

Montgomery County Public Schools Lead in Drinking Water Testing Report

Fox Chapel Elementary School
19315 Archdale Rd.
Germantown, MD 20876

Report Date: April 29th, 2024

LEAD IN DRINKING WATER SAMPLE RESULTS SUMMARY

All Maryland public and nonpublic schools are required to sample all drinking water outlets for the presence of lead pursuant to the Code of Maryland Regulations (COMAR). Montgomery County Public Schools (MCPS) is required to remediate outlets where lead in drinking water concentrations exceed the State Action Level (AL) of 5 parts per billion (ppb). A summary of the lead in water initial samples collected by Inspection Experts Inc. is presented in the table below.

Sampling Date	3/5/2024
# of Outlets Tested	41
# of Outlets \geq 5 ppb	5

NEXT STEPS

If an initial sample exceeds the AL (5 ppb), the outlet will be shut-down within 24 hours, a follow-up sample collected, and a remedial plan of action developed for this outlet. No additional sampling or remedial actions are required for schools where all initial samples are below the AL.

HEALTH EFFECTS OF LEAD

Lead can cause serious health problems if too much enters your body from drinking water or other sources. It can cause damage to the brain and kidneys, and can interfere with the production of red blood cells that carry oxygen to all parts of your body. The greatest risk of lead exposure is to infants, young children, and pregnant women. Lead is stored in the bones and it can be released later in life. During pregnancy, the fetus receives lead from the mother's bones, which may affect brain development. Scientists have linked the effects of lead on the brain with lowered IQ in children. Adults with kidney problems and high blood pressure can be affected by low levels of lead more than healthy adults.

SOURCES OF HUMAN EXPOSURE TO LEAD

There are many different sources of human exposure to lead. These include: lead-based paint, lead-contaminated dust or soil, some plumbing materials, certain types of pottery, pewter, brass outlets, food, cosmetics, exposure in the work place and from certain hobbies. According to the Environmental Protection Agency (EPA), 10 to 20 percent of a person's potential exposure to lead may come from drinking water, while for an infant consuming formula mixed with lead-containing water this may increase to 40 to 60 percent.

TO REDUCE EXPOSURE TO LEAD IN DRINKING WATER:

1. Run your water to flush out lead: If water hasn't been used for several hours, run water for 15 to 30 seconds or until it becomes cold or reaches a steady temperature before using it for drinking or cooking.
2. Use cold water for cooking and preparing baby formula: Lead from the plumbing dissolves more easily into hot water.

**Please note that boiling the water will not reduce lead levels.*

ADDITIONAL INFORMATION

1. For additional information, please contact Brian Mullikin, Environmental Team Leader, at 240.740.2324 or brian_a_mullikin@mcpsmd.org.
2. For additional information on reducing lead exposure around your home/building and the health effects of lead, visit EPA's website at www.epa.gov/lead.
3. If you are concerned about exposure; contact your local health department or healthcare provider to find out how you can get your child tested for lead.

Please refer to the attachment(s) for additional water sampling information.

Attachment(s) A – Lead in Water Sample Results Table

ATTACHMENT A

Lead in Water Sample Results Table

Sampling Results for Fox Chapel ES

Outlet Barcode	Outlet Location	Outlet Type	Initial Results (ppb)	Pass/Fail	Status
LW10707	In health room	Faucet, Cold	<1.0	Pass	Testing Complete
LW10706	In classroom 100 adjacent to entrance	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW01975	In classroom 10	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW01977	In classroom 4	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW01978	In hallway across from gym	Drinking Water Fountain - Cooler/Chiller Style	<1.0	Pass	Testing Complete
M22237	In kitchen back wall	Faucet, Cold	24.8	Fail	Remediation Action Plan
M22238	In kitchen back wall	Faucet, Cold	6.8	Fail	Remediation Action Plan
M22261	In hallway across from CR 3	Drinking Water Fountain - Cooler/Chiller Style	<1.0	Pass	Testing Complete
M22306	In hallway across from CR 19	Drinking Water Fountain - Cooler/Chiller Style	<1.0	Pass	Testing Complete
M50627	In break room 118	Faucet, Cold	1.0	Pass	Testing Complete
M50628	In classroom 108 inside CR 108	Drinking Water Fountain - Cooler/Chiller Style	<1.0	Pass	Testing Complete

Outlet Barcode	Outlet Location	Outlet Type	Initial Results (ppb)	Pass/Fail	Status
M50630	In classroom 108	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
M50633	In classroom 110	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
M50640	In hallway across from CR 138	Drinking Water Fountain - Cooler/Chiller Style	<1.0	Pass	Testing Complete
M50641	In hallway across from CR 138	Drinking Water Fountain - Cooler/Chiller Style	<1.0	Pass	Testing Complete
M50646	In classroom 138	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
M50650	In classroom 144	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
M50652	In classroom 148	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
M50654	In classroom 150	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW12998	In classroom 41	Drinking Water fountain - Bubblers Style	2.0	Pass	Testing Complete
LW01897	In classroom 125	Drinking Water fountain - Bubblers Style	3.7	Pass	Testing Complete
LW01882	In classroom 112	Drinking Water fountain - Bubblers Style	11.3	Fail	Remediation Action Plan
M50648	In classroom 142	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete

Outlet Barcode	Outlet Location	Outlet Type	Initial Results (ppb)	Pass/Fail	Status
M50635	In classroom 110	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW01891	In classroom 101	Drinking Water fountain - Bubblers Style	2.2	Pass	Testing Complete
LW13001	In classroom 162	Drinking Water fountain - Bubblers Style	5.7	Fail	Remediation Action Plan
LW01880	In classroom 111	Drinking Water fountain - Bubblers Style	4.1	Pass	Testing Complete
LW01905	In classroom 110	Drinking Water fountain - Bubblers Style	3.7	Pass	Testing Complete
LW12997	Hallway across classroom Gym	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW13000	Hallway across classroom 132	Drinking Water fountain - Bubblers Style	1.4	Pass	Testing Complete
LW12999	In classroom 40	Drinking Water fountain - Bubblers Style	3.1	Pass	Testing Complete
LW12995	In hallway across from all purpose room	Bottle filler	<1.0	Pass	Testing Complete
LW12996	In hallway across from all purpose room	Bottle filler	<1.0	Pass	Testing Complete
LW01901	In classroom 164	Drinking Water fountain - Bubblers Style	191.0	Fail	Remediation Action Plan
LW01907	In classroom 159	Drinking Water fountain - Bubblers Style	2.4	Pass	Testing Complete

Outlet Barcode	Outlet Location	Outlet Type	Initial Results (ppb)	Pass/Fail	Status
LW01925	In classroom 27	Drinking Water fountain - Bubblers Style	1.8	Pass	Testing Complete
LW01965	In classroom 24	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW01968	In hallway across from 20	Drinking Water Fountain - Cooler/Chiller Style	<1.0	Pass	Testing Complete
LW01969	In hallway across from 20	Drinking Water Fountain - Cooler/Chiller Style	3.7	Pass	Testing Complete
LW01971	In classroom 16	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete
LW01973	In classroom 14	Drinking Water fountain - Bubblers Style	<1.0	Pass	Testing Complete

Montgomery County Public Schools Lead in Drinking Water Testing Report

Fox Chapel Elementary School
19315 Archdale Road
Germantown, MD 20876

Report Date: February 16th, 2022

LEAD IN DRINKING WATER SAMPLE RESULTS SUMMARY

All Maryland public and nonpublic schools are required to sample all drinking water outlets for the presence of lead pursuant to the Code of Maryland Regulations (COMAR). Montgomery County Public Schools (MCPS) is required to remediate outlets where lead in drinking water concentrations exceed the Montgomery County Action Level (AL) of 5 parts per billion (ppb). A summary of the lead in water initial samples collected by SaLUT are presented in the table below.

Sampling Date	10/21/2021
# of Outlets Tested	61
# of Outlets \geq 5 ppb	18

NEXT STEPS

If an initial sample exceeds the AL (5 ppb), the outlet will be immediately shut-down, a follow-up sample collected, and a remedial plan of action developed for this outlet. No additional sampling or remedial actions are required for schools where all initial samples are below the AL.

HEALTH EFFECTS OF LEAD

Lead can cause serious health problems if too much enters your body from drinking water or other sources. It can cause damage to the brain and kidneys, and can interfere with the production of red blood cells that carry oxygen to all parts of your body. The greatest risk of lead exposure is to infants, young children, and pregnant women. Lead is stored in the bones and it can be released later in life. During pregnancy, the fetus receives lead from the mother's bones, which may affect brain development. Scientists have linked the effects of lead on the brain with lowered IQ in children. Adults with kidney problems and high blood pressure can be affected by low levels of lead more than healthy adults.

SOURCES OF HUMAN EXPOSURE TO LEAD

There are many different sources of human exposure to lead. These include: lead-based paint, lead-contaminated dust or soil, some plumbing materials, certain types of pottery, pewter, brass fixtures, food, cosmetics, exposure in the work place and from certain hobbies. According to the Environmental Protection Agency (EPA), 10 to 20 percent of a person's potential exposure to lead may come from drinking water, while for an infant consuming formula mixed with lead-containing water this may increase to 40 to 60 percent.

TO REDUCE EXPOSURE TO LEAD IN DRINKING WATER:

1. Run your water to flush out lead: If water hasn't been used for several hours, run water for 15 to 30 seconds or until it becomes cold or reaches a steady temperature before using it for drinking or cooking.
2. Use cold water for cooking and preparing baby formula: Lead from the plumbing dissolves more easily into hot water.

**Please note that boiling the water will not reduce lead levels.*

ADDITIONAL INFORMATION

1. For additional information, please contact Brian Mullikin, Environmental Team Leader, at 240.740.2324 or brian_a_mullikin@mcpsmd.org.
2. For additional information on reducing lead exposure around your home/building and the health effects of lead, visit EPA's website at www.epa.gov/lead.
3. If you are concerned about exposure; contact your local health department or healthcare provider to find out how you can get your child tested for lead.

Please refer to the attachment(s) for additional water sampling information.

Attachment(s) A – Lead in Water Sample Results Table

ATTACHMENT A

Lead in Water Sample Results Table

Sampling Results for Fox Chapel ES

Fixture Barcode	Fixture Location	Fixture Type	Initial Results (ppb)	Pass/Fail	Follow up Results (ppb)	Status
LW01879	In Classroom 111	Classroom Sink	11.3	Fail	14.2	Testing Complete
LW01881	In classroom 112	Classroom Combination Sink	4.6	Pass	N/A	Testing Complete
LW01882	In classroom 112	Classroom Combination Drinking Fountain	8.0	Fail	Device Removed	Testing Complete
LW01883	In hallway across from all purpose room	Drinking Fountain	1.2	Pass	N/A	Testing Complete
LW01893	In classroom 102	Classroom Combination Sink	104	Fail	Device Removed	Testing Complete
LW01896	In classroom 125	Classroom Sink	12.8	Fail	Device Removed	Testing Complete
LW01900	In classroom 164	Classroom Combination Sink	4.8	Pass	N/A	Testing Complete
LW01901	In classroom 164	Classroom Combination Drinking Fountain	7.3	Fail	3.6	Testing Complete
LW01902	In classroom 162	Classroom Sink	5.8	Fail	Device Removed	Testing Complete
LW01907	In classroom 159	Classroom Combination Drinking Fountain	9.8	Fail	Device Removed	Testing Complete
LW01908	In classroom 161	Classroom Sink	2.7	Pass	N/A	Testing Complete
LW01912	In classroom 41	Classroom Sink	12.6	Fail	10.6	Testing Complete
LW01916	Classroom 36	Classroom Combination Sink	3.9	Pass	N/A	Testing Complete
LW01919	In classroom 32	Classroom Combination Sink	7.2	Fail	4.5	Testing Complete
LW01922	In classroom 28	Classroom Combination Sink	9.0	Fail	7.6	Testing Complete
LW01925	In classroom 27	Classroom Combination Drinking Fountain	4.6	Pass	N/A	Testing Complete
LW01964	In classroom 24	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
LW01965	In classroom 24	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
LW01966	In classroom 20	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
LW01968	In hallway across from 20	Drinking Fountain	<1	Pass	N/A	Testing Complete
LW01969	In hallway across from 20	Drinking Fountain	<1	Pass	N/A	Testing Complete
LW01970	In classroom 16	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
LW01971	In classroom 16	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
LW01972	In classroom 14	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
LW01973	In classroom 14	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
LW01974	In classroom 10	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
LW01975	In classroom 10	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
LW01976	In classroom 4	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
LW01977	In classroom 4	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
LW01978	In hallway across from gym	Drinking Fountain	2.6	Pass	N/A	Testing Complete

LW10705	In room 100 adjacent to entrance	Classroom Combination Sink	7.4	Fail	3.0	Testing Complete
LW10706	In classroom 100 adjacent to entrance	Classroom Combination Drinking Fountain	3.5	Pass	N/A	Testing Complete
LW10707	In health room	Nurses Office Sink	<1	Pass	N/A	Testing Complete
LW10708	In health room	Nurses Office Sink	3.4	Pass	N/A	Testing Complete
LW10709	In office 119	Classroom Sink	7.3	Fail	19.4	Testing Complete
LW10710	In classroom 30	Classroom Combination Sink	14	Fail	12.7	Testing Complete
LW10907	In classroom 26	Classroom Sink	11.7	Fail	3.3	Testing Complete
LW10908	In classroom 124	Classroom Combination Sink	10.5	Fail	11	Testing Complete
M22237	In kitchen ie. back wall	Kitchen Sink	15.4	Fail	10	Testing Complete
M22238	In kitchen ie. back wall	Kitchen Sink	14.9	Fail	5.4	Testing Complete
M22261	In hallway across from CR 3	Drinking Fountain	<1	Pass	N/A	Testing Complete
M22275	In classroom 132	Classroom Combination Sink	2.9	Pass	N/A	Testing Complete
M22306	In hallway across from CR 19	Drinking Fountain	<1	Pass	N/A	Testing Complete
M50627	In break room 118	Teachers Lounge Sink	1.1	Pass	N/A	Testing Complete
M50628	In classroom 108 inside CR 108	Drinking Fountain	1.6	Pass	N/A	Testing Complete
M50629	In classroom 108	Classroom Combination Sink	2.9	Pass	N/A	Testing Complete
M50630	In classroom 108	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
M50631	In classroom 109	Classroom Sink	1.2	Pass	N/A	Testing Complete
M50632	In classroom 110	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
M50633	In classroom 110	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
M50640	In hallway across from CR 138	Drinking Fountain	<1	Pass	N/A	Testing Complete
M50641	In hallway across from CR 138	Drinking Fountain	<1	Pass	N/A	Testing Complete
M50645	In classroom 138	Classroom Combination Sink	6.3	Fail	<1	Testing Complete
M50646	In classroom 138	Classroom Combination Drinking Fountain	1.5	Pass	N/A	Testing Complete
M50647	In classroom 142	Classroom Combination Sink	3.7	Pass	N/A	Testing Complete
M50649	In classroom 144	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
M50650	In classroom 144	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
M50651	In classroom 148	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
M50652	In classroom 148	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete
M50653	In classroom 150	Classroom Combination Sink	<1	Pass	N/A	Testing Complete
M50654	In classroom 150	Classroom Combination Drinking Fountain	<1	Pass	N/A	Testing Complete



Montgomery County Public Schools Lead in Drinking Water Post-Remediation Follow-Up Testing 2019

October 30, 2019

Executive Summary:

Fox Chapel Elementary School

19315 Archdale Road

Germantown, Maryland 20876

Round of Testing:	Post-Remediation Follow-up
Sample Date	1/31/2019
# of Outlets Tested:	5
# of Outlets \geq 5 ppb:	3
Low Value (ppb):	3
High Value (ppb):	35.1

Project Status

Testing Complete: Post-remediation follow-up testing completed for following rooms:

- Computer Lab 8 - Outlet (M22275) will have signage affixed
- Classroom 125 - Outlet (LW01897) will be removed from service
- Classroom 40 - Outlet (LW01910) will be removed from service
- Computer Lab 8 - Outlet (M22276) will be placed back into service
- Classroom 36 - Outlet (LW01917) will be placed back into service



October 30, 2019

Mr. Brian Mullikin, MS
Environmental Team Leader
Montgomery County Public Schools
8301 Turkey Thicket Dr., Bldg A, 1st Floor
Gaithersburg, Maryland 20879

Re: Lead in Water Post-Remediation Follow-up Testing Service

Location: Fox Chapel Elementary School

19315 Archdale Road
Germantown, Maryland 20876

Dear Mr. Mullikin:

KCI Technologies, Inc. (KCI) is pleased to submit the following report to the Montgomery County Public Schools (MCPS) for completion of the post-remediation follow-up lead in water testing at Fox Chapel Elementary School, located at 19315 Archdale Road in Germantown, Maryland 20876.

SCOPE OF SERVICES

Five drinking water outlets were remediated at Fox Chapel Elementary School due to initial lead levels that exceeded the lead action level of 5 parts per billion (ppb). KCI Technologies, Inc. conducted lead in water post-remediation follow-up testing in accordance with the Maryland Code of Regulations (COMAR) 26.16.07 - Lead in Drinking Water - Public and Nonpublic Schools.

KCI Technologies, Inc. visited the site on 1/31/2019 to collect post-remediation follow-up samples from 5 drinking water outlets that had been replaced. Samples were submitted to a laboratory for lead in water analysis using current US EPA methodology. The laboratory has been certified by the Maryland Department of the Environment to analyze drinking water for lead.

RESULTS

The initial, flush, and post-remediation follow-up results are highlighted in the summary table below:

Barcode ID	Room Number	Location	Notes	Equipment Type	Initial (ppb)	Flush (ppb)	Post-Remediation Follow-up (ppb)	Post-Remediation Follow-up Pass/Fail	Status
M22275	8	Computer Lab		Faucet	21.8	ND	10.1	Fail	Post-remediation follow-up testing complete. Outlet will have signage affixed
LW01897	125	Classroom		Faucet	88.3	14.5	24.2	Fail	Post-remediation follow-up testing complete. Outlet will be removed from service
LW01910	40	Classroom		Faucet	51.3	3.6	35.1	Fail	Post-remediation follow-up testing complete. Outlet will be removed from service
M22276		Computer Lab		Bubbler-Indoor	29.2	16.9	3	Pass	Post-remediation follow-up testing complete. Outlet will be placed back into service
LW01917	36	Classroom		Bubbler-Indoor	87	2.6	4.3	Pass	Post-remediation follow-up testing complete. Outlet will be placed back into service

DISCUSSION

Lead is a naturally occurring element that can be harmful to humans when ingested or inhaled, particularly to children under the age of six. Lead can adversely affect the development of children's brain potentially leading to detrimental alterations in intelligence and behavior. Lead has been historically used in plumbing, paint and other building materials. Lead is released into the environment from industrial sources and fuel combustion. Lead may also be found in consumer products (imported candy, medicines, toys, dishes, etc.).

Most lead leaches into drinking water from contact with plumbing components such as faucets and valves made of brass or lead-containing solder. The physical and chemical interaction that occurs between the plumbing and water directly contributes to the amount of lead that is released into the water. Although plumbing components installed prior to the 1990's could contain more lead than newer materials, the amount of lead in the drinking water cannot be predicted by the age of building. The purpose of this regulation is to establish a program to minimize the risk of exposure to lead in drinking water outlets at schools. The Environmental Protection Agency (EPA) developed the 3T's (Training, Testing, and Telling) to assist schools in reducing the lead concentrations in their drinking water. More information about 3T's can be found on the EPA website.

Simple steps like keeping your home clean and well-maintained will go a long way in preventing lead exposure. These steps include inspecting and maintaining all painted surfaces to prevent paint deterioration, using only cold water to prepare food and drinks, flushing water outlets used for drinking or food preparation, and cleaning around painted areas where friction can generate dust, such as doors, windows, and drawers. Wipe these areas with a wet sponge or rag to remove paint chips or dust, and wash children's hands, bottles, pacifiers and toys often.

Respectfully Submitted,
KCI Technologies, Inc.



Kamau McAbee
MDE Certified Water Sampler #8281KM
KCI Job #1214634186



MONTGOMERY COUNTY PUBLIC SCHOOLS DRINKING WATER TESTING 2018

June 27, 2018

Executive Summary:
Fox Chapel Elementary School
19315 Archdale Rd,
Germantown, MD 20876

Round of Testing:	Initial
# of Outlets Tested:	78
# of Outlets \geq 20 ppb:	5
Low Value (ppb):	< 1.0
High Value (ppb):	88.3
Follow-Up Testing Required (Samples \geq 20 ppb):	Room 125 (88.3 ppb) Room 40 (51.3 ppb) Room 36 (29.2 ppb) Room 8 (21.8 ppb) Room 8 (87.0 ppb)

Round of Testing:	Follow-Up – 30 sec draw
# of Outlets Tested:	5

Project Status **Testing Complete: Remediation Plan**

Classroom 125– Replace fixture (LW01897), in addition to supply line and valve located under sink
Classroom 40– Replace fixture (LW01910), in addition to supply line and valve located under sink
Classroom 36– Replace fixture (LW01917), in addition to supply line and valve located under sink
Classroom 8– Replace fixture (M22275), in addition to supply line and valve located under sink
Classroom 8– Replace fixture (M22276), in addition to supply line and valve located under sink



June 27, 2018

Mr. Brian Mullikin
Environmental Team Leader
Montgomery County Public Schools
8301 Turkey Thicket Drive
Building A, First Floor
Gaithersburg, Maryland 20879

Re: Lead in Water Testing Service

Location: Fox Chapel Elementary School
19315 Archdale Rd,
Germantown, MD 20876

Dear Mr. Mullikin:

Professional Services Industries (PSI), Inc. is pleased to submit the following report to the Montgomery County Public Schools (MCPS) for completion of initial lead in water testing at Fox Chapel Elementary School, located at 19315 Archdale Rd, Germantown, MD 20876.

Scope of Services:

PSI conducted lead in water testing at Fox Chapel Elementary School in accordance with the Environmental Protection Agency (EPA) and Maryland House Bill (HB) 270. State regulation established an action level of 20 parts per billion (ppb) to evaluate lead levels in school buildings, a concentration EPA recommends that schools take action to reduce lead below this action level. Maryland requires periodic testing for the presence of lead in drinking water in occupied public and nonpublic school buildings. EPA developed the 3T's (Training, Testing, and Telling) to assist schools in reducing the lead concentrations in their drinking water. More information about 3T's can be found on the EPA website.

PSI visited the site on 4/16/18 and 4/17/18 to collect samples from 78 drinking water outlets in accordance with current criteria described by the Maryland Department of the Environment (MDE) Draft Lead in Drinking Water—Public and Nonpublic Schools, Title 26, Subtitle 16 Lead, Chapter 07. Five 30 second follow-up samples were collected on 5/24/18.

Samples were submitted to a laboratory for lead in water analysis using current US EPA methodology. The laboratory has been certified by the Maryland Department of the Environment to analyze drinking water for lead.

Results:

There were 5 results of the initial lead in water analysis at or above 20 parts per billion (ppb) and subsequent follow up 30 second results are highlighted in the summary table below:



Barcode ID	Sample Location	Date Collected	Initial Sample Result (ppb)	Date Collected	30 Second Follow Up Sample Result (ppb)
LW01897	Reading 125	4/17/18	88.3	5/24/18	14.5
LW01910	Classroom 40	4/17/18	51.3	5/24/18	3.6
LW01917	Classroom 36	4/17/18	29.2	5/24/18	16.9
M22275	Computer Lab 8	4/17/18	21.8	5/24/18	ND
M22276	Computer Lab 8	4/17/18	87.0	5/24/18	2.6

The initial lead in water sample results (4/17/18) and 30 second follow up results (5/24/18) are shown in Attachment A.

Discussion:

Lead is a naturally occurring element that can be harmful to humans when ingested or inhaled, particularly to children under the age of six. Lead can adversely affect the development of children’s brain potentially leading to detrimental alterations in intelligence and behavior. Lead has been historically used in plumbing, paint and other building materials. Lead is released into the environment from industrial sources and fuel combustion. Lead may also be found in consumer products (imported candy, medicines, toys, dishes, etc.).

Most lead leaches into drinking water from contact with plumbing components such as faucets and valves made of brass or lead-containing solder. The physical and chemical interaction that occurs between the plumbing and water directly contributes to the amount of lead that is released into the water. Although plumbing components installed prior to the 1990’s could contain more lead than newer materials, the amount of lead in the drinking water cannot be predicted by the age of building. The purpose of this regulation is to establish a program to minimize the risk of exposure to lead in drinking water outlets at schools.

Simple steps like keeping your home clean and well-maintained will go a long way in preventing lead exposure. These steps include inspecting and maintaining all painted surfaces to prevent paint deterioration, using only cold water to prepare food and drinks, flushing water outlets used for drinking or food preparation, and cleaning around painted areas where friction can generate dust, such as doors, windows, and drawers. Wipe these areas with a wet sponge or rag to remove paint chips or dust, and wash children's hands, bottles, pacifiers and toys often.

Respectfully Submitted,

PROFESSIONAL SERVICE INDUSTRIES, INC.

Nand Kaushik, P.E.
Department Manager, Environmental Services
Nand.Kaushik@psiusa.com

Attachments: A – Lead in Water Test Summary Table

ATTACHMENT A

Fox Chapel ES Water Test Summary Table

Contractor: Professional Services Industries, Inc.

Certified Laboratory: Microbac Laboratories, Inc.

Initial Sample Results for Fox Chapel Elementary School (4/17/18)

Barcode ID	Room Number	Location	Location Notes	Equipment Type	Result (PPB)*	Pass/Fail	Status
LW01879	111	Classroom		Faucet	5.6	Pass	Testing Complete
LW01880	111	Classroom		Bubbler - Indoor	6.2	Pass	Testing Complete
LW01881	112	Classroom		Faucet	5.7	Pass	Testing Complete
LW01883		Hallway		Cooler	<1.0	Pass	Testing Complete
LW01884		Administration		Faucet	4.2	Pass	Testing Complete
LW01885	100	Health Room		Faucet	3.0	Pass	Testing Complete
LW01886	104	Classroom		Faucet	10.3	Pass	Testing Complete
LW01887	104	Classroom		Bubbler - Indoor	6.9	Pass	Testing Complete
LW01888	103	Classroom		Faucet	7.2	Pass	Testing Complete
LW01890	101	Classroom		Bubbler - Indoor	5.1	Pass	Testing Complete
LW01891	101	Classroom		Bubbler - Indoor	1.2	Pass	Testing Complete
LW01892	102	Classroom		Faucet	9.6	Pass	Testing Complete
LW01894	124	Classroom		Faucet	10.4	Pass	Testing Complete
LW01896	125	Reading		Faucet	16.3	Pass	Testing Complete
LW01897	125	Reading		Bubbler - Indoor	88.3	Fail	Follow-Up Testing Needed
LW01899	120	Media Center		Faucet	6.0	Pass	Testing Complete
LW01900	164	Classroom		Faucet	5.9	Pass	Testing Complete
LW01901	164	Classroom		Bubbler - Indoor	1.5	Pass	Testing Complete
LW01902	162	Classroom		Faucet	4.2	Pass	Testing Complete
LW01903	162	Classroom		Bubbler - Indoor	6.2	Pass	Testing Complete
LW01904	160	Classroom		Faucet	12.2	Pass	Testing Complete
LW01905	160	Classroom		Bubbler - Indoor	18.3	Pass	Testing Complete
LW01906	159	Classroom		Faucet	6.9	Pass	Testing Complete

Barcode ID	Room Number	Location	Location Notes	Equipment Type	Result (PPB)*	Pass/Fail	Status
LW01908	161	Classroom		Faucet	7.3	Pass	Testing Complete
LW01909	159	Classroom		Bubbler - Indoor	17.4	Pass	Testing Complete
LW01910	40	Classroom		Faucet	51.3	Fail	Follow-Up Testing Needed
LW01911	40	Classroom		Bubbler - Indoor	15.7	Pass	Testing Complete
LW01912	41	Classroom		Faucet	9.9	Pass	Testing Complete
LW01913	41	Classroom		Bubbler - Indoor	10.5	Pass	Testing Complete
LW01914		Music		Faucet	17.3	Pass	Testing Complete
LW01915		Music		Faucet	5.3	Pass	Testing Complete
LW01916	36	Classroom		Faucet	7.5	Pass	Testing Complete
LW01917	36	Classroom		Bubbler - Indoor	29.2	Fail	Follow-Up Testing Needed
LW01918	32	Classroom		Faucet	9.1	Pass	Testing Complete
LW01920	30	Classroom		Faucet	11.7	Pass	Testing Complete
LW01922	28	Classroom		Faucet	9.7	Pass	Testing Complete
LW01924	27	Classroom		Faucet	4.8	Pass	Testing Complete
LW01926	26	Classroom		Faucet	12.2	Pass	Testing Complete
LW01927	26	Classroom		Bubbler - Indoor	6.0	Pass	Testing Complete
LW01964	24	Classroom		Faucet	<1.0	Pass	Testing Complete
LW01965	24	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
LW01966	20	Classroom		Faucet	<1.0	Pass	Testing Complete
LW01967	20	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
LW01968		Hallway	Across From CR 20	Cooler	<1.0	Pass	Testing Complete
LW01969		Hallway	Across From CR 20	Cooler	<1.0	Pass	Testing Complete
LW01970	16	Classroom		Faucet	<1.0	Pass	Testing Complete
LW01971	16	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
LW01972	14	Classroom		Faucet	<1.0	Pass	Testing Complete
LW01973	14	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
LW01974	10	Classroom		Faucet	<1.0	Pass	Testing Complete
LW01975	10	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete

Barcode ID	Room Number	Location	Location Notes	Equipment Type	Result (PPB)*	Pass/Fail	Status
LW01976	04	Classroom		Faucet	<1.0	Pass	Testing Complete
LW01977	04	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
LW01978		Hallway	Across From Gym	Cooler	<1.0	Pass	Testing Complete
M22261		Hallway	Across from CR 3	Cooler	<1.0	Pass	Testing Complete
M22275	8	Computer Lab		Faucet	21.8	Fail	Follow-Up Testing Needed
M22276	8	Computer Lab		Bubbler - Indoor	87.0	Fail	Follow-Up Testing Needed
M22279		Hallway	Across from CR 8	Cooler	2.0	Pass	Testing Complete
M22306		Hallway	Across from CR 19	Cooler	<1.0	Pass	Testing Complete
M50627	118	Break Room		Faucet	<1.0	Pass	Testing Complete
M50628	108	Classroom	Inside CR 108	Cooler	<1.0	Pass	Testing Complete
M50629	108	Classroom		Faucet	<1.0	Pass	Testing Complete
M50630	108	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
M50631	109	Classroom		Faucet	<1.0	Pass	Testing Complete
M50632	110	Classroom		Faucet	<1.0	Pass	Testing Complete
M50633	110	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
M50640		Hallway	Across from CR 138	Cooler	<1.0	Pass	Testing Complete
M50641		Hallway	Across from CR 138	Cooler	<1.0	Pass	Testing Complete
M50645	138	Classroom		Faucet	<1.0	Pass	Testing Complete
M50646	138	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
M50647	142	Classroom		Faucet	<1.0	Pass	Testing Complete
M50648	142	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
M50649	144	Classroom		Faucet	<1.0	Pass	Testing Complete
M50650	144	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
M50651	148	Classroom		Faucet	<1.0	Pass	Testing Complete
M50652	148	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete
M50653	150	Classroom		Faucet	<1.0	Pass	Testing Complete
M50654	150	Classroom		Bubbler - Indoor	<1.0	Pass	Testing Complete

*ppb = parts per billion

Contractor: Professional Services Industries, Inc.
Certified Laboratory: Microbac Laboratories, Inc.

Follow Up Sample Results for Fox Chapel Elementary School (5/24/18)

Barcode ID	Room Number	Location	Equipment Type	Initial draw (2 nd) (PPB)	30 Second Draw (PPB)	Status
LW01897	125	Reading	Bubbler	26.1	14.5	Remediation required – replace fixture, in addition to supply line and valve located under sink
LW01910	40	Classroom	Faucet	28.5	3.6	Remediation required – replace fixture, in addition to supply line and valve located under sink
LW01917	36	Classroom	Bubbler	32.9	16.9	Remediation required – replace fixture, in addition to supply line and valve located under sink
M22275	8	Computer Lab	Faucet	12.5	ND	Remediation required – replace fixture, in addition to supply line and valve located under sink
M22276	8	Computer Lab	Bubbler	51.3	2.6	Remediation required – replace fixture, in addition to supply line and valve located under sink

*ppb = parts per billion
 ND = Non Detect

Note: Fixture(s) with elevated test results were immediately removed from service. Subsequent 2nd round testing was performed on these fixture(s) for further diagnostics for remediation. Because the fixture was shut off after the first test, the subsequent test results may not be representative of an in-use fixture because of stagnant water in the supply line and the operation of shut off valves prior to the tests. All fixtures with elevated test results are to be remediated. After remediation, post remediation testing will be conducted before the fixture is returned to service.