



**DEPARTMENT OF THE AIR FORCE  
HEADQUARTERS 7TH BOMB WING (AFGSC)  
DYESS AIR FORCE BASE TEXAS**

MEMORANDUM FOR ALL DYESS PERSONNEL

FROM: 7 BW/CD

SUBJECT: Dyess Air Force Base Drinking Water Consumer Confidence Report

1. Attached is the Dyess AFB Consumer Confidence Report for the 2023 calendar year. All of the data from the City of Abilene, as well as Dyess AFB, is provided in this report covering the measured levels of wanted and unwanted substances in our drinking water. This report is our way of communicating with you information on your source of our water and the possible contaminates.
2. The highest quality of water is provided to Dyess AFB through the efforts of 7th Civil Engineer Squadron Water/Fuels Maintenance Element and 7th Operational Medical Readiness Squadron Bioenvironmental Engineering Flight. Our drinking water is continuously tested to ensure the proper amounts of chlorine and fluoride are present. A majority of constituents are tested annually, however, some constituents are tested at varying frequencies due to past sampling and direction of the Texas Commission on Environmental Quality (TCEQ). The result is water that is free of harmful bacteria, resides within the TCEQ regulatory limits for all constituents tested, and promotes the development of strong and healthy teeth in our children. Our water is safe for consumption.
3. Dyess AFB was not issued any Notice of Violation (NOV) by TCEQ during the 2023 calendar year.
4. If you have any questions or concerns, my point of contact is Capt Jose Pagan of the Bioenvironmental Engineering Flight and he can be reached at 325-696-2325.

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SAMUEL A. FRIEND, Colonel, USAF  
Deputy Commander

Attachment:  
2023 Dyess AFB Drinking Water Consumer Confidence Report

# 2023 Consumer Confidence Report for Public Water System DYESS AIR FORCE BASE

This is your water quality report for January 1 to December 31, 2023

DYESS AIR FORCE BASE (TX2210013) provides Purchased Surface Water from City of Abilene treated and filtered surface water located in Taylor County.

For more information regarding this report contact:

Bioenvironmental Engineering Flight

Phone: (325) 696-2325

Este reporte incluye información importante sobre el agua para tomar. Para asistencia en español, favor de llamar al telefono (325) 696-2325.

## Definitions and Abbreviations

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The following tables contain scientific terms and measures, some of which may require explanation.

Action Level:

The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.

Avg:

Regulatory compliance with some MCLs are based on running annual average of monthly samples.

Level 1 Assessment:

A Level 1 assessment is a study of the water system to identify potential problems and determine (if possible) why total coliform bacteria have been found in our water system.

Level 2 Assessment:

A Level 2 assessment is a very detailed study of the water system to identify potential problems and determine (if possible) why an E. coli MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.

Maximum Contaminant Level or MCL:

The highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

Maximum Contaminant Level Goal or MCLG:

The level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.

Maximum residual disinfectant level or MRDL:

The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

Maximum residual disinfectant level goal or MRDLG:

The level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.

MFL

million fibers per liter (a measure of asbestos)

mrem:

millirems per year (a measure of radiation absorbed by the body)

na:

not applicable.

NTU

nephelometric turbidity units (a measure of turbidity)

pCi/L

picocuries per liter (a measure of radioactivity)

## Definitions and Abbreviations

ppb:	parts per billion, or microgram per liter (ug/L)
ppm:	parts per million, or milligrams per liter (mg/L)
ppq	parts per quadrillion, or picograms per liter (pg/L)
ppt	parts per trillion, or nanograms per liter (ng/L)
Treatment Technique or TT:	A required process intended to reduce the level of a contaminant in drinking water.

## Information about your Drinking Water

The sources of drinking water (both tap water and bottled water) 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, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity.

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the EPAs Safe Drinking Water Hotline at (800) 426-4791.

Contaminants that may be present in source water include:

- Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- Inorganic contaminants, such as salts and metals, which can be naturally-occurring or result from urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- Pesticides and herbicides, which may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses.
- Organic chemical contaminants, including synthetic and volatile organic chemicals, which are by-products of industrial processes and petroleum production, and can also come from gas stations, urban storm water runoff, and septic systems.
- Radioactive contaminants, which can be naturally-occurring or be the result of oil and gas production and mining activities.

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

Contaminants may be found in drinking water that may cause taste, color, or odor problems. These types of problems are not necessarily causes for health concerns. For more information on taste, odor, or color of drinking water, please contact the system's business office.

You may be more vulnerable than the general population to certain microbial contaminants, such as *Cryptosporidium*, in drinking water. Infants, some elderly, or immunocompromised persons such as those undergoing chemotherapy for cancer; persons who have undergone organ transplants; those who are undergoing treatment with steroids; and people with HIV/AIDS or other immune system disorders, can be particularly at risk from infections. You should seek advice about drinking water from your physician or health care providers. Additional guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* are available from the Safe Drinking Water Hotline (800-426-4791).

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. We are responsible for providing high quality drinking water, but we cannot control the variety of materials used in plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before using water for drinking or cooking. If you are concerned about lead in your water, you may wish to have your water 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://www.epa.gov/safewater/lead>.

### Information about Source Water

DYESS AIR FORCE BASE purchases water from CITY OF ABILENE. CITY OF ABILENE provides purchase surface water from West Central Texas WMD located in Stephens County.

TCEQ completed a Source Water Susceptibility for all drinking water systems that own their sources. This report describes the susceptibility and types of constituents that may come into contact with the drinking water source based on human activities and natural conditions. The system(s) from which we purchase our water received the assessment report. For more information on source water assessments and protection efforts at our system contact Bioenvironmental Engineering at (325) 696-2325.

## 2023 Water Quality Test Results

### Lead and Copper

Contaminants	Date Sampled	MCLG	Action Level (AL)	90th Percentile	# Sites Over AL	Units	Violation	Likely Source of Contamination
Lead	2023	0	0.015	0.00095	0	ppm	N	Erosion of natural deposits; Leaching from wood preservatives; Corrosion of household plumbing systems.
Copper	2023	1.3	1.3	0.561	0	ppm	N	Erosion of natural deposits; Leaching from wood preservatives; Corrosion of household plumbing systems.

### Disinfection By-Products

Contaminant	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Chlorite <sup>1</sup>	2023	0.693	<0.01 – 0.693	0.8	1	ppm	N	Byproduct of drinking water disinfection.
Haloacetic Acids (HAA5)	2023	14	11.7 - 17.3	No goal for the total	60	ppb	N	By-product of drinking water disinfection.
Total Trihalomethanes (TTHM)	2023	48	24.8 - 66.4	No goal for the total	80	ppb	N	By-product of drinking water disinfection.

\*The value in the Highest Level or Average Detected column is the highest average of all HAA5/TTHM sample results collected at a location over a year.

<sup>1</sup>City of Abilene Data

### Inorganic Contaminants

Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Nitrate [measured as Nitrogen]	2023	0.296	0.196 - 0.296	10	10	ppm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits.
Nitrite [measured as Nitrogen]	2023	.082	0.009 – 0.082	1	1	ppm	N	Runoff from fertilizer use; Leaching from septic tanks, sewage; Erosion of natural deposits.
Chromium <sup>1</sup>	2023	<0.001	<0.001	<0.001	0.1	ppm	N	Inorganic contaminants, such as salts and metals, which can be naturally-occurring or result from urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
Arsenic <sup>1</sup>	2023	1.3	< 1.0 – 1.3	10	10	ppb	N	Erosion of natural deposits
Barium <sup>1</sup>	2023	0.20	0.18 – 2.0	2	2	ppm	N	Discharge from plastic and fertilizer factories; Discharge from steel/metal factories.
Cyanide <sup>1</sup>	2023	147	65.7 – 147	200	200	ppb	N	Discharge from plastic and fertilizer factories; Discharge from steel/metal factories.
Fluoride <sup>1</sup>	2023	0.8	0.691 – 0.8	4	4	ppm	N	Erosion of natural deposits; water additive for strong teeth; discharge from fertilizer and aluminum factories
Selenium <sup>1</sup>	2023	<5.0	<5.0	50	50	ppb	N	Erosion from natural deposits; discharge from petroleum refineries

<sup>1</sup>City of Abilene Data

### Disinfectant Residual

Disinfectant Residual	Year	Average Level	Range of Levels Detected	MRDL	MRDLG	Unit of Measure	Violation (Y/N)	Source in Drinking Water
Chloramine Residual	2023	2.19	1.54 – 2.53	4	4	ppm	N	Water additive used to control microbes.

### Radioactive Contaminants

Inorganic Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Beta/Photon Emitters <sup>1</sup>	2020	6.6	6.6 – 6.6	0	50	pCi/L	N	Erosion of natural deposits. Decay of natural and man made deposits.
Uranium <sup>1</sup>	2023	0.29	0 – 0.29	0	30	ppb	N	Erosion of natural deposits. Decay of natural and man made deposits.
Gross Alpha <sup>1</sup>	2023	<3.0	<3.0	0	15	cpm	N	Erosion of natural deposits. Decay of natural and man made deposits.
Gross Beta <sup>1</sup>	2023	10.7	7.7 – 10.7	0	50	cpm	N	Erosion of natural deposits. Decay of natural and man made deposits.
Radium 228 <sup>1</sup>	2023	<1.0	<1.0	0	5	pCi/L	N	Erosion of natural deposits. Decay of natural and man made deposits.

<sup>1</sup>City of Abilene Data

### Contaminants

Contaminants	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Asbestos <sup>1</sup>	2012	ND	ND	7	7	MFL	N	Construction materials.

<sup>1</sup>City of Abilene Data

### Synthetic Organic Contaminants, Including Pesticides and Herbicides

Contaminant	Collection Date	Highest Level Detected	Range of Individual Samples	MCLG	MCL	Units	Violation	Likely Source of Contamination
Atrazine <sup>1</sup>	2021	0.1	0 – 0.1	3	3	ppb	N	Runoff from herbicide used on cow crops.

<sup>1</sup>City of Abilene Data

## Per- and Polyfluoroalkyl Substances (PFAS)

The Unregulated Contaminant Monitoring Rule (UCMR) program was developed in coordination with the Contaminant Candidate List (CCL). The CCL is a list of contaminants that are not regulated by the National Primary Drinking Water Regulations, are known or anticipated to occur at public water systems, and may warrant regulation under the Safe Drinking Water Act. Data collected through UCMR are stored in the National Contaminant Occurrence Database (NCOD) to support analysis and review of contaminant occurrence, to guide the CCL selection process, and to support the Administrator's determination of whether to regulate a contaminant in the interest of protecting public health.

Analyte	CAS Number	Highest Level Detected	Range	MCL	Units	Contaminant Classification
PFBA <sup>1</sup>	CAS 375-22-4	14	6 – 14	70	ppt	PFAS
PFPeA <sup>1</sup>	CAS 2706-90-3	18	0 – 18	70	ppt	PFAS
PFBS <sup>1</sup>	CAS 375-73-5	7	6 – 7	70	ppt	PFAS
PFHxA <sup>1</sup>	CAS 307-24-4	21.7	3.11 – 21.7	70	ppt	PFAS
PFHpA <sup>1</sup>	CAS 375-85-9	10	0 – 10	70	ppt	PFAS
PFHxS <sup>1</sup>	CAS 355-46-4	28	9 – 28	70	ppt	PFAS
PFOA <sup>1</sup>	CAS 335-37-1	7.49	0 – 7.49	70	ppt	PFAS
PFOS <sup>1</sup>	CAS 1763-23-1	30	0 – 30	70	ppt	PFAS

<sup>1</sup>City of Abilene Data