### **Asbestos Reinspection Report Tri-City Elementary School**

546 SW Chadwick Lane Myrtle Creek, OR 97457

Prepared for:

South Umpqua School District #19



March 2019 Project No.: 52468.000 Phase No.: 0005

2645 Willamette Street #A, Eugene, OR 97405 541.686.8684 Main 866.727.0140 Fax 888.248.1939 Toll-Free

PBSUSA.COM

The reinspection process under the AHERA rules states that a school building must be reinspected by an accredited inspector at least every three years. The results of the reinspection are reported in these documents.

### LIST OF DOCUMENTS

Material Summary Page 1.1 **Updated Full Assessments** Page 2.1 **Updated Stock Assessments** Page 3.1 **Bulk Sample Information** 

Page 4.1 (If any taken)

### **ACTIVITY DATES**

02/01/1989 Management Plan Implementation Date \* 01/03/2019 Reinspection End Date

01/03/2022 Next Reinspection Due

### REINSPECTION SUMMARY

Friable asbestos-containing pipe insulation was observed in the kitchen, attic spaces, and pipe tunnels. Pipe insulation has been abated within the boiler room since the last reinspection. Access to the pipe tunnels was very limited, but severe insulation damage and debris were present in areas where the tunnels were observed. Minor localized damage to asbestoscontaining pipe insulation straight runs and hard fittings was observed within the attic space. The pipe insulation in all other areas was generally in good condition. Additional asbestoscontaining pipe insulation is assumed to be present inside walls, above ceilings, and in other inaccessible areas.

Other friable suspect asbestos-containing materials observed include various types of ceiling tiles throughout the building and insulation on wiring within the stage area.

Non-friable suspect asbestos-containing materials included vinyl floor tile, mastic, and gypsum wallboard and plasters. These materials were in generally good condition. Floor tile cracking was observed along what appears to be settling boundaries within the concrete slab foundation of the north classroom wing, as well as at several doorways within the central classroom wing. Cracking of floor tile appears in straight lines, largely along the north and south exterior walls of the north wing, and across hallways in several areas. These areas of floor tile damage are wellcoated with floor wax in all instances.

Suspect floor tile and mastic were abated from the southwestern-most classroom in the north classroom wing in the Summer of 2018.



Project No.: 52468.000 Phase No.: 0005

<sup>\*</sup> Information provided by School District

SIGNATURI	ES
-----------	----

Inspector Management Planner

David Burrows Jeff Heeren

Accreditation #: IR-18-9405A Accreditation #: IMR-18-4941A



Known or suspected asbestos-containing building materials are listed below in order of hazard priority. The priorities are established by the Accredited Inspector(s) and Accredited Management Planner(s), and are based on the assessments. A material may be listed more than once if its location varies and if the assessment criteria also dramatically changes.

1. MATERIAL Asbestos Pipe Insulation

LOCATION Pipe Tunnels

CATEGORY High to Moderate Concern

TSI - Damaged or significantly damaged ACBM

2. MATERIAL Ceiling Tiles

LOCATION Throughout

CATEGORY Moderate Concern

Miscellaneous Material - Damaged or significantly damaged friable ACBM

3. MATERIAL Asbestos Pipe Insulation

LOCATION Kitchen

CATEGORY Moderate Concern

TSI - ACBM with potential for damage

4. MATERIAL Vinyl Floor Tile/Mastic

LOCATION North classroom wing, classroom doorways in central classroom wing

CATEGORY Moderate to Low Concern

Miscellaneous Material - Damaged or significantly damaged friable ACBM

5. MATERIAL Asbestos Pipe Insulation

LOCATION Attic Space

CATEGORY Moderate to Low Concern

TSI - Damaged or significantly damaged ACBM

6. MATERIAL Mechanical Isolation Cloth

LOCATION HVAC Units in Mechanical Spaces

CATEGORY Moderate to Low Concern

TSI - ACBM with potential for damage

7. MATERIAL Built-up Roofing

LOCATION Throughout
CATEGORY Low Concern

Miscellaneous Non-friable ACBM or Assumed ACBM



Material Summary: January 03, 2019

Known or suspected asbestos-containing building materials are listed below in order of hazard priority. The priorities are established by the Accredited Inspector(s) and Accredited Management Planner(s), and are based on the assessments. A material may be listed more than once if its location varies and if the assessment criteria also dramatically changes.

8. MATERIAL Gypsum and Plaster

LOCATION Throughout
CATEGORY Low Concern

Miscellaneous Non-friable ACBM or Assumed ACBM

9. MATERIAL Mastic

LOCATION Throughout
CATEGORY Low Concern

Miscellaneous Non-friable ACBM or Assumed ACBM

10. MATERIAL Vinyl Floor Tile

LOCATION Throughout
CATEGORY Low Concern

Miscellaneous Non-friable ACBM or Assumed ACBM



**HOMOGENEOUS AREA** Asbestos Pipe Insulation

FUNCTIONAL SPACE Pipe Tunnels

QUANTITY Not measured

**DESCRIPTION** 

A variety of asbestos containing pipe insulation and associated hard insulating cement on fittings. The pipe insulation may be aircell, mag, felt, paper wrap, contaminated fiberglass or similar.

ADDITIONAL SAMPLES TAKEN: None

ASSESSMENT AHERA CLASSIFICATION TSI - Damaged or significantly damaged ACBM

CONCERN CATEGORY High to Moderate Concern

CURRENT DAMAGE Severe to Moderate

UNDAMAGED AREA Fair FRIABILITY High ACCESSIBILITY Low

DAMAGE POTENTIAL Moderate

DAMAGE TYPE Impact, Water

DAMAGE CAUSE Age, Maintenance, Vibration,

Water

**DISCUSSION** 

AHERA Classification - Damaged or significantly damaged thermal system insulation ACM.

### **RESPONSE ACTIONS**

Preventative Measures Prior to Abatement

Restrict access to pipe tunnels and post warning signs at all access locations.

Do not disturb material without proper training and protection.

Recommended Abatement Action

Remove material under full isolation procedures.

Other Options

None suggested.



**HOMOGENEOUS AREA** Ceiling Tiles

FUNCTIONAL SPACE Throughout

QUANTITY Not measured

**DESCRIPTION** 

Fibrous tiles of lay-in, glued-on, and concealed spline systems.

ADDITIONAL SAMPLES TAKEN: None

ASSESSMENT AHERA CLASSIFICATION Miscellaneous Material - Damaged or

significantly damaged friable ACBM

CONCERN CATEGORY Moderate Concern

CURRENT DAMAGE Moderate to None Minimal localized damage to ceiling systems throughout

UNDAMAGED AREA Good

FRIABILITY Moderate to Low

ACCESSIBILITY Moderate

DAMAGE POTENTIAL Moderate to Low

DAMAGE TYPE Impact

DAMAGE CAUSE Vandals

**DISCUSSION** 

AHERA Classification - Damaged or significantly damaged friable miscellaneous ACM.

### **RESPONSE ACTIONS**

Preventative Measures Prior to Abatement

Establish an Operations and Maintenance Program.

Recommended Abatement Action

Conduct further testing. If positive, remove material under full isolation procedures.

Other Options

None suggested.



**HOMOGENEOUS AREA** Asbestos Pipe Insulation

FUNCTIONAL SPACE Kitchen

QUANTITY Not measured

**DESCRIPTION** 

A variety of asbestos containing pipe insulation and associated hard insulating cement on fittings. The pipe insulation may be aircell, mag, felt, paper wrap, contaminated fiberglass or similar.

ADDITIONAL SAMPLES TAKEN: None

**ASSESSMENT** AHERA CLASSIFICATION TSI - ACBM with potential for damage

CONCERN CATEGORY Moderate Concern

CURRENT DAMAGE None
UNDAMAGED AREA Good
FRIABILITY Moderate
ACCESSIBILITY Moderate
DAMAGE POTENTIAL Moderate
DAMAGE TYPE None
DAMAGE CAUSE None

**DISCUSSION** 

AHERA Classification - ACBM with potential for damage.

### **RESPONSE ACTIONS**

Preventative Measures Prior to Abatement

Do not disturb material without proper training and protection. Continue to implement Operations and Maintenance program.

Recommended Abatement Action

Remove material under full isolation procedures.

Other Options

None suggested.



**HOMOGENEOUS AREA** Vinyl Floor Tile/Mastic

FUNCTIONAL SPACE North classroom wing, classroom doorways in central classroom wing

QUANTITY Not measured

**DESCRIPTION** 

Manufactured floor tiles typically 9 inches by 9 inches or 12 inches by 12 inches, composed of a dense vinyl matrix that often contains asbestos and is adhered to the substrate with a mastic that often contains

asbestos.

ADDITIONAL SAMPLES TAKEN: None

ASSESSMENT AHERA CLASSIFICATION Miscellaneous Material - Damaged or

significantly damaged friable ACBM

CONCERN CATEGORY Moderate to Low Concern

CURRENT DAMAGE Moderate to None Cracking along exterior walls and at expansion joints in slab

UNDAMAGED AREA Good

FRIABILITY Low Cracking areas are largely well-coated with wax

ACCESSIBILITY High to Moderate

DAMAGE POTENTIAL Low

DAMAGE TYPE Flaking

DAMAGE CAUSE Age, Maintenance

**DISCUSSION** 

AHERA Classification - Damaged or significantly damaged miscellaneous ACM.

### **RESPONSE ACTIONS**

Preventative Measures Prior to Abatement

Continue to implement Operations and Maintenance program.

Do not disturb material without proper training and protection.

Recommended Abatement Action

Remove material under full isolation procedures.

Other Options

Encapsulate material in high traffic areas.



**HOMOGENEOUS AREA** Asbestos Pipe Insulation

FUNCTIONAL SPACE Attic Space

QUANTITY Not measured

**DESCRIPTION** 

A variety of asbestos containing pipe insulation and associated hard insulating cement on fittings. The pipe insulation may be aircell, mag, felt, paper wrap, contaminated fiberglass or similar.

ADDITIONAL SAMPLES TAKEN: None

ASSESSMENT AHERA CLASSIFICATION TSI - Damaged or significantly damaged ACBM

CONCERN CATEGORY Moderate to Low Concern

CURRENT DAMAGE Moderate to None Raw edges & minimal localized damage

UNDAMAGED AREA Good

FRIABILITY Moderate

ACCESSIBILITY Low

DAMAGE POTENTIAL Moderate to Low

DAMAGE TYPE Impact

DAMAGE CAUSE Maintenance

**DISCUSSION** 

AHERA Classification - Damaged or significantly damaged thermal system insulation ACM.

### **RESPONSE ACTIONS**

Preventative Measures Prior to Abatement

Properly remove debris; HEPA vacuum and/or wet clean in areas affected by the debris.

Continue to implement Operations and Maintenance program.

Recommended Abatement Action

Repair material.

Glovebag removal as required in conjunction with other building activities.

Other Options

None suggested.



**HOMOGENEOUS AREA**Mechanical Isolation Cloth

FUNCTIONAL SPACE HVAC Units in Mechanical Spaces

QUANTITY Not measured

**DESCRIPTION** 

A heavy woven fabric located typically between air handling equipment and an adjacent air duct to prevent

the transmission of vibrations.

ADDITIONAL SAMPLES TAKEN: None

**ASSESSMENT** AHERA CLASSIFICATION TSI - ACBM with potential for damage

CONCERN CATEGORY Moderate to Low Concern

CURRENT DAMAGE None
UNDAMAGED AREA Good

FRIABILITY Moderate

ACCESSIBILITY Low DAMAGE POTENTIAL Low

DAMAGE TYPE

DAMAGE CAUSE

**DISCUSSION** 

AHERA Classification - ACBM with potential for damage.

### **RESPONSE ACTIONS**

Preventative Measures Prior to Abatement

Do not disturb material without proper training and protection. Continue to implement Operations and Maintenance program.

Recommended Abatement Action

Remove material under modified isolation.

Other Options

None suggested.



March 2019

2.6

Material Assessments: January 03, 2019

MATERIAL Built-up Roofing

FUNCTIONAL SPACE Throughout

**DESCRIPTION** 

Multiple layers of manufactured roofing felts and asphaltic emulsion. Both felts and emulsion may contain asbestos. Sampling to substrate is necessary since a given membrane may represent several applications.

SAMPLE RESULTS ASSUMED POSITIVE

ASSESSMENT Low Concern

Non-friable built-up roofing felt and bitumens typically contain asbestos. It is recommended that a qualified inspector take full depth samples before any activity that would raise friability, such as drilling, cutting, or removal. If the samples test positive (asbestos-containing), remove using wet methods and proper worker protection. Contact local air pollution control authority and worker protection division for additional and current guidelines. Re-roofing is generally permitted if the existing material remains undisturbed.

MATERIAL Gypsum and Plaster

FUNCTIONAL SPACE Throughout

**DESCRIPTION** 

Gypsum wallboard is typically manufactured in panels composed of compressed gypsum plaster. Seams are covered with tape and joint compound. Plaster is a trowel-applied cementitious material on wood or metal lath, or gypsum wallboard substrate.

SAMPLE RESULTS ASSUMED POSITIVE

ASSESSMENT Low Concern

It is very difficult to determine all possible varieties of gypsum wallboard and plaster in a given building since these materials are obscured by paint and other finishes. Even if they test negative (no asbestos detected), other locations of these materials may contain asbestos. In the gypsum wallboard, asbestos is typically found in the joint compound. It is PBS' experience that 3 to 5 percent of all gypsum wallboard and plaster samples contain asbestos. An accredited inspector should take full depth samples before repair, remodeling, demolition or other activities that would impact any wallboard. If the sample tests are positive (asbestos-containing), remove using current regulatory guidelines.



Material Assessments: January 03, 2019

MATERIAL Mastic

FUNCTIONAL SPACE Throughout

**DESCRIPTION** 

Adhesive used to attach building materials to a substrate such as floor tiles to a subfloor material.

SAMPLE RESULTS ASSUMED POSITIVE

ASSESSMENT Low Concern

Mastic may adhere vinyl floor tiles, rubber base and other items to the appropriate surface. Consequently, the mastic is not accessible. When removing materials and the mastic below, the mastic may become very friable and full or modified isolation may be required. At a minimum, establish an Operations and Maintenance Program.

MATERIAL Vinyl Floor Tile

FUNCTIONAL SPACE Throughout

**DESCRIPTION** 

Manufactured floor tiles typically 9 inches by 9 inches or 12 inches by 12 inches, composed of a dense vinyl matrix that often contains asbestos and is adhered to the substrate with a mastic that often contains asbestos.

SAMPLE RESULTS ASSUMED POSITIVE

ASSESSMENT Low Concern

Vinyl floor tile and mastic are suspected to contain asbestos. Drilling, grinding, sanding, etc. will create friability. At a minimum, establish an operations and maintenance program. Prior to disturbing the tile, a qualified inspector should take samples that include both the tile and mastic, which adheres the tile to the floor substrate. Remove using full isolation if the tile and/or mastic is asbestos-containing (positive). Other methods may be acceptable; contact the local air pollution authority and worker protection division. Carpeting and reflooring is permitted if existing material remains undisturbed. Polarized light microscopy (PLM) analysis is not considered conclusive for this material due to the potential presence of many small fibers that are invisible under PLM magnification. All negative sample results of vinyl floor tile should be verified through scanning or transmission electron microscopy (SEM or TEM).



THIS IS TO CERTIFY THAT

### **DAVID BURROWS**

# HAS SUCCESSFULLY COMPLETED THE TRAINING COURSE

for

# **ASBESTOS INSPECTOR REFRESHER**

In accordance with TSCA Title II, Part 763, Subpart E, Appendix C of 40 CFR

Course Date:

04/18/2018

M PBS

Eugene, OR

Course Location:

IR-18-9405A

Certificate:

AHERA is the Asbestos Hazard Emergency Response Act enacting Title II of Toxic Substance Control Act (TSCA)

**Expiration Date:** 

For verification of the authenticity of this

certificate contact:

PBS Environmental 4412 SW Corbett Avenue

Portland, OR 97239

(503) 248-1939

The Robert Inch

Greg Baker, Instructor

THIS IS TO CERTIFY THAT

### JEFF HEEREN

HAS SUCCESSFULLY COMPLETED THE TRAINING COURSE

for

## ASBESTOS INSPECTOR / MANAGEMENT PLANNER REFRESHER

In accordance with TSCA Title II, Part 763, Subpart E, Appendix C of 40 CFR

N PBS

IMR-18-4941A

Certificate:

For verification of the authenticity of this

certificate contact: PBS Environmental 4412 SW Corbett Avenue Portland, OR 97239

503) 248-1939

Eugene, OR

Course Location:

04/18/2018

Course Date:

AHERA is the Asbestos Hazard Emergency Response Act enacting Title II of Toxic Substance Control Act (TSCA)

Expiration Date: 04/18/20

Hugon. Bolon

Greg Baker, Instructor