Three – Year Asbestos Re-Inspection and Management Plan Update

Bourne Public Schools Administration Building
36 Sandwich Road
Bourne, MA 02532

Bourne Public Schools
Bourne, Massachusetts

December, 2011

Fuss & O'Neill EnviroScience, LLC
50 Redfield Street, Suite 100
Boston, Massachusetts 02122

For Compliance with
EPA Asbestos Hazard Emergency Response Act (AHERA)
40 CFR Part 763

FUSS & O'NEILL
EnviroScience, LLC

January 3, 2012

Mr. Edward Donoghue
Director of Business Services
Bourne Public Schools
36 Sandwich Road
Bourne, MA 02532

RE: 2011 Three Year AHERA Management Plan Update
Bourne Public Schools Administration Building
Fuss & O'Neill EnviroScience, LLC No. 20070914.A7E

Dear Mr. Donoghue:

Fuss & O'Neill EnviroScience, LLC (EnviroScience) is pleased to submit the enclosed report of the three-year AHERA asbestos re-inspection and management plan update performed for the Bourne Public Schools Administration Building located at 36 Sandwich Road in Bourne, Massachusetts. This report is an important document that must be kept on file at the school administration building as well as at a central location where all the Management Plans are preserved.

Based on the walkthrough inspection, and review of EnviroScience's August 2009 *Limited Asbestos Inspection Report,* no response actions are recommended. Building materials that had been previously presumed as asbestos-containing materials (ACM) were sampled, and determined as non-asbestos.

If you have any questions regarding this report, please do not hesitate to contact us. Thank you for this opportunity to have served your environmental needs.

Sincerely,

Robert L. May, Jr.
Vice President

Stephen W. Connelly
Senior Vice President

RLM/asn

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Bourne Public Schools Administration Building

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1 INTRODUCTION

1.1 Background

The Clean Air Act of 1977 required the United States Environmental Protection Agency (USEPA) to develop standards to address the potential health aspects associated with adverse effects of asbestos exposure as an indoor contaminant. In October 1986 the USEPA promulgated the Asbestos Hazard Emergency Response Act (AHERA).

The AHERA regulations required that all local education agencies conduct inspections of each school building that they lease, own, or otherwise use as a school building in order to identify all locations or friable and non-friable asbestos-containing building materials (ACBM). The original inspections were required to have been completed prior to October 12, 1988.

Any building leased or acquired on or after October 12, 1988 that is to be used as a school building shall be inspected for friable and non-friable ACBM prior to use as a school building. In the event of an emergency use of a building that has not been inspected for ACBM, the building shall be inspected within 30 days after commencement of such use.

The regulatory requirements are still in full force and effect for any private or public school system, a church affiliated school of any denomination, a school dedicated to the education of children with special needs, or a charter school. In the Commonwealth of Massachusetts the Department of Labor Standards (DLS) formerly known as the Division of Occupational Safety (DOS) Asbestos and Lead Program is responsible for enforcement of the AHERA regulations.

1.2 Local Education Agency (LEA) Responsibilities

A. The LEA is responsible for compliance with AHERA regulation 40 CFR Part 763. The following responsibilities must be adhered to (refer to above mentioned regulation for full requirements and responsibilities):

1. The LEA must designate a person to ensure that all of the AHERA requirements are properly implemented. The Designated Person must receive adequate training to perform his/her duties.

2. The LEA must ensure that management plans are maintained in a central location as well as at each facility, and such plans and records are available for inspection or review at all times.

3. The LEA must inform all workers, teachers, parents of students, or their legal guardians in writing at least once each school year about asbestos related activities, and the availability of the AHERA management plans for the school buildings.

4. The LEA must ensure proper accreditation for all persons who perform asbestos inspections, asbestos re-inspections, develop/update management plans, develop response actions, and/or perform required response actions including operations and maintenance activities that may disturb asbestos.

5. The LEA must provide training for all custodial and maintenance staff who regularly perform building maintenance where asbestos-containing building materials (ACBM) are present. The training must be provided upon initial hire as well as updated annually.

6. The LEA must provide information (disclosure) to any workers who may perform short-term work and come in contact with asbestos in school buildings where ACBM or presumed ACBM are present.

7. The LEA must ensure that known ACBM or presumed ACBM are provided with warning labels in routine maintenance areas.

8. The LEA must ensure that periodic surveillance is performed at least once every six months, after a management plan is in effect, in all school buildings that it leases, owns, or otherwise uses that contains ACBM or presumed ACBM.

9. The LEA must ensure that once every three years, after a management plan is in effect, a re-inspection is performed in all school buildings that it leases, owns, or otherwise uses that contains ACBM or presumed ACBM.

1.4 Accreditation

A. Local Education Agency (LEA)

LEA:	Bourne Public Schools
Address:	36 Sandwich Road Bourne, Massachusetts 02532
Phone:	(508)-759-0660
Fax:	(508)-759-1107

B. Designated Person

Designated Person:	Mr. Edward Donoghue Director of Business Services
Address:	36 Sandwich Road Bourne, Massachusetts 02532

C. Asbestos Consultant Data

Firm:	Fuss & O'Neill EnviroScience, LLC.

Address: 50 Redfield Street, Suite 100
Boston, Massachusetts 02122
Phone: (617) 282-4675
Fax: (617) 282-8253

D. Asbestos Inspector

Inspector:	Mr. Dustin Diedricksen
Accreditation Number:	AI041867
State of Accreditation:	Massachusetts
Expiration Date:	04/26/12

E. Asbestos Management Planner:

Planner:	Mr. Robert May
Accreditation Number:	AP041719
State of Accreditation:	Massachusetts
Expiration Date:	03/27/12

1.5 Inspection History and Schedule

A. Original AHERA Inspection Management Plan

Report Date:	November 1988
Prepared By:	EnviroScience Consultants, Inc.
Address:	Newington, Connecticut

B. Three Year Re-Inspections

1. September 1994 prepared by EnviroScience Consultants, Inc.
2. July 2001 prepared by EnviroScience Consultants, Inc.
3. August 2004 prepared by EnviroScience Consultants, Inc.
4. December 2007 prepared by Fuss & O'Neill EnviroScience, LLC

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2 Three Year Re-inspection

2.1 Re-inspection Procedures

This three-year asbestos re-inspection was conducted in accordance with the requirements of the following regulations:

- United States Environmental Protection Agency (USEPA) Asbestos Hazard Emergency Response Act (AHERA) regulation (40 CFR Part 763, Section 763.85 (b)).

Mr. Dustin Diedricksen of Fuss & O'Neill EnviroScience, LLC (EnviroScience) performed the re-inspection on September 2, 2011. Mr. Diedricksen is an accredited Asbestos Inspector in the Commonwealth of Massachusetts (License No. AI041867). John Coletti of Fuss & O'Neill EnviroScience performed the Checklist for Existing Records onn December 12, 2011.

A. During the re-inspection the following required tasks were performed:

1. A visual re-inspection and re-assessment of all friable known or assumed asbestos-containing building materials (ACBM).

2. A visual re-inspection of ACBM that was previously considered non-friable to determine if the present condition of the material has made it friable.

3. Identification and assessment of any homogeneous area that contained new friable ACBM since the last inspection or re-inspection.

Note: The limits of an AHERA inspection involve visible and accessible areas only. ACBM may exist in concealed chases, above fixed ceilings, or concealed below floors. Additionally, materials such as glue associated with chalkboards and tackboards, flooring adhesives and mastics, and concealed thermal system insulation may contain asbestos, and are presumed to be present.

2.2 Limited Building Description

The Bourne Public Schools Administration Building is a multi-level wood -framed structure housing the administrative offices, and was constructed in 1935. Building areas include offices and a boiler room. The total gross area of this facility is approximately 3,830 square feet.

One hot water boiler provides radiant heating utilizing tube radiators.

No renovation or construction had been performed since the last inspection.

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3 RE-INSPECTION REPORT

3.1 Review of Existing Records

An important part of this AHERA re-inspection involved checking documentation that was required to be present at the building being inspected as well as at the central location where all management plans are preserved.

Please see *Appendix A* for details of our findings.

3.2 Re-inspection Summary

The on-site portion of the re-inspection was documented on forms modeled from examples provided by the United States Environmental Protection Agency (USEPA). A single form has been created which summarizes the inventory of materials by type, location, quantity, and category. Each location of a given material type is provided an exposure assessment including friability, a previous condition assessment category consistent with AHERA rankings, a current assessment category ranking, and notes regarding the current assessment. The forms also identify any previous recommendations from last recorded three-year inspection, and current recommendations based on the re-inspection.

Any newly identified materials are also recorded and identified as newly identified materials. Note no samples were collected of materials as part of the re-inspection. Any newly identified materials are presumed to contain asbestos.

The information obtained during this re-inspection was transmitted to Mr. Robert May, an accredited Management Planner, so that response actions relative to the condition of the ACBM could be designed. Mr. May is a licensed Asbestos Management Planner in the Commonwealth of Massachusetts (License No. AP041719).

3.3 Newly Identified ACBM Material

No newly identified materials were determined and/or assumed to be ACBM.

Any suspect material encountered during renovation/demolition that is not specifically identified in this report as a non-ACM should be assumed to contain asbestos unless sample results prove otherwise. AHERA inspections do not satisfy the requirements for the U.S. EPA survey requirements for compliance with the National Emission Standards for Hazardous Air Pollutants (NESHAP). A NESHAP survey should be performed prior to renovation or other planned disturbance within a building.

3.4 Physical Assessment of ACBMs

During the inspection, suspect ACBM were separated into three USEPA categories. These categories are thermal system insulation (TSI), surfacing ACBM, and miscellaneous ACBM. TSI includes all materials used to prevent heat loss or gain or water condensation on mechanical systems. Examples of TSI are pipe insulation, boiler insulation, duct insulation, and mudded insulation on pipe fittings. Surfacing ACBM is commonly used for fireproofing, decorative, and acoustical applications. Miscellaneous materials include all ACBM not listed in TSI or surfacing, such as linoleum, vinyl asbestos flooring, and ceiling tiles.

Finally, all ACBM were quantified in linear and/or square footage depending on the nature of the material.

All ACBM identified during the inspection and still remaining in the school were reassessed using the AHERA guidelines for assessment of ACBM. The assessment categories are listed as follows:

1 = Damaged or significantly damaged TSI ACBM
2 = Damaged friable surfacing ACBM
3 = Significantly damaged friable surfacing ACBM
4 = Damaged or significantly damaged friable miscellaneous ACBM
5 = ACBM with potential for damage
6 = ACBM with potential for significant damage
7 = Any remaining friable ACBM or friable suspected ACBM

Material locations, assessments, and recommended response actions are listed in the Re-inspection forms located in *Appendix B*.

4 MANAGEMENT PLAN UPDATE

4.1 Recommended Response Actions

Only a select amount of documentation on the Checklist for Existing Records was found at the Administration Building. This Documentation must be present at the Administration Building.

Based on the walkthrough inspection, and review of EnviroScience's August 2009 Limited Asbestos Inspection Report, no response actions are recommended. Building materials that had been previously presumed as asbestos-containing materials (ACM) were sampled and determined as non-asbestos. Refer to *Appendix C* for a copy of the August 2009 Limited Inspection Report, which includes sample results for chimney & breeching cement, ceiling plaster, drywall, and joint compound building materials. No periodic surveillance is necessary due to absence of friable ACM within building. LEA should maintain parent/teacher notification forms and distribute each school year.

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5 EPA CERTIFICATION REQUIREMENTS

The certificates and the licenses for the individuals (Dustin Diedricksen and Robert L. May Jr.) involved in performing the re-inspection and updating the management plan are provided in Appendix E.

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APPENDIX A

CHECKLIST FOR EXISTING RECORDS

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CHECKLIST FOR EXISTING RECORDS

Local Education Agency (LEA): Bourne Public Schools
36 Sandwich Road, Bourne, MA

School Building: Bourne Public School Administration Building

The following documentation is required to be present in both the LEA's Office as well as in a centralized location in the administrative office of the school. The information included in this checklist shall be verified to be present and complete as part of three year re-inspection.

DOCUMENTATION		LOCATION	
		School	LEA Office
1.	Original AHERA Inspection/Management Plan (1994)		Yes
2.	1998 Three year Re-inspection		Yes
3.	2001 Three year Re-inspection		Yes
4.	2004 Three year Re-inspection		Yes
5.	Notifications to Parents/Guardians and Teachers (yearly since last re-inspection)		No
6.	Designated Person Identified and Proper Training (person must be named and have appropriate training)		No
7.	Designated Person Periodic Surveillance (every six months since last re-inspection)		No*
8.	Record of Awareness Training for Maintenance Staff		No
9.	Outside Vendor Awareness Notification		No
10.	Warning Signs and Labels (required posting in Boiler room and mechanical spaces only)		No
11.	Record of Response Actions (includes any abatement done since last re-inspection)		No (N\A)

Inspector: John Coletti Date: December 12, 2011

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APPENDIX B

RE-INSPECTION FORM

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50 Redfield St, Suite 100, Boston, MA 02122 (617) 282-4675 Fax (617) 282-8253

ASBESTOS RE-INSPECTION FORM

Inspection Date: September 2, 2011

Bourne Public Schools Administration Building
Town of Bourne

Inspector: Dustin Diedricksen

ACM Type Chimney & Breeching Cement

Sample Reference # 0724SC03- A-C

ACM Inventory			Exposure Assessment				Response Action	
Location	Estimate Quantity	Material Category	Friable	Previous Conditions	Current Assessment Category	Current Assessment Description	Previous Recommend-ations	Current Recommend-ations
Boiler Room	3 SF	TSI	Y	5	Determined as Non ACM from August 2009 Sampling	Non ACM	Continue O&M	Remove from O&M Plan

AHERA assessment category:
1= Damaged or significantly damaged TSI ACBM, 2=Damaged friable surfacing ACBM, 3=Significantly damaged friable surfacing ACBM, 4=Damaged or significantly damaged friable miscellaneous ACBM, 5=ACBM with potential for damage, 6=ACBM with potential for significant damage,
7=Any remaining friable ACBM or friable suspected ACBM

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APPENDIX B

AUGUST 2009 LIMITED INSPECTION REPORT

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APPENDIX C

PREVENTIVE MEASURES

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PREVENTIVE MEASURES

FOR VARIOUS ASBESTOS-CONTAINING MATERIALS

A. SURFACING MATERIALS

"Surfacing Materials" means materials in a school building that are sprayed-on, troweled-on, or otherwise applied to surfaces. These include sprayed-on fireproofing materials on structural members, ceiling and wall plasters, or other materials applied to surfaces for acoustical, fireproofing, or other purposes.

Surfacing Materials are generally considered friable and can release asbestos fibers if damaged by impact, air erosion, vibration, and/or water intrusion. The following procedures, when properly implemented, will reduce the potential for fiber release:

Sprayed-on fire-proofing

Identify the materials and post warning signs on the laid-in or glued-in ceiling tile. If the decking is not covered, place the sign on the wall.
Maintain the materials in intact state and undamaged condition. During winter, pigeons, squirrels and other rodents tend to roost in boiler/machine rooms and dislodge sprayed-on fireproofing on the decking. Prevent such possibilities.
Prevent water leakage. If the material is significantly damaged, removal is the best option. For minor damage, enclosure is a temporary solution. Encapsulation of damaged sprayed-on fireproofing material is not recommended.
Train the custodial people who are responsible for care and maintenance of surfacing materials.
Please note that the repair/removal can only be performed by a licensed abatement contractor.

Ceiling and wall plaster

Identify the materials and post warning signs.
Maintain the materials in intact state and undamaged condition. Avoid storing/stacking on/near the materials to reduce contact damage.
Prevent water leakage. If the material is significantly damaged, removal is the best option. For minor damage, repair or enclosure is a temporary solution.
Train the custodial people who are responsible for care and maintenance of surfacing materials.

B. THERMAL SYSTEM INSULATION (TSI)

"Thermal System Insulation (TSI)" means insulating materials applied to pipes, pipe fittings, boilers, breechings, tanks, ducts, or other components to prevent process heat loss or gain, water condensation, or for other purposes (e.g., fire door insulation core).

TSI is generally considered friable ACM. This means it can be easily damaged, increasing the potential for fiber release. The following procedures, when properly implemented, will reduce the potential for fiber release:

Boiler and breeching insulation

Identify the locations and label the boiler. Warning signs should be posted outside the boiler room.
Reduce the likelihood of fiber release by ensuring that the insulation is not damaged. Avoid storing/stacking on/near the boiler to reduce contact damage.
Maintain the insulation in intact state and undamaged condition. Repair damaged areas as soon as possible to prevent further deterioration. If repair is not feasible due to extensive damage/deterioration, remove the material.
Train the custodial people who are responsible for care and maintenance of TSI. Please note that the repair/removal can only be performed by a licensed abatement contractor.

Pipe, pipe-fittings, tank and duct insulation

Identify the locations and label the materials. Warning signs should be posted outside of rooms that have TSI materials.
Reduce the likelihood of fiber release by ensuring that the materials are not damaged. Avoid storing/stacking near the materials to reduce contact damage.
Maintain all TSI materials in intact state and undamaged condition. Inspect the protective jackets for damage. Repair damaged areas as soon as possible to prevent further deterioration. If repair is not feasible due to extensive damage/deterioration, remove the material.
Train the custodial people who are responsible for care and maintenance of TSI. Please note that the repair/removal can only be performed by a licensed abatement contractor.

Fire door

Identify the locations and label the materials.
Since there may be a number of different types of fire doors throughout a building, fire door cores must be considered to have asbestos-containing interior insulation unless sample result prove otherwise. Prior to performing any maintenance on any door (lock change, drilling, etc.), the door should be surveyed by qualified personnel to rule out the existence of an asbestos core.
Train the custodial people who are responsible for care and maintenance of TSI. Please note that the repair/removal can only be performed by a licensed abatement contractor.

C. MISCELLANEOUS MATERIALS

"Miscellaneous Materials" are all other asbestos-containing materials in a school building that do not fall under the categories of Surfacing Materials or TSI. These include floor tiles, floor tile and carpet mastic, gypsum wallboard and joint compound, ceiling tiles, glue daubs, transite panels, laboratory counter tops, wallbase and associated glue, window caulking and glazing compounds etc. The following maintenance procedures are recommended for these materials:

Vinyl Asbestos Floor Tiles (VAT)

Vinyl Asbestos Floor Tiles (VAT) are considered non-friable, however routine maintenance procedures such as spray-buffing, burnishing, wet scrubbing, and stripping can generate asbestos fibers. Following procedures, when properly implemented, will reduce the potential of fiber release:

Do not sand, grind or abrade the tiles. Stripping of VAT should be done as infrequently as possible. When stripping becomes necessary, follow the appropriate work practices. Never perform dry stripping.

During spray-buffing or burnishing the floor, operate the machine at the lowest workable speed and use the least abrasive pad. Use a wet mop for routine cleaning whenever possible.
Routinely check whether chair and desk glides are in good condition and replace when necessary. Worn glides can gouge the floor and cause fiber release.
Place carpets/floor mats in all entrances to reduce abrasion of floor tiles by sand and pebbles.
During winter, have parking lots and walkways swept to the extent possible to avoid the tracking of salt and ice-melting compounds into the school by the students.
Train the custodial people who are responsible for care and maintenance of VAT. Please note that the repair/removal can only be performed by a licensed abatement contractor.

Gypsum wallboard and joint compound assembly

Since there may exist a number of different homogeneous assemblies in a building, all sheetrock/joint compound must be assumed to be ACBM unless sample result prove otherwise. If any specific areas are going to be disturbed, the material in that area should be sampled.
Reduce the likelihood of fiber release by avoiding cutting or drilling holes through the sheetrock panels.

Ceiling Tile and Glue Daubs

Reduce the likelihood of fiber release by limiting access to the area above the ceiling tiles. Maintain the ceiling tiles in undamaged condition. Replace any damaged or water-stained tile.
If the ceiling tiles are negative for asbestos, sample and analyze the glue daubs to ascertain whether these are asbestos-containing before the tiles are replaced.

Transite Panels, Laboratory Counter Tops, Window Caulking and Glazing Compounds

Reduce the likelihood of fiber release.
Maintain transite panels, lab tabletops and window caulking and glazing compounds in undamaged condition

Carpet Glue, Blackboard/ Tack Board Glue, Sink Undercoating, Floor Tile Mastic, Baseboard and Mastic

Reduce the likelihood of fiber release by leaving base cove and carpets in place.
Maintain carpets and base cove in good condition. Sample and analyze the glue and the mastic to ascertain whether these are asbestos-containing if the renovation activities are going to impact the carpet and the baseboard.

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APPENDIX E

AHERA CERTIFICATES