

DRAFT

**AUTHORIZATION TO DISCHARGE UNDER THE
OKLAHOMA POLLUTANT DISCHARGE ELIMINATION SYSTEM**

**PERMIT NUMBER: OK0021911
ID NUMBER: S20528**

PART I

In compliance with the Oklahoma Pollutant Discharge Elimination System (OPDES) Act, Title 27A OS § 2-6-201, *et seq.*, as amended, and the rules of the Oklahoma Department of Environmental Quality (DEQ) adopted thereunder (see the Oklahoma Administrative Code (OAC) 252:606), the Federal Clean Water Act (CWA), Public Law 95-217 (33 USC 1251, *et seq.*), Section 402; and the National Pollutant Discharge Elimination System (NPDES) regulations at Title 40 of the Code of Federal Regulations (CFR) Parts 122, 124, and 403),

City of Watonga
P.O. Box 280
Watonga, OK 73772

is hereby authorized to discharge treated wastewater from the Watonga Wastewater Treatment Facility (WWTF) located at approximately

SW¼, SE¼, NE¼
Section 36, Township 16 North, Range 12 East, Indian Meridian (I.M.),
Blaine County, Oklahoma
or at 1.5 miles South of HWY 281, Watonga, OK 73772

to receiving waters: the North Canadian River at the point located at approximately

Latitude: 35° 48' 56.604" N [GPS: NAD83]
Longitude: 98° 25' 26.317" W [GPS: NAD83]

Water Body ID No. OK520530000010_10

in accordance with effluent limitations, monitoring requirements and other conditions set forth in Parts I, II, III, and IV hereof.

This permit replaces and supersedes the previous permit issued on May 6, 2019.

The issuance date of this permit is Month Date 2024.

This permit shall become effective Month Date 2024.

This permit and authorization to discharge shall expire at midnight Month Date 2029.

For the Oklahoma Department of Environmental Quality:

Michael B. Moe, P.E., Manager
Municipal Discharge and Stormwater Permits Section
Water Quality Division

Shellie R. Chard, Director
Water Quality Division

A. Effluent Limitations and Monitoring Requirements (Outfall 001)

Beginning the effective date of the permit through the expiration date of the permit, the permittee is authorized to discharge treated wastewater in accordance with the following limitations:

Effluent Characteristic		Discharge Limitations				Monitoring Requirements	
		Mass Loading (lb/day)	Concentrations (mg/L, unless otherwise specified)			Frequency	Sample Type
		Monthly Avg.	Monthly Avg.	Weekly Avg.	Daily Max.		
Flow (mgd) [STORET: 50050]	Year round	---	Report	---	Report	Daily	Totalized
Biochemical Oxygen Demand -5 Day (BOD ₅) [STORET: 00310]	Nov – May	240.2	30	45	---	3 per Month	3-hour composite
Carbonaceous Biochemical Oxygen Demand-5 Day CBOD ₅) [STORET: 80082]	June – Oct	120.1	15	22.5	---	3 per Month	3-hour composite
Total Suspended Solids (TSS) [STORET: 00530]	Year round	240.2	30	45	---	3 per month	3-hour composite
Ammonia (NH ₃ -N) [STORET: 00610]	Jun - Oct	80.1	10	15	---	3 per month	3-hour composite
pH (standard unit) [STORET: 00400]	Year round	---	6.5 – 9.0			Daily	Grab
<i>E. coli</i> ^a [STORET: 51040]	May – Sept	---	126 ^b	--	406	2 per week	Grab
	Oct – Apr	---	630 ^b	---	2,030	1 per week	
Total Residual Chlorine (TRC) ^c [STORET: 50060]	Year round	---	Instantaneous Maximum: No Measurable ^d			Daily	Grab

^a *E. coli* shall be reported in colony forming unit (CFU)/100 mL.

^b Monthly data for *E. coli* shall be reported as geometric mean of all samples in that month.

^c If no chlorine is used for an entire reporting period, the permittee shall report a value of “zero” for the daily maximum and enter “No chlorine used this reporting period” in the comments section on the DMR for that reporting period in lieu of the indicated testing. For any week in which chlorine is used, the indicated testing shall be done until the chlorine is no longer in use and at least one subsequent test verifies that the effluent meets the total residual chlorine limit.

^d No measurable is defined as less than 0.1 mg/L.

Sampling Point

Samples taken for compliance with the monitoring requirements specified above shall be taken at the discharge from the final treatment unit.

Year-round Requirements

- There shall be no discharge of floating solids or visible foam in other than trace amounts.

- There shall be no discharge of a visible sheen of oil or globules of oil or grease on or in the water. Oil and grease shall not be present in quantities that adhere to stream banks and coat bottoms of water courses or which cause deleterious effects to the biota.
- All monitoring and reporting requirements shall also be in compliance with Part III of this permit.

B. Sanitary Sewer Overflows

Any bypass in the collection system [sanitary sewer overflow (SSO)] shall be reported in accordance with Part III.B.6 of this permit.

C. Reporting of Monitoring Results

Monitoring results shall be reported in accordance with the provisions of Part III.B.5 of the permit. Monitoring results obtained during the previous month shall be summarized and electronically reported on an electronic Discharge Monitoring Report (eDMR) form due to the Oklahoma Department of Environmental Quality, Water Quality Division, Wastewater Compliance Tracking Section no later than the 15th day of the month following the completed monthly test. If no discharge occurs during the reporting period, an eDMR form stating "No Discharge" shall be electronically submitted according to the above schedule. Instructions on how to register as a Preparer or Signatory for eDMRs, as well as how to prepare and submit eDMRs, can be found on DEQ's website at <https://www.deq.ok.gov/water-quality-division/electronic-reporting/>. Assistance is also available by contacting DEQ at (405) 702-8100 or email deqreporting@deq.ok.gov.

The first report is due on the 15th of MONTH, 2024.

PART II. OTHER PERMIT REQUIREMENTS

A. CONTRIBUTING INDUSTRIES AND PRETREATMENT REQUIREMENTS

1. The following pollutants shall not be introduced into a Publicly Owned Treatment Works (POTW) facility, defined in 40 CFR § 403.3(q) “as any devices and systems used in storage, treatment, recycling, and reclamation of municipal sewage and industrial wastes of a liquid nature. It also includes sewers, pipes, and other conveyances only if they convey wastewater to a POTW Treatment Plant. The term also means the municipality as defined in Section 502(4) of the CWA, which has jurisdiction over the Indirect Discharges to and from such treatment works.”
 - a. Pollutants which create a fire or explosion hazard in the POTW facility, including, but not limited to, wastestreams with a closed cup flashpoint of less than 60°C (140°F) using the test methods specified in 40 CFR § 261.21;
 - b. Pollutants which will cause corrosive structural damage to the POTW, but in no case discharges with pH lower than 5.0, unless the works are specifically designed to accommodate such discharges;
 - c. Solid or viscous pollutants in amounts which will cause obstruction to the flow in the POTW, resulting in interference;
 - d. Any pollutant, including oxygen demanding pollutants (e.g., BOD), released in a discharge at a flow rate and/or pollutant concentration which will cause interference with the POTW;
 - e. Heat in amounts which will inhibit biological activity in the POTW resulting in interference but in no case heat in such quantities that the temperature at the POTW treatment plant exceeds 40°C (104°F) unless the Approval Authority, upon request of the POTW, approves alternate temperature limits;
 - f. Petroleum oil, non-biodegradable cutting oil, or products of mineral oil origin in amounts that will cause interference or pass through;
 - g. Pollutants which result in the presence of toxic gases, vapors, or fumes within the POTW in a quantity that may cause acute worker health and safety problems; and
 - h. Any trucked or hauled pollutants, except at discharge points designated by the POTW.
2. The permittee shall require any indirect discharger to the treatment works to comply with the reporting requirements of Sections 204(b), 307, and 308 of the CWA, including any requirements established under 40 CFR Part 403.
3. The permittee shall provide adequate notice of the following:
 - a. Any new introduction of pollutants into the treatment works from an indirect discharger which would be subject to Sections 301 and 306 of the CWA and/or 40 CFR Parts 405-499 if it were directly discharging those pollutants;

- b. Any substantial change in the volume or character of pollutants being introduced into the treatment works by a source introducing pollutants into the treatment works at the time of issuance of the permit; and
- c. Any notice shall include information on (i) the quality and quantity of effluent to be introduced into the treatment works and (ii) any anticipated impact of the change on the quality or quantity of effluent to be discharged from the POTW.

B. RE-OPENER CLAUSE

This permit may be re-opened for modification or revocation and reissuance to require additional monitoring and/or effluent limitations where actual or potential exceedances of State water quality criteria are determined to be the result of the permittee's discharge to the receiving water, or a revised Total Maximum Daily Load (TMDL) is established for the receiving water, or when required as technology advances. Modification or revocation and reissuance of the permit shall follow regulations listed at 40 CFR § 124.5.

C. BIOSOLIDS/SEWAGE SLUDGE REQUIREMENTS

1. The biosolids/sewage sludge beneficial reuse and disposal practices shall comply with the requirements of Sludge Management Plant (SMP) Number 3506011, approved by DEQ on March 13, 1997, that allows the permittee to land apply biosolids/sewage sludge at a site located in the W½, NE¼, of the Section 19, Township 16 North, Range 11 West, IM, Blaine County, Oklahoma.

The SMP was amended on December 15, 2022, to allow the permittee to landfill sewage sludge at the Oklahoma Environmental Authority Landfill (Landfill Permit Number 3509005), located at 20435 SW 29th St., Union City, Oklahoma, or in Section 10, Township 11 North, Range 7 West, IM, Canadian County, Oklahoma.

2. The biosolids/sewage sludge beneficial reuse and disposal practices shall comply with the Federal regulations for landfills, biosolids/sewage sludge land application, and solid waste disposal established at 40 CFR Parts 257, 503, and the DEQ rules governing Sludge Management (OAC 252:515 and OAC 252:606) as applicable.
3. The permittee is required to maintain all records relevant to biosolids/sewage sludge beneficial reuse and disposal for the life of the permit. These records shall be made available to DEQ upon request.
4. The permittee shall give 120 days prior notice to DEQ of any change planned in the biosolids/sewage sludge beneficial reuse or disposal practices.
5. The permittee shall also comply with all applicable biosolids/sewage sludge requirements in Part IV of this permit.

D. POLLUTION PREVENTION REQUIREMENTS

1. The permittee shall institute a program within 12 months of the effective date of the permit (or continue an existing program) directed towards optimizing the efficiency and extending the useful life of the facility. The permittee shall consider the following items in the program:
 - a. The influent loadings, flow and design capacity;

- b. The effluent quality and plant performance;
 - c. The age and expected life of the wastewater treatment facility's equipment;
 - d. Bypasses and overflows of the tributary sewerage system and treatment works;
 - e. New developments at the facility;
 - f. Operator certification and training plans and status;
 - g. The financial status of the facility;
 - h. Preventative maintenance programs and equipment conditions; and
 - i. An overall evaluation of conditions at the facility.
2. The permittee shall prepare the following information on the biosolids/sewage sludge generated by the facility:
- a. An annual quantitative tabulation of the ultimate disposition of all biosolids/sewage sludge (including, but not limited to, the amount beneficially reused, landfilled, and incinerated).
 - b. An assessment of technological processes and an economic analysis evaluating the potential for beneficial reuse of all biosolids/sewage sludge not currently beneficially reused including a listing of any steps which would be required to achieve the biosolids/sewage sludge quality necessary to beneficially reuse the biosolids/sewage sludge.
 - c. A description of, including the expected results and the anticipated timing for, all projects in process, in planning and/or being considered which are directed towards additional beneficial reuse of biosolids/sewage sludge.
 - d. An analysis of one composite sample of the biosolids/sewage sludge collected prior to ultimate re-use or disposal shall be performed for the pollutants listed in Part IV, Element 1, Section III, Table 3 of the permit.
 - e. A listing of the specific steps (controls/changes) which would be necessary to achieve and sustain the quality of the biosolids/sewage sludge so that the pollutant concentrations in the biosolids/sewage sludge fall below the pollutant concentration criteria listed in Part IV, Element 1, Section III, Table 3 of the permit.
 - f. A listing of, and the anticipated timing for, all projects in process, in planning, and/or being considered which are directed towards meeting the biosolids/sewage sludge quality referenced in (e) above.

The permittee shall certify in writing, within three years of the effective date of the permit, that all pertinent information is available. This certification shall be submitted to:

Oklahoma Department of Environmental Quality
Water Quality Division
Municipal Discharge and Stormwater Permits Section
P.O. Box 1677
707 North Robinson Ave
Oklahoma City, OK 73101-1677

FACT SHEET

(Draft of February 2, 2024)

FOR THE DRAFT AUTHORIZATION TO DISCHARGE TO WATERS OF THE UNITED STATES
UNDER THE OKLAHOMA POLLUTANT DISCHARGE ELIMINATION SYSTEM.

OPDES Permit Number: OK0021911

Facility ID Number: S20528

Applicant: City of Watonga
P.O. Box 280
Watonga, OK 73772

Issuing Office: Oklahoma Department of Environmental Quality
Water Quality Division
707 North Robinson Ave
P.O. Box 1677
Oklahoma City, Oklahoma 73101-1677

Prepared By: Holley Vinson, Permit Writer.
Municipal Discharge and Stormwater Permits Section
Water Quality Division

Date Prepared: February 2, 2024

Reviewed By: Michael B. Moe, P.E., Manager
Municipal Discharge and Stormwater Permits Section
Water Quality Division

and

Patrick Rosch, P.E., Manager
Municipal Wastewater Group
Water Quality Division

The Oklahoma Department of Environmental Quality (DEQ) has made a tentative determination to issue a permit for the discharge described in the application. DEQ is the permitting authority and this permit will be enforceable under both Federal and State laws, rules and regulations. Permit requirements are based on the National Pollutant Discharge Elimination System (NPDES) regulations at Title 40 of the Code of Federal Regulations (CFR) Parts 122, 124, and 403 and the Oklahoma Pollutant Discharge Elimination System (OPDES) Act, Title 27A OS § 2-6-201, *et seq.*, as amended, and the rules of DEQ adopted thereunder (see the Oklahoma Administrative Code (OAC) 252:606).

I. PERMITTING BACKGROUND

A. CHRONOLOGY OF PERMITTING ACTIVITIES

The following is a chronology of permitting activities since issuance of the previous OPDES permit:

Month Date, Year:	Public Notice of Draft published by Facility.
Month Date, Year:	Public Notice of Draft published by DEQ.
Month Date, Year:	Comments on draft permit and fact sheet received from applicant.
Month Date, Year:	Draft permit package sent to applicant for courtesy review and for public notice.
May 31, 2024:	Scheduled expiration of previous OPDES permit.
January 10, 2024:	Site visit conducted.
January 3, 2024:	Administrative review of permit application completed.
November 29, 2023:	Certification of public notice of filing of application received.
November 22, 2023:	OPDES permit application (Form 2M2) received.
May 6, 2019:	Previous OPDES permit issued.

B. PROPOSED PERMITTING ACTION

It is proposed that Permit No. OK0021911, which was effective June 1, 2019, for which application for renewal was timely submitted (>180 days prior to permit expiration), be reissued for a five-year term in accordance with regulations promulgated at 40 CFR § 122.46(a), OAC 252:606-1-3(b).

II. APPLICANT ACTIVITY

A. DESCRIPTION AND LOCATION OF FACILITY

The Watonga Wastewater Treatment Facility (WWTF), owned and operated by the City of Watonga, is located in the SW¼, SE¼, NE¼ of the Section 36, Township 16 North, Range 12 West, Indian Meridian (IM), Blaine County, Oklahoma, or at 1.5 miles South of HWY 281, Watonga, OK 73772. Under the standard industrial classification (SIC) Code 4952, the facility provides biological treatment of domestic sewage. Based on the US Census Bureau 2022 estimate, the population of Watonga is 2,633.

B. WASTEWATER GENERATION AND TREATMENT

1. Treatment Plant

The facility's design average daily flow is 0.96 million gallons per day (mgd) which is less than 0.99 mgd for the design average daily flow specified in the Oklahoma's Water Quality Management Plan (WQMP). The wastewater received at this Publicly Owned Treatment Works (POTW) consists of domestic sewage. Biological treatment of the wastestream takes place using a trickling filter system, prior to discharge.

2. Industrial Contributions

The facility does not receive industrial wastewaters.

3. Reclaimed Water for Water Reuse

The facility does not supply reclaimed water for water reuse.

III. DISCHARGE LOCATION

Sampling Point and Outfall 001

Sampling Point and Outfall	Location			Receiving Stream
	Legal Description	Latitude	Longitude	
Sampling Point	SW¼, SE¼, NE¼ Section 36, Township 16 North, Range 12 West, IM Blaine County, Oklahoma	35° 49' 12.704" N (GPS: NAD83) ^a	98° 25' 19.767" W (GPS: NAD83) ^a	---
Outfall 001 physical location	NE¼, SW¼, SE¼ Section 36, Township 16 North, Range 12 West, IM Blaine County, Oklahoma	35° 48' 56.604" N (GPS: NAD83) ^a	98° 25' 26.317" W (GPS: NAD83) ^a	North Canadian River

^a The North American Datum of 1983 or NAD83.

IV. TECHNOLOGY-BASED EFFLUENT LIMITATIONS AND CONDITIONS

POTWs treating domestic sewage are required by 40 CFR Part 133 to provide secondary or secondary-equivalent treatment. The Oklahoma definition of secondary treatment, which sets minimum requirements for developing wasteload allocations for municipalities in the State's Water Quality Management Plan (WQMP), is defined at OAC 252:606-5-2(2). The definitions are dependent on the type of treatment system and whether the receiving stream flow is perennial or intermittent. Since the facility is a mechanical system discharging to a perennial stream, secondary treatment is defined according to OAC 252:606-5-2(2)(B) as indicated below:

Mechanical – Perennial

5-day Biochemical Oxygen Demand (BOD₅)

A monthly average effluent concentration of 30 mg/L

A weekly average effluent concentration of 45 mg/L

Total Suspended Solids (TSS)

A monthly average effluent concentration of 30 mg/L

A weekly average effluent concentration of 45 mg/L

pH

A pH range between 6.5 and 9.0 standard units, inclusive.

V. WATER QUALITY-BASED EFFLUENT LIMITATIONS AND CONDITIONS

A. RECEIVING STREAM DESIGNATED USES AND ANTIDEGRADATION PROVISIONS

The facility discharges through Outfall 001 into the North Canadian River, waterbody identification (WBID OK520530000010_10) in segment 520530 of the Canadian River Basin. As designated in Appendix A of Oklahoma's Water Quality Standards (OWQS), the designated beneficial uses in this segment are:

- Public and Private Water Supplies (OAC 252:730-5-10)
- Fish and Wildlife Propagation (OAC 252:730-5-12), Warm Water Aquatic Community
- Agriculture (OAC 252:730-5-13)
- Primary Body Contact Recreation (OAC 252:730-5-16)
- Aesthetics (OAC 252:730-5-19)
- Fish Consumption (OAC 252:730-5-20)

The North Canadian River is not designated as an Outstanding Resource Water (ORW), High Quality Water (HQW), or Sensitive Water Supply (SWS) in Appendix A of the OWQS. Neither is it designated in Table 1 of Appendix B of the OWQS as an area of ecological and/or recreational significance or in Table 2 of Appendix B as an area containing federally-listed endangered species.

B. WATER QUALITY STANDARDS IMPLEMENTATION

1. DO and DO-Demanding Substances – Fish and Wildlife Propagation Use (Outfall 001)

OAC 252:730-5-12(f)(1) requires that where dissolved oxygen (DO)-demanding substances are present in an effluent at significant levels, a wasteload allocation (WLA) must be established according to certain seasonal criteria dependent on the receiving water's aquatic community subcategory. In determining the WLA for DO-demanding substances, the prescribed level of secondary treatment for the facility (see Section IV of the fact sheet) is modeled to determine if it meets the aforementioned seasonal criteria. If the model indicates that a more stringent WLA than secondary is required to meet these criteria, then the more stringent wasteload allocation (often referred to as a "tertiary" level of treatment) may be used once it is granted technical approval by EPA Region 6. It is then promulgated as an amendment to the WQMP. The approved WLA for DO-demanding substances for this facility at a design flow of 0.99 mgd is shown in the following table:

DO-Based WLA

Season	WLA Parameters (in mg/L)			
	CBOD ₅	BOD ₅	NH ₃ -N	TSS)
Spring (April 1 – May 31)	---	30	---	30
Summer (June 1 – October 31)	15	---	10	30
Winter (November 1 – March 31)	---	30	---	30

For purposes of establishing permit limitations for DO-demanding substances, the seasonal monthly average limit (MAL) in the draft permit for each effluent characteristic is set equal to the corresponding WLA concentration shown in the table above. The corresponding weekly average

limit (WAL) is set equal to 1.5 times the seasonal WLA concentration in accordance with 40 CFR § 122.45(d)(2).

2. pH – Fish and Wildlife Propagation Use (Outfall 001)

OAC 252:730-5-12(f)(3) states, "pH values shall be between 6.5 and 9.0 in waters designated for fish and wildlife propagation; unless pH values outside that range are due to natural conditions." This pH range is established in the draft permit.

3. Oil and Grease – Fish and Wildlife Propagation Use (Outfall 001)

In accordance with OAC 252:730-5-12(f)(4), a narrative condition prohibiting the discharge of any visible sheen or globules of oil or grease or in quantities that adhere to stream banks and coat bottoms of water courses or which cause deleterious effects to the biota will be included in the draft permit.

4. Bacterial Criteria

a. Bacteria Limitation – Primary Body Contact Recreation Use (Outfall 001)

The receiving stream, the North Canadian River (WBID 520530000010_10), was impaired for *Escherichia coli* (*E. coli*) and Enterococci per the November 6, 2007, Total Maximum Daily Load (TMDL ID 33888). The TMDL established a WLA for bacteria in the discharge from the Watonga WWTF. Thus, the following bacteria limits are applicable to the facility's discharge through Outfall 001.

- In accordance with OAC 252:690-3-86(a)(1), the draft permit will have an *E. coli* monthly average limit (MAL) of 126 colony forming unit (CFU)/100 mL, expressed as a geometric mean, and a daily maximum limit (DML) of 406 CFU /100 mL (for streams) in effect for the "recreational period" of May 1 through September 30 to protect primary body contact recreation (PBCR) beneficial use.
- Additionally, in accordance with OAC 252:690-3-86(b), from October 1 through April 30; *E. coli* monthly average limit of 630 CFU /100 mL, expressed as a geometric mean, and the daily maximum limit of 2030 CFU /100 mL (for streams) stated in OAC 252:690-3-86(c)(1) to protect secondary body contact recreation (SBCR) beneficial use shall apply to permittees that discharge to waterbodies that are impaired for bacteria.
- Pursuant to OAC 252:690-3-89(a)(3), the draft permit will have bacteria monitoring frequency of two per week for the months of May through September and one per week for the months of October through April to protect PBCR beneficial use since the receiving stream is impaired for bacteria.

b. Total Coliform – Public and Private Water Supply Use (Outfall 001)

In accordance with OAC 252:690-3-78, total coliform criteria are applied where a discharge is within five miles upstream of a public water supply intake or within five miles of such an intake in a lake. A total coliform limit is not required because there is no intake within five miles downstream or within five lake miles.

5. Toxicity from Halogenated Oxidants – Fish and Wildlife Propagation Use (Outfall 001)

OAC 252:740-3-1(c) states, “Toxicity from halogens (e.g., chlorine, bromine, and bromochloro compounds) will be controlled by dehalogenation rather than WET testing. However, use of dehalogenation shall not exempt an effluent from the WET testing requirements of this subchapter.” The requirement of OAC 252:740-3-1(c) for dehalogenation is typically implemented as “no measureable amount” in the effluent in accordance with OAC 252:690-3-28. “No measurable amount” is defined by DEQ to be < 0.1 mg/L for halogenated oxidants.

6. Floatable Solids and Foam – Aesthetics Use (Outfall 001)

In accordance with OAC 252:730-5-9(b), a narrative condition prohibiting the discharge of floating solids or visible foam in other than trace amounts will be included in the draft permit.

7. Pretreatment Program

DEQ has tentatively determined that the permittee is not required to develop a full pretreatment program.

8. Biosolids/Sewage Sludge Requirements

The biosolids/sewage sludge beneficial reuse and disposal practices shall comply with the Federal regulations for landfills, biosolids/sewage sludge land application, and solid waste disposal established at 40 CFR Parts 257, 503, and the DEQ rules governing Sludge Management (OAC 252:515 and OAC 252:606) as applicable.

The biosolids/sewage sludge beneficial reuse practices shall also comply with the requirements of Sludge Management Plan Number 3506011, approved by DEQ on March 13, 1997, that allows the permittee to land apply biosolids/sewage sludge at a site located in the W½, NE¼, of the Section 19, Township 16 North, Range 11 West, IM, Blaine County, Oklahoma.

The sewage sludge disposal shall also comply with the requirements of Landfill permit Number 3509005, approved by DEQ, and the Sludge Management Plan for the facility approved by DEQ and amended on December 15, 2022, that allows the permittee to landfill sewage sludge at the Oklahoma Environmental Management Authority Landfill located at 20435 Southwest 29th Street, Union City, Oklahoma and located in the SW ¼, of the SE ¼ of the Section 10, Township 11 North, Range 7 West, IM, Canadian County, Oklahoma.

The permittee is required to maintain all records relevant to biosolids/sewage sludge beneficial reuse and disposal for the life of the permit. These records shall be made available to DEQ upon request.

The permittee shall give 120 days prior notice to DEQ of any change planned in the biosolids/sewage sludge beneficial reuse or disposal practices.

C. 303(d) LIST ASSESSMENT

1. Water Quality Assessment and Causes of Impairment

The Category 5 303(d) list in the Appendix C of the 2022 Integrated Report, indicates that this stream segment of Canadian River, North (WBID# OK520530000010_10), to which the Watonga WWTF discharges, is impaired. The listed causes are dissolved oxygen (DO) and turbidity. A TMDL development process for bacteria was completed in early November 2007, establishing a

WLA for the Watonga WWTF for enterococcus (bacteria). In accordance with OAC 252:690-3-86(a)(1), either bacteria indicator may be used to meet the requirements of the TMDL. Therefore, the *E. coli* limits described in Section V.B.4 are applied to this permit, and additional permit limits for enterococcus are not needed.

2. 303(d) List-Related Permitting Actions

Where impairments are listed, EPA Region 6 policy requires that the draft permit include WQ-based limits or a monitoring and reporting requirement for the listed pollutants if present in the discharge, and a re-opener clause as permit conditions. Therefore, the following permitting actions are taken according to the listed impairments:

DO

Controls for low DO are established in the draft permit through effluent limits for BOD₅.

Turbidity

Controls for high turbidity are established in the draft permit through effluent limits for TSS.

A re-opener clause is included in the permit to allow for modification and/or reissuance to require additional monitoring and/or effluent limitations.

D. ANTIDegradation Requirements

Because no antidegradation restrictions are listed in Appendix A of the OWQS for this water body, implementation of Oklahoma's antidegradation policy, as described at OAC 252:740, Subchapter 13, states that no special requirements beyond Tier 1 protection (maintenance and protection of designated uses, as herein described) are necessary.

E. PROTECTION OF ENDANGERED AND THREATENED SPECIES AND CRITICAL HABITAT

The discharge point is not located in waters identified as sensitive by the United States Fish and Wildlife Service (USFWS) for endangered or candidate species or critical habitat; therefore, notification to the USFWS is not necessary.

F. RE-OPENER CLAUSE

A re-opener clause is included in the permit to allow for modification and/or reissuance to require additional monitoring and/or effluent limitations where actual or potential exceedances of State water quality criteria are determined to be the result of the permittee's discharge to the receiving water(s), or a revised Total Maximum Daily Load is established for the receiving water(s). Modification and/or reissuance of the permit shall follow regulations listed at 40 CFR § 124.5.

VI. SUMMARY OF PROPOSED PERMIT EFFLUENT LIMITATIONS

A. GENERAL

In accordance with 40 CFR § 122.44(a), (d), and (l), pollutant limitations and monitoring requirements are established in the draft permit based on the WQMP (208 Plan) for this facility, technology-based, water quality-based, or previous permit requirements. Mass loading limitations are calculated using the

facility's design average daily flow is 0.96 mgd which is less than the design average daily flow of 0.99 mgd specified in the Oklahoma's Water Quality Management Plan (WQMP).

Mass loading limit (in lb/day) = Concentration limit (in mg/L) $\times$ $Q_{e(D)}$ (permitted flow in mgd) $\times$ 8.34

B. OUTFALL 001

1. Final Limitations

Final limitations and reporting requirements are effective on the effective date of the permit:

a. Concentration Limitations and Reporting Requirements

Effluent Characteristic ^a		Water Quality Standards		Previous Permit		Draft Permit	
		Monthly Avg	Weekly Avg	Monthly Avg	Weekly Avg	Monthly Avg	Weekly Avg
BOD ₅	Nov-May	30	45	30.0	45.0	30	45
CBOD ₅	Jun – Oct	15	22.5	15.0	22.5	15	22.5
TSS	Year round	30	45	30.0	45.0	30	45
Ammonia – as N	Jun – Oct	10	15	10.0	15.0	10	15
<i>E. coli</i> (CFU /100 mL)	May – Sep	126 ^b	406 ^c	126 ^b	406 ^c	126 ^b	406 ^c
	Oct – Apr	630 ^b	2,030 ^c	630 ^b	2,030 ^c	630 ^b	2,030 ^c
Total Residual ^d Chlorine (TRC)	Year round	Instantaneous Maximum: No measureable ^e		Instantaneous Maximum: No measureable ^e		Instantaneous Maximum: No measureable ^e	
pH (standard units)	Year round	6.5 to 9.0		6.5 to 9.0		6.5 to 9.0	

^a Units are mg/L, unless otherwise specified.

^b Geometric mean.

^c Daily maximum.

^d If no chlorine is used for an entire reporting period, the permittee shall report a value of “zero” for the daily maximum and enter “No chlorine used this reporting period” in the comments section on the DMR for that reporting period in lieu of the indicated testing. For any week in which chlorine is used, the indicated testing shall be done until the chlorine is no longer in use and at least one subsequent test verifies that the effluent meets the total residual chlorine limit.

^e No measurable is defined as less than 0.1 mg/L.

b. Mass Loading Limitations and Reporting Requirements

Effluent Characteristic ^a		Water Quality Standards	Previous Permit	Draft Permit
		Monthly Avg	Monthly Avg	Monthly Avg
Flow (mgd)	Year-round	---	Report	Report
BOD ₅	Nov – May	240.2	247.7	240.2
CBOD ₅	Jun – Oct	120.1	123.8	120.1
TSS	Year round	240.2	247.7	240.2
Ammonia – as N	Jun – Oct	80.1	82.6	80.1

^a Units are lb/day, unless otherwise specified.

c. Final Monitoring Requirements and Sample Types

Effluent Characteristic		Previous Permit		Draft Permit	
		Measurement Frequency	Sample Type	Measurement Frequency ^a	Sample Type
Flow	Year round	Daily	Totalized	Daily	Totalized
BOD ₅	Nov – May	3 per month	3-hour composite	3 per month	3-hour composite
CBOD ₅	Apr – Oct	3 per month	3-hour composite	3 per month	3-hour composite
TSS	Year round	3 per month	3-hour composite	3 per month	3-hour composite
Ammonia – as N	Jun– Oct	3 per month	3-hour composite	3 per month	3-hour composite
<i>E. coli</i> ^b	May – Sep	2 per week	Grab	2 per week	Grab
	Oct – Apr	1 per week	Grab	1 per week	Grab
Total Residual Chlorine (TRC)	Year round	Daily	Grab	Daily	Grab
pH	Year round	Daily	Grab	Daily	Grab

^a Monitoring frequency is in accordance with OAC 252:606 Appendix A Table 1-3, unless otherwise specified.

^b *E. coli* monitoring frequency in accordance with OAC 252:690-3-89(a)(3).

VII. RE-OPENER CLAUSE

A re-opener clause is included in the permit to allow for modification and/or reissuance to require additional or more frequent monitoring, additional or more stringent limits, additional operational controls, or additional reporting and recordkeeping requirements where actual or potential threats to public health or the environment are determined to be the result of the permittee's operation of the water reuse system or where the water reuse system is not being properly operated and maintained in accordance with OAC 252:627. Modification and/or reissuance of the permit shall follow regulations listed at OAC 252:004.

VIII. SUMMARY OF CHANGES FROM PREVIOUS PERMIT

Changes were made in the draft permit from design flow of 0.99 mgd to 0.96 mgd and the mass loading for BOD₅, CBOD₅, TSS and Ammonia relative to the previous discharge permit:

IX. REVIEW BY OTHER AGENCIES AND FINAL DETERMINATION

A public notice which includes a link to the DEQ's webpage where the draft permit may be viewed will be sent to various Federal and State agencies upon posting the draft permit in the DEQ's webpage. If comments are received from these agencies or other State or Federal agencies with jurisdiction over fish, wildlife, or public health, the permit may be denied or additional conditions may be included in accordance with regulations promulgated at 40 CFR § 124.59.

The public notice describes the procedures for the formulation of final determinations.