

Drinking Water Testing Program

City of Flint Community Data

Multiple labs were used for this drinking water project with some samples going to more than one lab. Initial and flushed water samples from sampling events 6 and 7 were sent to Paragon Lab. Some of the flushed water samples from these sampling events were also sent to Trace Analytical Laboratories, Inc. (Trace Lab) and the Michigan Department of Energy and Great Lakes Environmental Laboratory (EGLE Lab). This was done to make sure that the results were accurate. Homes that had water testing during these sampling events received results in the mail from each lab that tested their water. Below are the results from Paragon Lab.

MDHHS Sampling Event 7 Paragon Lab (11/16/2021 – 11/18/2021)

Section 1: Metals									
Parameter	Number of locations sampled (number of initial samples/number of flushed samples)	Range in initial samples (mg/L)			Range in flushed samples (mg/L)			US Environmental Protection Agency (US EPA) drinking water value (mg/L)	Health-based level (mg/L)
		Median	Lowest	Highest	Median	Lowest	Highest		
Aluminum	59 (59/59)	.056	ND	13	.06	ND	2	0.05-0.20 (J)	0.3 (D)
Antimony	59 (59/59)	ND	ND	ND	ND	ND	ND	0.006 (F)	0.0028 (B: chronic for children)
Arsenic	59 (59/59)	ND	ND	ND	ND	ND	ND	0.01(F)	0 (G)
Barium	59 (59/59)	0.012	ND	.12	.012	ND	.028	2 (F)	0.7 (E: 1/10- day for children)
Beryllium	59 (59/59)	ND	ND	ND	ND	ND	ND	0.004 (F)	0.004 (G)
Boron	59 (59/59)	0.014	0.013	0.016	0.014	0.012	0.016	Value not established	1.4 (C: chronic for children)
Cadmium	59 (59/59)	ND	ND	0.0025	ND	ND	0.00024	0.005 (F)	0.0007 (C: chronic for children)

Chromium, total	59 (59/59)	0.001	ND	0.0014	ND	ND	0.0016	0.1 (F)	0.0063 (C: chronic for children, Cr (VI)) ¹
Copper	59 (59/59)	0.0093	ND	0.082	0.0035	ND	0.029	1.3 (A) 1.0 (J)	0.07 (C: acute/ intermediate for children) 1.3 (G) ²
Iron	59 (59/59)	ND	ND	1.1	ND	ND	.12	0.30 (J)	2 (D)
Lead	59 (59/59)	ND	ND	0.0014	ND	ND	ND	0.015 (A)	0 (G)
Manganese	59 (59/59)	0.0016	ND	0.44	0.0017	ND	0.066	0.05 (J)	0.3 (E: lifetime)
Molybdenum	59 (59/59)	ND	ND	ND	ND	ND	ND	Value not established	0.035 (B: chronic for children)
Nickel	59 (59/59)	0.0014	ND	0.0028	0.0013	ND	0.0026	Value not established	0.1 (E: lifetime)
Selenium	59 (59/59)	ND	ND	0.0011	ND	ND	0.0011	0.05 (F)	0.035 (B, C: chronic for children)
Silver	59 (59/59)	ND	ND	ND	ND	ND	ND	0.1 (J)	0.035 (C: children – chronic for children)
Thallium	59 (59/59)	ND	ND	ND	ND	ND	ND	0.002 (F)	0.0002 (I)
Tin	59 (59/59)	ND	ND	ND	ND	ND	ND	Value not established	2.1 (C: intermediate children)
Vanadium	59 (59/59)	ND	ND	ND	ND	ND	ND	Value not established	0.0045 (D)
Zinc	59 (59/59)	ND	ND	.44	ND	ND	0.067	5 (J)	2 (E: lifetime)

Section 2: Disinfectants, Disinfection Byproducts and Bacteria

Parameter	Number of locations sampled (number of initial samples/number of flushed samples)	Range in initial samples			Range in flushed samples			US Environmental Protection Agency (US EPA) drinking water value	Health-based level (µg/L)
		Median	Lowest	Highest	Median	Lowest	Highest		
Chlorine (as Cl ₂ , mg/L)	59 (59/59)	1.03	0.03	1.88	1.39	ND	2.13	4 (H)	Learn more here
Haloacetic Acids (HAA5, µg/L)	59 (59/59)	23	ND	45	23	ND	32	60 (F)	Learn more here
Total Trihalomethanes (TTHMs, µg/L)	59 (59/59)	28	20	61	29	20	41	80 (F)	Learn more here

Section 3: General Chemistry

Parameter	Number of locations sampled (number of initial samples/number of flushed samples)	Range in initial samples			Range in flushed samples			US Environmental Protection Agency (US EPA) drinking water value	Health-based level
		Median	Lowest	Highest	Median	Lowest	Highest		
Calcium (mg/L)	59 (59/59)	26	ND	30	26	ND	27	Learn more here	Learn more here
Chloride (mg/L)	59 (59/59)	11	11	12	11	11	13	250 (F)	Learn more here
Specific Conductance (µmhos/cm)	59 (59/59)	250	240	330	250	240	340	Learn more here	Learn more here
Hardness (as mg/L of CaCO ₃)	59 (59/59)	97	ND	110	96	ND	99	Learn more here	Learn more here
Magnesium (mg/L)	59 (59/59)	7.5	ND	7.9	7.5	ND	7.7	Learn more here	400 (D)
Orthophosphate (mg/L)	59 (59/59)	0.97	0.8	1.1	0.98	0.81	1.5	Learn more here	Learn more here

pH (SU)	59 (59/59)	7.8	7.6	8	7.8	7.6	8	6.5 – 8.5 (F)	Learn more here
Sodium (mg/L)	59 (59/59)	8.8	7.4	61	8.8	7.4	56	Learn more here	Learn more here
Sulfate (mg/L)	59 (59/59)	21	20	21	21	20	21	250 (F)	500 (E)
Total Alkalinity (mg/L)	59 (59/59)	70	70	80	70	70	80	Learn more here	Learn more here
Turbidity (NTU)	59 (59/59)	0.17	0.09	0.82	0.16	0.1	1.7	Learn more here	Learn more here