Level D Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HW140-Z1D	\$46.62	\$62.49	\$78.35	H H H H H H D Y
Level D When Capping Landfill Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HW140-Z1DCL	\$46.37	\$62.11	\$77.85	НННННН D Y

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

**Issue Date:** 6/5/2007

Contract must be awarded by 9/3/2007

Page 12 of 20

	Page 12 of 20				
Classification Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Operating Engineer Hazardous Waste Crane w/ Boom & . leads 220' or longer	 Jib				
Level A - Fully encapsulating chemical resistant suit w/ pressure demand, full face piece SCBA or pressure demand supplied air respirator w/ escape SCBA. The highest available level of respiratory, skin and eye protection.	EN-324-HW220-Z1A	\$49.17	\$66.31	\$83.45	ннннннру
Level B & C protection. B - Pressure demand, full face SCBA or pressure demand supplied air respirator w/ escape SCBA w/chemical resistant clothing. C - Full face piece, air purifying canister-equipped respirator w/chemical resistant clothing.	EN-324-HW220-Z1B	\$48.22	\$64.89	\$81.55	H H H H H H D Y
Level D Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HW220-Z1D	\$46.92	\$62.94	\$78.95	ннннннрү
Level D When Capping Landfill Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HW220-Z1DCL	\$46.67	\$62.56	\$78.45	н н н н н н н D Y
Operating Engineer Hazardous Waste Regular Crane, Jol Mechanic, Dragline Operator, Boom Truck Operator, and Concrete Pump with Boom Operator					
Level D - Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HWRC-Z1D	\$44.94	\$59.97	\$74.99	ннннннрү
Operating Engineer Hazardous Waste Regular Crane, Jol Mechanic, Dragline Operator, Boom Truck Operator, Pow Shovel Operator and Concrete Pump with boom					
Level D When Capping Landfill Coveralls, safety boots, glasses or chemical splash goggles and hard hats.	EN-324-HWRC-Z1DCL	\$44.07	\$58.66	\$73.25	ннннннрү
Operating Engineer Hazardous Waste Regular Crane, Jol Mechanic, Dragline Operator, Boom Truck Operator, Pow Shovel Operator and Concrete Pump with booms					
Level B & C protection. B - Pressure demand, full face SCBA or pressure demand supplied air respirator w/ escape SCBA w/chemical resistant clothing. C - Full face piece, air purifying canister-equipped respirator w/chemical resistant clothing.	EN-324-HWRC-Z1B	\$46.24	\$61.92	\$77.59	H H H H H H D Y
Operating Engineer Hazardous Waste Regular Crane, Jol Mechanic, Dragline Operator, Boom Truck Operator, Pow Shovel Operators and Concrete Pump with booms					
Level A - Fully encapsulating chemical resistant suit w/ pressure demand, full face piece SCBA or pressure demand supplied air respirator w/ escape SCBA. The highest available level of respiratory, skin and eye protection.	EN-324-HWRC-Z1A	\$47.19	\$63.34	\$79.49	H H H H H H D Y
Operating Engineer Steel Work	EN 224 CW420	<b>DEA 5</b> 4	<b>#</b> 00.00	<b>#00.00</b>	
Crane w/ 120' boom or longer	EN-324-SW120	\$51.51	\$69.80	·	HHDHHHDDY
Official Request #: 747  Requestor: TROY SCHOOL DISTRICT			Offici	al Ra	te Schedule

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

Issue Date:

6/5/2007

9/3/2007 Contract must be awarded by

Page 13 of 20

Classification Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Crane w/ 120' boom or longer w/ Oiler	EN-324-SW120-O	\$52.51	\$71.30	\$90.08	HHDHHHDDY
Crane w/ 140' boom or longer	EN-324-SW140	\$52.69	\$71.57	\$90.44	H $H$ $D$ $H$ $H$ $H$ $D$ $D$ $Y$
Crane w/ 140' boom or longer W/ Oiler	EN-324-SW140-O	\$53.69	\$73.07	\$92.44	H $H$ $D$ $H$ $H$ $H$ $D$ $D$ $Y$
Boom & Jib 220' or longer	EN-324-SW220	\$52.96	\$71.97	\$90.98	H $H$ $D$ $H$ $H$ $H$ $D$ $D$ $Y$
Crane w/ 220' boom or longer w/ Oiler	EN-324-SW220-O	\$53.96	\$73.47	\$92.98	H H D H H H D D Y
Boom & Jib 300' or longer	EN-324-SW300	\$54.46	\$74.22	\$93.98	H $H$ $D$ $H$ $H$ $H$ $D$ $D$ $Y$
Crane w/ 300' boom or longer w/ Oiler	EN-324-SW300-O	\$55.46	\$75.72	\$95.98	H $H$ $D$ $H$ $H$ $H$ $D$ $D$ $Y$
Boom & Jib 400' or longer	EN-324-SW400	\$55.96	\$76.47	\$96.98	H H D H H H D D Y
Crane w/ 400' boom or longer w/ Oiler	EN-324-SW400-O	\$56.96	\$77.97	\$98.98	H H D H H H D D Y
Crane Operator & Job Mechanic	EN-324-SWCO	\$51.15	\$69.26	\$87.36	H $H$ $D$ $H$ $H$ $H$ $D$ $D$ $Y$
	Apprentice Rates:		<b>^</b>		
	0-999 hours	\$40.04	\$52.72	\$65.39	
	1,000-1,999 hours	\$41.85	\$55.43	\$69.01	
	2,000-2,999 hours	\$43.66	\$58.14	\$72.63	
	3,000-3,999 hours 4,000-4,999 hours	\$45.48 \$47.28	\$60.88 \$63.58	\$76.27 \$79.87	
	5,000 hours	\$47.28 \$49.10	\$66.31	\$83.51	
Crane w/ Oiler	EN-324-SWCO-O	\$52.15	\$70.76	\$89.36	H
Compressor or Welder Operator	EN-324-SWCW	\$43.70	\$58.08	\$72.46	H
Hoisting Operator	EN-324-SWHO	\$50.51	\$68.30	\$86.08	НН Д Н Н Н Д Д Ү
Oiler	EN-324-SWO	\$42.29	\$55.97	\$69.64	ннонннооч
			·	, -	
Tower Crane & Derrick where work is 50' or first level	more above EN-324-SWTD50	\$52.24	\$70.89	\$89.54	HHDHHHDDY
Tower Crane & Derrick 50' or more w/ Oiler station is 50' or more above first level	where work EN-324-SWTD50-O	\$53.24	\$72.39	\$91.54	H H D H H H D D Y

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT
Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date: 6/5/2007

9/3/2007 Contract must be awarded by

Page 14 of 20

Classification Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Operating Engineer Underground					
Class I Equipment	EN-324A1-UC1	\$43.72	\$58.11	\$72.50	нннннн b y
Ap	prentice Rates:				
0-9	99 hours	\$34.89	\$44.97	\$55.04	
1,0	00-1,999 hours	\$36.33	\$47.13	\$57.92	
The state of the s	00-2,999 hours	\$37.76	\$49.27	\$60.78	
3,0	00-3,999 hours	\$39.21	\$51.45	\$63.68	
4,0	00-4,999 hours	\$40.65	\$53.61	\$66.56	
5,0	00-5,999 hours	\$42.09	\$55.77	\$69.44	
Class II Equipment	EN-324A1-UC2	\$38.99	\$51.02	\$63.04	ннннннру
Class III Equipment	EN-324A1-UC3	\$38.26	\$49.92	\$61.58	ннннннру
Class IV Equipment	EN-324A1-UC4	\$37.69	\$49.07	\$60.44	ннннннру
Master Mechanic	EN-324A1-UMM	\$43.97	\$58.49	\$73.00	ннннннру
Painter					
Painter (8 hours of repaint work performed on be paid time & one half rate)	Sunday shall PT-22-P	\$38.01	\$50.24	\$62.47	HHDHDDDDN
Ар	prentice Rates:				
Fir	st 6 months	\$25.78	\$31.89	\$38.01	
	cond 6 months	\$29.45	\$37.40	\$45.35	
Th	rd 6 months	\$30.67	\$39.23	\$47.79	
Fo	urth 6 months	\$31.89	\$41.06	\$50.23	
Fift	h 6 months	\$33.12	\$42.91	\$52.69	
Fir	al 6 months	\$34.34	\$44.73	\$55.13	
Sandblasting & spraywork performed, on highwoverpases, tanks or steel, OR spraywork & sandone with a scaffold height of 40' above the flo	dblasting	\$38.81	\$51.44	\$64.07	HHDHDDDDN

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT
Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by

9/3/2007

Page 15 of 20

Classification  Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Pipefitter					
Pipefitter	PF-636	\$55.06	\$74.14	\$89.96	$H\;H\;D\;H\;D\;D\;D\;D\;N$
	Apprentice Rates:				
	1st & 2nd periods	\$26.28	\$34.63	\$41.63	
	3rd period	\$28.28	\$37.63	\$45.63	
	4th period	\$29.53	\$39.51	\$48.13	
	5th period	\$30.78	\$41.38	\$50.63	
	6th period	\$32.03	\$43.25	\$53.13	
	7th period	\$33.28	\$45.13	\$55.63	
	8th period	\$34.28	\$46.63	\$57.63	
	9th period	\$35.28	\$48.13	\$59.63	
	10th period	\$36.71	\$50.27	\$62.49	
Plasterer					
Plasterer	BR1P	\$41.92	\$62.88	\$83.84	H $H$ $H$ $H$ $H$ $H$ $D$ $N$
	Apprentice Rates:				
	1st 6 months	\$21.61	\$32.41	\$43.22	
	2nd 6 months	\$25.00	\$37.50	\$50.00	
	3rd 6 months	\$28.39	\$42.59	\$56.78	
	4th 6 months	\$31.83	\$47.75	\$63.66	
	5th 6 months	\$35.16	\$50.94	\$67.92	
	6th 6 months	\$38.53	\$57.80	\$77.06	
Plasterer	PL67	\$42.87	\$58.16	\$73.45	HHHXDDDDN
	Apprentice Rates:	•	·	,	
	1st 6 months	\$24.52	\$30.63	\$36.75	
	2nd 6 months	\$27.58	\$35.23	\$42.87	
	3rd 6 months	\$30.64	\$39.81	\$48.99	
	4th 6 months	\$33.70	\$44.41	\$55.11	
	5th 6 months	\$36.75	\$48.98	\$61.21	
	6th 6 months	\$39.81	\$53.57	\$67.33	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 16 of 20

	1 age 10 01 20			
Classification		Straight	Time and	Double
Name Description		Hourly	a Half	Time Overtime Provision
Plumber	DI 00	<b>#54.00</b>	<b>#</b> 00 40	<b>****</b>
Plumber	PL-98	\$51.88	\$68.40	\$84.91 H H D H D D D D
	Apprentice Rates:			
	Period 1	\$17.11	\$23.41	\$29.71
	Period 2	\$17.11	\$23.41	\$29.71
	Period 3	\$26.78	\$35.13	\$43.47
	Period 4	\$27.41	\$36.07	\$44.73
	Period 5	\$28.57	\$37.81	\$47.05
	Period 6	\$29.72	\$39.53	\$49.35
	Period 7	\$30.87	\$41.26	\$51.65
	Period 8	\$32.04	\$43.01	\$53.99
	Period 9	\$33.19	\$44.74	\$56.29
	Period 10	\$34.35	\$46.48	\$58.61
Roofer				
Commercial Roofer	RO-149-WOM	\$45.01	\$58.72	\$72.42 H H D H H H D D I
Straight time is not to exceed ter (40) hours per week.	n (10) hours per day or forty			
	Apprentice Rates:			
	Apprentice 1	\$29.78	\$36.88	\$44.64
	Apprentice 2	\$33.80	\$41.54	\$49.52
	Apprentice 3	\$35.16	\$43.50	\$52.14
	Apprentice 4	\$36.15	\$44.94	\$54.06
	Apprentice 5	\$37.33	\$46.64	\$56.32
	Apprentice 6	\$38.67	\$48.58	\$58.90
Sheet Metal Worker				
Sheet Metal Worker	SHM-80	\$51.82	\$69.04	\$86.25 H H D H D D D D
	Apprentice Rates:	*****	400.0	***************************************
	First Year	\$34.61	\$43.22	\$51.83
	Second Year	\$35.98	\$45.27	\$54.57
	Third Year	\$37.36	\$47.34	\$57.33
	Fourth Year	\$40.11	\$51.47	\$62.83
	Fifth Year	\$42.86	\$55.59	\$68.33
		,	*	,
Siding & Decking	SHM-80-SD	\$34.58	\$46.03	\$57.48 H H H H H H D

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

**Issue Date:** 6/5/2007

Contract must be awarded by

rded by 9/3/2007

Page 17 of 20

Classification  Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
=======================================		=========			
Sprinkler Fitter					
Sprinkler Fitter	SP 704	\$54.02	\$72.89	\$91.75	H $H$ $D$ $H$ $D$ $D$ $D$ $D$ $Y$
	Apprentice Rates:				
	1st Period	\$31.38	\$38.93	\$46.47	
	2nd Period	\$33.27	\$41.76	\$50.25	
	3rd Period	\$35.15	\$44.58	\$54.01	
	4th Period	\$37.04	\$47.41	\$57.79	
	5th Period	\$38.93	\$50.25	\$61.57	
	6th Period	\$40.81	\$53.07	\$65.33	
	7th Period	\$42.70	\$55.91	\$69.11	
	8th Period	\$44.59	\$58.74	\$72.89	
	9th Period	\$46.47	\$61.56	\$76.65	
	10th Period	\$48.36	\$64.39	\$80.43	
Terrazzo					
Terrazzo Finisher	TT32-TRF	\$38.77	\$49.06	\$59.34	H $H$ $D$ $H$ $D$ $D$ $D$ $D$ $N$
	Apprentice Rates:				
	Level 1	\$19.72	\$25.71	\$31.69	
	Level 2	\$20.39	\$26.71	\$33.03	
	Level 3	\$23.86	\$30.27	\$36.69	
	Level 4	\$25.16	\$32.23	\$39.29	
	Level 5	\$26.49	\$33.74	\$41.00	
	Level 6	\$27.92	\$35.33	\$42.74	
	Level 7	\$29.41	\$37.18	\$44.96	
	Level 8	\$30.73	\$38.74	\$46.76	
Terrazzo Worker	TT32-TRW	\$43.79	\$56.59	\$69.38	H H D H D D D D N
	Apprentice Rates:				
	Level 1	\$24.11	\$30.98	\$37.86	
	Level 2	\$26.83	\$34.42	\$42.00	
	Level 3	\$29.60	\$37.44	\$45.28	
	Level 4	\$32.00	\$40.68	\$49.36	
	Level 5	\$34.08	\$43.15	\$52.21	
	Level 6	\$37.34	\$47.85	\$58.35	
	Level 7	\$38.42	\$49.33	\$60.25	
	Level 8	\$39.25	\$50.58	\$61.91	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

#### Official Rate Schedule

Issue Date:

6/5/2007

Contract must be awarded by 9/3/2007

Page 18 of 20

Classification Name Description		Straight Hourly	Time and a Half	Double Time	Overtime Provision
Tile			=======		===========
Tile Finisher	TT32-TF	\$38.39	\$48.49	\$58.58	HHDHDDDDN
	Apprentice Rates:	·	·	,	
	Level 1	\$18.63	\$24.07	\$29.51	
	Level 2	\$19.69	\$25.66	\$31.63	
	Level 3	\$23.83	\$30.23	\$36.63	
	Level 4	\$25.13	\$32.18	\$39.23	
	Level 5	\$26.46	\$33.70	\$40.94	
	Level 6	\$27.89	\$35.48	\$43.08	
	Level 7	\$29.38	\$37.01	\$44.65	
	Level 8	\$30.70	\$38.57	\$46.45	
Tile Layer	TT32-TL	\$43.69	\$56.44	\$69.18	HHDHDDDDN
-	Apprentice Rates:				
	Level 1	\$24.11	\$30.98	\$37.86	
	Level 2	\$26.83	\$34.42	\$42.00	
	Level 3	\$29.60	\$37.44	\$45.28	
	Level 4	\$32.00	\$40.68	\$49.36	
	Level 5	\$34.03	\$42.94	\$51.86	
	Level 6	\$37.29	\$47.77	\$58.25	
	Level 7	\$37.87	\$48.51	\$59.15	
	Level 8	\$38.70	\$49.75	\$60.81	
Truck Driver					
on all trucks of 8 cubic yard capacity or	less TM-RB1	\$33.66	\$35.99		ннннннн
of all trucks of 8 cubic yard capacity or o	over TM-RB1A	\$33.76	\$36.14		ннннннн
on euclid type equipment	TM-RB1B	\$33.91	\$36.36		ннннннн
Underground Laborer Open Cut, Clas	sl				
Construction Laborer	LAUC-Z1-	1 \$32.39	\$42.99	\$53.58	нннннн b y
	Apprentice Rates:	ţ02.00	Ŧ :=:-V	7	
		¢07.50	¢25.70	<b>ሲ</b> ላኃ ቦዕ	
	0-1,000 work hours	\$27.59 \$28.55	\$35.78	\$43.98	
	1,001-2,000 work hours	\$28.55 \$20.51	\$37.22	\$45.90 \$47.82	
	2,001-3,000 work hours	\$29.51 \$21.42	\$38.66 \$44.54	\$47.82 \$51.66	
	3,001-4,000 work hours	\$31.43	\$41.54	90.1C¢	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

Issue Date: 6

6/5/2007

Contract must be awarded by 9/3/2007

Page 19 of 20

Classification		3	Straight	Time and	Double	
Name Description	=========	=========	Hourly	a Half ======	Time ======	Overtime Provision
Underground Laborer Open Cut, Clas	s II					
Mortar and material mixer, concrete for well point man, manhole, headwall and guard rail builders, headwall, seawall, builder and fence erector.	catch basin builder,	LAUC-Z1-2	\$32.50	\$43.15	\$53.80	н н н н н н b Y
	Apprentice Rate	es:				
	0-1,000 work hou 1,001-2,000 work 2,001-3,000 work 3,001-4,000 work	k hours k hours	\$27.68 \$28.64 \$29.60 \$31.54	\$35.92 \$37.36 \$38.80 \$41.71	\$44.16 \$46.08 \$48.00 \$51.88	
Underground Laborer Open Cut, Clas	s III					
Air, gasoline and electric tool operator, vibrator operator, drillers, pump man, tar kettle operator, bracers, rodder, reinforced steel or mesh man (e.g. wire mesh, steel mats, dowel bars, etc.), cement finisher, welder, pipe jacking and boring man, wagon drill and air track operator and concrete saw operator (under 40 h.p.), windlass and tugger man, and directional boring man.		LAUC-Z1-3	\$32.55	\$43.23	\$53.90	н н н н н н н D Y
	Apprentice Rate	es:				
	0-1,000 work hou 1,001-2,000 worl 2,001-3,000 worl 3,001-4,000 worl	k hours k hours	\$27.71 \$28.68 \$29.65 \$31.58	\$35.96 \$37.42 \$38.88 \$41.77	\$44.22 \$46.16 \$48.10 \$51.96	
Underground Laborer Open Cut, Clas	s IV					
Trench or excavating grade man.	Apprentice Rate	LAUC-Z1-4	\$32.63	\$43.35	\$54.06	H H H H H H D Y
	0-1,000 work hou 1,001-2,000 worl 2,001-3,000 worl 3,001-4,000 worl	k hours k hours	\$27.77 \$28.74 \$29.72 \$31.66	\$36.06 \$37.51 \$38.98 \$41.89	\$44.34 \$46.28 \$48.24 \$52.12	
Underground Laborer Open Cut, Clas	ss V					
Pipe Layer		LAUC-Z1-5	\$32.69	\$43.44	\$54.18	H $H$ $H$ $H$ $H$ $H$ $D$ $Y$
	Apprentice Rate	es:				
	0-1,000 work hou 1,001-2,000 worl 2,001-3,000 worl 3,001-4,000 worl	k hours k hours	\$27.82 \$28.79 \$29.77 \$31.72	\$36.13 \$37.58 \$39.06 \$41.98	\$44.44 \$46.38 \$48.34 \$52.24	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

**Issue Date:** 6/5/2007

Contract must be awarded by

9/3/2007

Page 20 of 20

Clas Name	sification  Description	Straight Hourly	Time and a Half	Double Time	Overtime Provision
Undergro	ound Laborer Open Cut, Class VI				
operation	man, top man assistant, audio visual television as and all other operations in connection with actit television inspection, pipe cleaning and pipe york.	\$30.14	\$39.61	\$49.08	Н Н Н Н Н Н D Y
	Apprentice Rates:				
Undergro	0-1,000 work hours 1,001-2,000 work hours 2,001-3,000 work hours 3,001-4,000 work hours	\$25.90 \$26.75 \$27.60 \$29.29	\$33.25 \$34.52 \$35.80 \$38.34	\$40.60 \$42.30 \$44.00 \$47.38	
mulching property	on laborer, seeding, sodding, planting, cutting, LAUC-Z1-7 and topsoil grading and the restoration of such as replacing mail boxes, wood chips, planter agstones etc.	\$26.76	\$34.54	\$42.32	Н Н Н Н Н Н D Y
	Apprentice Rates:				
	0-1,000 work hours 1,001-2,000 work hours 2,001-3,000 work hours 3,001-4,000 work hours	\$23.37 \$24.05 \$24.73 \$26.08	\$29.46 \$30.48 \$31.50 \$33.52	\$35.54 \$36.90 \$38.26 \$40.96	

Official Request #: 747

Requestor: TROY SCHOOL DISTRICT

Project Description: HAZARDOUS MATERIAL ABATEMENT

Project Number: WATTLES ELEMENTARY & SMITH MIDDLE

County: Oakland

## Official Rate Schedule

## **SECTION IV**

# PRE-PROJECT SUBMITTALS POST-PROJECT SUBMITTALS

## PRE-PROJECT SUBMITTALS

Prior to mobilization to the project site, the Contractor will be required to submit the following materials to healthAIR, inc.:

- A1 Bonds/Insurance
- A2 Notification Form
- A3 Pre-Start Meeting
- A4 Project Penalties
- A5 Company Information Sheet

## POST-PROJECT SUBMITTALS

Prior to release of the final retainage for the projects covered by this specification, the Contractor will be required to submit the following materials to healthAIR, inc.:

- **B1** Final Project Notifications
- **B2** Waste Shipment Records
- **B3** Worker Documentation
- **B4** Final Consent of Surety
- **B5** Full Unconditional Waiver of Lien

#### TROY SCHOOL DISTRICT Bid 9423 Asbestos Abatement Wattles Elementary School Smith Middle School

	Certified Abatement Services	Asbestos Abatement Inc.	Environmental Maint. Engineers, Inc.	Trust Thermal Abatement	Qualified Abatement Services
Project Total	39,256.00	37,450.00	35,092.00	19,235.00	18,300.00
Smith Middle School Courtyard Transite	6,230.00	11,605.00	12,800.00	3,745.00	4,950.00
Smith Middle School Transite Not in Courtyard	21,466.00	14,770.00	10,752.00	8,745.00	7,950.00
Wattles Elementary School Transite	11,560.00	11,075.00	11,540.00	6,712.00	5,400.00
	78,512.00	74,900.00	70,184.00	38,437.00	36,600.00