

# 2010 WATER QUALITY REPORT

## FOR

### City of Farmington Water System

**PWSID# 8930038**

This report contains important information regarding the water quality in our water system. The water source for Rathbun Regional Water Association, Inc, Ft. Madison System is the City of Ft. Madison and the City of Keokuk. The City of Ft. Madison obtains its water from a Pleistocene aquifer, an underground source and the Mississippi River, a surface water source. The City of Keokuk obtains its water from the Mississippi River, a surface water source.

Our water quality testing shows the following results:

CONTAMINANT	MCLG	MCL	DETECTED LEVEL	DATE SAMPLED	RANGE OF DETECTION	VIOLATION	SOURCE
<b>Farmington</b>							
Copper (ppm) 90 % of samples must be below Action level (AL)	1.3	AL=1.3	0.0162 90% of samples were below this level 0 Samples Exceeded AL	2009	0.0 – 0.0374	No	Corrosion of household plumbing systems; erosion of natural deposits
Lead (ppb) 90 % of samples must be below Action level (AL)	0	AL=15	0 90% of samples were below this level 0 Samples Exceeded AL	2009	0	No	Corrosion of household plumbing systems; erosion of natural deposits
TTHM (ppb) [Total trihalomethanes]	N/A	80	60 RAA		38 – 97	No	By-products of drinking water disinfection
Haloacetic Acids (HAA5) (ppb)	N/A	60	10 RAA		0 – 18	No	By-products of drinking water disinfection
Chlorine (ppm)	MRDLG =4.0	MRDL =4.0	0.8 RAA	Monthly	0.3 – 1.4	No	Water additive used to control microbes
<b>RRWA</b>							
*Turbidity (NTU) <i>Ft. Madison-Surface</i> <i>Keokuk</i>	N/A N/A	TT TT	0.685; 100% of Samples 0.11; 100% of Samples		0.147 – 0.685 0.06 – 0.11	No No	Soil runoff
Fluoride (ppm) <i>Ft. Madison-Surface</i> <i>Ft. Madison-Ground</i>	4 4	4 4	1.14 0.94		0.23 – 1.14 0.42 – 0.94	No No	Water additive which promotes strong teeth; erosion of natural deposits; Discharge from fertilizer and aluminum factories
Nitrate [as N] (ppm) <i>Ft. Madison-Surface</i> <i>Ft. Madison-Ground</i> <i>Keokuk</i>	10 10 10	10 10 10	4.3 0.04 4.6		0.4 – 4.3 N/A 2.1 – 4.6	No No	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits
Atrazine (ppb) <i>Ft. Madison-Surface</i> <i>Keokuk</i>	3 3	3 3	0.2 0.9		N/A 0 - 1	No No	Runoff from herbicide used on row crops
Sodium (ppm) <i>Ft. Madison-Surface</i> <i>Ft. Madison-Ground</i> <i>Keokuk</i>	N/A N/A N/A	N/A N/A N/A	16 16 9.6		N/A N/A N/A	No No No	Erosion of natural deposits; added to water during treatment process
Total Organic Carbon (TOC) (ppm) <i>Ft. Madison-Surface</i>  <i>Keokuk</i>	N/A  N/A	TT  TT	25% Required 59% - RAA  25% - 30% Required Ratio 2.3%	Monthly  Monthly	43.8 ~ 75.3  49 - 72	No  No	Naturally present in the environment.

Note: Contaminants with dates indicate results from the most recent testing done in accordance with regulations