ASBESTOS SURVEY REPORT

89 E. Howe Road
Tallmadge, Summit County, Ohio 44278

Parcel Numbers: 6010569 & 6010572

November 2022

Prepared for:

City of Tallmadge
46 North Avenue, Suite 201
Tallmadge, OH 44278
Phone: (330) 633-5639

Prepared by:

HZW Environmental Consultants

1234 Weathervane Ln.♦Akron, Ohio 44313
330-208-2717 ♦ Fax 330-208-2799
A22017-01

HZW Environmental Consultants

November 4, 2022

Ms. Andrea Kidder, MPA
Community Development/Communications Manager
Department of Administration
The City of Tallmadge
46 North Avenue
Tallmadge, Ohio 44278
(330) 633-5639

Subject: ***Asbestos Survey Report for the Property Located at 89 East Howe Road, City of Tallmadge, Summit County, Ohio 44278.***

Dear Ms. Kidder:

HZW Environmental Consultants, LLC (HZW) is pleased to submit this letter report which presents the findings of an asbestos survey conducted at 89 East Howe Road, city of Tallmadge, Summit County, Ohio (hereinafter sometimes referred to as the "Property") on behalf of city of Tallmadge. According to the Summit County's Auditor's Office, the Property is owned by the city of Tallmadge and consists of two (2) contiguous parcels identified as permeant parcel numbers 6010569 and 6010572. Parcel number 6010569 is comprised of approximately 11.54-acres and contains an approximate 96,554-square foot structure formerly used by the Summit County Developmental Disability Board as a school and workshop. The 96,554-square feet structure was the focus of asbestos survey due its proposed demolition. Parcel 6010569 also contains a small salt storage building that is to be maintained by the city of Tallmadge and was not part of the asbestos survey.

Parcel 6010572 is primarily utilized as ballfield or recreational area and is comprised of 4.867-acres. It also contains baseball dugouts and a small concession building of approximately 1,000-square feet. These structures were also to remain; and therefore, they were not inspected.

1.0 INTRODUCTION

On October 25 and 26, 2022, a representative of HZW, Mr. Robert Settle, who is a certified Asbestos Hazard Evaluation Specialist (AHES), performed an asbestos survey at the Property under Certification No. ES546635. This certification is required to be maintained by the inspector(s) in accordance with the Asbestos School Hazard Abatement Reauthorization Act (ASHARA) and Ohio Environmental Protection Agency (OEPA) regulations.

The asbestos survey was conducted in accordance with the National Emissions Standard for Hazardous Air Pollutants (NESHAP). NESHAP regulations require no specific survey protocol be followed; however, AHERA protocol is recommended. Therefore, the asbestos survey at the Property was conducted in accordance with AHERA protocol, which initially requires that all homogeneous areas of building materials located in a building and suspected of containing asbestos be identified. A homogeneous area is a building material/area that is uniform in texture, color, date of application, use or system and appears identical in every other respect. Once all homogeneous areas are identified, functional spaces in which these homogeneous areas exist are subsequently identified. Within each functional space, the AHERA category, condition, quantity, and location of each suspect material is determined. Relevant definitions and acronyms used in this report are provided in **Attachment 1**.

2.0 FACILITY CONSTRUCTION INFORMATION

The school building is located at 89 East Howe Road, City of Tallmadge, Summit County, Ohio 44278. The 96,554 square feet primarily two (2)-story building with a lower level at ground surface was built circa 1970. The building also contains a third level above a portion of the building The exterior construction of the building consists of brick and masonry block walls. The roof consists of a flat asphalt roof over steel beams and joists. Interior finishes within the Property are primarily walls constructed of drywall and mesh corkboard in certain areas. The ceiling consists of concrete and polystyrene ceiling tile with pinholes. The flooring consists of carpet and/or floor tile on primarily concrete floors. *As noted above, there is a salt shed on the western side of the Property. However, it is not intended for demolition and as such was not included in the survey. A contiguous parcel (6010572) to northwest contains a concession area. This is also not intended for demolition and was not included within the ACM survey.*

3.0 SCOPE OF WORK

AHERA classifies friable building materials into the following three (3) categories: surfacing materials, thermal system insulation (TSI) and miscellaneous materials. A friable building material is defined as a material that can be crumbled, pulverized, or reduced to powder by hand pressure. Examples of surfacing materials include fireproofing and acoustical plaster. TSI can include, but is not limited to, the following: pipe lagging, pipe wrap, block insulation, batt insulation and mudded fitting insulation. Miscellaneous materials can include, but are not limited, to the following: ceiling tile, drywall and joint compound, floor tile/sheet and mastic, roofing materials and transite. It should be noted that nonfriable building materials are often included by building inspectors under the miscellaneous materials category. In determining the condition of the material, the following guidelines are used:

General Damage Category	AHERA Damage Category	Criteria
Good	No Damage	No Damage
Fair	Damage	Up to 10% overall damage Up to 25% localized damage
Poor	Significant Damage	Over 10% overall damage Over 25% localized damage

4.0 SUSPECT MATERIAL SUMMARY

During HZW's survey of the Property, all accessible homogeneous areas of building materials suspected of containing asbestos were identified and the functional spaces in which they were located were documented. Destructive techniques were used to determine if asbestos-containing materials were located behind walls, above ceiling components, etc. However, if during demolition/renovation activities, suspect materials not included in this report are observed, they must be tested for asbestos content or assumed to be ACM before being disturbed.

A total of 103 bulk samples of the suspect ACM were collected at the Property for analysis by polarized light microscopy (PLM) technique with a positive stop at greater than 1% asbestos per homogenous area. The bulk sampling protocol is based on the AHERA category assigned to a specific homogeneous area and the quantity of that homogeneous area identified. **Attachment 2** provides a listing of samples submitted for analysis and a figure/sketch depicting sample locations. The bulk samples collected were submitted to Crisp Analytical, LLC (CA Labs) of Baton Rouge, Louisiana, for analysis of asbestos content by PLM using Environmental Protection Agency (EPA) Method 600/R-93/116.

In addition to the 103 bulk samples secured for analysis, the following lists the suspect ACM identified at the Property that were not tested for asbestos content:

- Floor Tile 12" x 12" White Speckled with Black Mastic – Assumed to be ACM
- Floor Tile 12"x 12" Green Speckled with Black Mastic - Assumed to be ACM
- Floor Tile 12"x 12" Beige Speckled with Black Mastic - Assumed to be ACM
- Floor Tile 12"x 12" Blue Speckled with Black Mastic - Assumed to be ACM
- Floor Tile 12"x 12" Black Speckled with Black Mastic - Assumed to be ACM
- Asphalt Shingles – Assumed to be ACM
- Vinyl Floor-Sheet White/Gray with Tan Mastic – Assumed to be ACM
- Gray Carpet with Tan Mastic – Assumed to be ACM
- Floor Tile 12"x 12" White/Gray with Black Mastic - Assumed to be ACM
- Floor Tile 12"x 12" Brown Speckled with Black Mastic - Assumed to be ACM
- Carpet Tile 2'x 2' Brown with Clear Mastic – Assumed to be ACM
- Gray/Orange Carpet with Tan Mastic – Assumed to be ACM
- Floor Tile 12"x 12" Yellow Speckled with Black Mastic - Assumed to be ACM
- Floor Tile 9" x 9" Gray with Black Mastic- Assumed to be ACM
- Floor Tile 9" x 9" White/Brown with Black Mastic- Assumed to be ACM
- Carpet Tile 2'x 2' Gray with Clear Mastic – Assumed to be ACM
- Carpet Tile 2'x 2' Black with Clear Mastic – Assumed to be ACM
- Carpet Tile 2'x 2' Gray with Clear Mastic – Assumed to be ACM
- Floor Tile 9" x 9" Olive with Black Mastic- Assumed to be ACM
- Carpet Tile 2' x 2' Blue with Clear Mastic – Assumed to be ACM
- Floor Tile 12"x 12" White/Brown Speckled with Black Mastic - Assumed to be ACM
- Blue/Green Carpet with Clear Mastic – Assumed to be ACM
- Floor Tile 12"x 12" Red with Black Mastic - Assumed to be ACM
- Floor Tile 9" x 9" Dark Brown with Black Mastic- Assumed to be ACM
- Brown Carpet with Clear Mastic – Assumed to be ACM

- Floor Tile 12"x 12" Brown/White Speckled with Black Mastic - Assumed to be ACM
- Floor Tile 12"x 12" Brown/Gray Speckled with Black Mastic - Assumed to be ACM
- Red Carpet with Clear Mastic – Assumed to be ACM
- Floor Tile 9" x 9" White/Black Speckled with Black Mastic- Assumed to be ACM
- Floor Tile 9" x 9" Tan/Brown with Black Mastic- Assumed to be ACM
- Floor Tile 12"x 12" Blue with Black Mastic - Assumed to be ACM
- Black Carpet with Clear Mastic – Assumed to be ACM
- Blue Carpet with Clear Mastic – Assumed to be ACM
- Light Brown Carpet with Clear Mastic – Assumed to be ACM
- Carpet Tile 2'x 2' Multicolor with Clear Mastic – Assumed to be ACM
- Multicolor Carpet with Clear Mastic – Assumed to be ACM
- Blue Speckled Carpet with Clear Mastic – Assumed to be ACM
- Carpet Tile 2'x 2' Brown/Gray with Clear Mastic – Assumed to be ACM
- Orange Carpet with Clear Mastic – Assumed to be ACM
- Carpet Tile 2'x 2' Brown/Purple with Clear Mastic – Assumed to be ACM
- Carpet Tile 2'x 2' Brown/Orange with Clear Mastic – Assumed to be ACM
- Water Fountains – Assumed to be ACM
- Vinyl Floor-Sheet Brown with Clear Mastic – Assumed to be ACM
- Brown Swirl Carpet with Clear Mastic – Assumed to be ACM
- Flat Asphalt Roof and Underlayment – Assumed to be ACM

5.0 FINDINGS AND CONCLUSIONS

Based on the site inspection and the analytical data from the 103 bulk samples collected, HZW concludes the following regarding the Property:

- Friable material identified as White Pipe Wrap on foil located in Room UD-35 contains 10% Chrysotile. Per NESHAPs (40 CFR Part 61.145, Section A (i)), this material does not need abated prior to demolition since it less than 160 square feet or 260 linear feet; however, OSHA does consider this as ACM. Therefore, worker protection must be provided during demolition and/or renovation.

- No non-friable ACM was identified via sampling.

- Other non-friable materials which were not sampled but assumed to be ACM include floor tile 12"x12" (White Speck, Green Speck, Beige Speck, Blue Speck, Black Speck, White/Gray, Brown Speck, Yellow, White/Brown Speck, Brown/Gray Speck, Blue) with black mastic, 9"x9" floor tile (Gray, White/Brown, Olive, Dark Brown, White/Black Speck, Tan/Brown) with black mastic, Carpet Tile 2' x 2' (Brown, Gray, Black, Blue, Multicolor, Brown/Gray, Brown/Purple, Brown/Orange) with clear mastic, Carpet (Gray, Gray/Orange, Blue/Green, Brown, Red, Black, Blue, Light Brown, Multicolor, Blue Speck, Orange, Brown Swirl) with clear mastic, Asphalt Shingles, Flat Asphalt Roof and Underlayment, and Water Fountain Gaskets. *These materials will need to be disposed of as Category I Non-Friable material at a licensed facility during demolition unless it becomes in poor condition or is rendered friable such that it must be treated and/or abated and disposed as RACM.*

HZW's Asbestos Bulk Sampling Information Log for the Property, which includes the bulk sampling locations, material descriptions, quantities, condition and asbestos content is provided in **Attachment 2.** In addition, **Attachment 2** contains a drawing/sketch depicting the bulk sampling locations and the locations of building materials identified as ACM. A copy of the laboratory analytical report from CA Labs for the bulk samples collected at the Property is included as **Attachment 3**.

The quantities of ACM and assumed ACM, as presented on HZW's Asbestos Bulk Sampling Information Form in **Attachment 2** are approximate and represent the majority of accessible building materials that could be quantified during the survey. In addition, demolition of any of the Property's ceilings and walls may reveal additional building materials suspected of containing asbestos. These materials should be sampled prior to demolition to discern its asbestos content or assumed to be ACM.

6.0 HAZARD COMMUNICATION

The information contained in this report should be conveyed to contractors that will be working in the facility to satisfy the hazard communication requirements of the OSHA Asbestos in Construction Standard, 29 CFR 1926.1101.

7.0 LIMITATIONS AND DISCLAIMER

This report describes the locations of ACM identified in the Property located at 89 East Howe Road, city of Tallmadge, Summit County, Ohio 44278 at the time of assessment. HZW represents that our services are performed within the limits prescribed by applicable regulations and in a manner consistent with the level of care and skill ordinarily exercised by other professional consultants under similar circumstances. HZW shall not be responsible for conditions or consequences arising from relevant information that was concealed or not fully disclosed at the time this investigation was conducted. The information and opinions included in this report are exclusively for the use of City of Tallmadge, who may rely upon the information and conclusions presented in this report. No other representation is made to the client, expressed or implied, and no warranty or guarantee is included or intended.

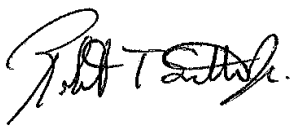
Asbestos-containing material quantities stated in this report are approximate. The results and conclusions of the asbestos assessment are based upon information obtained from a limited number of samples. Conditions at other locations may differ from those where sampling was conducted. It is possible that additional ACMs are present behind walls, below floors, above ceilings, or in other areas which were not readily accessible at the time of this work. If encountered during demolition activities, suspect material must be sampled and analyzed for asbestos content or assumed to be ACM. Exploratory demolition was not completed as part of this assessment.

This report is designed to aid the building owner, architect, construction manager, or general contractor in locating ACM. Under no circumstances is the report to be utilized as a project specification document. This asbestos survey report does not contain the components required to serve as an Asbestos Project Design document or as an Asbestos Abatement Work Plan.

HZW's professional services have been performed, findings obtained, as well as conclusions and recommendations prepared in accordance with customary principles and practices in the fields of environmental science and engineering. This statement is in lieu of other statements either expressed or implied. This report does not warrant against future operations or conditions, nor does it warrant against operations or conditions present of a type or at a location not investigated.

HZW appreciates the opportunity you have given us to provide professional consulting services to City of Lorain. Should you have any questions regarding the information presented above, please do not hesitate to contact us.

Report Prepared By:



Robert Settle

Asbestos Hazard Abatement Specialist
AS546850
Asbestos Hazard Evaluation Specialist
ES546635

Report Reviewed By:

Kevin Reaman
Akron Office Manager

ATTACHMENT 1

DEFINITIONS & ACRONYMS

DEFINITIONS

Definitions are included in this section in order to provide information concerning potential examples of material that contain asbestos, the condition of the materials, and the proper handling, transportation, and disposal of the materials off-site if necessary.

Asbestos-Containing Material (ACM) is defined as any material that contains more than one (1) percent asbestos as determined by the test method, specified in the CFR Title 40, Part 763, Subpart E, PLM.

Friable is defined as a material that, when dry, can be crumbled, pulverized, or reduced to powder by hand pressure, or any previously non-friable material that has become damaged to the extent that when dry it may be crumbled, pulverized, or reduced to powder by hand pressure.

Category I Non-friable ACM is defined by the NESHAPs as asbestos-containing packings, gaskets, resilient floor coverings, and asphalt roofing products.

Category II Non-friable ACM is any material, excluding Category I non-friable ACM, that when dry, cannot be crumbled, pulverized, or reduced to powder by hand pressure.

Regulated Asbestos-Containing Material (RACM) includes: (1) Friable asbestos-containing material, including Category I or II non-friable ACM that has become friable; (2) Category I and Category II non-friable ACM that will be or has been subjected to sanding, grinding, cutting, or abrading; (3) Category I and Category II non-friable ACM that has become or have a high probability of becoming friable by the actions of demolition or renovation.

ACRONYMS

ACM-	Asbestos-containing material
AHERA-	Asbestos Hazard Emergency Response Act
CAHES-	Certified Asbestos Hazard Evaluation Specialist
CFR-	Code of Federal Regulations
DOT-	Department of Transportation
EPA-	Environmental Protection Agency
HVAC-	Heating, Ventilation and Air Conditioning
NESHAP-	National Emissions Standards for Hazardous Air Pollutants
NVLAP-	National Voluntary Laboratory Accreditation Program
ODH-	Ohio Department of Health
OSHA-	Occupational Safety & Health Administration
PACM-	Presumed asbestos-containing material
PLM-	Polarized light microscopy
RACM-	Regulated Asbestos-Containing Material
VAE-	Visual area estimation

ATTACHMENT 2

ASBESTOS BULK SAMPLING INFORMATION LOG AND PROPERTY FIGURE/SKETCH

HZW Environmental Consultants, 1234 Weathervane Lane, Suite 110, Akron, Ohio 44313
330-208-2717/ 330-208-2799- Fax

Asbestos Bulk Sample Information Log

Project Name:	*City of Tallmadge Asbestos Inspections*	*HZW Project Number:*	*A22017-01*
Project Address:	*89 East Howe Road, Tallmadge, Ohio 44278*	*Sample Collection Date:*	*10/25/2022*

Sample #	Asbestos Content	Material Description	Location	Condition	Friable (Y/N)	Approximate Quantity
1		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
2		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
3		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
4		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
5		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
6		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
7		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
8		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
9		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
10		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
11	*None*	*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	*Approx. 125,000 sf*
12		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
13		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
14		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
15		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
16		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
17		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
18		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
19		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
20		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
21		*Drywall Wall System with Joint Compound*	*Throughout*	*Good*	*Yes*	
22		*4" Tan Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
23		*4" Tan Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
24		*4" Tan Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
25	None	*4" Tan Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	*Approx. 8,650 sf*
26		*4" Tan Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
27		*4" Tan Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
28		*4" Tan Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
29		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
30		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
31		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
32		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
33		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
34		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
35		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
36		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
37		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
38		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
39	*None*	*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	*Approx. 110,000 sf*
40		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
41		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
42		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
43		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
44		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
45		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
46		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
47		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
48		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
49		*Ceiling Tile 2'x4' White Pinhole with Fissures*	*Throughout*	*Good*	*Yes*	
50		*4" Black Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
51		*4" Black Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
52		*4" Black Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
53	*None*	*4" Black Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	*Approx. 8,000 sf*
54		*4" Black Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
55		*4" Black Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
56		*4" Black Cove Base with Tan Mastic*	*Throughout*	*Good*	*No*	
57	*None*	*Black Rubber Stair Tread with Clear Mastic*	*Stage*	*Good*	*No*	*Approx. 125 sf*

HZW Environmental Consultants, 1234 Weathervane Lane, Suite 110, Akron, Ohio 44313
330-208-2717/ 330-208-2799- Fax

Asbestos Bulk Sample Information Log

Project Name:	City of Tallmadge Asbestos Inspections	HZW Project Number:	A22017-01
Project Address:	89 East Howe Road, Tallmadge, Ohio 44278	Sample Collection Date:	10/25/2022

58	None	Black Rubber Stair Tread with Clear Mastic	Stage	Good	No	Approx. 125 sf
59	None	Duct Insulation	Kitchen, LB-112	Good	Yes	Approx. 145 sf
60		Duct Insulation	Kitchen, LB-112	Good	Yes	
61	None	Corkboard 3' x 4' Mesh with Black Mastic	A-wing, UC-wing, UD-wing, S-wing	Good	Yes	Approx. 11,000 sf
62		Corkboard 3' x 4' Mesh with Black Mastic	A-wing, UC-wing, UD-wing, S-wing	Good	Yes	
63		Corkboard 3' x 4' Mesh with Black Mastic	A-wing, UC-wing, UD-wing, S-wing	Good	Yes	
64		Corkboard 3' x 4' Mesh with Black Mastic	A-wing, UC-wing, UD-wing, S-wing	Good	Yes	
65		Corkboard 3' x 4' Mesh with Black Mastic	A-wing, UC-wing, UD-wing, S-wing	Good	Yes	
66		Corkboard 3' x 4' Mesh with Black Mastic	A-wing, UC-wing, UD-wing, S-wing	Good	Yes	
67		Corkboard 3' x 4' Mesh with Black Mastic	A-wing, UC-wing, UD-wing, S-wing	Good	Yes	
68	None	4" Gray Cove Base with Tan Mastic	Throughout	Good	No	Approx. 4,000 sf
69		4" Gray Cove Base with Tan Mastic	Throughout	Good	No	
70		4" Gray Cove Base with Tan Mastic	Throughout	Good	No	
71		4" Gray Cove Base with Tan Mastic	Throughout	Good	No	
72		4" Gray Cove Base with Tan Mastic	Throughout	Good	No	
73	None	Brown Rubber Stair Tread with Tan Mastic	UC Lobby, UC-50	Good	No	Approx. 300 sf
74		Brown Rubber Stair Tread with Tan Mastic	UC Lobby, UC-50	Good	No	
75	None	4" Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	Approx. 3,250 sf
76		4" Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	
77		4" Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	
78		4" Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	
79		4" Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	
80	None	4" Brown Cove Base with Tan Mastic	A-wing, C-wing, S-wing	Good	No	Approx. 2,000 sf
81		4" Brown Cove Base with Tan Mastic	A-wing, C-wing, S-wing	Good	No	
82		4" Brown Cove Base with Tan Mastic	A-wing, C-wing, S-wing	Good	No	
83	10% Chysotile	Pipe Elbows/Insulation	UD-35	Good	Yes	Approx. 65 sf
84		Pipe Elbows/Insulation	UD-35	Good	Yes	
85	None	Ceiling Tile 12" x 12" White Pinhole with Fissures	UB-222	Good	Yes	Approx. 125 sf
86		Ceiling Tile 12" x 12" White Pinhole with Fissures	UB-222	Good	Yes	
87	None	4" Thick Brown Cove Base with Tan Mastic	Gym	Good	No	Approx. 2,500 sf
88		4" Thick Brown Cove Base with Tan Mastic	Gym	Good	No	
89		4" Thick Brown Cove Base with Tan Mastic	Gym	Good	No	
90		4" Thick Brown Cove Base with Tan Mastic	Gym	Good	No	
91		4" Thick Brown Cove Base with Tan Mastic	Gym	Good	No	
92	None	4" Red Cove Base with Tan Mastic	Boys and Girls Locker Room	Good	No	Approx. 750 sf
93		4" Red Cove Base with Tan Mastic	Boys and Girls Locker Room	Good	No	
94	None	Ceiling Tile 2'x2' White Solid	A-232, A-234, A-262	Good	Yes	Approx. 475 sf
95		Ceiling Tile 2'x2' White Solid	A-232, A-234, A-262	Good	Yes	
96	None	4" Green Cove Base with Tan Mastic	A-250, LB-109, LD-5, LD-6	Good	No	Approx. 600 sf
97		4" Green Cove Base with Tan Mastic	A-250, LB-109, LD-5, LD-6	Good	No	
98	None	4" Blue Cove Base with Tan Mastic	S-wing	Good	No	Approx. 825 sf
99		4" Blue Cove Base with Tan Mastic	S-wing	Good	No	
100	None	4" Burgundy Cove Base with Tan Mastic	LD-10	Good	No	Approx. 150 sf
101		4" Burgundy Cove Base with Tan Mastic	LD-10	Good	No	
102	None	Light Brown Rubber Stair Tread with Clear Mastic	C-wing Stairs, D-wing Stairs	Good	No	Approx. 1,200 sf
103		Light Brown Rubber Stair Tread with Clear Mastic	C-wing Stairs, D-wing Stairs	Good	No	
	Assumed	Floor Tile 12" x 12" White Speckled with Black Mastic	Throughout	Good	No	Approx. 29,500 sf
	Assumed	Floor Tile 12" x 12" Green Speckled with Black Mastic	Cafeteria, LB-wing, LD-wing	Good	No	Approx. 10,250 sf
	Assumed	Floor Tile 12" x 12" Beige Speckled with Black Mastic	Cafeteria, LB-wing, LD-wing	Good	No	Approx. 1,525 sf
	Assumed	Floor Tile 12" x 12" Blue Speckled with Black Mastic	Cafeteria, LB-wing, LC-wing	Good	No	Approx. 1,500 sf
	Assumed	Floor Tile 12" x 12" Black Speckled with Black Mastic	Stage, LB-wing	Good	No	Approx. 1,500 sf
	Assumed	Asphalt Shingles	Exterior Roof	Good	No	Approx. 12,250 sf
	Assumed	Vinyl Floorsheet White/Gray with Tan Mastic	Kitchen	Good	No	Approx. 1,200 sf
	Assumed	Gray Carpet with Tan Mastic	MP-7	Good	No	Approx. 350 sf
	Assumed	Floor Tile 12" x 12" White/Gray with Black Mastic	UC-wing, UD-wing, MP-2, G-239, G-241	Good	No	Approx. 10,500 sf
	Assumed	Floor Tile 12" x 12" Brown Speckled with Black Mastic	A-wing, UB-wing, C-wing, UD-wing, S-wing	Good	No	Approx. 78,250 sf
	Assumed	Carpet Tile 2' x 2' Brown with Clear Mastic	UC-wing, UD-wing, S-wing	Good	No	Approx. 4,250 sf
	Assumed	Gray/Orange Carpet with Clear Mastic	UB-227	Good	No	Approx. 700 sf
	Assumed	Floor Tile 12" x 12" Yellow with Black Mastic	UB-229	Good	No	Approx. 125 sf

HZW Environmental Consultants, 1234 Weathervane Lane, Suite 110, Akron, Ohio 44313
330-208-2717/ 330-208-2799- Fax

Asbestos Bulk Sample Information Log

Project Name:	City of Tallmadge Asbestos Inspections	HZW Project Number:	A22017-01
Project Address:	89 East Howe Road, Tallmadge, Ohio 44278	Sample Collection Date:	10/25/2022

	Assumed	Floor Tile 9" x 9" Gray with Black Mastic	UC-2	Good	No	Approx. 350 sf
	Assumed	Floor Tile 9" x 9" White/Brown Speckled with Black Mastic	A-215, UC-4, UC-42, UC-54	Good	No	Approx. 1,250 sf
	Assumed	Carpet Tile 2' x 2' Gray with Clear Mastic	UC-wing, UD-wing	Good	No	Approx. 6,500 sf
	Assumed	Carpet Tile 2' x 2' Black with Clear Mastic	LB-wing, UC-wing, UD-wing, Boys and Girls Locker Room	Good	No	Approx. 3,250 sf
	Assumed	Floor Tile 9" x 9" Olive with Black Mastic	UC-14	Good	No	Approx. 350 sf
	Assumed	Carpet Tile 2' x 2' Blue with Clear Mastic	UC-17	Good	No	Approx. 400 sf
	Assumed	Floor Tile 12" x 12" White/Brown Speckled with Black Mastic	A-wing, UB-wing, C-wing, UD-wing	Good	No	Approx. 6,750 sf
	Assumed	Blue/Green Carpet with Tan Mastic	A-wing, UC-wing, UD-wing	Good	No	Approx. 1,750 sf
	Assumed	Floor Tile 12" x 12" Red with Black Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	Approx. 2,000 sf
	Assumed	Floor Tile 9" x 9" Dark Brown with Black Mastic	UC-42	Good	No	Approx. 350 sf
	Assumed	Brown Carpet with Clear Mastic	UB-wing, C-wing	Good	No	Approx. 2,750 sf
	Assumed	Floor Tile 12" x 12" Brown/White Speckled with Black Mastic	A-wing, UC-wing	Good	No	Approx. 3,500 sf
	Assumed	Floor Tile 12" x 12" Brown/Gray Speckled with Black Mastic	UB-wing, UC-wing, UD-wing	Good	No	Approx. 5,250 sf
	Assumed	Red Carpet with Clear Mastic	A-wing, UB-wing, D-wing	Good	No	Approx. 1,500 sf
	Assumed	Floor Tile 9" x 9" White/Black Speckled with Black Mastic	UD-27	Good	No	Approx. 350 sf
	Assumed	Floor Tile 9" x 9" Tan/Brown with Black Mastic	UD-12	Good	No	Approx. 350 sf
	Assumed	Floor Tile 12" x 12" Blue with Black Mastic	Boys and Girls Locker Room, S-119	Good	No	Approx. 475 sf
	Assumed	Black Carpet with Clear Mastic	A-201, LC-1, Door 6	Good	No	Approx. 1,000 sf
	Assumed	Blue Carpet with Clear Mastic	A-wing, LC-2	Good	No	Approx. 5,750 sf
	Assumed	Light Brown Carpet with Clear Mastic	A-wing	Good	No	Approx. 1,200 sf
	Assumed	Carpet Tile 2' x 2' Multicolor with Clear Mastic	A-wing, LB-wing, S-wing	Good	No	Approx. 2,250 sf
	Assumed	Multicolor Carpet with Clear Mastic	A-wing, LB-wing, LC-wing	Good	No	Approx. 975 sf
	Assumed	Blue Speckled Carpet with Clear Mastic	A-244, A-249	Good	No	Approx. 750 sf
	Assumed	Carpet Tile 2' x 2' Brown/Gray with Clear Mastic	S-wing	Good	No	Approx. 1,350 sf
	Assumed	Orange Carpet with Clear Mastic	S-212	Good	No	Approx. 400 sf
	Assumed	Carpet Tile 2' x 2' Brown/Purple with Clear Mastic	LC-8	Good	No	Approx. 400 sf
	Assumed	Carpet Tile 2' x 2' Brown/Orange with Clear Mastic	LC-wing	Good	No	Approx. 1,275 sf
	Assumed	Water Fountain Gaskets	Throughout	Good	No	9 Water Fountains
	Assumed	Vinyl Floorsheet Brown with Clear Mastic	A-221	Good	No	Approx. 125 sf
	Assumed	Brown Swirl Carpet with Clear Mastic	A-230	Good	No	Approx. 400 sf
	Assumed	Asphalt Roof and Underlayment	Exterior Roof	Good	No	Approx. 97,000 sf

NOTES.

Red text is friable or may become friable RACM and must be abated before demolition of the structure.

Sample Locations

EMERGENCY LOCATION MAP
MAIN FLOOR

C-WING

D-WING

B-WING

A-WING

You Are Here

R.N.

Multi-Purpose Room

Stage

Gym

Pool

Boy's Locker Room

Girl's Locker Room

Computer Lobby

PRIMARY EXIT

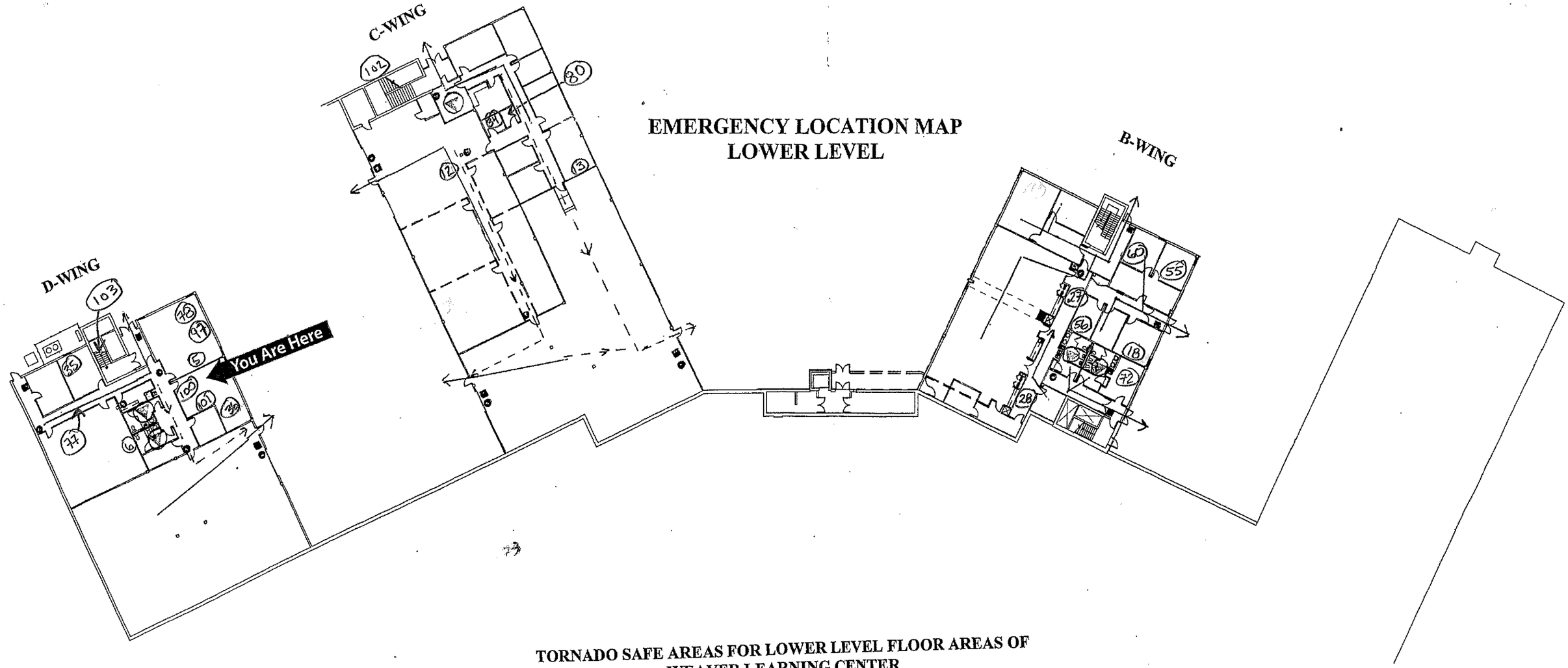
SECONDARY EXIT

FIRE ALARM PULL STATION

FIRE EXTINGUISTER

TORNADO SAFE AREA

EMERGENCY LOCATION MAP
LOWER LEVEL



TORNADO SAFE AREAS FOR LOWER LEVEL FLOOR AREAS OF WEAVER LEARNING CENTER

OFFICE/WORK/ CONFERENCE AREA	TORNADO SAFE AREAS
Lower Level B-Wing	Men's & Women's Restrooms
Lower Level C-Wing	Plant Operation's Secretary's Office
Lower Level D-Wing	Men's & Women's Restrooms

PRIMARY EXIT

SECONDARY EXIT

FIRE ALARM PULL STATION

FIRE EXTINGUISTER

TORNADO SAFE AREA

HZW Environmental Consultants
1234 Weathervane Lane, Suite 110, Akron, OH 44313
phone 330-208-2717 - 800-804-8484
fax 330-208-2799
A WOMAN OWNED BUSINESS ENTERPRISE

PROJECT 89 E Howe Rd. Tallmadge
PROJECT NO. A2201701
DATE 10.25.22 PAGE 1 OF ___
HZW REPRESENTATIVE RS

FACILITY CONSTRUCTION INFORMATION

Dimensions		Attic	No
Basement	No		
Exterior Const.	Masonary block		
Other Structures			

NOTES: Flat asphalt roof
asphalt shingles on eaves

SUSPECT MATERIAL SUMMARY

Sample #	DESCRIPTION AND LOCATION OF SUSPECT BUILDING MATERIALS	Quantity
1 ✓ 1-21 LC	Drywall system w/ JC walls A200, 201-212-216 throughout, UC 32, 29, 7, 26, 10, 23, 20 A217-220, 230-240, 250-253, 241-243, 244, 245-248, S207-206 UD, 31, 30, 2, 23, 20, 5, 8, 17, 14, 11, UB201-210, 220, 217, 212,	Throughout 125,000
✓ 22-28	Tan Cove Base w/ tan mastic Ahall, Shall, S212 Caf, UC Hall, UC 35, 4, 14, 17, 54 UD hall, 23, UB 214	8,650
Ass	FT 12"x12" white speckled w/ black mastic Caf, UC hall, UB hall, Ahall, Shall, Door 15, LB hall, 109C 110, LB hall, stairs, LD hall,	29,500
Ass	FT " " green speckled Caf, LB 110, LD Hall	10,250
Ass	FT " " Beige speckled Caf, UD 33, 32	1,525
Ass	FT " " Blue speckled Caf, LB 109, C 5	1,500
29-49 LC UD	CT 2'x4' white pinhole w/ fissures Caf, UC Hall, UC 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 56, UD Hall 245-248, S210, 211, Shall, LB 106, 108, 109, 103-105, 100, 110 UB 226, G239, 241, Ahall, 200, 201-212, 213-220, 226, 228, 241, 243	110,000
	FT 12"x12" Black w/ mastic Stage, LB hall	1,500
✓ 50-56	Black Cove base w/ tan mastic Stage, UC 2, 32, 29, 26, 23, 20, 17, 37, 42, 41, 46, 50, 52, UD 33, 32 S207, LB 106-108, 103-105, 100 B/G LR, G239, 241, 213 UD 31, 30, 27, 2, 23, 20, 5, 8, 17, 14, 11, UB 201-210, 220, 217, 215, 226, 228	8,000
Ass	Asphalt Shingles Exterior	12,250
57-58	Black rubber stair tread w/ clear mastic Stage,	125
Ass	Floorsheet vinyl white/gray w/ tan mastic Kit,	1,200
Ass	Gray carpet w/ tan mastic MP-7,	350
✓ 59-60	Duct insulation Kit, LD112	145
Ass	FT 12"x12" white/gray w/ black mastic MP-2, UC Hall, UD hall, G239, 241	10,500
Ass	FT 12"x12" brown speckled w/ black UC Hall, UD hal, A219, Ahall, Shall, LC4, Bhall, stair	78,250
ASS	Brown 2'x2' Carpet Tile w/ clear mastic UC-2, 23, 20, 46, UD 30, 24, 1, 23, 5, 17, S218, 217-213	4,250

NOTE: Quantities are approximate and listed in (ft^2). "TSM" = Textured Surfacing Material. "FT" = Floor Tile. "FS" = Floor Sheet. "CT" = Ceiling Tile.

Gray/orange carpet UB 227 700
5 FT 15"x15" Yellow w/ black mastic UB 229 125

HZW Environmental Consultants
1234 Weathervane Lane, Suite 110, Akron, OH 44313
phone 330-208-2717 - 800-804-8484
fax 330-208-2799
A WOMAN OWNED BUSINESS ENTERPRISE

PROJECT _____
PROJECT NO. _____
DATE _____ PAGE ___ OF ___
HZW REPRESENTATIVE _____

FACILITY CONSTRUCTION INFORMATION

Dimensions		Attic		NOTES:
Basement				
Exterior Const.				
Other Structures				

SUSPECT MATERIAL SUMMARY

Sample #	DESCRIPTION AND LOCATION OF SUSPECT BUILDING MATERIALS	Quantity
61	FT 9"x9" gray w/ black mastic UC7,	350
	FT 9"x9" white brown speck w/ black mastic UC 4, 42, 54, A215	1,250
	2'x2' Gray carpet tile w/ clear mastic UC 32, 29, 7, 26, Clobby, 41, 43, 47, 48, 52, UD33, 2, 20, 8, 14, 11, 243, 246-248	6,500
61-67 ✓	3'x4' Mesh ~~fiberboard~~ cork board wall w/ black mastic UC 4, 14, 17, UD 27, 26, A212, S200, 202, 218, 217-213 C9	11,000
68-72 ✓	Gray cove base w/ tan mastic UC 7, 10, UC lobby, 42, 44, UD1, UB212, A217, 218, 263, Doors 15, LB.113 264, 252, 243, 244, 245-248, S219, 218, 217-213, 206, 208, 210, 211, LB.110	4,000
	Black 2'x2' carpet tile w/ clear mastic UC10, 42, 44, UD 27, B/G LR, S207, LB 103, 104, 103, 00	3,250
	FT 9"x9" olive w/ black mastic UC 14	350
	2'x2' Carpet tile blue w/ clear mastic UC 17,	400
73-74 ✓	Brown stairtread w/ tan mastic UC lobby, 50	300
	FT 12"x12" white brown speck w/ black mastic UC37, Door 2, 47 hall, UD 23, 9, 17, 14, UB 201-210, A226, 228, LC hall	6,750
	Blue green carpet w/ ~~clear~~ tan mastic UC 37, UD31, UD 27, UD20, A216	1,750
	FT 12"x12" red w/ black mastic UC 39, 40, UB226, S200, S202, LD10	2,000
75-79 ✓	Light tan cove base ~~clear~~ tan mastic UC 39, 40, 47, 53, UB226, S200, 202, LD hall, LD	3,250
	FT 9"x9" Dark brown w/ black mastic UC 42	350
	Brown carpet w/ clear mastic UC. 42, 53, UB220, 217, 215, LC 5, 6, 7	2,750
	FT 12"x12" brown white speckled w/ black mastic Door 2, 47 hall, A hall	3,500
80-82 ✓	Brown cove base w/ tan mastic UC 47 hall, 48, A hall (217-220), 236-240, S219, LC FR's IDH	2,000

NOTE: *Quantities are approximate and listed in (ft²). "TSM" = Textured Surfacing Material. "FT" = Floor Tile. "FS" = Floor Sheet. "CT" = Ceiling Tile.*

FT 12"x12" Brown speckled w/ black mas UC/UD hall; UB hall 5,250

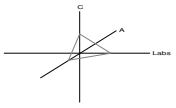
83-84	* Pipe elbows/insulation	UD 35,	65
	Red carpet w/ clear	UD 30, UB 212, A262, LD 1	1,500
	FT 9"x9" white black speck w/ black mas	UD 27	350
	FT 9"x9" tan brown speck black mastic	UD-12	350
85-86	VCT 12"x12" White marble w/ fissures	UB 222	125
87-91	Thick Brown cove base w/ tan mastic	Gym	2,500
92-93	Red cove base w/ tan mast	Boy LR, G LR	750
	FT 12"x12" blue w/ black mas	B/G LR, 9219	475
	Black carpet w/ clear mastic	Door 6, A201, LC1,	1,000
	Blue carpet Brown " "	A201-212, 213-214, 217, 218, 220, 249, LC2,	5,750
	light brown carpet w/ " "	A hall btwn 216-220	1,200
	Vinyl Floorshed	A221	125
94-95	VCT 2'x2' White marble solid	A262, 231, 232	1,000
	Brown swirl carpet	A230 area,	400
	2'x2' carpet tile multicolor	A236 area, S203, 204, 205, LB106, 109, 113	2,250
	Multicolor carpet	A250 area, LB hall, LC9	975
96-97	Green cove base	A250 area, LB 109, LD 5, 6	600
	Blue speckled carpet	A249, 244	750
98-99	Blue cove base	S hall, S203, 204, 205	825
	2'x2' brown gray carpet tile	S206, 208, 210, 211	1,350
	Orange carpet	S212	400
	2'x2' Brown purple carpet tile	LC8	400
	Brown orange 2'x2' carpet tile	LD 8, 3, 2	1,275
100-101	* Burgundy cove base	LD 10	150
	Water Fountain	LB, LC, LD, UD, UB, UC, A, S, BLC, GLC	50
102-103	Light Brown stair tread w/ clear mastic	LD, LC, stairs	1,200

ATTACHMENT 3

LABORATORY ANALYTICAL REPORT FOR BULK SAMPLES COLLECTED

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634



NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Materials Characterization - Bulk Asbestos Analysis

Laboratory Analysis Report - Polarized Light

HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Attn: Rob Settle
Customer Project: 89 East Howe Road, Tallmadge, OH 44278
Reference #: CBR22108352 Date: 11/1/2022

Analysis and Method

Summary of polarizing light microscopy (PLM / Stereomicroscopy bulk asbestos analysis) using the methods described in 40CFR Part 763 Appendix E to Subpart E (Interim and EPA 600 / R-93 / 116 (Improved). The sample is first viewed with the aid of stereomicroscopy. Numerous liquid slide preparations are created for analysis under the polarized microscope where identifications and quantifications are preformed. Calibrated liquid refractive oils are used as liquid mouting medium. These oils are used for identification (dispersion staining). A calibrated visual estimation is reported, should any asbestiform mineral be present. Other techniques such as acid washing are used in conjugation with refractive oils for detection of smaller quantities of asbestos. All asbestos percentages are based on calibrated visual estimation traceable to NIST standards for regulated of asbestos. Traceability to measurement and calibration is achieved by using known amounts and types of asbestos from standards where analyst and laboratory accuracy are measured. As little as 0.001% asbestos can be detected in favorable samples, while detection in unfavorable samples may approach the detection limit of 0.50% (well above the laboratory definition of trace).

Discussion

Vermiculite containing samples may have trace amounts of actinolite-tremolite, where not found be PLM should be analyzed using TEM methods and / or water separation techniques. Suspected actinolite/vermiculite presence will be indicated through the sample comment section of this report.

Fibrous talc containing samples may even contain a related asbestos fiber known as anthophyllite. Under certain conditions the same fiber may actually contain both talc and anthophyllite (a phenomenon called intergrowth). Again, TEM detection methods are recommended. CA Labs PLM report comments will denote suspected amounts of asbestiform anthophyllite with talc, where further analysis is recommended.

Some samples (floor tiles, surfacings, etc.) may contain fibers too small to be detectable by PLM analysis and should be analyzed by TEM bulk protocols.

A "trace asbestos" will be reported if the analyst observes far less than 1% asbestos. CA Labs defines "trace asbestos" as a few fibers detected by the analyst in several preparations and will indicate as such under these circumstances.

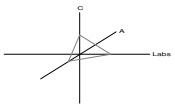
Quantification of <1% will actually be reported as <=1% (allowable variance close to 1% is high). Such results are ideal for point counting, and the technique is mandatory for friable samples (NESHAP, Nov. 1990 and clarification letter 8 May 1991) under 1% percent asbestos and the "trace asbestos". **In order to make all initial PLM reports issued from CA Labs NESHAP compliant, all <1% asbestos results (except floor tiles) will be point counted at no additional charge.**

Qualifications

CA Labs is accredited by the National Voluntary Accreditation Program (NVLAP) for selected test methods for airborne fiber analysis (TEM), and for bulk asbestos fiber analysis (PLM). All analysts have a college degree in a natural science (geology, biology, or environmental science) or are recognized by a state professional board in one these disciplines .Extensive in-house training programs are used to augment education background of the analyst. The group leader of polarized light has received supplemental McCrone Research training for asbestos identification. This report is not covered by the scope of AIHA accreditation. Analysis performed at CA Labs, LLC 12232 Industriplex, Suite 32 Baton Rouge, LA 70809.

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634



NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Overview of Project Sample Material Containing Asbestos

Customer Project: 89 East Howe Road, Tallmadge, OH 44278 **CA Labs Project #:** CBR22108352

Sample #	Layer #	Analysts Physical Description of Subsample	Asbestos type / calibrated visual estimate percent	List of Affected Building Material Types
				White Wrap on Foil
83	*83-1*	*White Wrap on Foil*	***10% Chrysotile***	

Glossary of abbreviations (non-asbestos fibers and non-fibrous minerals):

ca - carbonate	pe - perlite	fg - fiberglass	pa - palygorskite (clay)
gypsum - gypsum	qu - quartz	mw - mineral wool	
bi - binder		wo - wollastinite	
or - organic		ta - talc	
ma - matrix		sy - synthetic	
mi - mica		ce - cellulose	
ve - vermiculite		br - brucite	
ot - other		ka - kaolin (clay)	

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
1		*1-1*	*Gray Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		1-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
2		*2-1*	*Gray Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		2-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
3		*3-1*	*Gray Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		3-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
4		*4-1*	*Gray Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		4-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
5		*5-1*	*Gray Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		5-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
6		*6-1*	*Gray Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		6-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
7		*7-1*	*Gray Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		7-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
8		*8-1*	*Red Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		8-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
9		*9-1*	*Red Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		9-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
10		*10-1*	*Red Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		10-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
11		*11-1*	*Red Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		11-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
12		*12-1*	*Red Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		12-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
13		*13-1*	*Red Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		13-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
14		*14-1*	*Red Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		14-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
15		*15-1*	*Tan Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		15-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
16		*16-1*	*Tan Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		16-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
17		*17-1*	*Tan Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		17-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
18		*18-1*	*Tan Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		18-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
19		*19-1*	*Tan Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		19-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
20		*20-1*	*Tan Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		20-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy
21		*21-1*	*Tan Textured Surfacing*	*N*	***None Detected***		100% qu, mi, bi, ca
		21-2	*White Drywall with Paper*	*N*	***None Detected***	10% ce	90% qu, gy

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
22		*22-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		22-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
23		*23-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		23-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
24		*24-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		24-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
25		*25-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		25-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
26		*26-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		26-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
27		*27-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		27-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
28		*28-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		28-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
29		*29-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		29-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
30		*30-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		30-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
31		*31-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		31-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
32		*32-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		32-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
33		*33-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		33-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
34		*34-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		34-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
35		*35-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		35-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
36		*36-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		36-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
37		*37-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		37-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
38		*38-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		38-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
39		*39-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		39-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
40		*40-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		40-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
41		*41-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		41-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
42		*42-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		42-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
43		*43-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		43-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
44		*44-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		44-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
45		*45-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		45-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
46		*46-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		46-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
47		*47-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		47-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
48		*48-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		48-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
49		*49-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		49-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
50		*50-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		50-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
51		*51-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		51-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
52		*52-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		52-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
53		*53-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		53-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
54		*54-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		54-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
55		*55-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		55-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
56		*56-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		56-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
57		*57-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		57-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
58		*58-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		58-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
59		*59-1*	*White Surfaced Gray Felt*	*N*	***None Detected***	90% ce	10% qu, ma, bi
60		*60-1*	*White Surfaced Gray Felt*	*N*	***None Detected***	90% ce	10% qu, ma, bi
61		*61-1*	*White Surfaced Gray Felt*	*N*	***None Detected***	90% ce	10% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
62		*62-1*	*White Surfaced Gray Felt*	*N*	***None Detected***	90% ce	10% qu, ma, bi
63		*63-1*	*White Surfaced Brown Paneling*	*N*	***None Detected***	90% ce	10% qu, ma, bi
64		*64-1*	*White Surfaced Brown Paneling*	*N*	***None Detected***	90% ce	10% qu, ma, bi
65		*65-1*	*White Surfaced Brown Paneling*	*N*	***None Detected***	90% ce	10% qu, ma, bi
66		*66-1*	*White Surfaced Brown Paneling*	*N*	***None Detected***	90% ce	10% qu, ma, bi
67		*67-1*	*White Surfaced Brown Paneling*	*N*	***None Detected***	90% ce	10% qu, ma, bi
68		*68-1*	*Gray Cove Base*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		68-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
69		*69-1*	*Gray Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		69-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
70		*70-1*	*Gray Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		70-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
71		*71-1*	*Gray Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		71-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
72		*72-1*	*Gray Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		72-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
73		*73-1*	*Gray Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		73-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
		73-3	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
74		*74-1*	*Gray Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		74-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		74-3	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
75		*75-1*	*White Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		75-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
76		*76-1*	*White Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		76-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
77		*77-1*	*White Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		77-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
78		*78-1*	*White Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		78-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
79		*79-1*	*White Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		79-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
80		*80-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		80-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
81		*81-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		81-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
82		*82-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		82-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
83		*83-1*	*White Wrap on Foil*	*N*	***10% Chrysotile***		90% ot, qu, ma, bi, ca
	4	*83-2*	*Yellow Insulation*	*Y*			
84		*84-1*	*White Wrap on Foil*	*N*	*Positive Stop*		
	4	*84-2*	*Yellow Insulation*				

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
85		*85-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		85-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
86		*86-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		86-2	*Gray Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
87		*87-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
88		*88-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
89		*89-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
90		*90-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
91		*91-1*	*Brown Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
92		*92-1*	*Red Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		92-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
93		*93-1*	*Red Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		93-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
94		*94-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		94-2	*Tan Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
95		*95-1*	*White Surfacing*	*Y*	***None Detected***		100% qu, ma, bi
		95-2	*Tan Ceiling Tile*	*Y*	***None Detected***	5% fg 10% ce	85% qu, ma
96		*96-1*	*Green Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		96-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
97		*97-1*	*Green Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		97-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
98		*98-1*	*Blue Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		98-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
99		*99-1*	*Blue Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		99-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
100		*100-1*	*Red Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
		100-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
101		*101-1*	*Red Cove Base*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

CA Labs
Dedicated to Quality

CA Labs, L.L.C.
12232 Industriplex, Suite 32
Baton Rouge, LA 70809
Phone 225-751-5632
Fax 225-751-5634

NVLAP #200772-0
TDSHS #300370
CDPHE #AL-18111
LELAP #03069

Polarized Light Asbestiform Materials Characterization

Customer Info: **Attn:** Rob Settle
HzW Environmental
1234 Weathervane Lane, Suite 110
Akron, OH 44313

Phone # 330-208-2717
Fax # 330-208-2799

Customer Project:
89 East Howe Road,
Tallmadge, OH 44278

Turnaround Time: 3 day

CA Labs Project #:
CBR22108352

Date: 11/1/2022
Samples Received: 10/27/2022
Date Of Sampling: 10/25/2022
Purchase Order #: A22017-01

Sample #	Comment	Layer #	Analysts Physical Description of Subsample	Homogeneous (Y/N)	Asbestos type / calibrated visual estimate percent	Non-asbestos fiber type / percent	Non-fibrous type / percent
		101-2	*Yellow Mastic*	*Y*	***None Detected***		100% qu, bi
102		*102-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi
103		*103-1*	*Tan Cove Base*	*Y*	***None Detected***		100% qu, ma, bi

Analysis Method: Interim (40CFR Part 763 Appendix E to Subpart E) / Improved (EPA-600 / R-93/116)
Preparation Method: HCL acid washing for carbonate based samples, chemical reduction for organically bound components, oil immersion for identification of asbestos types by dispersion attaining / becke line method.

ca - carbonate	mi - mica	fg - fiberglass	ce - cellulose
gypsum - gypsum	ve - vermiculite	mw - mineral wool	br - brucite
bi - binder	ot -other	wo - wollastinite	ka - kaolin (clay)
or - organic	pe - perlite	ta - talc	pa - palygorskite (clay)
ma - matrix	qu - quartz	sy - synthetic	

Approved Signatories:

John Grout
Analyst

Senior Analyst
Alicia Stretz

Laboratory Director
Chris Williams

1. Fire Damage significant fiber damage - reported percentages reflect unaltered fibers
2. Fire Damage no significant fiber damages effecting fibrous percentages
3. Actinolite in association with Vermiculite
4. Layer not analyzed - attached to previous positive layer and contamination is suspected
5. Not enough sample to analyze
6. Anthophyllite in association with Fibrous Talc
7. Contamination suspected from other building materials
8. Favorable scenario for water separation on vermiculite for possible analysis by another method
9. < 1% Result point counted positive
10. TEM analysis suggested

HZW Environmental Consultants, 1234 Weathervane Lane, Suite 116, Akron, Ohio 44313
330-208-2717/ 330-208-2799- Fax

CBR22108352

Asbestos Bulk Sample Chain of Custody

Project Name:	City of Tallmadge Asbestos Inspections	HZW Project Number:	A22017-01
Project Address:	89 East Howe Road, Tallmadge, Ohio 44278	Sample Collection Date:	10/25/2022

Sample #	HA	Material Description	Location	Condition	Friable (Y/N)	Comment
1		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
2		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
3		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
4		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
5		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
6		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
7		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
8		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
9		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
10		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
11		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
12		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
13		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
14		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
15		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
16		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
17		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
18		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
19		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
20		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
21		Drywall Wall System with Joint Compound	Throughout	Good	Yes	Stop at First Positive
22		Tan Cove Base with Tan Mastic	A-wing, UB-wing, UC-wing, UD-wing, S-wing, Cafeteria	Good	No	Stop at First Positive
23		Tan Cove Base with Tan Mastic	A-wing, UB-wing, UC-wing, UD-wing, S-wing, Cafeteria	Good	No	Stop at First Positive
24		Tan Cove Base with Tan Mastic	A-wing, UB-wing, UC-wing, UD-wing, S-wing, Cafeteria	Good	No	Stop at First Positive
25		Tan Cove Base with Tan Mastic	A-wing, UB-wing, UC-wing, UD-wing, S-wing, Cafeteria	Good	No	Stop at First Positive
26		Tan Cove Base with Tan Mastic	A-wing, UB-wing, UC-wing, UD-wing, S-wing, Cafeteria	Good	No	Stop at First Positive
27		Tan Cove Base with Tan Mastic	A-wing, UB-wing, UC-wing, UD-wing, S-wing, Cafeteria	Good	No	Stop at First Positive
28		Tan Cove Base with Tan Mastic	A-wing, UB-wing, UC-wing, UD-wing, S-wing, Cafeteria	Good	No	Stop at First Positive
29		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
30		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
31		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
32		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
33		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
34		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
35		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
36		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
37		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
38		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
39		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
40		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
41		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
42		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
43		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
44		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
45		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
46		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
47		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
48		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
49		Ceiling Tile 2' x 4' Pinhole with Fissures	Throughout	Good	Yes	Stop at First Positive
50		Black Cove Base with Tan Mastic	UC-wing, UD-wing, S-wing, Stage	Good	No	Stop at First Positive
51		Black Cove Base with Tan Mastic	UC-wing, UD-wing, S-wing, Stage	Good	No	Stop at First Positive
52		Black Cove Base with Tan Mastic	UC-wing, UD-wing, S-wing, Stage	Good	No	Stop at First Positive
53		Black Cove Base with Tan Mastic	UC-wing, UD-wing, S-wing, Stage	Good	No	Stop at First Positive
54		Black Cove Base with Tan Mastic	UC-wing, UD-wing, S-wing, Stage	Good	No	Stop at First Positive
55		Black Cove Base with Tan Mastic	UC-wing, UD-wing, S-wing, Stage	Good	No	Stop at First Positive
56		Black Cove Base with Tan Mastic	UC-wing, UD-wing, S-wing, Stage	Good	No	Stop at First Positive

10:30

Carolin Reaves 10/27/22

HZW Environmental Consultants, 1234 Weathervane Lane, Suite 110, Akron, Ohio 44313
330-208-2717/ 330-208-2799- Fax

UBR221083S2

57		Black Rubber Stair Tread with Clear Mastic	Stage	Good	No	Stop at First Positive
58		Black Rubber Stair Tread with Clear Mastic	Stage	Good	No	Stop at First Positive
59		Duct Insulation	Kitchen, LB-112	Good	No	Stop at First Positive
60		Duct Insulation	Kitchen, LB-112	Good	No	Stop at First Positive
61		Mesh Corkboard Wall with Black Mastic	A-wing, UC-wing, S-wing	Good	Yes	Stop at First Positive
62		Mesh Corkboard Wall with Black Mastic	A-wing, UC-wing, S-wing	Good	Yes	Stop at First Positive
63		Mesh Corkboard Wall with Black Mastic	A-wing, UC-wing, S-wing	Good	Yes	Stop at First Positive
64		Mesh Corkboard Wall with Black Mastic	A-wing, UC-wing, S-wing	Good	Yes	Stop at First Positive
65		Mesh Corkboard Wall with Black Mastic	A-wing, UC-wing, S-wing	Good	Yes	Stop at First Positive
66		Mesh Corkboard Wall with Black Mastic	A-wing, UC-wing, S-wing	Good	Yes	Stop at First Positive
67		Mesh Corkboard Wall with Black Mastic	A-wing, UC-wing, S-wing	Good	Yes	Stop at First Positive
68		Gray Cove Base with Tan Mastic	A-wing, UC-wing, UD-wing	Good	No	Stop at First Positive
69		Gray Cove Base with Tan Mastic	A-wing, UC-wing, UD-wing	Good	No	Stop at First Positive
70		Gray Cove Base with Tan Mastic	A-wing, UC-wing, UD-wing	Good	No	Stop at First Positive
71		Gray Cove Base with Tan Mastic	A-wing, UC-wing, UD-wing	Good	No	Stop at First Positive
72		Gray Cove Base with Tan Mastic	A-wing, UC-wing, UD-wing	Good	No	Stop at First Positive
73		Brown Rubber Stair-Tread with Tan Mastic	UC-lobby	Good	No	Stop at First Positive
74		Brown Rubber Stair-Tread with Tan Mastic	UC-lobby	Good	No	Stop at First Positive
75		Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	Stop at First Positive
76		Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	Stop at First Positive
77		Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	Stop at First Positive
78		Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	Stop at First Positive
79		Light Tan Cove Base with Tan Mastic	UB-wing, UC-wing, LD-wing, S-wing	Good	No	Stop at First Positive
80		Brown Cove Base with Tan Mastic	A-wing, UC-wing, LC-wing	Good	No	Stop at First Positive
81		Brown Cove Base with Tan Mastic	A-wing, UC-wing, LC-wing	Good	No	Stop at First Positive
82		Brown Cove Base with Tan Mastic	A-wing, UC-wing, LC-wing	Good	No	Stop at First Positive
83		Pipe Elbows	UD-35	Good	Yes	Stop at First Positive
84		Pipe Elbows	UD-35	Good	Yes	Stop at First Positive
85		Ceiling Tile 12"x 12" Pinhole with Fissures	UB222	Good	Yes	Stop at First Positive
86		Ceiling Tile 12"x 12" Pinhole with Fissures	UB222	Good	Yes	Stop at First Positive
87		Brown Cove Base (Thick) with Tan Mastic	Gym	Good	No	Stop at First Positive
88		Brown Cove Base (Thick) with Tan Mastic	Gym	Good	No	Stop at First Positive
89		Brown Cove Base (Thick) with Tan Mastic	Gym	Good	No	Stop at First Positive
90		Brown Cove Base (Thick) with Tan Mastic	Gym	Good	No	Stop at First Positive
91		Brown Cove Base (Thick) with Tan Mastic	Gym	Good	No	Stop at First Positive
92		Red Cove Base with Tan Mastic	Boys Locker Room, Girls Locker Room	Good	No	Stop at First Positive
93		Red Cove Base with Tan Mastic	Boys Locker Room, Girls Locker Room	Good	No	Stop at First Positive
94		Ceiling Tile 2'x 2' Solid	A262, A234, A232	Good	Yes	Stop at First Positive
95		Ceiling Tile 2'x 2' Solid	A262, A234, A232	Good	Yes	Stop at First Positive
96		Green Cove Base with Tan Mastic	A-wing, LB-wing, LD-wing	Good	No	Stop at First Positive
97		Green Cove Base with Tan Mastic	A-wing, LB-wing, LD-wing	Good	No	Stop at First Positive
98		Blue Cove Base with Tan Mastic	S-wing	Good	No	Stop at First Positive
99		Blue Cove Base with Tan Mastic	S-wing	Good	No	Stop at First Positive
100		Burgundy cove Base with Tan Mastic	LD10	Good	No	Stop at First Positive
101		Burgundy cove Base with Tan Mastic	LD10	Good	No	Stop at First Positive
102		Brown Rubber Stair Tread with Clear Mastic	LC Stairs, LD Stairs	Good	No	Stop at First Positive
103		Brown Rubber Stair Tread with Clear Mastic	LC Stairs, LD Stairs	Good	No	Stop at First Positive

Type of Analysis:	PLM	TEM	Point Count	Stop at First Positive	Turn Around Time:	Three (3) Day Turn

Fax Results- 330-208-2799

Email Results- kreaman@hzwenv.com; ckowalski@hzwenv.com

Relinquished by: (sign & print name)	Robert Suttle	Date: 10-26-22
Received by:		Date: 10/27/22 10:30