

File No.: 04-1000-20-2019-546

October 2, 2019

s.22(1)

Dear s.22(1)

Re: **Request for Access to Records under the Freedom of Information and Protection of Privacy Act (the "Act")**

I am responding to your request of August 27, 2019 for:

Records related to code compliance issues against 1296 Wolfe Avenue (i.e. issue on mould and asbestos), from August 1, 2018 to August 26, 2019.

All responsive records are attached. Some information in the records has been severed, (blacked out), under s.22(1) of the Act. You can read or download this section here: http://www.bclaws.ca/EPLibraries/bclaws_new/document/ID/freeside/96165_00.

Under section 52 of the Act you may ask the Information & Privacy Commissioner to review any matter related to the City's response to your request. The Act allows you 30 business days from the date you receive this notice to request a review by writing to: Office of the Information & Privacy Commissioner, info@oipc.bc.ca or by phoning 250-387-5629.

If you request a review, please provide the Commissioner's office with: 1) the request number assigned to your request (#04-1000-20-2019-546); 2) a copy of this letter; 3) a copy of your original request for information sent to the City of Vancouver; and 4) detailed reasons or grounds on which you are seeking the review.

Please do not hesitate to contact the Freedom of Information Office at foi@vancouver.ca if you have any questions.

Yours truly,



Barbara J. Van Fraassen, BA
Director, Access to Information & Privacy

Barbara.vanfraassen@vancouver.ca
453 W. 12th Avenue Vancouver BC V5Y 1V4

*If you have any questions, please email us at foi@vancouver.ca and we will respond to you as soon as possible. Or you can call the FOI Case Manager at 604.871.6584.

Encl.

:kt

Site Address:
1296 Wolfe Avenue, Vancouver, BC



HAZARDOUS MATERIALS ASSESSMENT

PRELIMINARY INVESTIGATION – ASBESTOS AND LEAD



INSPECTION DATE	May 24, 2019
REPORT DATE	June 21, 2019
CLIENT NAME	Shaughnessy Residents Association
INSPECTOR NAME	Jeff Goulet
BUILDING INSPECTOR	ON-4644-8267-042919/ 4646-2849-040418
LEAD INSPECTOR	3560-16-C27-25261
LEAD RISK ASSESSOR	3578-16-C31-25261

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1.0 INTRODUCTION

EcoHazMat was requested, by the Shaughnessy Residents Association, to complete a preliminary investigation and assessment of the **residence** located at **1296 Wolfe Avenue, Vancouver, BC**. This assessment does not provide adequate detail for a complete property hazardous material assessment. This report may not be used for renovation or demolition purposes.

On May 24, 2019, *EcoHazMat* collected twelve suspect Asbestos-Containing Material (ACM) samples and three suspect lead paint samples. All samples were collected by a qualified person, as defined by WorkSafeBC. Three samples analyzed tested positive for ACM. **Please see recommendations 3.1.** Laboratory results can be found in Appendix A. Two paint samples were found to be lead-containing. **Please see recommendations 3.2.** Lead laboratory results can be found in Appendix B.

Caution, at the time of inspection, hazardous materials had been previously disturbed, left unmaintained, and are in poor condition. Anyone entering the mechanical/boiler room of the residence must don appropriate Personal Protective Equipment (PPE).

1.1 SCOPE OF WORK

This report is to be used solely the residence located at **1296 Wolfe Avenue, Vancouver, BC**. The assessment was limited to the interior living space, the mechanical room, and the attic of the residence.

The purpose of the assessment is to determine if some suspect materials are asbestos or lead-containing. Deconstructive sampling was not performed.

This assessment does not form a complete asbestos or lead investigation for the residence.

1.2 LAB ANALYTICAL METHOD

Asbestos samples

All suspect asbestos samples collected were submitted for polarized light microscopy (PLM) bulk asbestos fibre analysis. The examination of these samples was conducted in accordance with NIOSH (National Institute for Occupational Safety and Health) Method 9002: 1994 Method for the Determination of Asbestos in Bulk Building Materials.

Lead in paint chip samples

All suspect lead paint chip samples collected were submitted for lead concentration analysis. Examination of these samples was conducted using Atomic Absorption Spectrometry (AAS) in accordance with EPA Method 7000B – Flame Atomic Absorption Spectrometry.

1.3 SITE DESCRIPTION

The site located at **1296 Wolfe Avenue, Vancouver, BC** is a two-level, free-standing residence.

The lower level of the residence consists of a kitchen, living room, dining room, two bedrooms, a washroom and a mechanical/boiler room. The upper level of the residence consists of a living room,

dining room, kitchen, laundry closet, main washroom with separate water closet, two bedrooms, and a master bedroom with ensuite. The attic is accessible from a ceiling hatch in the upper-level hallway.

The walls and ceilings of the residence are comprised of painted drywall. The doors, door frames, baseboards, window sills and casings are also painted, as is the tile on the fireplace hearth in the lower west bedroom. The upper-level washroom has wallpaper on drywall walls and vinyl flooring under ceramic floor tiles and plywood. The flooring throughout the remainder of the residence is a mixture of carpet, hardwood, laminate and ceramic tiles. The mechanical/boiler room has a boiler with damaged asbestos-containing pipe and boiler jacket insulation. Pipe insulation debris was observed on and around the boiler. The attic has fibreglass insulation over a brown loose-fill insulation layer.

All other areas out of the scope of work.

2.0 SUMMARY

2.1 ASBESTOS-CONTAINING MATERIALS

Asbestos is a generic name for a set of six naturally occurring minerals. The two classes of asbestos are the Serpentine class of fibres (curly) and the Amphibole class (needle-like). Manufacturers used asbestos in many building materials for its properties. The fibres are resistant to heat, withstand chemicals, insulate, and add tensile strength to materials. All forms of asbestos are known carcinogens.

The BC Occupational Health and Safety Regulations (OHSR) state the legal requirements pertaining to asbestos in Sections 6.1 to 6.13 and Section 20.113. For this report and as defined by WorkSafeBC in OHSR Section 6.1, **asbestos-containing material** is defined as the following:

"a manufactured article or other material, other than vermiculite insulation, that would be determined to contain at least 0.5% asbestos..."

A. SURFACING MATERIALS

DRYWALL TAPING COMPOUND

Eight (8) drywall taping compound samples were collected. No (0) sample analyzed was found to contain asbestos. Laboratory results can be found in Appendix A.

B. FLOORING MATERIALS

MULTI-LAYER VINYL FLOORING

One (1) multi-layer vinyl flooring sample was collected. One (1) layer of vinyl floor tile in the multi-layer vinyl flooring sample was found to contain Chrysotile asbestos. **Please see recommendations 3.1.** Laboratory results can be found in Appendix A.

C. MISCELLANEOUS MATERIALS

BOILER PIPE INSULATION

Two (2) boiler pipe insulation samples were collected. Both (2) samples analyzed were found to contain Chrysotile asbestos. **Please see recommendations 3.1.** Laboratory results can be found in Appendix A.

ATTIC INSULATION

One (1) fibreglass and loose-fill attic insulation sample was collected. No (0) sample analyzed was found to contain asbestos. Laboratory results can be found in Appendix A.

2.2 LEAD (PB)

Lead is an element in the carbon group with symbol Pb (*plumbum*) and is the heaviest non-radioactive element. Lead was used in building materials because it is abundant and easy to extract and use. It was used in paint because it increased durability and colour and decreased drying time. For this report, and as defined by The Federal Ministry of Health under the Hazardous Products Act, a **lead-containing material** is "*paint or other similar material that dries to a solid film that contains over 90 mg/kg (0.009%) dry weight of lead.*" Lead concentrations as low as 90 mg/kg may present a risk to pregnant women and children.

A. LEAD-BASED PAINTS (LBP)/COATINGS

Three (3) suspect lead paint samples were collected and analyzed. Two (2) samples analyzed were deemed lead-containing. **Please see recommendations 3.2.** Laboratory results can be found in Appendix B.

3.0 RECOMMENDATIONS

Caution, hazardous materials have been previously disturbed, left unmaintained, and are in poor condition at 1296 Wolfe Avenue, Vancouver, BC. Anyone entering the mechanical/boiler room must don appropriate Personal Protective Equipment (PPE).

It is recommended that site-specific handling, abatement, and disposal specifications for these materials be developed. The hazardous materials identified throughout section 2 of this report should be removed or encapsulated to protect building occupants.

It is recommended that prior to abatement or remediation of this site, a scope-specific pre-renovation assessment be conducted to meet the minimum sampling requirements set forth by WorkSafeBC. This assessment does not provide adequate detail for a complete property hazardous material assessment. This report may not be used for renovation or demolition purposes.

3.1 ASBESTOS-CONTAINING MATERIALS (ACM)

EcoHazMat recommends following the guidelines illustrated in the WorkSafeBC publication called *Safe Work Practices for Handling Asbestos*. Appropriate personal protective equipment (PPE), dust suppression, decontamination and safe work procedures must be used any time workers are disturbing ACM. It is the responsibility of the professional abatement contractor to conduct abatement work in accordance with WorkSafeBC regulations and dispose of hazardous materials in accordance with the BC Hazardous Waste Regulation and the Environmental Management Act. **See sections 5.48-5.59 and sections 6.1-6.32 of the BC OHSR.**

Table A. Locations of known and presumed Asbestos-Containing Materials

ACM	Colour	Location(s)
Boiler Pipe Insulation	Grey/White	Mechanical/Boiler Room
Vinyl Floor Tile	Off White	Upper-Level Washroom Floor

A. HIGH RISK WORK

Boiler pipe and jacket insulation – Approximately 15 - 25 Sq.Ft,

Two (2) boiler pipe insulation samples collected from the residence were found to contain Chrysotile asbestos. At the time of the inspection, the boiler pipe insulation and boiler jacket were in **poor condition with a high risk of disturbance**, posing a **high risk of exposure**. Boiler pipe and boiler jacket insulation produces **friable** dust upon disturbance. **This material is in poor condition and has subsequently contaminated contents of the mechanical/boiler room.**

All boiler pipe and boiler jacket insulation throughout the residence must be presumed asbestos-containing. In the mechanical/boiler room, the following must be treated as asbestos-containing/contaminated:

- All dust and debris
- All remaining porous materials:
 - Kids toys and infant swing
 - Storage boxes
 - Portable Vacuum
 - Central Vacuum collection bin and filter

Solid surface, nonporous materials may be professionally decontaminated and salvaged.

The asbestos-containing boiler pipe insulation and boiler jacket must be professionally repaired and encapsulated or abated and disposed of using the appropriate safe work procedures. Abatement of this material, as well as any contaminated contents requires **high risk work procedures** (dependant on the scope of work and procedures), and disposal specifications that comply with WorkSafeBC Regulations, the Environmental Management Act, and Hazardous Waste Regulation. Air monitoring is recommended.



Mechanical/Boiler Room - Overview



Mechanical/Boiler Room - Asbestos Pipe Insulation



Mechanical/Boiler Room - Asbestos Pipe Insulation Debris



Mechanical/Boiler Room - Asbestos Pipe Insulation



Mechanical/Boiler Room - Contaminated Contents



Mechanical/Boiler Room - Dust/Debris

B. MODERATE RISK WORK

Vinyl Floor Tiles (VFT) - Approximately 20 - 40 Sq.Ft.

One (1) layer of vinyl floor tile in one (1) multi-layer vinyl flooring sample collected from the residence was found to contain Chrysotile asbestos. At the time of the inspection, the vinyl floor tile

was in **good condition** with a **low risk of disturbance**, posing a **low risk of exposure**. VFT is non-friable.

All vinyl floor tiles found throughout the residence must be presumed asbestos-containing.

If this material will be removed, it must be abated and disposed of using the appropriate safe work procedures. Abatement of this material requires **moderate risk work procedures** and disposal specifications that comply with WorkSafeBC Regulations, the Environmental Management Act, and Hazardous Waste Regulation. Air monitoring is recommended.



Upper Washroom – VFT Under Ceramic Tiles and Plywood

Note- Asbestos-containing materials may not be exclusive to the areas in the photos. Estimated quantities of hazardous materials are to be confirmed on site by a qualified contractor.

3.2 LEAD-CONTAINING MATERIALS

EcoHazMat recommends following the practices and procedures outlined in the 2017 WorkSafeBC publication titled *Safe Work Practices for Handling Lead*. Appropriate personal protective equipment, dust suppression, decontamination and safe work procedures must be used any time workers are disturbing lead-containing materials in any way. Lead-containing building materials and lead-based paints must be abated and disposal of in accordance with Sections 5.48-5.59 and Sections 6.59-6.69 of the BC OHSR as well as with the Environmental Management Act and associated Hazardous Waste Regulation.

Table B. Risk assessment for lead paint concentrations above 90 mg/kg:

Paint	Lead Conc. (mg/kg)	Substrate	Location	Condition	Disturbance Risk	Exposure Risk
Black Multi-layer	9,570	Ceramic Tile	Lower West Bedroom Fireplace Hearth	Poor	High	High
White Multi-layer	97	Wood	Upper-Level Main Washroom Door	Good	Low	Low

Lead Paint – Approximately 150 – 300 Sq.Ft.

The Following paints must be treated as lead-containing:

- all paint on the lower west bedroom fireplace
- all paint on wood doors throughout the residence
- all paints not yet tested

The paint on the lower west bedroom fireplace hearth is in **poor condition**. It must be abated and disposed of, or encapsulated, following lead safe work procedures that comply with WorkSafeBC Regulations, the Environmental Management Act, and the Hazardous Waste Regulation.



Lower Level West Bedroom – Fireplace Hearth – Lead Paint

If the paint on the wood doors is to be disturbed, it must be abated and disposed of following lead safe work procedures that comply with WorkSafeBC Regulations, the Environmental Management Act, and the Hazardous Waste Regulation.



Upper-Level Main Washroom – Wood Door – Lead Paint


Note- Lead-containing materials are not exclusive to the areas in the photos. Estimated quantities of hazardous materials are to be confirmed on site by a qualified contractor.

4.0 LIMITATIONS

This assessment was limited to the scope of work. Some areas that require dismantling or deconstruction of part of the building have not been inspected, therefore asbestos or lead materials may be present in areas such as above ceilings, within wall cavities, concrete penetrations, walls and floor slabs, internal pipework, beneath floors, subsurface equipment such as underground storage tanks, and pipes. For the reasons listed above this report does not state that all or no asbestos and lead have been found.

Information provided within this report is intended for client use only. *EcoHazMat* will not provide results or information to any party other than the client.

Prepared and reviewed by:



Jeff Goulet, *AHERA Building Inspector*



Dallas Jones, *Dipl. OHS, B. Kin*

Please call Jessica Porter with any questions regarding this report: 778-874-8990

Project #: ECO-1249-L02

5/28/2019



Please find attached the results of the analysis for the samples submitted to the lab for the project indicated on the report below. Results for all material provided can be found on the following pages.

All samples were analyzed using the NIOSH (National Institute for Occupational Safety and Health) Method 9002: 1994. Sample numbers are generated based on the order in which they appear on the COC, the formal sample number is the project number followed by the reported sample ID. Samples containing multiple layers were first separated into individual samples for each layer and analyzed separately, specific layers were identified based on regions of homogeneity. All asbestos concentrations are reported as a percent of the total material in the layer as estimated by a calibrated visual estimate. Samples whose asbestos concentration is below the limit of detection shall be marked as "None Detected". Sarcova Industries Inc. maintains a proficient status in the AIHA Proficiency Analytical Testing (PAT) Programs' Bulk Asbestos Proficiency Analytical Testing (BAPAT) program.

The results presented in this report are strictly valid for the samples received by the laboratory personnel and as such are subject to error generated during sampling. These results may not be reproduced, except in full, without the expressed permission of Sarcova Industries Inc. management.

Samples are archived for four weeks after analysis. Samples that are not retrieved by the client will be disposed of in accordance with local regulations.

Sincerely,

A handwritten signature in black ink, appearing to read "Patrick O'Donnell".

Patrick O'Donnell M.Sc.,
Quality Assurance Officer



Sarcova Industries Inc.
8036 Winston Street
Burnaby, B.C. V5A 2H5
604.336.9880 | www.sarcova.com

Bulk Material Asbestos Analysis Results

Sarcova

Client: EcoHazMat
Client Project #: ECO-1249
Phone: 1-778-874-8990

Project Location: 1296 Wolfe Avenue, Vancouver BC
Relinquished By: Jeff Goulet
Received By: Veronika Ebenal

Project Number: BS3581
Date Received: 2019-05-24
Samples Received: 12

SAMPLE ID	SAMPLE LOCATION	LAYER	MATERIAL DESCRIPTION	NON-FIBROUS MATERIAL	NON-ASB FIBROUS MATERIAL	ASBESTOS TYPE AND PERCENTAGE
1	UL Master Bedroom Closet South	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
2	UL Main Washroom West	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
3	UL Hallway Linen Closet West	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
4	LL Boiler Room South	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
5	LL Kitchen North	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
6	LL South Bedroom South	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
7	LL Hallway At Boiler Room South	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
8	LL Green North Hallway Closet South	1	Drywall Joint Compound	Gypsum	Cellulose-1%	None Detected
10	UL Main Washroom Floor Multi-Layer	1	Vinyl Sheet Floor (Beige)	Vinyl, Binders	-	None Detected
		2	Fibrous Backing (Beige)	Binders	Cellulose-80%, Fibre Glass-10%	None Detected
		3	Vinyl Floor Tile (Off-White)	Vinyl, Binders, Quartz	-	Chrysotile - 1%
		4	Mastic (Yellow)	Yellow Brittle Material	-	None Detected
		5	Vinyl Floor Tile (Blue)	Vinyl, Binders, Quartz	-	None Detected
		6	Fibrous Backing (Black)	Black Soft Material	Cellulose-90%	None Detected

 **AIHA
PAT
PROGRAMS**
Lab ID# 206527

Sarcova Industries Inc. maintains a proficient status in the American Industrial Hygiene Association (AIHA) Bulk Asbestos Proficiency Analytical Testing (BAPAT) Program.

Analyst: Christina Majano
Analysis Date: 2019-05-28
Turn-around Time: 2 Day

Reviewed By: Patrick O'Donnell


Patrick O'Donnell, QA Officer

Sarcova Industries Inc.
8036 Winston Street
Burnaby, B.C. V5A 2H5
604.336.9880 | www.sarcova.com

Bulk Material Asbestos Analysis Results

Sarcova

Client: EcoHazMat
Client Project #: ECO-1249
Phone: 1-778-874-8990

Project Location: 1296 Wolfe Avenue, Vancouver BC
Relinquished By: Jeff Goulet
Received By: Veronika Ebenal

Project Number: BS3581
Date Received: 2019-05-24
Samples Received: 12

SAMPLE ID	SAMPLE LOCATION	LAYER	MATERIAL DESCRIPTION	NON-FIBROUS MATERIAL	NON-ASB FIBROUS MATERIAL	ASBESTOS TYPE AND PERCENTAGE
11	LL Boiler Room Hard Pack Pipe Elbow	1	Pipe Insulation (Grey)	Binders	Cellulose Mesh	Chrysotile – 60%
12	LL Boiler Room Air Cell Pipe Run	1	Pipe Insulation (Grey)	Binders	Cellulose Mesh	Chrysotile – 60%
13	UL Attic	1	Insulation (Pink)	Binders	Fibre Glass-95%	None Detected
		2	Insulation (Brown)	Binders	Fibre Glass-1%	None Detected
		3	Mastic (Black)	Black Soft Material	-	None Detected

 AIHA
PAT
PROGRAMS
Lab ID# 206527

Sarcova Industries Inc. maintains a proficient status in the American Industrial Hygiene Association (AIHA) Bulk Asbestos Proficiency Analytical Testing (BAPAT) Program.

Analyst: Christina Majano
Analysis Date: 2019-05-28
Turn-around Time: 2 Day

Reviewed By: Patrick O'Donnell


Patrick O'Donnell, OA Officer

Chain of Custody



EcoHazMat

Sarcova Industries Inc.

B53581

12

Billing Information

Project Information

Page 1 of 1

Company:	EcoHazMat	Project #:	ECO-1249
Address:	PO Box 31029 St Johns St	Contractor:	
City/Prov/PC:	Port Moody, BC, V3H 4T4	Site Location:	1296 Wolfe Avenue, Vancouver, BC
Contact Name:	Jessica Porter	PO #	
Contact Phone:	778-874-8990	Sampled By:	Jeff Goulet 604-789-4269
Email (results):	results@ecohazmat.ca	Date Sampled:	May 24, 2019
Email (invoice):	jessica@ecohazmat.ca	Results by:	3 Day TAT

Sample #	Sample Location	Sample Material
1	UL - Master Bedroom Closet - S	DTC
2	UL - Main Washroom - W	DTC
3	UL - Hallway Linnen Closet - W	DTC
4	LL - Boiler Room - S	DTC
5	LL - Kitchen - N	DTC
6	LL - South Bedroom - S	DTC
7	LL - Hallway @ Boiler Room - S	DTC
8	LL - Green N. Hallway Closet - S	DTC
9		
10	UL - Main Washroom Floor - Multi-layer	VSF + VFT
11	LL - Boiler Room - Hardpack Pipe Elbow	Pipe Insulation
12	LL - Boiler Room - AirCell Pipe Run	Pipe Insulation
13	UL - Attic	Attic Insulation
14		
15		
16		
17		
18		
19		
20		
21		
22		
23		
24		
25		

Notes:

Relinquished by:

Date:

Jeff Goulet

May 24, 2019

Received by:

Date:

VE

2019-05-24

Z

2019-05-27



Please find attached the analysis results for the samples submitted for Lead content analysis to Sarcova Industries Inc.

All samples were analyzed using EPA SW 846 3050B/7000B method. Samples where less than 0.2g dry weight of matrix material were submitted will be marked as Insufficient for analysis. Sample numbers are generated first chronologically by the submission date, followed by sequentially based on the order they appear on the completed COC. Unless otherwise stated all quality control and assurance samples analyzed were within acceptable limits. Samples whose lead concentration is below the Reporting Limit will be marked as "<0.009%".

Materials containing greater than 90 ppm or 0.009% lead are considered to be lead containing, and a qualified person should be consulted on the regional regulations concerning removal and disposal.

The results presented in this report are strictly valid for the samples received by the laboratory personnel and as such are subject to error generated during sampling. These results may not be reproduced, except in full, without the expressed permission of Sarcova Industries Inc. management.

Reasonable excess quantities of samples are archived for four weeks after analysis. Samples that are not retrieved by the client will be disposed of in accordance with local regulations.

Sincerely,

A handwritten signature in black ink, appearing to read "Patrick O'Donnell", is written over a horizontal line.

Patrick O'Donnell M.Sc.,
Quality Assurance Officer

Analysis Results: Lead in Paint Chips by FAAS

Project Number:	LS0591 ECO-1249	Client:	EcoHazMat
Analyst:	VE	Contact:	Jessica Porter (778-874-8990)
Analysis Date:	2019-05-27	Project:	1296 Wolfe Avenue, Vancouver BC
Analysis Method:	EPA SW846 3050/7000B		

Client Samples

LS0591-1	Location	LL - West Bedroom - White on Wood Window Sill		
	Sample Weight (g)	Sample Conc. (ppm)	Sample % by weight	
	0.2251	< 90	< 0.009	
LS0591-2	Location	LL - West Bedroom - Black on Ceramic Tile Hearth		
	Sample Weight (g)	Sample Conc. (ppm)	Sample % by weight	
	0.2325	9569.892473	0.957	
LS0591-3	Location	UL - Main Washroom - White on Wood Door		
	Sample Weight (g)	Sample Conc. (ppm)	Sample % by weight	
	0.2159	97.26725336	0.010	

Standard Absorbances

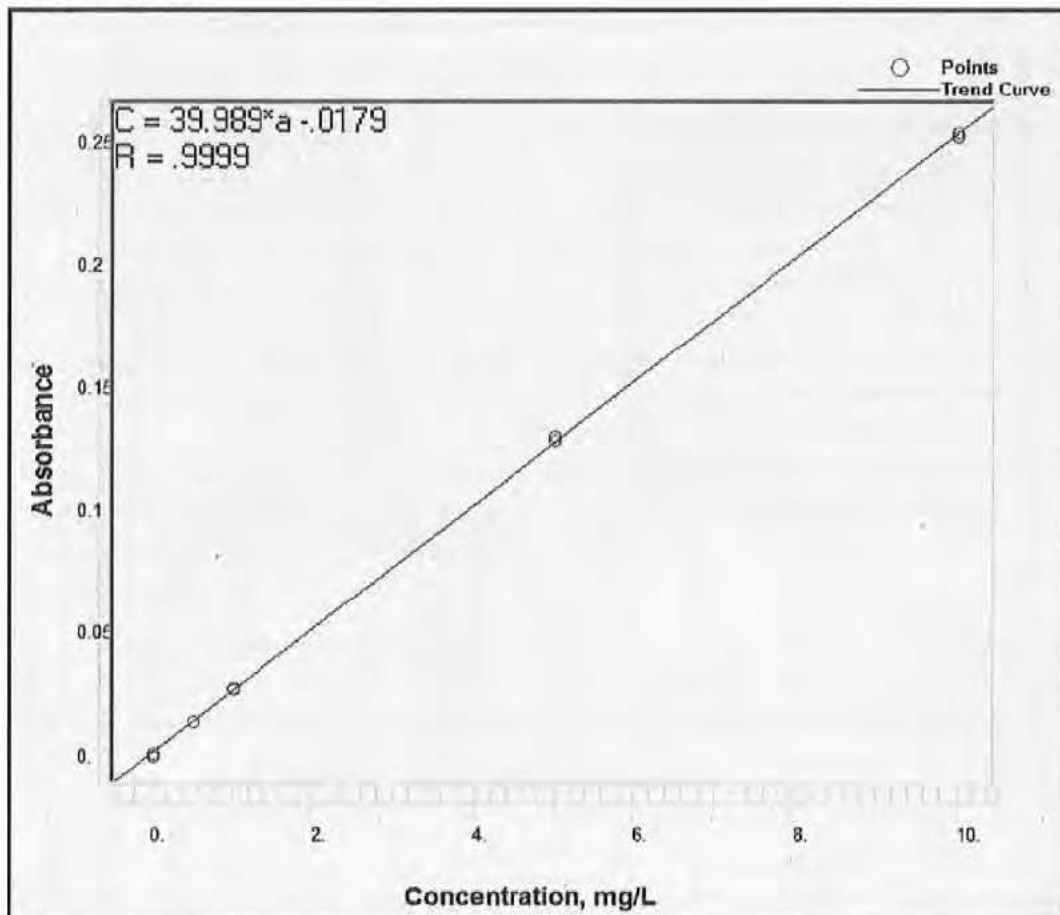
Blank	0.5ppm	1ppm	5ppm	10ppm
-0.0007	0.0129	0.0259	0.1272	0.2496

Batch: 27051901

QA/QC Samples

	Expected Range		Actual	PASS?
MSD	75%	125%	77.91%	Y
LCS	70.3	118.3	77.35	Y
ICV	0.11448	0.13992	0.1308	Y
ICB	-	0.0050	-0.0007	Y
CCV	0.11448	0.13992	0.1282	Y
CCB	-	0.0050	-0.0009	Y
MB	-	0.0050	-0.0009	Y

Standard Curve




Lead (Pb) Analysis Chain of Custody

Sarcova Project #

LS0591

Client:	EcoHazMat
Email:	results@ecohazmat.ca
Phone:	778-874-8990
Project Location:	1296 Wolfe Avenue, Vancouver, BC
Client Project #	ECO-1249

Select	Matrix	Method	Reporting Limit
<input checked="" type="checkbox"/>	Paint Chips	SW846-7000B FAAS	100ppm (0.01%)
<input type="checkbox"/>	Air	NIOSH 7082 FAAS	5µg/sample
<input type="checkbox"/>	Wipe (ASTM E1792)	SW846-7000B FAAS	10µg/sample
<input type="checkbox"/>	Water	SW846-7000B FAAS	0.4ppm
Sampler Name: Jeff Goulet		Signature: 	
Turn Around Time <input type="checkbox"/> 1 Hour <input type="checkbox"/> 4 Hour <input type="checkbox"/> 24 Hour <input type="checkbox"/> 2 Day <input checked="" type="checkbox"/> 3 Day			


Sample #	Location	Volume/Area	Date Sampled
L01	LL - W Bedroom - White on Wood Window Sill		May 24, 2019
L02	LL - W Bedroom - Black on Ceramic Tile Hearth		May 24, 2019
L03	UL - Main Washroom - White on Wood Door		May 24, 2019

Number of samples: 3 Date: May 24, 2019 Time: 2:00pm

Relinquished By:

Jeff Goulet

Print



Signature

LAB USE ONLY

Received By:

VE

Date: 2019-05-24 Time: 2

Comments:

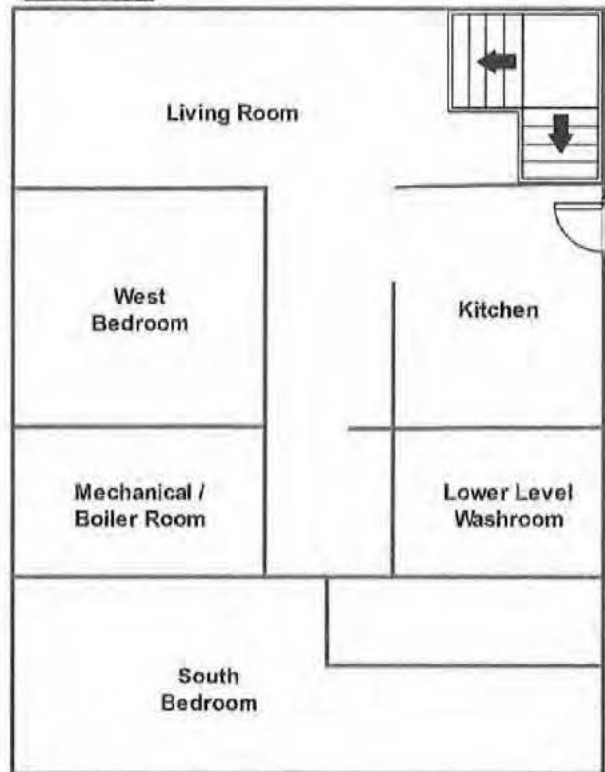
Site Sketch



Upper Level



Lower Level



ECO-1249 - 1296 Wolfe Avenue, Vancouver, BC

Site Address:
1296 Wolfe Avenue, Vancouver, BC



MOULD ASSESSMENT

PRELIMINARY INVESTIGATION - MOULD AND RODENT DROPPINGS



INSPECTION DATE	May 24, 2019
REPORT DATE	May 31, 2019
CLIENT NAME	Shaughnessy Residents Association
INSPECTOR NAME	Jeff Goulet
BUILDING INSPECTOR	ON-4644-8267-042919 / 4646-2849-040418
LEAD INSPECTOR	3560-16-C27-25261
LEAD RISK ASSESSOR	3578-16-C31-25261

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1.0 INTRODUCTION

EcoHazMat was requested, by the Shaughnessy Residents Association, to complete a preliminary mould and rodent dropping investigation and assessment of the **residence located at 1296 Wolfe Avenue, Vancouver, BC**. This assessment does not provide adequate detail for a complete property hazardous material assessment. This report may not be used for renovation or demolition purposes.

On May 24, 2019, *EcoHazMat* collected three Air-O-Cell (mould air) samples and submitted them for analysis. Air sampling results identified *Ulocladium sp.*, which is an indicator of a potential moisture issue and active mould growth. This corroborates the fact that mould was observed on walls and ceilings in both washrooms. **Please see recommendations 3.1.** Laboratory results can be found in Appendix A. Rodent droppings were observed in the attic space and a strong smell of rodent urine was present in the lower level mechanical room. **Please see recommendations 3.2.**

1.1 SCOPE OF WORK

This report is to be used solely the residence located at 1296 Wolfe Avenue, Vancouver, BC. The assessment was limited to the interior living space, including the mechanical room, and the attic of the residence.

The purpose of the assessment is to investigate the presence of mould by detecting and identifying specific fungal spores via air sampling, as well as to establish if rodents have contaminated, with feces and urine, areas throughout the residence. Deconstructive investigation was not performed.

This assessment does not form a complete mould or rodent dropping investigation for the residence.

1.2 LAB ANALYTICAL METHOD

Mould Air-O-Cell/Spore Trap Samples

All air samples submitted to the laboratory were analyzed using the method of analysis based on *ASTM D7391 - 09 Standard Test Method for Categorization and Quantification of Airborne Fungal Structures*. Analysis was performed according to the *SOP-MBL-M-3-Analysis of Fungi in Air Samples by Direct Microscopic Examination*. Raw counts are converted to spores/m³. Spores lacking distinguishing characteristics are reported as "Unidentified spores". Where the analyst is able to identify the group to which the spores belong but not the mould they belong to, the spores may be recorded as "Unidentified Basidiospores" or "Unidentified Ascospores". Spores of *Aspergillus* and *Penicillium* (and others such as *Acremonium*, *Paecilomyces*) are difficult to distinguish and are reported as *Aspergillus/Penicillium*.

1.3 SITE DESCRIPTION

The site located at **1296 Wolfe Avenue, Vancouver, BC** is a two-level, free-standing residence.

The lower level of the residence consists of a kitchen, family room, two bedrooms, a washroom and a mechanical/boiler room. The upper level of the residence consists of a family room, kitchen, laundry closet, main washroom, a bedroom and a master bedroom with ensuite. The attic is accessible from a ceiling hatch in the upper-level hallway.

The walls and ceilings throughout the residence are drywall. The upper-level washroom has wallpaper. The upper-level and lower washrooms have ceramic floor tiles. The flooring throughout the remainder of the residence is a mixture of carpet, hardwood, laminate and ceramic tiles.

Mould was observed on the walls and ceilings in the upper and lower washrooms. The washroom exhaust fans were present but non-operational. No signs of active water leaks or musty odours were present at the time of the investigation. Rodent droppings were observed in the attic space and a strong smell of rodent urine was present in the lower level mechanical room.

All other areas out of the scope of work.

2.0 SUMMARY OF FINDINGS

2.1 MOULD

Mould and Indoor Air Quality is referred to under Part 4 (Section 79) of the WorkSafeBC OH&S Guidelines. These guidelines describe moulds as the following:

"Moulds are part of the fungi kingdom and serve an important role in breaking down organic matter. They are found both outdoors and indoors. Fungi can form a colony, which is a visible mass of interwoven filaments that may appear cottony, velvety, granular, or leathery. Fungi can be any colour but usually will appear as a shade of white, grey, brown, yellow, or green..."

A. AIR-O-CELL

Three (3) Air-O-Cell (spore trap) samples were collected. Interpretation of results comes down to comparing types and levels of mould in different areas. This means comparing mould found in the air in areas where a problem is thought to exist (inside) to those taken from an area thought to be 'normal' (inside and outside).

Air sampling results revealed mould spore types on the indoor samples that do not appear in the outdoor reference sample. Total airborne fungal spore counts for all the samples are low; however, *Ulocladium sp.* spores were found in the upper washroom air sample. This type of mould indicates a potential moisture issue and active mould growth. All sources of mould growth should be rectified and all mould impacted materials should be removed or cleaned and encapsulated. **Please see recommendations 3.1.**

B. VISUAL ASSESSMENT

A visual assessment was conducted to identify the presence of mould on building materials within the residence. Mould was observed on the walls and ceilings for the upper washroom, as well as the ceiling of the lower washroom. **Please see recommendations 3.1.**

2.2 HANTAVIRUS (RODENT DROPPINGS)

Hantavirus Pulmonary Syndrome (HPS) is a potentially deadly disease transmitted by rodents. People can get HPS when they come into contact with infected rodents, their urine, droppings, or saliva. Rodent droppings were observed in the attic. **Please see recommendations 3.2.**

A. VISUAL ASSESSMENT

Rodent droppings were observed in the attic space and a strong smell of rodent urine was present in the lower level mechanical room. **Please see recommendations 3.2.**

3.0 RECOMMENDATIONS

The moulds detected and identified suggest that there is a moisture problem and active mould growth, which is potentially a health hazard. Clean-up/remediation is required. *EcoHazMat* recommends removing moisture laden and mould impacted materials in the upper and lower level washrooms. **Please see Section 3.1.** The source of the moisture problem should also be fixed to prevent reoccurrence. Remediation should be conducted by a Qualified Hazardous Materials Remediation Professional. Post-remediation air sampling should be conducted prior to the installation of new materials to confirm successful remediation.

The rodent droppings are potentially a health hazard. *EcoHazMat* recommends retaining a qualified hazardous materials remediation professional to clean up the rodent droppings and any contaminated materials.

3.1 MOULD

EcoHazMat recommends all work be conducted in accordance with CCA (Canadian Construction Association) Mould Guidelines for the Canadian Construction Industry and WorkSafeBC regulations and the guidelines. Appropriate personal protective equipment (PPE), decontamination and safe work procedures must be used any time workers are disturbing mould.

Guidelines 4.79 -Moulds and indoor air quality- Table 1: Guide for Removing Visible Mould Growth in the Indoor Environment.

A. CLEAN UP/REMEDIATION

Approximate surface areas affected in the:

- Upper washroom: 8 to 28 Sq.Ft.
- Lower washroom: 1 to 2 Sq.Ft.

It is recommended that a professional restoration/abatement company be retained to remediate and remove all mould-impacted materials in the upper and lower washrooms. All affected materials must be removed and disposed of using appropriate remediation procedures and in accordance with WorkSafeBC and BC Ministry of Environment.

To prevent further moisture related issues and subsequent mould growth, all efforts should be made to ensure that the upper and lower washrooms of **1296 Wolfe Avenue, Vancouver, BC** are kept dry and the humidity controlled.

Post-remediation inspection and air sampling is recommended.



Lower Washroom - Mould on Drywall Ceiling



Lower Washroom - Mould on Drywall Ceiling



Upper Washroom - Mould on Drywall Ceiling and Wallpaper



Upper Washroom - Mould on Drywall Ceiling and Wallpaper

3.2 RODENT DROPPINGS - HANTAVIRUS

EcoHazMat recommends all work be conducted in accordance with WorkSafeBC Hantavirus/Rodent Droppings regulations and the guidelines. Appropriate personal protective equipment (PPE), decontamination and safe work procedures must be used any time workers are disturbing rodent droppings.

A. CLEAN-UP/REMEDIATION

Approximate surface areas affected: Attic and Mechanical/Boiler Room – 300 to 500 Sq.Ft.

It is recommended that a professional restoration/abatement company be retained to remediate and remove all rodent dropping impacted materials in the attic space and mechanical/boiler room. All affected materials must be removed and disposed of using appropriate remediation procedures and in accordance with WorkSafeBC and BC Ministry of Environment.

To prevent further rodent infestation and subsequent rodent droppings, all efforts should be made to ensure that the pathways to which the rodents enter the residence are sealed and **1296 Wolfe Avenue, Vancouver, BC** engage a pest control company to control the population of rodents in and around the residence.



Attic – Rodent Droppings



Attic – Rodent Droppings and tripped rodent trap

4.0 LIMITATIONS

Mould air sampling only offers evidence of fungal contaminants present in the samples collected. This report does not state that all or no mould has been found.

Identified rodent dropping locations are not the only locations that rodents, rodent nests and rodent droppings may be found. It should be assumed in a rodent-infested residence, there will be rodents, rodent nests and rodent droppings in the walls, ceilings and under the floors throughout the residence. This report does not state that all or no rodent droppings have been found.

Information provided within this report is intended for client use only. *EcoHazMat* will not provide results or information to any party other than the client.

Prepared and reviewed by:

Jeff Goulet, AHERA Building Inspector

Dallas Jones, Dipl. OHS, B. Kin.

Please call Jessica Porter with any questions regarding this report at 778-874-8990.

Project #: ECO-1249-M01



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More Than Just Lab Results

Laboratory Analytical Results

CONTACT NAME:	Jeff Goulet	TYPE OF SAMPLES:	Air: Air-O-Cell	PROJECT NAME:	1296 Wolfe Avenue Vancouver BC
COMPANY:	Ecohazmat Ltd.	NO. OF SAMPLES:	3	PROJECT NO:	ECO-1249
ADDRESS:		DATE COLLECTED:	May 24, 2019	LAB REFERENCE:	MBC6088ANO
		DATE RECEIVED:	May 24, 2019	ANALYSED BY:	Ali Golestani, PGDip.
		DATE ANALYSED:	May 27, 2019	REVIEWED BY:	Georget Shamon, PhD,
PHONE:	604-789-4269	DATE REPORTED:	May 28, 2019		

Method of Analysis: Based on ASTM D7391 - 09 Standard Test Method for Categorization and Quantification of Airborne Fungal Structures

Analysis is performed according to the SOP-MBL-M-3- Analysis of Fungi in Air Samples by Direct Microscopic Examination (DME). The slide impacted with air sample is placed on a drop of lactophenol cotton blue on a clean microscope slide and subsequently scanned at X 100 or X 200 magnification to give the analyst an overview of sample deposition and the diversity of the spores present on the slide. The slide is then analysed at X400 or X600 magnification by counting and identifying spores in at least 20% of the sample deposition area. Spores occurring in chains are counted individually. Raw counts are converted to spores/m³ of air. Spores lacking distinguishing characteristics are reported as "Unidentified spores". Where the analyst is able to identify the group to which the spores belong but not the mould they belong to, the spores may be recorded as "Unidentified Basidiospores or Unidentified Ascospores". Spores of *Aspergillus* and *Penicillium* (and others such as *Acremonium*, *Paecilomyces*) are difficult to distinguish and are reported as *Aspergillus/Penicillium*.

A scale of 0 to 5+ is used to rate abundance of non-fungal material (debris), with 5+ indicating the largest amount. Large amounts of debris may obscure small spores. Therefore, counts from samples with 5+ non-fungal material may be treated as undercounts. Except for blanks, samples with no detected spores are recorded as "less than the method detection limit" (MDL). Results are not corrected for blanks.

Summary Results/Interpretation or Comments (where applicable):

Please see results on page 2. Compared with the outdoor reference sample, the total fungal spore counts for the indoor air samples are likely background level. However, any visible mould growth indoors should be removed, and the moisture source identified and fixed so as to control mould growth.



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More Than Just Lab Results

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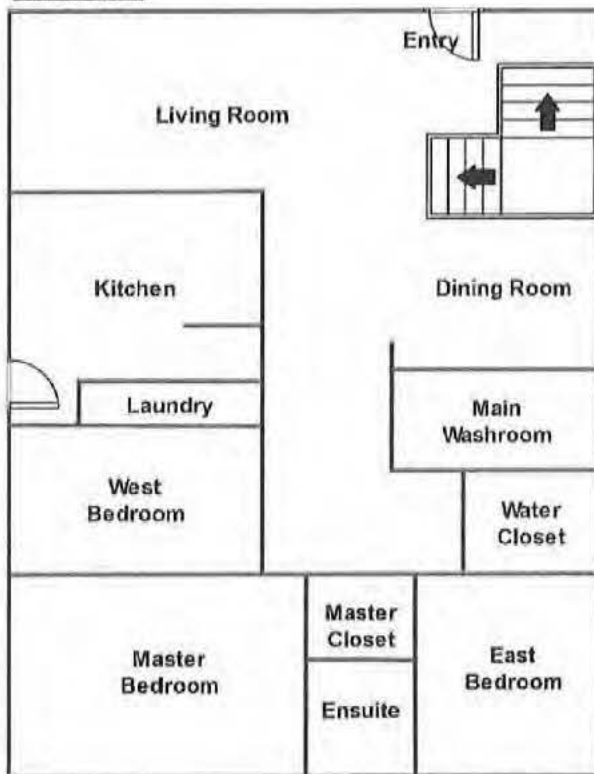
References

1. ASTM Designation: D 7391-09. Standard Test Method for Categorization and Quantification of Airborne Fungal Structures in an Inertial Impaction Sample by Optical Microscopy.
2. Illustrated Genera of Imperfect Fungi. Barnett H.L. and B. Hunter Barry. Burgess Publishing Company, Edition 3. 1972. ISBN 8087-0266-1
3. Sampling and Identifying Allergenic Pollens and Molds. An Illustrated Identification Manual for Air Samples. Edited by E. Grant Smith. Blewstone Press. San Antonio, Texas. 2000. ISBN 0-930961-02-1
4. The Air Spora. A Manual for Catching and Identifying Airborne Biological Particles. Edited by Maureen E. Lacey and J. S. West, 2006. ISBN-13 978-0-378-30252

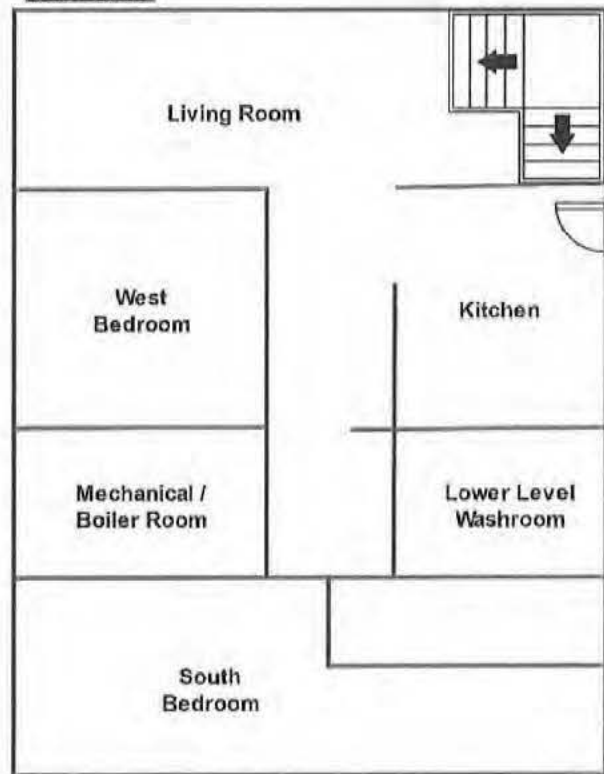
Site Sketch



Upper Level



Lower Level



ECO-1249 - 1296 Wolfe Avenue, Vancouver, BC

Arcangel, Dallas

From: Brian Roberts s.22(1)
Sent: Thursday, June 27, 2019 10:39 AM
To: Arcangel, Dallas
Cc: margo.davis@vancouver.ca; Chen, Ingrid; Sharif, Dorsai; Petersen, Marisol; andrea.sawczenko@vch.ca; kitty.minions@vch.ca; City of Vancouver - Short-term Rentals
Subject: Re: 1296 Wolfe Avenue - Development Application Number DP.2017.00762
Attachments: ECO-1249 - L02 - 1296 Wolfe Avenue, Vancouver, BC.pdf; ECO-1249 - M01 - 1296 Wolfe Avenue, Vancouver, BC.pdf

Dear Ms. Arcangel:

Thank you for forwarding the decision notice on the file noted above. In reviewing the notification letter, we note a number of conditions which the applicant will be required to meet and as such, we would ask to be kept apprised of any changes to/relaxation of these conditions or changes to status of the application process.

→ *notify if DP issued &/or refused or withdrawn.*

Further, in reviewing the notification document and related required conditions, we do not see any mention of any hazardous materials and mould investigation and/or remediation. We wanted to advise you that since our group last met with you and your colleagues, we have been able to observe and confirm that 1296 Wolfe Avenue is a very serious health hazard to any human occupant and, as concerned citizens, would request that the City ensure that appropriate assessment and remediation work be undertaken immediately with respect to the lawful, safe use of this property. Specifically, we have received confirmation that the property is contaminated with (a) active mould growth, (b) rodent droppings and rodent urine, (c) asbestos and (d) lead, as noted in the attached formal environmental reports.

These findings are of serious concern to us both with respect to the topic development permit application process but also with respect to the fact that during this interim application process, this property is being operated on a full-time basis as an Airbnb, and is being used by large groups of people including young children. We would also add that this Airbnb is in contravention of the City of Vancouver's Short Term Rental bylaws as the property is not the principal residence of the operator. We have advised the Short Term Rental department of the foregoing and were told that the department has a "current and active investigation" underway on this short term rental property.

Yours truly,

Brian Roberts, on behalf of the First Shaughnessy Estates Owners Group