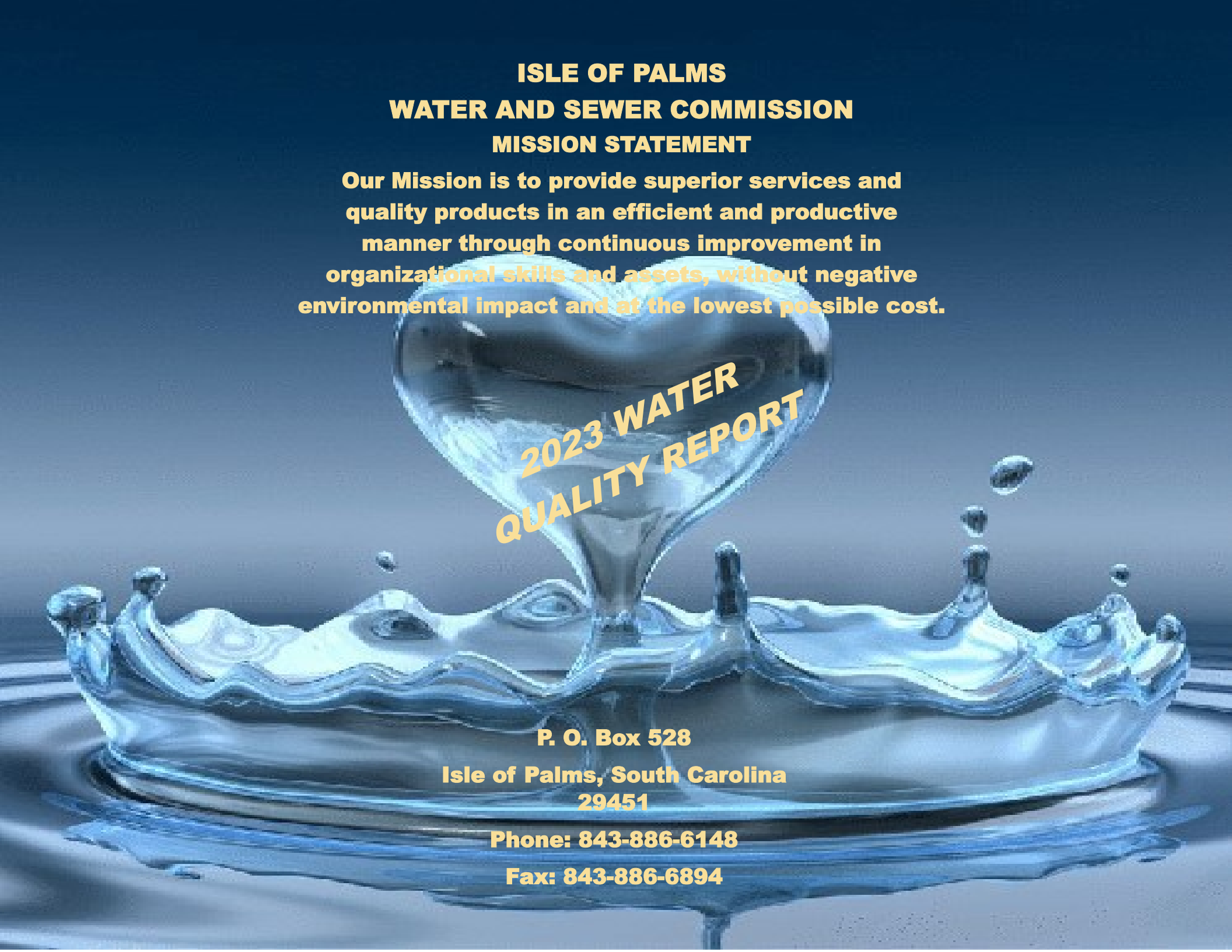
ISLE OF PALMS
WATER AND SEWER COMMISSION
MISSION STATEMENT

Our Mission is to provide superior services and quality products in an efficient and productive manner through continuous improvement in organizational skills and assets, without negative environmental impact and at the lowest possible cost.



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Isle of Palms
Water and Sewer Commission
(SC 1010004)
2023 Annual Water
Quality Report

This is an annual report on the quality of water delivered by the Isle of Palms Water and Sewer Commission (IOPWSC). It meets the Federal Safe Drinking Water Act (SDWA) requirement for the "Consumer Confidence Report" and contains information on the source of our water, its constituents, and the health risks associated with any contaminants. Safe water is vital to our community. We encourage public interest and participation in our community's decisions affecting our drinking water. Regular Commission meetings occur on the third Wednesday of each month at 8:00 A.M. at the IOPWSC office located at 1300 Palm Boulevard. The public is invited to attend these meetings. Please read this report carefully, and if you have any questions, please call this office.

WE ARE PROUD TO REPORT THAT THE WATER PROVIDED BY THE IOPWSC MEETS OR EXCEEDS ESTABLISHED WATER QUALITY STANDARDS

Water Source

Isle of Palms is supplied by water from the IOPWSC Reverse Osmosis Treatment Facility and treated surface water from Charleston Water Systems (CWS).

IOPWSC Reverse Osmosis treatment facility uses membrane technology to treat the groundwater from the Charleston Aquifer, sometimes called the Middendorf Aquifer. The plant is capable of producing 1.2 million gallons of treated water per day. The CWS surface water enters our distribution system through a transmission line located at Breach Inlet.

Explanation of the Water Quality Data Report

The tables show the results of our water quality analysis. Every regulated and unregulated contaminant that was detected in the water, even in the minutest traces, is listed here. The tables contain the name of each substance, the highest level allowed by regulation (MCL), the ideal goals for public health, the amount detected, the usual sources of such contamination, footnotes explaining our findings, and a key to the units of measurements.

ADDITIONAL HEALTH INFORMATION

To ensure that the tap water is safe to drink, EPA prescribes limits on the amount of certain contaminants in water provided by public water systems. FDA regulations establish limits for contaminants in bottled water.

Drinking water, including bottled water, may reasonably be expected to contain small amounts of some contaminants. The presence of contaminants does not necessarily indicate that the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hot Line at 1-800-426-4781.

The sources of drinking water (both tap and bottled) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally occurring minerals and radioactive material, and can pick up substrates resulting from the presence of animals and from human activity. Inadequately treated water may contain disease causing organisms. These organisms include bacteria, viruses, and parasites which can cause symptoms such as nausea, cramps, diarrhea, and associated headaches.

CONTAMINANTS THAT MAY BE PRESENT IN SOURCE WATER INCLUDE:

(A) Microbial contaminants such as viruses and bacteria, which may come from sewage treatment plants, septic tank systems, agricultural livestock operations, and wildlife.

(B) Inorganic contaminants such as salts and metals, which can be naturally occurring or a result of urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining, and residential uses.

(C) Pesticides and herbicides, which may come from a variety of sources such as agriculture, storm water runoff, and residential uses.

(D) Organic chemical contaminants including synthetic and volatile organics, which are by-products of industrial processes and petroleum production and can also come from gas stations, urban storm water runoff, and septic systems.

(E) Radioactive contaminants, which can be naturally occurring or the result of oil and gas production and mining activities.

In order to ensure that the tap water is safe to drink, EPA prescribes regulations that limit the amount of certain contaminants in water provided by public water systems. FDA regulations establish limits for contaminants in bottled water that must provide the same protection for public health.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immunocompromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, persons with HIV/AIDS or other immune system disorders, some elderly persons, and infants can be particularly at risk for infections. These people should seek advice about drinking water from their heath care providers. EPA/CDC guidelines on the appropriate means to lessen the risk of infection by Cryptosporidium are available from the Safe Drinking Water Hotline at 1-800-426-4791.

IOPWSC Operations Staff work very diligently, in conjunction with the Department of Health and Environmental Control, to assure that the water the community receives is safe drinking water and meets all Environmental Protection Agency requirements.

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and children. Lead in the drinking water is primarily from materials and components associated with the service lines and home plumbing. The IOPWSC is responsible for providing high quality drinking water but cannot control the variety of materials found in plumbing components. When water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap water for 30 seconds to 2 minutes before using water for drinking or cooking. If you are concerned about lead in your drinking water, you may wish to have it tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline or at http://epa.gov/safewater/lead.

Definitions

Maximum Contaminant Level (MCL) - The highest level of a contaminant that is allowed in drinking water. MCL's are set as close to the MCLG's as feasible using the best available treatment technology.

Maximum Contaminant Level Goal (MCLG) - The level of a contaminant in drinking water below which there is no known or expected risk to health. MCLG's allow for a margin of safety.

Treatment Technique (TT) - A required process intended to reduce the level of a contaminant in drinking water.

Action Level (AL) - The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.

Turbidity - A measure of the cloudiness of the water.

UCMR4 - Unregulated Contaminates Monitoring . Unregulated contaminant monitoring helps EPA to determine where certain contaminants occur and whether the Agency should consider regulating those contaminants in the future. Should you wish to review these results, please contact the IOPWSC.

National Primary Drinking Water Regulation Compliance

Isle of Palms Water and Sewer Commission prepared this report.
For more information about this report, contact the IOPWSC at 843-886-6148 from 8:00 A.M. until 4:30 P.M. Monday through Friday.

ISLE OF PALMS WATER AND SEWER COMMISSION

Key To Tables

AL = Action Level

MCL = Maximum Contaminant Level

MCLG = Maximum Contaminant Level Goal

MFL = Million Fibers Per Liter

NTU = Nephelometric Turbidity Units

LRAA = Locational Running Annual Average

ppm = Parts Per Million, or Milligrams Per Liter (mg/l)

ppb = Parts Per Billion, or Micrograms Per Liter (ug/l)

ppt = Parts Per Trillion, or Nanograms Per Liter

ppq = Parts Per Quadrillion, or Picograms Per Liter

TT = Treatment Technique

RAA = Running Annual Average

NOTE: Isle of Palms Water and Sewer Commission and Charleston Water Systems monitor for some contaminants less than once per year, and for those contaminants, the year of the last sample is shown in the respective table.

IOPWSC — Water Quality Lab Results for 2023

PARAMETER	UNITS	HIGHEST LEVEL DETECTED	RANGE OR OTHER COMMENTS	MCL	DATE SAMPLED	MCLG	POSSIBLE SOURCES IN WATER
INORGANIC COMPOUNDS							
Chlorine	ppm	2.0	2.0 to 2.0	MRDL=4	2023	MRLDG 4	Water additive used to control microbes.
Copper	mg/l	90th percentile 0.10	90th percentile. No samples exceeded MCL	AL = 1.3	2021	1.3	Erosion of natural deposits. Leaching from wood preservatives; corrosion of household plumbing systems.
Lead	mg/l	90th percentile 0.96	90th percentile. No samples exceeded MCL	AL = 15	2021	0	Erosion of natural deposits. Corrosion of household plumbing systems.
Fluoride	ppm	0.42	0.42 to 0.42	4	2022	None	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories.
Sodium	ppm	50		NA	2022	NA	Erosion of natural deposits
UNREGULATED COMPOUNDS							
PFOA **	ug/l	<0.0013		0.004	2023		
PFOS **	ug/l	<0.0013		0.02	2023		

** This report shares data from 2023, and the EPA did not set MCL's for PFOA and PFOS until 2024, Before 2024, the EPA issued Health Advisories, which are no-regulatory. Starting in 2024, public water systems have until 2029 to implement solutions that reduce these PFAS if monitoring shows that drinking water levels exceed the MCL's.

IOPWSC — Water Quality Lab Results for 2023

PARAMETER	UNITS	HIGHEST LEVEL DETECTED	RANGE OR OTHER COMMENTS	MCL	DATE SAMPLED	MCLG	POSSIBLE SOURCES IN WATER
Microbiological Contaminants							
Total Coliform Bacteria	% positive samples	.5% Highest level detected in any monthly sample. (All repeat samples were satisfactory)	0% - 0.5	Presence of coliform bacteria in > 5% of monthly samples	2023	0%	Naturally present in the environment
Volatile Organic Contaminants							
Total Trihalomethanes	ppb	27 (RAA)	4.20 to 65.90	80	2023	No goal for the total	By-product of the water disinfection process
Total Haloacetic Acids	ppb	22 (LRAA)	10.5 to 47.40	60	2023	No goal for the total	By-product of the water disinfection process
Total Trihalomethanes	ppb	LRAA Min: 12	LRAA Max: 35				
Total Haloacetic Acids	ppb	LRAA Min: 0.007	LRAA Max: 29				

While a sample site can have a single result that exceeds the minimum contaminant level (MCL), the LRAA may be below the MCL. Therefore, the monitoring is in compliance.

Charleston Water System — Water Quality Lab Results for 2023

PARAMETER	UNITS	HIGHEST LEVEL DETECTED	RANGE OR OTHER COMMENTS	MCL	DATE SAM-PLED	MCLG	POSSIBLE SOURCES IN WATER
Total Coliform Bacteria	% positive samples	2.3 % highest level detected in any monthly sample. (All repeat samples were satisfactory.)	0% to 2.3%	5% or more of monthly samples	2023	0 %	Naturally present in environment
Turbidity	NTU	0.13	0.07 to 0.13 100%	Requires a specific treatment technique (TT) TT=1 TT=95% of Samples <0.3%	2023	None	Soil runoff
Cryptosporidium in the River Water	per liter	0.2	0 to 0.2	None	2023	None	Human and animal sources
Giardia in the River Water	per liter	0.1	0 to 0.1	None	2023	None	Human and animal sources
Copper	ppm	90 percentile = 0.09	No samples exceeded the action level. (0.0 to 0.14)	AL=1.3	2021	1.3	Corrosion of household plumbing
Lead	ppb	90 percentile = 2.1	No samples exceeded the action level. (0 to 19)	AL=15	2021	0	Corrosion of household plumbing
Nitrate/Nitrite	ppm	0.11	0.11 to 0.11	10	2023	10	Runoff from fertilizers
Fluoride	ppm	0.16 ppm in source water 0.55 in finished water	0.23to 0.55	4	2023	4	Additive to prevent tooth decay

Charleston Water System — Water Quality Lab Results for 2023

PARAMETER	UNITS	HIGHEST LEVEL DETECTED	RANGE OR OTHER COMMENTS	MCL	DATE SAMPLED	MCLG	POSSIBLE SOURCES IN WATER
Chlorine Dioxide	ppb	0.32	0 to 0.32	0.8	2023	0.8	Added for disinfection
Chloramine Residual	ppm	RAA: 3.0	3.0 to 3.0	MRDL = 4	2023	MRDL = 4	Added for disinfection
Stage 2 Total Trihalomethanes	ppb	LRAA: 7	3.60 to 11.10	80	2023	NA	By-product of water disinfection
Stage 2 Total Haloacetic Acids	ppb	LRAA: 14	9.70 to 31.60	60	2023	NA	By-product of water disinfection
Chlorite	ppm	0.81	0.43 to 0.81	1.0	2023	0.8	By-product of water disinfection
Total Organic Carbon (TOC)	ppm	Actual % Removal Range: 54%	Actual % Removal: 46% to 62%	TT	2023	Required % Removal: 35% - 50%	Naturally present in the environment
Sodium	ppm	9		NA	2023	NA	Erosion of natural deposits
Gross alpha excluding radon and uranium	pCi/L	0.376	0.376-0.376	70	2022	70	Runoff from herbicide used on row crops
UNREGULATED COMPOUNDS							
PFOA**	ppt	4.2		0.004	2023		
PFOS **	ppt	5.2		0.02	2023		

While a sample site can have a single result that exceeds the maximum contaminant level (MCL), the LRAA may be below the MCL. Therefore, the monitoring is in compliance.

** This report shares data from 2023, and the EPA did not set MCL's for PFOA and PFOS until 2024, Before 2024, the EPA issued Health Advisories, which are no-regulatory. Starting in 2024, Public water systems have until 2029 to implement solutions that reduce these PFAS if monitoring shows that drinking water levels exceed the MCL's.

Charleston Water System — Water Quality Lab Results for 2023

2020 Unregulated Contaminant Monitoring (UCMR4)

Compound	Units	Raw Water		Finished Water		Distribution Water	
		Average	Range	Average	Range	Average	Range
HAAS	ppb					12.19	8.14 - 18.44
HAA6Br	ppb					5.89	4.34 to 8.42
HAA9	ppb					17.28	12.25 to 25.86
Manganese	ppb			9.38	6.15 — 14.4		
Bromide	ppb	0.04	0.03 — 0.04				
Total Organic Carbon (TOC)	ppm						

Unregulated contaminant monitoring helps EPA to determine where certain contaminants occur and whether the Agency should consider regulating those contaminants in the future. The IOPWSC was tested for UCMR4 and there were no detects. Should you wish to review these results, please contact the IOPWSC.