



**City of Detroit**  
**Water and Sewerage Department**  
 Laboratory analysis of Water Samples collected at  
**Southwest Plant**  
 on August 14, 2001

	Raw	Tap	MCL/[SMCL] <sup>(1)</sup>	MDL <sup>(2)</sup>
Turbidity <sup>(3)</sup>	4.23	0.154	0.3/95%	
Total Solids	134	145	[500]	10
Total Dissolved Solids	108	120	[500]	10
Aluminum (Al)	0.287	0.089	[0.05-0.2]	0.005
Iron (Fe)	0.231	0.010	[0.3]	0.002
Copper (Cu)	0.017	0.003	1.3	0.001
Magnesium (Mg)	6.26	7.02		0.2
Calcium (Ca)	11.5	26.3		0.06
Sodium (Na)	3.34	4.85	20 <sup>(4)</sup>	0.01
Potassium (K)	1.07	0.99		0.01
Manganese (Mn)	<0.001	<0.001	[0.05]	0.001
Zinc (Zn)	<0.01	<0.01	[5.0]	0.01
Silica (SiO <sub>2</sub> )	3.50	5.38		0.4
Sulfate (SO <sub>4</sub> )	48.6	47.5		
Chloride (Cl <sup>-</sup> )	5.5	7.5	[250]	1.0
Phosphorus (P)	<0.01	0.33		0.01
Free Carbon Dioxide	1.1	2.9		
Total Hardness <sup>(5)</sup> <sup>(6)</sup>	102	101		
Total Alkalinity <sup>(5)</sup>	76	70		
Carbonate Alkalinity <sup>(5)</sup>	0	0		
Bi-Carbonate Alkalinity <sup>(5)</sup>	76	70		
Non-Carbonate Hardness <sup>(5)</sup>	26	31		
Chemical Oxygen Demand	5.2	5.6		2.0
Dissolved Oxygen	7.6	8.0		
Ammonia Nitrogen	0.1	<0.1		0.1
Organic Nitrogen	0.2	<0.1		0.1
Nitrite Nitrogen	<0.01	<0.01	1.0	0.01
Nitrate Nitrogen	0.26	0.34	10.0	0.01
Fluoride	0.1	1.2	4.0	0.1
pH in pH units	8.13	7.68	6.5-8.5	
Specific Conductance in micromhos at 25° C.	204	209		
Temperature in ° C.	25.4	24.3		

-----  
**FOR INFORMATIONAL PURPOSES ONLY**

Notes: All units are mg/L unless otherwise noted. (1) MCL/[SMCL] = Maximum Contaminant Level/Secondary Maximum Contaminant Level. (2) MDL = Method Detection Limit. (3) NTU = Nephelometric Turbidity Units. Reported results are from a Grab sample. EPA requirements are for 95% of monthly readings to be <0.3 NTU. (4) EPA Guidance level. (5) = As Calcium Carbonate. (6) by EDTA titration. "<" = Less than. EF = Equipment Failure.

Analyst: Brian Brown, Sr. Anl. Chemist

By: Pamela Turner

Pamela Turner

Manager, Water Quality Division

Kathleen Leavy

Interim Director, Water & Sewerage Department