Lead in Drinking Water – Public and Nonpublic Schools

IMPORTANT NOTICE: ELEVATED WATER SAMPLE RESULT Bel Air Middle School

ELEVATED LEAD WATER SAMPLE RESULT

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. On January 5 and 7, 2019 two hundred ninety-six (296) lead water samples were collected from Bel Air Middle School. Of these lead water samples, **one hundred fifty** had levels of lead exceeding the action level of 20 parts per billion (ppb) for lead in drinking water in school buildings. The elevated lead results from the samples collected at Bel Air Middle School were as follows:

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22.5 parts per billion (ppb) PE office restroom sink in boy's locker room 30.8 parts per billion (ppb) Room 40 sink, center, right, towards back wall
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47.3 parts per billion (ppb) Room 40 sink, right wall

40 parts per billion (ppb) Room 40 sink, center, right, towards front wall

35.9 parts per billion (ppb) Room 40 sink, center, left, towards front wall

24.4 parts per billion (ppb) Room 40 sink, hallway wall, left

51 parts per billion (ppb) Room 39 sink, left

39.7 parts per billion (ppb) Room 39 sink, right

209 parts per billion (ppb) Room 18, door across from 17, first left, left sink faucet

534 parts per billion (ppb) Room 18, door across from 17, left, right sink faucet

82.6 parts per billion (ppb) Room 18, door across from 17, second left, left faucet

234 parts per billion (ppb) Room 18, door across from 17, second left, right sink faucet

70.3 parts per billion (ppb) Room 18, door across from 17, third left, left sink faucet

126 parts per billion (ppb) Room 18, door across from 17, third left, right sink faucet

81.2 parts per billion (ppb) Room 18, door across from 17, back wall left, left sink faucet

73.3 parts per billion (ppb) Room 18, door across from 17, back wall, middle, left sink faucet

97.9 parts per billion (ppb) Room 18, door across from 17, back wall, middle, right sink faucet

228 parts per billion (ppb) Room 18, door across from 17, back wall, right, left sink faucet

212 parts per billion (ppb) Room 18, door across from 17, back wall, right, right sink faucet

34.1 parts per billion (ppb) Room 18, door across from 17, second right, left sink faucet

54.2 parts per billion (ppb) Room 18, door across from 17, right, left sink faucet

22.2 parts per billion (ppb) Room 18, door across from 17, right, right sink faucet

99.6 parts per billion (ppb) Room 20, door near 18, left, left sink faucet

478 parts per billion (ppb) **Room 20, door near 18, left, right sink faucet 41.6** parts per billion (ppb) **Room 20, door near 18, second left, left sink faucet**

77.5 parts per billion (ppb) Room 20, door near 19, second left, right sink faucet

49.4 parts per billion (ppb) Room 20, door near 19, back wall, left, left sink faucet

218 parts per billion (ppb) Room 20, door near 19, back wall, left, right sink faucet

537 parts per billion (ppb) Room 20, door near 19, second right, left sink faucet

210 parts per billion (ppb) Room 20, door near 19, second right, right sink faucet

114 parts per billion (ppb) Room 20, door near 19, right, left sink faucet

182 parts per billion (ppb) Room 20, door near 19, right, right sink faucet

190 parts per billion (ppb) Room 20, door near 19, front wall, left, left sink faucet 137 parts per billion (ppb) Room 20, door near 19, front wall, left, right sink faucet

139 parts per billion (ppb) Room 20, door near 19, front, middle sink faucet

385 parts per billion (ppb) Storage room sink between 20 and 22

54.1 parts per billion (ppb) Room 22, door near 20, left, right sink faucet

151 parts per billion (ppb) Room 22, door near 20, second left, left sink faucet

57.6 parts per billion (ppb) Room 22, door near 20, second left, right sink faucet

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189 parts per billion (ppb) Room 22, door near 20, back wall, left, left sink faucet
330 parts per billion (ppb) Room 22, door near 20, back wall, left, right sink faucet
308 parts per billion (ppb) Room 22, door near 20, back wall, right, left sink faucet
289 parts per billion (ppb) Room 22, door near 20, back wall, right, right sink faucet
198 parts per billion (ppb) Room 22, door near 20, second right, right sink faucet
381 parts per billion (ppb) Room 22, door near 20, second right, left sink faucet
3390 parts per billion (ppb) Room 22, door near 20, right, left sink faucet
39 parts per billion (ppb) Room 22, door near 20, front, left, left sink faucet
153 parts per billion (ppb) Room 22, door near 20, front, left, right sink faucet
26.8 parts per billion (ppb) Room 37 Art back, left sink faucet
95.6 parts per billion (ppb) Room 21, door near restroom, left, left sink faucet
47.8 parts per billion (ppb) Room 21, door near restroom, left, right sink faucet
152 parts per billion (ppb) Room 21, door near restroom, second left, left sink faucet
60.3 parts per billion (ppb) Room 21, door near restroom, second left, right sink faucet
229 parts per billion (ppb) Room 21, door near restroom, back wall, left, left sink faucet
192 parts per billion (ppb) Room 21, door near restroom, back wall, left, right sink faucet
381 parts per billion (ppb) Room 21, door near restroom, back wall, right, left sink faucet
226 parts per billion (ppb) Room 21, door near restroom, back wall, right, right sink faucet
222 parts per billion (ppb) Room 21, door near restroom, second right, left sink faucet
131 parts per billion (ppb) Room 21, door near restroom, second right, right sink faucet
93 parts per billion (ppb) Room 21, door near restroom, right, left sink faucet
39.5 parts per billion (ppb) Room 21, door near restroom, right, right sink faucet
140 parts per billion (ppb) Room 21, door near restroom, front wall, left, left sink faucet
203 parts per billion (ppb) Room 21, door near restroom, front wall, left, right sink faucet
240 parts per billion (ppb) Room 21, door near restroom, front wall, right, left sink faucet
6090 parts per billion (ppb) Room 21, door near restroom, front wall, right, right sink faucet
22.7 parts per billion (ppb) Room 21, door near restroom, front wall, middle sink
63.1 parts per billion (ppb) Room 19, door near 17, left, left sink faucet
27.1 parts per billion (ppb) Room 19, door near 17, left, right sink faucet
82.4 parts per billion (ppb) Room 19, door near 17, second left, left sink faucet
69.4 parts per billion (ppb) Room 19, door near 17, second left, right sink faucet
193 parts per billion (ppb) Room 19, door near 17, back wall, left, left sink faucet
133 parts per billion (ppb) Room 19, door near 17, back wall, left, right sink faucet
81.6 parts per billion (ppb) Room 19, door near 17, back wall, right, left sink faucet
43.7 parts per billion (ppb) Room 19, door near 17, back wall, right, right sink faucet
240 parts per billion (ppb) Room 19, door near 17, second right, left sink faucet
136 parts per billion (ppb) Room 19, door near 17, second right, right sink faucet
795 parts per billion (ppb) Room 19, door near 17, right, left sink faucet
182 parts per billion (ppb) Room 19, door near 17, right, right sink faucet
130 parts per billion (ppb) Room 19, door near 17, front wall, left, left sink faucet
424 parts per billion (ppb) Room 19, door near 17, front wall, left, right sink faucet
26.3 parts per billion (ppb) Room 19, door near 17, front wall, middle sink
119 parts per billion (ppb) Room 19, door near 17, front wall, right, left sink faucet
56.2 parts per billion (ppb) Room 19, door near 17, front wall, right, right sink faucet
292 parts per billion (ppb) Room 17, back left, left sink faucet
24.8 parts per billion (ppb) Room 17, back, left, right sink faucet
50 parts per billion (ppb) Room 17, back, second left, left sink faucet
126 parts per billion (ppb) Room 17, back, second left, right sink faucet
486 parts per billion (ppb) Room 17, back, third left, left sink faucet
428 parts per billion (ppb) Room 17, back, third left, right sink faucet
31.8 parts per billion (ppb) Room 17, front wall sink
81 parts per billion (ppb) Room 17, third right, right sink faucet
43.1 parts per billion (ppb) Room 17, second right, left sink faucet
39 parts per billion (ppb) Room 17, second right, right sink faucet
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423 parts per billion (ppb) Room 17, right, left sink faucet
40.5 parts per billion (ppb) Room 17, right, right sink faucet
41.8 parts per billion (ppb) Girl's restroom, across from 11, left sink
69.9 parts per billion (ppb) Room 57, left, right sink faucet
128 parts per billion (ppb) Room 57, second left, right sink faucet
33 parts per billion (ppb) Room 57, third left, left sink faucet
34.8 parts per billion (ppb) Room 57, third left, right sink faucet
86.1 parts per billion (ppb) Room 57, fourth left, left sink faucet
771 parts per billion (ppb) Room 57, fourth left, right sink faucet
29.4 parts per billion (ppb) Room 57, third right, left sink faucet
50.4 parts per billion (ppb) Room 57, second right, left sink faucet
54.6 parts per billion (ppb) Room 57, second right, right sink faucet
28.6 parts per billion (ppb) Room 57, right, left sink faucet
81.4 parts per billion (ppb) Room 57, right, right sink faucet
242 parts per billion (ppb) Room 57, back, left, right sink faucet
84.3 parts per billion (ppb) Room 57, back, right, left sink faucet
175 parts per billion (ppb) Room 57, back, right, right sink faucet
20.5 parts per billion (ppb) Room 56, left, left sink faucet
37.7 parts per billion (ppb) Room 56, second left, left sink faucet
20.5 parts per billion (ppb) Room 56, second left, right sink faucet
29.9 parts per billion (ppb) Room 56, third left, right sink faucet
50.2 parts per billion (ppb) Room 56, back wall, left, left sink faucet
88.2 parts per billion (ppb) Room 56, back wall, left, right faucet
32.1 parts per billion (ppb) Room 56, back wall, right, left sink faucet
43 parts per billion (ppb) Room 56, back wall, right, right sink faucet
47.4 parts per billion (ppb) Room 56, fourth right, left sink faucet
28.1 parts per billion (ppb) Room 56, fourth right, right sink faucet
66.5 parts per billion (ppb) Room 56, third right, right sink faucet
34.2 parts per billion (ppb) Room 56, second right, left sink faucet
53.4 parts per billion (ppb) Room 56, second right, right sink faucet
59.6 parts per billion (ppb) Room 56, right, left sink faucet
50 parts per billion (ppb) Room 56, right, right sink faucet
22.1 parts per billion (ppb) Room 54, back wall sink
48.6 parts per billion (ppb) Room 53, left, left sink faucet
37.5 parts per billion (ppb) Room 53, left, right sink faucet
23.6 parts per billion (ppb) Room 53, second left, left sink faucet
20.5 parts per billion (ppb) Room 53, fourth left, left sink faucet
25.4 parts per billion (ppb) Room 53, fourth left, right sink faucet
40.8 parts per billion (ppb) Room 53, back right, left sink faucet
30.1 parts per billion (ppb) Room 53, third right, left sink faucet
25.5 parts per billion (ppb) Room 53, second right, right sink faucet
31 parts per billion (ppb) Room 52, third left, right sink faucet
67.4 parts per billion (ppb) Room 52, back wall, left, left sink faucet
57.4 parts per billion (ppb) Room 52, back wall, left, right sink faucet
41.5 parts per billion (ppb) Room 52, back wall, right, left sink faucet
26.1 parts per billion (ppb) Room 52, back wall, right, right sink faucet
71 parts per billion (ppb) Room 52, fourth right, left sink faucet
66.4 parts per billion (ppb) Room 52, fourth right, right sink faucet
57.9 parts per billion (ppb) Room 52, second right, right sink faucet
31.3 parts per billion (ppb) Room 52, right, left sink faucet
34.8 parts per billion (ppb) Room 52, right, right sink faucet
32.4 parts per billion (ppb) Room 50 sink
51 parts per billion (ppb) Girl's restroom across from faculty lounge, second left sink
21.1 parts per billion (ppb) Girl's restroom across from faculty lounge, second right sink
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189 parts per billion (ppb) Girl's restroom across from faculty lounge, right sink 21 parts per billion (ppb) Boy's restroom across from faculty lounge, right sink 36.5 parts per billion (ppb) Room 46, right sink

ACTION LEVEL (AL)

The AL is 20 ppb for lead in drinking water in school buildings. The AL is the concentration of lead which, if exceeded, triggers required remediation.

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, and cosmetics, exposure in the work place and exposure from certain hobbies, brass faucets, fittings, and valves. 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.

IMMEDIATE ACTIONS TAKEN

Results were received on July 23, 2019. Handwash only signs were placed at the sinks.

NEXT STEPS

At this time our remedial action is to use these sinks for hand washing only.

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 **Patti Jo Beard, Harford County Public Schools,** at **410-638-4088.** 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. 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.