



TTI ENVIRONMENTAL, INC.
Consulting & Contracting

1253 North Church Street, Moorestown, NJ 08057
www.ttienv.com o 856-840-8800 f 856-840-8815

September 23, 2024

Mr. Scott Krisanda, M.Ed., CEFM
Director of Facilities
Pemberton Township Schools
125B Trenton Road
Browns Mills, NJ 08015

Reference: Initial Mold Inspection and Testing
Pemberton Township - Samuel T Busansky School – Room 106, 201 & 308
16 Scrapetown Rd, Pemberton, NJ 08068
TTI Project Number 24-1322

Dear Mr. Krisanda:

Thank you for selecting TTI Environmental, Inc. (TTI) for your environmental needs. This correspondence is being forwarded to provide the findings and results of the initial mold inspection conducted at the above referenced property which included Rooms 106, 201 & 308.

1.0 Background

TTI arrived on site on September 20, 2024 and was provided with general information on the area of concern. The property is a public elementary school building which was occupied at the time of the inspection and is located at 16 Scrapetown Road, Pemberton, New Jersey. The mold inspection included Rooms 106, 201 and 308. Samples collected from the clearance inspection of Room 109 are discussed under a separate letter. TTI's inspection was performed using a high lumen flashlight, humidity/temperature meter, and a thermal camera.

The building is one story constructed of concrete slab floor with vinyl tile, cinder block walls, drop ceiling with an HVAC unit in the room.

The onsite assessment was conducted by the following personnel: Mr. Timothy Popp, Vice President of Consulting for TTI. In addition to the visual inspection, TTI collected one (1) air sample from inside each room and one from outside the building as a comparison sample.

Observations

Room 106, 201 & 308 were inspected because of staff concerns. TTI conducted a visual inspection of the rooms building components and contents which identified normal school conditions like minor spots of mold growth by trash can, under a table, food/liquid spillage on a closet, art easel and a teacher's chair. The temperature level in these classrooms was normal, and the relative humidity was below 60% and lower than the outside level.

Room/Area	Temperature	Relative Humidity
Room 106	75.8	49.6
Room 201	71.0	57.4
Room 308	72.4	58.8
Outside	69.5	76.9
Recommended Ranges	68-79	>30 & <60%

2.0 Sampling Methods and Sample Locations

A fungal spore trap air sample was collected from within Rooms 106, 201 & 308 and the outside as a comparison sample. All laboratory analysis was performed by EMSL Analytical Inc. Cinnaminson, New Jersey, a certified AIHA NVLAP Laboratory. The analytical test report is attached in Appendix A. A description of sample methodology is described below:



Fungal Spore Trap Air Samples

Fungal spore trap air samples are collected by using an Air-O-Cell™ cassette attached to a high-volume vacuum pump. A volume of air is drawn through the cassette and the contents of the air are deposited upon a specially treated glass slide, which is then analyzed by a mycologist who identifies fungal types and quantity. Fungal spore trap air samples measure both viable and non-viable fungal spores as well as fungal parts and fragments. Fungal spore trap air samples are collected from the outdoors to be used as a comparison to the inside samples. There are currently no standards of reference ranges for acceptable levels of airborne microorganisms when interpreting fungal air sample results, just guidance. It is generally accepted that indoor airborne fungal concentrations should be approximately the same as found outdoors and display similar genus distribution. Elevated indoor airborne fungal concentrations as compared to outdoor concentrations are often an indicator of a fungal amplification source due to moisture conditions.

Table 2.0: Fungal Spore Trap Air Sample Results Summary

Sample Number	Location	Total Airborne Fungal Concentration (fs per m ³)	Dominant Fungi Detected			Fungal Genera of Concern Detected		
			Fungal Species and/or Fungal Parts	Concentration (fs per m ³)	Percent of Total Sample	Fungal Species	Concentration (fs per m ³)	Percent of Total Sample
A-2	Room 106	1,180	Basidiospores	660	55.9	Aspergillus/ Penicillium	480	40.7
A-3	Room 308	790	Basidiospores	740	93.7	Aspergillus/ Penicillium	40	5.1
A-4	Room 201	780	Basidiospores	480	61.5	Aspergillus/ Penicillium	300	38.5
A-5	Outside	4,850	Basidiospores	20,900	84.4	Aspergillus/ Penicillium	300	6.2

fs/m³: fungal structures per cubic meter ND: Non-detected

The total airborne fungal concentration level of the sample collected inside Rooms 106, 201, & 308 were lower than the outside sample. The individual mold species detected in the air sample collected inside were similar to the outside and did not identify any one species to be greater than 800 fs per m³.



Conclusions & Recommendations

- The in-depth visual inspection of Room 106, 201 & 308 did not reveal any significant surface mold growth on building components and contents. The minor mold growth observed was a normal school condition. The humidity level in each of the classrooms was below 60% which prevents humidity related mold growth.
- The fungal air sample collected in each room did not indicate an air borne mold issue within the space at this time.
- Based on the information provided and TTI's site inspection results TTI recommends that no further investigation is required in these rooms at this time.
- In order to reduce the possibility of humidity related mold it is important to clean, prevent stagnant air and maintain humidity levels below 60%.
- A copy of this should be maintained in the buildings IAQ Plan and any noted corrective actions taken.

We appreciate the opportunity for allowing TTI to provide you with environmental consulting services. If you should have any questions, please feel free to contact us at any time.

Sincerely,
TTI ENVIRONMENTAL, INC.

Timothy Popp
Vice President of Consulting

Appendix A:
Analytical Test Reports



EMSL Analytical, Inc.

200 Route 130 North Cinnaminson, NJ 08077
Tel/Fax: (800) 220-3675 / (856) 786-0262
<http://www.EMSL.com> / cinmicrolab@emsl.com

EMSL Order: 372416056
Customer ID: TTIE54
Customer PO: 039729
Project ID:

Attention: Tim Popp
TTI Environmental Inc.
1253 North Church Street
Moorestown, NJ 08057

Phone: (856) 840-8800
Fax: (856) 840-8815
Collected Date: 09/20/2024
Received Date: 09/20/2024 09:20 AM
Analyzed Date: 09/20/2024

Project: 24-1322 / Pemberton Busansky School

Test Report: Air-O-Cell™ Analysis of Fungal Spores & Particulates by Optical Microscopy (Methods MICRO-SOP-201, ASTM D7391)

Lab Sample Number: Client Sample ID: Volume (L): Sample Location:	372416056-0001 A-1 75 Room 109			372416056-0002 A-2 75 Room 106			372416056-0003 A-3 75 Room 308			
	Spore Types	Raw Count†	Count/m³	% of Total	Raw Count†	Count/m³	% of Total	Raw Count†	Count/m³	% of Total
Alternaria (Ulocladium)	-	-	-	-	-	-	-	-	-	-
Ascospores	-	-	-	-	-	-	-	-	-	-
Aspergillus/Penicillium++	45	2000	56.7	11	480	40.7	1	40	5.1	
Basidiospores	18	790	22.4	15	660	55.9	17	740	93.7	
Bipolaris++	-	-	-	-	-	-	-	-	-	-
Chaetomium++	-	-	-	-	-	-	-	-	-	-
Cladosporium	17	740	21	1	40	3.4	-	-	-	-
Curvularia	-	-	-	-	-	-	-	-	-	-
Epicoccum	-	-	-	-	-	-	-	-	-	-
Fusarium++	-	-	-	-	-	-	-	-	-	-
Ganoderma	-	-	-	-	-	-	1	10*	1.3	
Myxomycetes++	-	-	-	-	-	-	-	-	-	-
Pithomyces++	-	-	-	-	-	-	-	-	-	-
Rust	-	-	-	-	-	-	-	-	-	-
Scopulariopsis/Microascus	-	-	-	-	-	-	-	-	-	-
Stachybotrys/Memnoniella	-	-	-	-	-	-	-	-	-	-
Unidentifiable Spores	-	-	-	-	-	-	-	-	-	-
Zygomycetes	-	-	-	-	-	-	-	-	-	-
Polythrincium	-	-	-	-	-	-	-	-	-	-
Total Fungi	80	3530	100	27	1180	100	19	790	100	
Hyphal Fragment	-	-	-	-	-	-	-	-	-	-
Insect Fragment	-	-	-	-	-	-	-	-	-	-
Pollen	-	-	-	-	-	-	-	-	-	-
Analyt. Sensitivity 600x	-	44	-	-	44	-	-	44	-	-
Analyt. Sensitivity 300x	-	13*	-	-	13*	-	-	13*	-	-
Skin Fragments (1-4)	-	2	-	-	1	-	-	1	-	-
Fibrous Particulate (1-4)	-	1	-	-	1	-	-	1	-	-
Background (1-5)	-	1	-	-	1	-	-	1	-	-

† Due to method stopping rules, extrapolated raw counts are reported in parenthesis.
++ Includes other spores with similar morphology; see EMSL's fungal glossary for each specific category.

Vincent Iuzzolino, M.S., Laboratory Manager
or other Approved Signatory

No discernable field blank was submitted with this group of samples.

EMSL Analytical, Inc. maintains liability limited to cost of analysis. Interpretation and use of test results are the responsibility of the client. This report relates only to the samples reported above, and may not be reproduced, except in full, without written approval by EMSL Analytical, Inc. EMSL Analytical, Inc. bears no responsibility for sample collection activities or analytical method limitations. The report reflects the samples as received. Results are generated from the field sampling data (sampling volumes and areas, locations, etc.) provided by the client on the Chain of Custody. Samples are within quality control criteria and met method specifications unless otherwise noted. Skin Fragment and Fibrous Particulate ratings are based on the percent of non-fungal material they represent: 1 (1-25%), 2 (26-50%), 3 (51-75%), or 4 (76-100%). Background ratings are based on the total area covered by non-fungal particles: 1 (1-25%), 2 (26-50%), 3 (51-75%), 4 (76-99%), or 5 (100%; overloaded). High levels of background particulate can obscure spores and other particulates, leading to underestimation. Background levels of 5 indicate an overloading of background particulates, prohibiting accurate detection and quantification. Present = Spores detected on overloaded samples. Results are not blank corrected unless otherwise noted. The detection limit is equal to one fungal spore, structure, pollen, fiber particle or insect fragment. "*" Denotes particles found at 300X. "-" Denotes not detected. Due to method stopping rules, raw counts >= 100 are extrapolated based on the percentage analyzed.

Samples analyzed by EMSL Analytical, Inc. Cinnaminson, NJ AIHA LAP, LLC-EMLAP Accredited #100194

Initial report from: 09/20/2024 02:27 PM

For information on the fungi listed in this report, please visit the Resources section at www.emsl.com



EMSL Analytical, Inc.

200 Route 130 North Cinnaminson, NJ 08077
Tel/Fax: (800) 220-3675 / (856) 786-0262
<http://www.EMSL.com> / cinmicrolab@emsl.com

EMSL Order: 372416056
Customer ID: TTIE54
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Attention: Tim Popp
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Collected Date: 09/20/2024
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Project: 24-1322 / Pemberton Busansky School

Test Report: Air-O-Cell™ Analysis of Fungal Spores & Particulates by Optical Microscopy (Methods MICRO-SOP-201, ASTM D7391)

Lab Sample Number: Client Sample ID: Volume (L): Sample Location:	372416056-0004 A-4 75 Room 201			372416056-0005 A-5 75 Outside					
	Spore Types	Raw Count†	Count/m³	% of Total	Raw Count†	Count/m³	% of Total		
Alternaria (Ulocladium)	-	-	-	1	40	0.2	-	-	-
Ascospores	-	-	-	26	1100	4.4	-	-	-
Aspergillus/Penicillium++	8	300	38.5	6	300	1.2	-	-	-
Basidiospores	11	480	61.5	131(480)	20900	84.4	-	-	-
Bipolaris++	-	-	-	-	-	-	-	-	-
Chaetomium++	-	-	-	-	-	-	-	-	-
Cladosporium	-	-	-	36	1600	6.5	-	-	-
Curvularia	-	-	-	-	-	-	-	-	-
Epicoccum	-	-	-	-	-	-	-	-	-
Fusarium++	-	-	-	-	-	-	-	-	-
Ganoderma	-	-	-	17	740	3	-	-	-
Myxomycetes++	-	-	-	1	10*	0	-	-	-
Pithomyces++	-	-	-	1	40	0.2	-	-	-
Rust	-	-	-	-	-	-	-	-	-
Scopulariopsis/Microascus	-	-	-	-	-	-	-	-	-
Stachybotrys/Memnoniella	-	-	-	-	-	-	-	-	-
Unidentifiable Spores	-	-	-	-	-	-	-	-	-
Zygomycetes	-	-	-	-	-	-	-	-	-
Polythrincium	-	-	-	1	40	0.2	-	-	-
Total Fungi	19	780	100	569	24770	100	-	-	-
Hyphal Fragment	-	-	-	2	90	-	-	-	-
Insect Fragment	-	-	-	-	-	-	-	-	-
Pollen	-	-	-	-	-	-	-	-	-
Analyt. Sensitivity 600x	-	44	-	-	44	-	-	-	-
Analyt. Sensitivity 300x	-	13*	-	-	13*	-	-	-	-
Skin Fragments (1-4)	-	1	-	-	1	-	-	-	-
Fibrous Particulate (1-4)	-	1	-	-	1	-	-	-	-
Background (1-5)	-	1	-	-	1	-	-	-	-

† Due to method stopping rules, extrapolated raw counts are reported in parenthesis.
++ Includes other spores with similar morphology; see EMSL's fungal glossary for each specific category.

Vincent Iuzzolino, M.S., Laboratory Manager
or other Approved Signatory

No discernable field blank was submitted with this group of samples.

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Samples analyzed by EMSL Analytical, Inc. Cinnaminson, NJ AIHA LAP, LLC-EMLAP Accredited #100194

Initial report from: 09/20/2024 02:27 PM

For information on the fungi listed in this report, please visit the Resources section at www.emsl.com



EMSL Chain of Custody - One Chain

EMSL Order Number / Lab Use Only

EMSL Analytical, Inc.
200 Route 130 North
Cinnaminson, NJ 08077

PHONE: (800) 220-3675
EMAIL: CinnAslab@EMSL.com

EMSL ANALYTICAL, INC.
TESTING LABS • PRODUCTS • TRAINING

372416056

Customer ID:		If Bill-To is the same as Report-To leave this section blank. Third-party billing requires written authorization.	
Customer Information	Company Name:	TTI Environmental Inc	Billing ID:
	Contact Name:	Tim Popp	Company Name:
	Street Address:	1253 North Church St	Same
	City, State, Zip:	Moorestown NJ 08057	Billing Contact:
	Country:		Street Address:
	Phone:	609-304-3968	City, State, Zip:
Email(s) for Report:	timp@ttienv.com	Country:	
		Phone:	
		Email(s) for Invoice:	

Project Information	
Project Name/No:	24-1322 Pemberton Basansky School
EMSL LIMS Project ID:	Purchase Order: 039729
(If applicable, EMSL will provide)	US State where samples collected:
State of Connecticut (CT) must select project location:	<input type="checkbox"/> Commercial (Taxable) <input type="checkbox"/> Residential (Non-Taxable)
Sampled By Name:	Tim Popp
Sampled By Signature:	<i>[Signature]</i>
No. of Samples in Shipment:	5

Turn-Around-Time (TAT)

3 Hour 6 Hour 24 Hour 32 Hour 48 Hour 72 Hour 96 Hour 1 Week 2 Week

Please call ahead for large projects and/or turnaround times 6 Hours or Less. *32 Hour TAT available for select tests only. Samples must be submitted by 11:30am.

ASBESTOS

<p>PCM Air</p> <input type="checkbox"/> NIOSH 7400 <input type="checkbox"/> NIOSH 7400 w/ 8hr. TWA <p>PLM - Bulk (reporting limit)</p> <input type="checkbox"/> PLM EPA 600/R-93/116 (<1%) <input type="checkbox"/> PLM EPA NOB (<1%) <input type="checkbox"/> POINT COUNT <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1,000 (<0.1%) <input type="checkbox"/> POINT COUNT w/ GRAVIMETRIC <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1,000 (<0.1%) <input type="checkbox"/> NIOSH 9002 (<1%) <input type="checkbox"/> NYS 198.1 (Friable - NY) <input type="checkbox"/> NYS 198.6 NOB (Non-Friable - NY) <input type="checkbox"/> NYS 198.8 (Vermiculite SM-V)	<p>TEM - Air</p> <input type="checkbox"/> AHERA 40 CFR, Part 763 <input type="checkbox"/> NIOSH 7402 <input type="checkbox"/> EPA Level II <input type="checkbox"/> ISO 10312* <p>TEM - Bulk</p> <input type="checkbox"/> TEM EPA NOB <input type="checkbox"/> NYS NOB 198.4 (Non-Friable-NY) <input type="checkbox"/> TEM EPA 600/R-93/116 w Milling Prep (0.1%) <p>Other Test (please specify)</p> <div style="border: 1px solid black; height: 20px; width: 100%;"></div>	<p>TEM - Settled Dust</p> <input type="checkbox"/> Microvac - ASTM D5755 <input type="checkbox"/> Wipe - ASTM D6480 <input type="checkbox"/> Qualitative via Filtration Prep <input type="checkbox"/> Qualitative via Drop Mount Prep <p>Soil - Rock - Vermiculite (reporting limit)*</p> <input type="checkbox"/> PLM EPA 600/R-93/116 with milling prep (<0.25%) <input type="checkbox"/> PLM EPA 600/R-93/116 with milling prep (<0.1%) <input type="checkbox"/> TEM EPA 600/R-93/116 with milling prep (<0.1%) <input type="checkbox"/> TEM Qualitative via Filtration Prep <input type="checkbox"/> TEM Qualitative via Drop Mount Prep
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*Please call with your project-specific requirements.

Positive Stop - Clearly Identified Homogeneous Areas (HA) Filter Pore Size (Air Samples) 0.8um 0.45um

<p>LEAD (PB)</p> <p>Flame Atomic Absorption</p> <input type="checkbox"/> Chips SW846-7000B or AOAC 974.2 <input type="checkbox"/> Soil SW846-7000B/7420 <input type="checkbox"/> Air NIOSH 7082 <input type="checkbox"/> Wastewater SM3111B or SW846-7000B/7420 <input type="checkbox"/> ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> non-ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> TCLP SW846-1311/ 7420/ SM3111B	<p>ICP</p> <input type="checkbox"/> TEM EPA 600/R-93/116 w Milling Prep (0.1%) <input type="checkbox"/> Chatfield SOP	<p>MAT-SCI (TAT End of Business Day)</p> <input type="checkbox"/> Common Particle ID (large particles) <input type="checkbox"/> Full Particle ID (environmental dust) <input type="checkbox"/> Basic Material ID (solids) <input type="checkbox"/> Advanced Material ID <input type="checkbox"/> Physical Testing (Tensile, Compression) <input type="checkbox"/> Combustion-By-Products (Soot, Char, Etc.) <input type="checkbox"/> X-Ray Fluorescence (elem. Analysis) <input type="checkbox"/> X-Ray Diffraction (Crystalline Part.) <input type="checkbox"/> MMVF's (Fibrous Glass, RCF's) <input type="checkbox"/> Particle Size (Sieve, Microscopy, Laser) <input type="checkbox"/> Combustible Dust <input type="checkbox"/> Petrographic Examination
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<p>MICROBIOLOGY</p> <p>Swab and Bulk Samples</p> <input type="checkbox"/> Mold & Fungi - Direct Examination <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi Culture (Genus & Species) <input type="checkbox"/> Bacterial Count & ID (Up to 3 Types) <input type="checkbox"/> Bacterial Count & ID (Up to 5 Types) <p>Sewage Screen</p> <input type="checkbox"/> Sewage Screen (P/A) <input type="checkbox"/> Sewage Screen (Membrane Filtration) <p>Water Samples</p> <input type="checkbox"/> Total Coliform & E. Coli (P/A, SM 9223B) <input type="checkbox"/> Heterotrophic Plate Count (PP, SM 9251B) <input type="checkbox"/> Fecal Coliform (SM 9222D)	<p>Air Samples</p> <input checked="" type="checkbox"/> Mold & Fungi (Spore Trap) <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi Culture (Genus & Species) <input type="checkbox"/> Bacterial Count & ID (Up to 3 Types) <input type="checkbox"/> Bacterial Count & ID (Up to 5 Types) <p>DNA & PCR Testing: (See Analytical Guide for Code) Test Code:</p> <p>Legionella: (See Analytical Guide for Code) Test Code:</p> <p>P/A= Presence/Absence, PP= Pour Plate</p>	<p>IAQ (TAT End of Business Day)</p> <input type="checkbox"/> Nuisance Dust <input type="checkbox"/> NIOSH 0500 <input type="checkbox"/> NIOSH 0600 <input type="checkbox"/> Airborne Dust <input type="checkbox"/> PM10 <input type="checkbox"/> TSP <p>Silica Analysis: <input type="checkbox"/> All Species Silica Analysis - Single Species <input type="checkbox"/> Alpha Quartz <input type="checkbox"/> Cristobalite <input type="checkbox"/> Tridymite <input type="checkbox"/> HVAC Efficiency <input type="checkbox"/> Carbon Black <input type="checkbox"/> Airborn Oil Mist Radon Testing: Call for Kit and COC</p>
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Other Test (please specify)

Special Instructions and/or Regulatory Requirements (Sample Specifications, Processing Methods, Limits of Detection, etc.)

Method of Shipment:	Sample Condition Upon Receipt:
Relinquished by: <i>[Signature]</i>	Received by: <i>[Signature]</i>
Date/Time: 9/20/24	Date/Time: 9/20/24 0920
Relinquished by: <i>[Signature]</i>	Received by: <i>[Signature]</i>
Date/Time:	Date/Time:

Controlled Document - COC-17 One Chain EMSL R5 2/26/2021 AGREE TO ELECTRONIC SIGNATURE (By checking, I consent to signing this Chain of Custody document by electronic signature.)

EMSL Analytical, Inc.'s Laboratory Terms and Conditions are incorporated into this Chain of Custody by reference in their entirety. Submission of samples to EMSL Analytical, Inc. constitutes acceptance and acknowledgment of all terms and conditions by Customer. Page 1 of 2

RECEIVED
 EMSL
 CINNAMINSON, N.J.
 2024 SEP 20 A 9:21

2 JSAN



TTI ENVIRONMENTAL, INC.
Consulting & Contracting

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September 23, 2024

Mr. Scott Krisanda, M.Ed., CEFM
Director of Facilities
Pemberton Township Schools
125B Trenton Road
Browns Mills, NJ 08015

Reference: Clearance Inspection and Testing
Pemberton Township - Samuel T Busansky School – Room 109
16 Scrapetown Rd, Pemberton, NJ 08068
TTI Project Number 24-1322

Dear Mr. Krisanda:

Thank you for selecting TTI Environmental, Inc. (TTI) for your environmental needs. This correspondence is being forwarded to provide the findings and results of the recent clearance inspection conducted at the above referenced property and room.

1.0 Background

TTI arrived on site on September 13, 2024 to conduct an initial inspection of Room 109 and was provided with general information on the area of concern. Based on the information provided and TTI's site inspection results TTI recommended that an in-depth cleaning of Room 109 and contents be conducted to remove and reduce the surface mold within the room back to a normal condition. The school staff performed the room cleaning, and a clearance inspection and testing was performed by TTI on September 20, 2024. Additional rooms were initially inspected during this same visit and a separate report for those initial inspections is provided under a separate letter.

The onsite clearance inspection was conducted by the following personnel: Mr. Timothy Popp, Vice President of Consulting for TTI. In addition to the visual inspection, TTI collected one (1) air sample from inside the room and one from outside the building as a comparison sample.

Observations

The visual inspection of the building components and contents did not identify any visible mold growth. The objects identified during the previous initial inspection were cleaned and visually mold free. However, the dust level and cleanliness within Room 109 was not at a level expected to have undergone an in depth cleaning as recommended. The temperature level in the building was normal, and the relative humidity was just above 60% but was lower than the outside level.

Table 1.0 Indoor Direct Reading Parameter		
Room/Area	Temperature	Relative Humidity
Room 109	70.3	63.9
Outside	69.5	76.9
Recommended Ranges	68-79	>30 & <60%

2.0 Sampling Methods and Sample Locations

A fungal spore trap air sample was collected from within Room 109 and the outside as a comparison sample. All laboratory analysis was performed by EMSL Analytical Inc. Cinnaminson, New Jersey, a certified AIHA NVLAP Laboratory. The analytical test report is attached in Appendix A which includes results from the other initial inspection samples also. A description of sample methodology is described below:



Fungal Spore Trap Air Samples

Fungal spore trap air samples are collected by using an Air-O-Cell™ cassette attached to a high-volume vacuum pump. A volume of air is drawn through the cassette and the contents of the air are deposited upon a specially treated glass slide, which is then analyzed by a mycologist who identifies fungal types and quantity. Fungal spore trap air samples measure both viable and non-viable fungal spores as well as fungal parts and fragments. Fungal spore trap air samples are collected from the outdoors to be used as a comparison to the inside samples. There are currently no standards of reference ranges for acceptable levels of airborne microorganisms when interpreting fungal air sample results, just guidance. It is generally accepted that indoor airborne fungal concentrations should be approximately the same as found outdoors and display similar genus distribution. Elevated indoor airborne fungal concentrations as compared to outdoor concentrations are often an indicator of a fungal amplification source due to a moisture condition.

Table 1.0: Fungal Spore Trap Air Sample Results Summary

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A-1	Room 109	3,530	Aspergillus/ Penicillium	2000	56.7	Aspergillus/ Penicillium	2000	56.7
A-5	Outside	24,770	Basidiospores	20,900	84.4	Aspergillus/ Penicillium	300	1.2

fs/m³: fungal structures per cubic meter ND: Non-detected

The total airborne fungal concentration level of the sample collected inside Room 109 was lower than the outside sample. However, the individual mold species Aspergillus/Penicillium was detected at a level exceeding the outside sample and was greater than 800 fs per m³.

Conclusions & Recommendations

- The cleaning was successful in removing the surface mold from the objects observed during TTI’s initial inspection. However, the room did not appear to have been deep cleaned as surface dust was visible on objects that were not touched.
- The humidity level was just above 60% and should be reduced. After the HVAC system turned on from overnight set back the humidity started to drop below 60%.
- Based on the clearance inspection and the results from the air sample TTI recommends that Room 109 remain closed and that additional in-depth cleaning of Room 109 and contents be conducted. Additional clearance inspection should be conducted following cleaning and include visual and air sample testing to confirm.

We appreciate the opportunity for allowing TTI to provide you with environmental consulting services. If you should have any questions, please feel free to contact us at any time.

Sincerely,
TTI ENVIRONMENTAL, INC.

Timothy Popp
 Vice President of Consulting

Appendix A:
Analytical Test Reports



EMSL Analytical, Inc.

200 Route 130 North Cinnaminson, NJ 08077
Tel/Fax: (800) 220-3675 / (856) 786-0262
<http://www.EMSL.com> / cinmicrolab@emsl.com

EMSL Order: 372416056
Customer ID: TTIE54
Customer PO: 039729
Project ID:

Attention: Tim Popp
TTI Environmental Inc.
1253 North Church Street
Moorestown, NJ 08057

Phone: (856) 840-8800
Fax: (856) 840-8815
Collected Date: 09/20/2024
Received Date: 09/20/2024 09:20 AM
Analyzed Date: 09/20/2024

Project: 24-1322 / Pemberton Busansky School

Test Report: Air-O-Cell™ Analysis of Fungal Spores & Particulates by Optical Microscopy (Methods MICRO-SOP-201, ASTM D7391)

Lab Sample Number: Client Sample ID: Volume (L): Sample Location:	372416056-0001 A-1 75 Room 109			372416056-0002 A-2 75 Room 106			372416056-0003 A-3 75 Room 308			
	Spore Types	Raw Count†	Count/m³	% of Total	Raw Count†	Count/m³	% of Total	Raw Count†	Count/m³	% of Total
Alternaria (Ulocladium)	-	-	-	-	-	-	-	-	-	-
Ascospores	-	-	-	-	-	-	-	-	-	-
Aspergillus/Penicillium++	45	2000	56.7	11	480	40.7	1	40	5.1	
Basidiospores	18	790	22.4	15	660	55.9	17	740	93.7	
Bipolaris++	-	-	-	-	-	-	-	-	-	-
Chaetomium++	-	-	-	-	-	-	-	-	-	-
Cladosporium	17	740	21	1	40	3.4	-	-	-	-
Curvularia	-	-	-	-	-	-	-	-	-	-
Epicoccum	-	-	-	-	-	-	-	-	-	-
Fusarium++	-	-	-	-	-	-	-	-	-	-
Ganoderma	-	-	-	-	-	-	1	10*	1.3	
Myxomycetes++	-	-	-	-	-	-	-	-	-	-
Pithomyces++	-	-	-	-	-	-	-	-	-	-
Rust	-	-	-	-	-	-	-	-	-	-
Scopulariopsis/Microascus	-	-	-	-	-	-	-	-	-	-
Stachybotrys/Memnoniella	-	-	-	-	-	-	-	-	-	-
Unidentifiable Spores	-	-	-	-	-	-	-	-	-	-
Zygomycetes	-	-	-	-	-	-	-	-	-	-
Polythrincium	-	-	-	-	-	-	-	-	-	-
Total Fungi	80	3530	100	27	1180	100	19	790	100	
Hyphal Fragment	-	-	-	-	-	-	-	-	-	-
Insect Fragment	-	-	-	-	-	-	-	-	-	-
Pollen	-	-	-	-	-	-	-	-	-	-
Analyt. Sensitivity 600x	-	44	-	-	44	-	-	44	-	-
Analyt. Sensitivity 300x	-	13*	-	-	13*	-	-	13*	-	-
Skin Fragments (1-4)	-	2	-	-	1	-	-	1	-	-
Fibrous Particulate (1-4)	-	1	-	-	1	-	-	1	-	-
Background (1-5)	-	1	-	-	1	-	-	1	-	-

† Due to method stopping rules, extrapolated raw counts are reported in parenthesis.
++ Includes other spores with similar morphology; see EMSL's fungal glossary for each specific category.

Vincent Iuzzolino, M.S., Laboratory Manager
or other Approved Signatory

No discernable field blank was submitted with this group of samples.

EMSL Analytical, Inc. maintains liability limited to cost of analysis. Interpretation and use of test results are the responsibility of the client. This report relates only to the samples reported above, and may not be reproduced, except in full, without written approval by EMSL Analytical, Inc. EMSL Analytical, Inc. bears no responsibility for sample collection activities or analytical method limitations. The report reflects the samples as received. Results are generated from the field sampling data (sampling volumes and areas, locations, etc.) provided by the client on the Chain of Custody. Samples are within quality control criteria and met method specifications unless otherwise noted. Skin Fragment and Fibrous Particulate ratings are based on the percent of non-fungal material they represent: 1 (1-25%), 2 (26-50%), 3 (51-75%), or 4 (76-100%). Background ratings are based on the total area covered by non-fungal particles: 1 (1-25%), 2 (26-50%), 3 (51-75%), 4 (76-99%), or 5 (100%; overloaded). High levels of background particulate can obscure spores and other particulates, leading to underestimation. Background levels of 5 indicate an overloading of background particulates, prohibiting accurate detection and quantification. Present = Spores detected on overloaded samples. Results are not blank corrected unless otherwise noted. The detection limit is equal to one fungal spore, structure, pollen, fiber particle or insect fragment. "*" Denotes particles found at 300X. "-" Denotes not detected. Due to method stopping rules, raw counts >= 100 are extrapolated based on the percentage analyzed.

Samples analyzed by EMSL Analytical, Inc. Cinnaminson, NJ AIHA LAP, LLC-EMLAP Accredited #100194

Initial report from: 09/20/2024 02:27 PM

For information on the fungi listed in this report, please visit the Resources section at www.emsl.com



EMSL Analytical, Inc.

200 Route 130 North Cinnaminson, NJ 08077
Tel/Fax: (800) 220-3675 / (856) 786-0262
<http://www.EMSL.com> / cinmicrolab@emsl.com

EMSL Order: 372416056
Customer ID: TTIE54
Customer PO: 039729
Project ID:

Attention: Tim Popp
TTI Environmental Inc.
1253 North Church Street
Moorestown, NJ 08057

Phone: (856) 840-8800
Fax: (856) 840-8815
Collected Date: 09/20/2024
Received Date: 09/20/2024 09:20 AM
Analyzed Date: 09/20/2024

Project: 24-1322 / Pemberton Busansky School

Test Report: Air-O-Cell™ Analysis of Fungal Spores & Particulates by Optical Microscopy (Methods MICRO-SOP-201, ASTM D7391)

Lab Sample Number: Client Sample ID: Volume (L): Sample Location:	372416056-0004 A-4 75 Room 201			372416056-0005 A-5 75 Outside					
	Spore Types	Raw Count†	Count/m³	% of Total	Raw Count†	Count/m³	% of Total		
Alternaria (Ulocladium)	-	-	-	1	40	0.2	-	-	-
Ascospores	-	-	-	26	1100	4.4	-	-	-
Aspergillus/Penicillium++	8	300	38.5	6	300	1.2	-	-	-
Basidiospores	11	480	61.5	131(480)	20900	84.4	-	-	-
Bipolaris++	-	-	-	-	-	-	-	-	-
Chaetomium++	-	-	-	-	-	-	-	-	-
Cladosporium	-	-	-	36	1600	6.5	-	-	-
Curvularia	-	-	-	-	-	-	-	-	-
Epicoccum	-	-	-	-	-	-	-	-	-
Fusarium++	-	-	-	-	-	-	-	-	-
Ganoderma	-	-	-	17	740	3	-	-	-
Myxomycetes++	-	-	-	1	10*	0	-	-	-
Pithomyces++	-	-	-	1	40	0.2	-	-	-
Rust	-	-	-	-	-	-	-	-	-
Scopulariopsis/Microascus	-	-	-	-	-	-	-	-	-
Stachybotrys/Memnoniella	-	-	-	-	-	-	-	-	-
Unidentifiable Spores	-	-	-	-	-	-	-	-	-
Zygomycetes	-	-	-	-	-	-	-	-	-
Polythrincium	-	-	-	1	40	0.2	-	-	-
Total Fungi	19	780	100	569	24770	100	-	-	-
Hyphal Fragment	-	-	-	2	90	-	-	-	-
Insect Fragment	-	-	-	-	-	-	-	-	-
Pollen	-	-	-	-	-	-	-	-	-
Analyt. Sensitivity 600x	-	44	-	-	44	-	-	-	-
Analyt. Sensitivity 300x	-	13*	-	-	13*	-	-	-	-
Skin Fragments (1-4)	-	1	-	-	1	-	-	-	-
Fibrous Particulate (1-4)	-	1	-	-	1	-	-	-	-
Background (1-5)	-	1	-	-	1	-	-	-	-

† Due to method stopping rules, extrapolated raw counts are reported in parenthesis.
++ Includes other spores with similar morphology; see EMSL's fungal glossary for each specific category.

Vincent Iuzzolino, M.S., Laboratory Manager
or other Approved Signatory

No discernable field blank was submitted with this group of samples.

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Samples analyzed by EMSL Analytical, Inc. Cinnaminson, NJ AIHA LAP, LLC-EMLAP Accredited #100194

Initial report from: 09/20/2024 02:27 PM

For information on the fungi listed in this report, please visit the Resources section at www.emsl.com



EMSL Chain of Custody - One Chain

EMSL Order Number / Lab Use Only

EMSL Analytical, Inc.
200 Route 130 North
Cinnaminson, NJ 08077

PHONE: (800) 220-3675
EMAIL: CinnAslab@EMSL.com

EMSL ANALYTICAL, INC.
TESTING LABS • PRODUCTS • TRAINING

372416056

Customer Information	Customer ID:	If Bill-To is the same as Report-To leave this section blank. Third-party billing requires written authorization.		
	Company Name:	TTI Environmental Inc	Billing ID:	
	Contact Name:	Tim Popp	Company Name:	Same
	Street Address:	1253 North Church St	Billing Contact:	
	City, State, Zip:	Moorestown NJ 08057	Street Address:	
	Phone:	609-304-3968	City, State, Zip:	
	Email(s) for Report:	timp@ttienv.com	Country:	
			Phone:	
			Email(s) for Invoice:	

Project Information	
Project Name/No:	24-1322 Pemberton Basansky School
EMSL LIMS Project ID:	Purchase Order: 039729
(If applicable, EMSL will provide)	US State where samples collected:
State of Connecticut (CT) must select project location:	<input type="checkbox"/> Commercial (Taxable) <input type="checkbox"/> Residential (Non-Taxable)
Sampled By Name:	Tim Popp
Sampled By Signature:	<i>[Signature]</i>
	No. of Samples in Shipment: 5

Turn-Around-Time (TAT)

3 Hour 6 Hour 24 Hour 32 Hour 48 Hour 72 Hour 96 Hour 1 Week 2 Week

Please call ahead for large projects and/or turnaround times 6 Hours or Less. *32 Hour TAT available for select tests only. Samples must be submitted by 11:30am.

ASBESTOS

<p>PCM Air</p> <input type="checkbox"/> NIOSH 7400 <input type="checkbox"/> NIOSH 7400 w/ 8hr. TWA <p>PLM - Bulk (reporting limit)</p> <input type="checkbox"/> PLM EPA 600/R-93/116 (<1%) <input type="checkbox"/> PLM EPA NOB (<1%) <input type="checkbox"/> POINT COUNT <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1,000 (<0.1%) <input type="checkbox"/> POINT COUNT w/ GRAVIMETRIC <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1,000 (<0.1%) <input type="checkbox"/> NIOSH 9002 (<1%) <input type="checkbox"/> NYS 198.1 (Friable - NY) <input type="checkbox"/> NYS 198.6 NOB (Non-Friable - NY) <input type="checkbox"/> NYS 198.8 (Vermiculite SM-V)	<p>TEM - Air</p> <input type="checkbox"/> AHERA 40 CFR, Part 763 <input type="checkbox"/> NIOSH 7402 <input type="checkbox"/> EPA Level II <input type="checkbox"/> ISO 10312* <p>TEM - Bulk</p> <input type="checkbox"/> TEM EPA NOB <input type="checkbox"/> NYS NOB 198.4 (Non-Friable-NY) <input type="checkbox"/> TEM EPA 600/R-93/116 w Milling Prep (0.1%) <p>Other Test (please specify)</p> <div style="border: 1px solid black; height: 20px; width: 100%;"></div>	<p>TEM - Settled Dust</p> <input type="checkbox"/> Microvac - ASTM D5755 <input type="checkbox"/> Wipe - ASTM D6480 <input type="checkbox"/> Qualitative via Filtration Prep <input type="checkbox"/> Qualitative via Drop Mount Prep <p>Soil - Rock - Vermiculite (reporting limit)*</p> <input type="checkbox"/> PLM EPA 600/R-93/116 with milling prep (<0.25%) <input type="checkbox"/> PLM EPA 600/R-93/116 with milling prep (<0.1%) <input type="checkbox"/> TEM EPA 600/R-93/116 with milling prep (<0.1%) <input type="checkbox"/> TEM Qualitative via Filtration Prep <input type="checkbox"/> TEM Qualitative via Drop Mount Prep
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*Please call with your project-specific requirements.

Positive Stop - Clearly Identified Homogeneous Areas (HA) Filter Pore Size (Air Samples) 0.8um 0.45um

<p>LEAD (PB)</p> <p>Flame Atomic Absorption</p> <input type="checkbox"/> Chips SW846-7000B or AOAC 974.2 <input type="checkbox"/> Soil SW846-7000B/7420 <input type="checkbox"/> Air NIOSH 7082 <input type="checkbox"/> Wastewater SM3111B or SW846-7000B/7420 <input type="checkbox"/> ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> non-ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> TCLP SW846-1311/ 7420/ SM3111B	<p>ICP</p> <input type="checkbox"/> TEM EPA 600/R-93/116 w Milling Prep (0.1%) <input type="checkbox"/> Chatfield SOP	<p>MAT-SCI (TAT End of Business Day)</p> <input type="checkbox"/> Common Particle ID (large particles) <input type="checkbox"/> Full Particle ID (environmental dust) <input type="checkbox"/> Basic Material ID (solids) <input type="checkbox"/> Advanced Material ID <input type="checkbox"/> Physical Testing (Tensile, Compression) <input type="checkbox"/> Combustion-By-Products (Soot, Char, Etc.) <input type="checkbox"/> X-Ray Fluorescence (elem. Analysis) <input type="checkbox"/> X-Ray Diffraction (Crystalline Part.) <input type="checkbox"/> MMVF's (Fibrous Glass, RCF's) <input type="checkbox"/> Particle Size (Sieve, Microscopy, Laser) <input type="checkbox"/> Combustible Dust <input type="checkbox"/> Petrographic Examination
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<p>MICROBIOLOGY</p> <p>Swab and Bulk Samples</p> <input type="checkbox"/> Mold & Fungi - Direct Examination <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi Culture (Genus & Species) <input type="checkbox"/> Bacterial Count & ID (Up to 3 Types) <input type="checkbox"/> Bacterial Count & ID (Up to 5 Types) <p>Sewage Screen</p> <input type="checkbox"/> Sewage Screen (P/A) <input type="checkbox"/> Sewage Screen (Membrane Filtration) <p>Water Samples</p> <input type="checkbox"/> Total Coliform & E. Coli (P/A, SM 9223B) <input type="checkbox"/> Heterotrophic Plate Count (PP, SM 9251B) <input type="checkbox"/> Fecal Coliform (SM 9222D)	<p>Wf Samples</p> <input checked="" type="checkbox"/> Mold & Fungi (Spore Trap) <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi Culture (Genus & Species) <input type="checkbox"/> Bacterial Count & ID (Up to 3 Types) <input type="checkbox"/> Bacterial Count & ID (Up to 5 Types) <p>DNA & PCR Testing: (See Analytical Guide for Code) Test Code:</p> <p>Legionella: (See Analytical Guide for Code) Test Code:</p> <p>P/A= Presence/Absence, PP= Pour Plate</p>	<p>IAQ (TAT End of Business Day)</p> <input type="checkbox"/> Nuisance Dust <input type="checkbox"/> NIOSH 0500 <input type="checkbox"/> NIOSH 0600 <input type="checkbox"/> Airborne Dust <input type="checkbox"/> PM10 <input type="checkbox"/> TSP <p>Silica Analysis: <input type="checkbox"/> All Species Silica Analysis - Single Species <input type="checkbox"/> Alpha Quartz <input type="checkbox"/> Cristobalite <input type="checkbox"/> Tridymite <input type="checkbox"/> HVAC Efficiency <input type="checkbox"/> Carbon Black <input type="checkbox"/> Airborn Oil Mist Radon Testing: Call for Kit and COC</p>
--	--	--

Other Test (please specify)

Special Instructions and/or Regulatory Requirements (Sample Specifications, Processing Methods, Limits of Detection, etc.)

Method of Shipment:	Sample Condition Upon Receipt:
Relinquished by: <i>[Signature]</i>	Received by: <i>[Signature]</i>
Date/Time: 9/20/24	Date/Time: 9/20/24 0920
Relinquished by: <i>[Signature]</i>	Received by: <i>[Signature]</i>
Date/Time:	Date/Time:

Controlled Document - COC-17 One Chain EMSL R5 2/26/2021 AGREE TO ELECTRONIC SIGNATURE (By checking, I consent to signing this Chain of Custody document by electronic signature.)

EMSL Analytical, Inc.'s Laboratory Terms and Conditions are incorporated into this Chain of Custody by reference in their entirety. Submission of samples to EMSL Analytical, Inc. constitutes acceptance and acknowledgment of all terms and conditions by Customer. Page 1 of 2

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 2024 SEP 20 A 9:21

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