

NPDES PERMIT NO. NM0023311

FACT SHEET

FOR THE DRAFT NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES)
PERMIT TO DISCHARGE TO WATERS OF THE UNITED STATES

APPLICANT

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ISSUING OFFICE

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DATE PREPARED

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PERMIT ACTION

Proposed re-issuance of the current permit issued on May 27, 2021, with an effective date of July 1, 2021, and an expiration date of June 30, 2026.

RECEIVING WATER – BASIN

Rio Grande River – Rio Grande Basin (Segment 20.6.4.101 NMAC)

DOCUMENT ABBREVIATIONS

In the document that follows, various abbreviations are used. They are as follows:

4Q3	Lowest four-day average flow rate expected to occur once every three-years
BAT	Best available technology economically achievable
BCT	Best conventional pollutant control technology
BPT	Best practicable control technology currently available
BMP	Best management plan
BOD	Biochemical oxygen demand (five-day unless noted otherwise)
BPJ	Best professional judgment
CBOD	Carbonaceous biochemical oxygen demand (five-day unless noted otherwise)
CD	Critical dilution
CFR	Code of Federal Regulations
cfs	Cubic feet per second
COD	Chemical oxygen demand
COE	United States Corp of Engineers
CWA	Clean Water Act
DMR	Discharge monitoring report
DO	Dissolved oxygen
ELG	Effluent limitation guidelines
EPA	United States Environmental Protection Agency
ESA	Endangered Species Act
FWS	United States Fish and Wildlife Service
mg/L	Milligrams per liter
ug/l	Micrograms per liter
lbs	Pounds
MG	Million gallons
MGD	Million gallons per day
ML	Method minimum level
NMAC	New Mexico Administrative Code
NMED	New Mexico Environment Department
NMIP	New Mexico NPDES Permit Implementation Procedures
NMWQS	New Mexico State Standards for Interstate and Intrastate Surface Waters
NOEC	No observable effect concentration
NPDES	National Pollutant Discharge Elimination System
ML	Minimum quantification level
O&G	Oil and grease
POTW	Publicly owned treatment works
RP	Reasonable potential
SS	Settleable solids
SSM	Sufficiently Sensitive Method
SIC	Standard industrial classification
s.u.	Standard units (for parameter pH)
SWQB	Surface Water Quality Bureau
TDS	Total dissolved solids
TMDL	Total maximum daily load
TRC	Total residual chlorine
TSS	Total suspended solids
UAA	Use attainability analysis
USGS	United States Geological Service
WLA	Waste Load allocation
WET	Whole effluent toxicity
WQCC	New Mexico Water Quality Control Commission
WQMP	Water Quality Management Plan
WWTP	Wastewater treatment plant

I. CHANGES FROM THE PREVIOUS PERMIT

The changes from the current permit issued on May 27, 2021, with an effective date of July 1, 2021, and an expiration date of June 30, 2026, include:

- Monitoring frequency for PCBs has been reduced to monthly from once/2 weeks.
- Monitoring of toxic pollutants have been removed.
- Limits have been added for cyanide with compliance schedule.
- Monitoring of PFAS pollutants has been added.
- WET limitation has been established for both species with compliance schedule.

II. APPLICANT LOCATION and ACTIVITY

As described in the application, the facility (Latitude 32° 17' 35.2" N and Longitude 106° 49' 23.94" W) is located at 2851 West Amador, Las Cruces in Dona Ana County, New Mexico.

Under the SIC code 4952, the applicant operates Jacob Hands Memorial WWTF, which has a design flow of 13.5 MGD. It provides sanitary services for approximately 120,442-population, including the same 8 significant industrial users in the previous application. The secondary treatment process mainly consists of equalization basin, primary clarifiers, roughing filters, aeration basins, secondary clarifiers and chlorine contact basin. Effluent is ultraviolet/chlorination disinfected and dechlorinated before discharging to a short unnamed ditch, thence to the Rio Grande. Sewage sludge is dewatered and then transported to the Las Cruces Utilities West Mesa Composting Facility and managed by land application. Since the last permit term, the facility has scheduled improvements in the treatment process. A facility location map is attached.

III. EFFLUENT CHARACTERISTICS

Data submitted in Form 2A is as follows:

Parameter	Max	Avg
	(mg/L unless noted)	
Biochemical Oxygen Demand, 5-day (BOD ₅)	20.88	9.01
E. coli (MPN/100 ml)	483.4	31.66
Flow (MGD)	17.0	7.29
pH, minimum, standard units (s.u.)	6.64	N/A
pH, maximum, standard units (s.u.)	7.45	N/A
Temperature (winter), °C	22..2	18.6
Temperature (summer), °C	29.2	27.5
Total Suspended Solids (TSS)	38.0	10.44
Ammonia (as N)	7.8	4.6
TRC	0.03	0.006
DO	9.65	8.0
Nitrate + Nitrite Nitrogen	18.8	16.2
Kjeldahl Nitrogen	9.9	5.9
Oil & Grease	<5.4	<5.4
Phosphorus (Total)	1.7	1.03
TDS	835	1010

Since July 1, 2021 there have been exceedances of the effluent limitations in DMR as follows (copy of DMR available upon request:

Parameter	Date Report	Exceedance, 30-day average, mg/L	Exceedance, daily max., mg/L	Note
BOD ₅	Multiple report dates	Multiple exceedances	Multiple exceedances	Exceedances in mass loading as well
TSS	Multiple report dates	Multiple exceedances	Multiple exceedances	Exceedances in mass loading as well
PCBs	Several events, including 1 event since 7/1/2024	Several exceedances	Several exceedances	Exceedance in mass loadings as well
TRC	12/31/21		22 ug/L	
E. coli	Many events	Many occurrences	Many occurrences	Exceedance in mass loading (monthly aveg.)
BOD ₅ % removal	Many events	Many occurrences		
TSS % removal	Many events	Many occurrences		
WET	Many events			

IV. REGULATORY AUTHORITY/PERMIT ACTION

In November 1972, Congress passed the Federal Water Pollution Control Act establishing the NPDES permit program to control water pollution. These amendments established technology-based or end-of-pipe control mechanisms and an interim goal to achieve “water quality which provides for the protection and propagation of fish, shellfish, and wildlife and provides for recreation in and on the water”; more commonly known as the “swimmable, fishable” goal. Further amendments in 1977 of the CWA gave EPA the authority to implement pollution control programs such as setting wastewater standards for industry and established the basic structure for regulating pollutants discharges into the waters of the United States. In addition, it made it unlawful for any person to discharge any pollutant from a point source into navigable waters, unless a permit was obtained under its provisions. Regulations governing the NPDES permit program are generally found at 40 CFR §122 (program requirements & permit conditions), §124 (procedures for decision making), §125 (technology-based standards) and §136 (analytical procedures). Other parts of 40 CFR provide guidance for specific activities and may be used in this document as required.

It is proposed that the permit be reissued for a 5-year term following regulations promulgated at 40 CFR §122.46(a).

V. DRAFT PERMIT RATIONALE AND CONDITIONS

A. OVERVIEW of TECHNOLOGY-BASED VERSUS WATER QUALITY STANDARDS-BASED EFFLUENT LIMITATIONS AND CONDITIONS

Regulations contained in 40 CFR §122.44 NPDES permit limits are developed that meet the more stringent of either technology-based effluent limitation guidelines, numerical and/or narrative water quality standard-based effluent limits, or the previous permit.

Technology-based effluent limitations are established in the proposed draft permit for TSS and BOD and percent removal for each. Water quality-based effluent limitations are established in the proposed draft permit for E. coli bacteria, pH, TRC, cyanide and PCBs.

B. TECHNOLOGY-BASED EFFLUENT LIMITATIONS/CONDITIONS

1. General Comments

Regulations promulgated at 40 CFR §122.44(a) require technology-based effluent limitations to be placed in NPDES permits based on ELGs where applicable, on BPJ in the absence of guidelines, or on a combination of the two. In the absence of promulgated guidelines for the discharge, permit conditions may be established using BPJ procedures. EPA establishes limitations based on the following technology-based controls: BPT, BCT, and BAT. These levels of treatment are:

BPT - The first level of technology-based standards generally based on the average of the best existing performance facilities within an industrial category or subcategory.

BCT - Technology-based standard for the discharge from existing industrial point sources of conventional pollutants, including BOD, TSS, *E. coli* bacteria, pH, and O&G.

BAT - The most appropriate means available on a national basis for controlling the direct discharge of toxic and non-conventional pollutants to navigable waters. BAT effluent limits represent the best existing performance of treatment technologies that are economically achievable within an industrial point source category or subcategory.

2. Effluent Limitation Guidelines

The facility is a POTW/POTW-like that has technology-based limits established at 40 CFR Part 133.102, Secondary Treatment Regulation. Pollutants with limits established in this Chapter are BOD, TSS and pH. BOD limits of 30 mg/L for the 30-day average and 45 mg/L for the 7-day average and 85% percent (minimum) removal are found at 40 CFR §133.102(a). TSS limits; also 30 mg/L for the 30-day average and 45 mg/L for the 7-day average, average and 85% percent (minimum) removal are found at 40 CFR §133.102(b). The limit for pH is 6.0-9.0 s.u. based on 40 CFR §133.102(c).

Regulations at 40 CFR §122.45(f)(1) require all pollutants limited in permits to have limits expressed in terms of mass such as pounds per day. When determining mass limits for POTWs or similar, the plant's design flow is used to establish the mass load. Mass limits are determined by the following mathematical relationship:

Loading in lbs/day = pollutant concentration in mg/L * 8.345 (lbs)(L)/(mg)(MG) * design flow in MGD

30-day average BOD/TSS loading = 30 mg/L * 8.345 (lbs)(L)/(mg)(MG) * 13.5 MGD = 3,379 lbs/day

7-day average BOD/TSS loading = 45 mg/L * 8.345 (lbs)(L)/(mg)(MG) * 13.5 MGD = 5,069 lbs/day

A summary of the technology-based limits (same ones previously) for the facility is:

Parameter	30-day Avg, lbs/day, unless noted	7-day Max, lbs/day, unless noted	30-day Avg, mg/L, unless noted	7-day Max, mg/L, unless noted
BOD	3,379	5,069	30	45
BOD, % removal ¹	≥ 85	---	---	---
TSS	3,379	5,069	30	45
TSS, % removal ¹	≥ 85	---	---	---

Parameter	30-day Avg, lbs/day, unless noted	7-day Max, lbs/day, unless noted	30-day Avg, mg/L, unless noted	7-day Max, mg/L, unless noted
pH	N/A	N/A	6.0 to 9.0 s.u.	6.0 to 9.0 s.u.

¹ % removal is calculated using the following equation: [(average monthly influent concentration – average monthly effluent concentration) ÷ average monthly influent concentration] * 100.

3. Pretreatment Regulation

The facility has eight significant industrial users (SIUs), which are subject to the local limits. The permittee is required to maintain and implement the approved pretreatment program pursuant to 40 CFR 403.8. The permittee did not submit a modification package as referenced in the previous permit and is working on redeveloping limits. EPA continues requiring the permittee to submit proposed modifications.

C. WATER QUALITY BASED LIMITATIONS

1. General Comments

Water quality-based requirements are necessary where effluent limits more stringent than technology-based limits are necessary to maintain or achieve federal or state water quality limits. Under Section 301(b)(1)(C) of the CWA, discharges are subject to effluent limitations based on Federal or State/Tribe WQS. Effluent limitations and/or conditions established in the draft permit are in compliance with applicable State/Tribe WQS and applicable State/Tribe water quality management plans to assure that surface WQS of the receiving waters are protected and maintained or attained.

2. Implementation

The NPDES permits contain technology-based effluent limitations reflecting the best controls available. Where these technology-based permit limits do not protect water quality or the designated uses, additional water quality-based effluent limitations and/or conditions are included in the NPDES permits. State/Tribe narrative and numerical water quality standards are used in conjunction with EPA criterion and other available toxicity information to determine the adequacy of technology-based permit limits and the need for additional water quality-based controls.

3. State Water Quality Standards

The general and specific stream standards are provided in NMWQS (20.6.4 NMAC approved on August 14, 2025). The discharge is to Rio Grande River Basin (20.6.4.101 NMAC). The designated uses of the receiving water are irrigation, marginal warmwater aquatic life, livestock watering, wildlife habitat and primary contact. The assessment unit for this portion of the Rio Grande is AU ID NM-2101_03.

4. Permit Action - Water Quality-Based Limits

Regulations promulgated at 40 CFR §122.44(d) require limits in addition to, or more stringent than effluent limitation guidelines (technology based). State WQS that are more stringent than effluent limitation guidelines are as follows:

a. pH

For primary contact and marginal warmwater aquatic life, criteria for pH is between 6.6 and 9.0 s.u. pursuant to 20.6.4.900.D and H(6) NMAC.

b. Bacteria

For primary contact, criteria for E. coli bacteria is at 126 cfu (or MPN)/100 mL monthly geometric mean and 410 cfu (or MPN)/100 mL daily maximum pursuant to 20.6.4.900.D NMAC.

c. TRC

For wildlife habitat, criteria for TRC is 11 ug/L pursuant to 20.6.4.900.G NMAC since the receiving water is effluent dominant. However, if a test result is less than the MQL specified in Part II.A of the permit it can be reported as zero for compliance purpose.

d. Toxics

The CWA in Section 301 (b) requires that effluent limitations for point sources include any limitations necessary to meet water quality standards. Federal regulations found at 40 CFR §122.44 (d) state that if a discharge poses the RP to cause an in-stream excursion above a water quality criteria, the permit must contain an effluent limit for that pollutant.

All applicable facilities are required to fill out appropriate sections of the Form 2A and 2S, to apply for an NPDES permit or reissuance of an NPDES permit. The new form is applicable not only to POTWs, but also to facilities that are similar to POTWs, but which do not meet the regulatory definition of “publicly owned treatment works” (like private domestics, or similar facilities on Federal property). The forms were designed and promulgated to “make it easier for permit applicants to provide the necessary information with their applications and minimize the need for additional follow-up requests from permitting authorities,” per the summary statement in the preamble to the Rule.

The 4Q3 of 1.06 cfs and harmonic mean flow of 0 (zero) cfs provided by NMED at Elephant Butte Irrigation District (EBID) Flow Station: Rio Grande below Picacho near Las Cruces. The harmonic means flow is adjusted to 10.93 cfs. NMED also provides other ambient data (geometric mean values if available) of the receiving water shown in the attached Appendix A. Effluent data with actual reported values submitted in Form 2A and DMR are used to analyze the RP. The pollutants (in Tables C & D) having test results above the MQLs/WQS are analyzed. Averaged values of effluent data sets are accounted in the RP. PCBs results are re-evaluated using the reported average value (0.00026 ug/L in DMR) against the applicable WQS (0.00064 ug/L). Attached Appendix A shows no RP excursion for PCBs. There were reported exceedances of PCBs (0.00114 ug/L on 10/31/2024); therefore, EPA retains the previous limitations for PCBs with less sampling frequency, once per month. RP exists for cyanide (averaged value: 4.8 ug/L; maximum value: 8.8 ug/L compared to 5.2 ug/L for chronic aquatic life use) shown in Appendix A. Therefore, EPA establishes limitations for cyanide such as 5.2 ug/L and 0.58 lb/day for daily maxima. A compliance schedule is provided per 40 CFR 122.47(a) with interim requirements stated in the draft permit because the established limits have not been met.

During the application review, the following pollutants have been demonstrated to meet the SSM requirement as follow:

Pollutants	Test Result (Method), ug/L	Applicable WQS, ug/L	Suggested Method with SSM Complied MDL, ug/L
Mercury	<2 (EPA 245)	0.77	
Acrolein	<50 (EPA 624)	3	0.5 (EPA 603)
Benzidine	<51 (EPA 625)	0.11	0.08 (EPA Method 605)
Benzo(a)anthracene	<5.1 (EPA 625)	0.013	0.023 (EPA Method 610)
Benzo(a)pyrene	<5.1 (EPA 625)	0.0013	0.023 (EPA Method 610)
Benzo(k)fluoranthene	<5.1 (EPA 625)	0.13	0.023 (EPA Method 610)
Bis(2-ethylhexyl) phthalate	<5.1 (EPA 625)	3.7	
Butylbenzyl phthalate	<5.1 (EPA 625)	1	
Chrysene	<5.1 (EPA 625)	1.3	0.023 (EPA Method 610)
Dibenzo(a,h)anthracene	<0.57 (EPA 625)	0.0013	0.03 (EPA Method 610)
Heptachlor	<0.057 (EPA 608)	0.000059	0.003 (EPA Method 508)
Hexachlorobenzene	<0.57 (EPA 625)	0.00079	0.05 (EPA Method 612)
Hexachlorobutadiene	<5.1 (EPA 625)	0.1	
Hexachlorocyclopentadiene	<5.1 (EPA 625)	4	
Hexachloroethane	<5.1 (EPA 625)	1	
Ideno(1,2,3-cd)pyrene	<0.57 (EPA 625)	0.013	0.043 (EPA Method 610)
Nonylphenol	<10 (EPA 625)	6.6	
1,2,4-Trichlorobenzene	<5.1 (EPA 625)	0.76	0.05 (EPA Method 612)

For pollutants that were monitored parameters in the previous permit, EPA removes them in the draft permit due to compliance of the SSM requirement in this draft permit. Pollutants shown in Part I.F of the draft permit, applicable to the State WQS that are not listed in Table C of Form 2A, will be tested, if the permit will be reapplied, during the permit term pursuant to 40 CFR 122.21(j)(4)(iv).

e. DO

For marginal warmwater aquatic life, the criteria for DO is 5 mg/L or more pursuant to 20.6.4.900.H(6) NMAC. Since the critical low flow is zero, EPA is not able to model DO in the receiving stream segment with zero flow at this time. Qualitative analysis is instead performed as follows:

	Critical low flow, cfs	BOD ₅ effluent limits, mg/L	Effluent DO, mg/L	Receiving stream DO*, mg/L	Note
Previous permit	1.06	30/45 (30-day/7-day averages)	6.28	6.83	No effluent DO limit or monitoring
Permit draft	0	30/45 (30-day/7-day averages)	8.0	9.68	

*NMED data

With the critical low flow (either zero or 1.06 cfs) meaning the receiving stream is effluent (20.9 cfs) dominant. Due to no DO impairment in the receiving stream and the effluent DO is 8.0 mg/L on average, EPA is not concerned about the DO level in the receiving stream because of the discharge. Currently, the technology-based BOD₅ limits are protective of the DO for this water segment; no DO limitation/monitoring is needed.

f. PFAS

As explained at <https://www.epa.gov/pfas>, PFAS are a group of synthetic chemicals that have been in use since the 1940s. PFAS are found in a wide array of consumer and industrial products. PFAS manufacturing and processing facilities, facilities using PFAS in production of other products, airports,

and military installations can be contributors of PFAS releases into the air, soil, and water. Due to their widespread use and persistence in the environment, most people in the United States have been exposed to PFAS. Exposure to some PFAS above certain levels may increase risk of adverse health effects.¹ EPA is collecting information to evaluate the potential impacts that discharges of PFAS from wastewater treatment plants may have on downstream drinking water, recreational and aquatic life uses.

Although not including numeric criteria for PFAS, the 2024 (current) NMQWS narrative criterion for toxic substances at 20.6.4.13(F)(1) NMAC states:

“Except as provided in 20.6.4.16 NMAC, surface waters of the state shall be free of toxic pollutants from other than natural causes in amounts, duration, concentrations, or combinations that affect the propagation of fish or that are toxic to humans, livestock or other animals, fish or other aquatic organisms, wildlife using aquatic environments for habitation or aquatic organisms for food, or that will or can reasonably be expected to bioaccumulate in tissues of fish, shellfish and other aquatic organisms to levels that will impair the health of aquatic organisms or wildlife or result in unacceptable tastes, odors or health risks to human consumers of aquatic organisms.”

The NMQWS includes a narrative criteria for monitoring of emerging contaminants at 20.6.4.14(F) NMAC that states: “Emerging Contaminants Monitoring: The department may require monitoring, analysis and reporting of emerging contaminants as a condition of a federal permit under Section 401 of the federal Clean Water Act.” Since PFAS chemicals are persistent in the environment and may lead to adverse human health and environmental effects, the draft permit requires that the facilities conduct influent, effluent, and sludge sampling for PFAS according to the frequency outlined in the permit. The purpose of this monitoring and reporting requirement is to better understand potential discharges of PFAS from this facility and to inform future permitting decisions, including the potential development of water quality-based effluent limits on a facility-specific basis. EPA is authorized to require this monitoring and reporting by CWA § 308(a), which states:

“SEC. 308. (a) Whenever required to carry out the objective of this Act, including but not limited to (1) developing or assisting in the development of any effluent limitation, or other limitation, prohibition, or effluent standard, pretreatment standard, or standard of performance under this Act; (2) determining whether any person is in violation of any such effluent limitation, or other limitation, prohibition or effluent standard, pretreatment standard, or standard of performance; (3) any requirement established under this section; or (4) carrying out sections 305, 311, 402, 404 (relating to State permit programs), 405, and 504 of this Act— the Administrator shall require the owner or operator of any point source to (i) establish and maintain such records, (ii) make such reports, (iii) install, use, and maintain such monitoring equipment or methods (including where appropriate, biological monitoring methods), (iv) sample such effluents (in accordance with such methods, at such locations, at such intervals, and in such manner as the Administrator shall prescribe), and (v) provide such other information as he may reasonably require;”.

EPA notes that there is currently not an analytical method approved in 40 CFR Part 136 for PFAS. As stated in 40 CFR § 122.44(i)(1)(iv)(B), in the case of pollutants or pollutant parameters for which there are no approved methods under 40 CFR Part 136 or methods are not otherwise required under 40 CFR

¹ EPA, *EPA’s Per- and Polyfluoroalkyl Substances (PFAS) Action Plan*, EPA 823R18004, February 2019. Available at: https://www.epa.gov/sites/production/files/2019-02/documents/pfas_action_plan_021319_508compliant_1.pdf

chapter I, subchapter N or O, monitoring shall be conducted according to a test procedure specified in the permit for such pollutants or pollutant parameters. Therefore, the draft permit specifies that until there is an analytical method approved in 40 CFR Part 136 for PFAS, monitoring shall be conducted using Method 1633. The Adsorbable Organic Fluorine CWA wastewater method 1621 can be used in conjunction with Method 1633, if appropriate.

EPA has included PFAS monitoring in the draft permit using analytical Method 1633. In January 2024, the EPA released final EPA Method 1633, a method to test for 40 PFAS in wastewater, surface water, groundwater, soil, biosolids, sediment, landfill leachate, and fish tissue and final EPA Method 1621, which can broadly screen for the presence of chemical substances that contain carbon-fluorine bonds, including PFAS, in wastewater. More information on Method 1633 and status for approval under Part 136, is available at <https://www.epa.gov/cwa-methods/cwa-analytical-methods-and-polyfluorinated-alkyl-substances-pfas>.

There are currently no applicable Federal and/or State/Tribe surface water quality standards for PFAS. EPA proposes to monitor the PFAS pollutants in the influent, effluent and sewage sludge at once per quarter based on the plant design flowrate in order to gather information on the presence or absence of PFAS in the discharge.

5. Monitoring Frequency for Limited Parameters

Regulations require permits to establish monitoring requirements to yield data representative of the monitored activity, 40 CFR §122.48(b), and to assure compliance with permit limitations, 40 CFR §122.44(i)(1). EPA established the monitoring frequency based on Table 9 (page 34 of the NMIP) for design flow 10.0 MGD or greater and history compliance.

Parameter	Frequency	Sample Type
Flow	Daily	Totalized Meter
pH	Daily	Instantaneous Grab
BOD ₅	Daily	12-hr Composite
TSS	Daily	12-hr Composite
% Removal	Monthly	Calculation
TRC	Daily	Instantaneous Grab
E. coli Bacteria	Daily	Grab
PCBs	Once/month (reduced due to no RP excursion)	12-hr Composite
Cyanide, total	Once/week (Interim limit) 3 times/week (final limit)	12-hr Composite

D. WHOLE EFFLUENT TOXICITY

Procedures for implementing WET terms and conditions in NPDES permits are contained in the NMIP. Table 11 (page 42) of the NMIP outlines the type of WET testing for different types of discharges. With a 4Q3 of 0cfs, and a plant design flow of 13.5MGD, the NMIP directs the WET testing for this permit to be a 7-day chronic test using *Ceriodaphnia dubia* and *Pimephales promelas*, once per quarter, with a critical dilution of 100%.

During the previous permit cycle, there were thirty-one (31) chronic tests conducted, with twenty-six (26) failures for the invertebrate species, *Ceriodaphnia dubia*. There were eighteen (18) chronic tests

conducted, with thirteen (13) failures for the vertebrate species, *Pimephales promelas*. There is reasonable potential for toxicity to both species (see attached WET RP spreadsheet), and WET limits for both species will be established in this permit, starting on the effective date of the permit. The permittee began working on a new Toxicity Reduction Evaluation (TRE) in 2024 and submitted quarterly reports detailing the updates on the plant treatment progress, as well as the status of the TRE. Due to treatment at the plant not stable after upgrades, the TRE was not carried out conclusively. The permittee is instructed in this permit to continue quarterly testing, and if a new TRE is triggered, then follow the process outlined for TREs. Monthly reporting is required although testing frequency is quarterly, to allow for fluctuations in the testing frequency following a violation. For months where no test is required, the permittee reports NODI 9.

The proposed permit requires five (5) dilutions in addition to the control (0% effluent) to be used in the toxicity tests based on a 0.75 dilution series. These additional effluent concentrations must be 32%, 42%, 56%, 75%, 100%. The low-flow effluent concentration (critical low-flow dilution) is defined as 100% effluent. The permittee shall limit and monitor discharge(s) as specified below:

WHOLE EFFLUENT TOXICITY LIMITS (7-Day Chronic Static Renewal/ NOEC) *	VALUE	MEASUREMENT FREQUENCY	REPORTING FREQUENCY	SAMPLE TYPE
<i>Ceriodaphnia dubia</i>	100%	Once/Quarter	Monthly	24-Hr Composite
<i>Pimephales promelas</i>	100%	Once/Quarter	Monthly	24-Hr Composite

* Compliance with the Whole Effluent Toxicity limitation is required on the effective date of the permit. See Part II of the permit for WET testing requirements and limitation conditions. Grab samples are allowed per method, if needed.

VI. TMDL REQUIREMENTS

The receiving water segment, Rio Grande (NM192 bridge W of Mesquite to Picacho Bridge), was originally categorized under Rio Grande (Anthony Bridge to Picacho Bridge). In 2006, this “old” assessment unit was listed in New Mexico’s 303(d) list of impaired waters because its primary contact designated use was not being supported due to excessive *E. coli* bacteria. An *E. coli* TMDL for the impaired reach was completed and approved in 2007. However, during the planning phase of the 2011 water quality survey, the “old” assessment unit was split to better capture the influences of changing hydrology, land uses, and pollutant sources. As a result, data from the “new” assessment unit (NM192 Bridge W of Mesquite to Picacho Bridge) was reassessed and *E. coli* was removed as a cause of impairment for this stream reach in 2014. However, the TMDL is still effective and the Waste Load Allocation for the Jacob Hands Memorial WWTP is still applicable to the discharge. Regardless of the 2014 assessment and full support determination (in the 2026-2028 assessment), limits for *E. coli* in the previous permit are retained in this permit draft to protect in-stream (previously impaired) and downstream water quality (“Anthony Bridge to NM 192 bridge W of Mesquite” is still impaired due to *E. coli*; the same TMDL was established). The permit has a standard reopener clause that would allow the permit to be changed if at a later date additional requirements on new or revised TMDLs are completed.

VII. ANTIDEGRADATION

The NMAC, Section 20.6.4.8 “Antidegradation Policy and Implementation Plan” sets forth the requirements to protect designated uses through implementation of the State water quality standards. The limitations and monitoring requirements set forth in the draft permit are developed from the Tribe/State water quality standards and are protective of those designated uses. Furthermore, the policy sets forth the intent to protect the existing quality of those waters, whose quality exceeds their designated use. The permit requirements and the limits are protective of the receiving water, which is protective of the designated uses of that water, NMAC Section 20.6.4.8.A.2.

VIII. ANTIBACKSLIDING

The proposed permit is consistent with the requirements to meet Antibacksliding provisions of the Clean Water Act, Section 402(o) and 40 CFR 122.44(l)(2)(i)(B), which state in part that interim or final effluent limitations must be as stringent as those in the previous permit, unless information is available which was not available at the time of permit issuance. No draft permit condition is less stringent than the previous one.

IX. ENDANGERED SPECIES CONSIDERATIONS

According to a report updated on July 28, 2026 for discharge flowpath, downstream in Dona Ana County, obtained from <http://ecos.fws.gov/ipac>, there are two endangered (E) and threatened (T) species: Southern Willow Flycatcher (E) and Yellow-billed Cuckoo (T). These birds were listed in the previous permit with determination of “no effect”. According to the report, there are no designated critical habitats for all the species downstream from the discharging facility. The discharge from the facility is required to protect applicable water quality standards, and the discharge itself ensures water will be available to wildlife in the area.

In accordance with requirements under section 7(a)(2) of the Endangered Species Act, EPA has reviewed this permit for its effect on listed threatened and endangered species and designated critical habitat. The scope of the Federal Action is limited to the effects of authorizing the discharge and does not include the permittee’s decision to cease discharging. After review, EPA has determined that the reissuance of this permit will have “no effect” on listed threatened and endangered species nor will adversely modify designated critical habitat. EPA makes this determination based on the following:

1. EPA has received no additional information since the previous permit issuance which would lead to revision of its determinations.
2. The draft permit is consistent with the States WQS and does not increase pollutant loading.
3. EPA determines that Items 1, thru 2 result in no change to the environmental baseline established by the previous permit, therefore, EPA concludes that reissuance of this permit will have “no effect” on listed species and designated critical habitat.

X. HISTORICAL and ARCHEOLOGICAL PRESERVATION CONSIDERATIONS

The reissuance of the permit should have no impact on historical and/or archeological sites since no new construction activities are planned in the reissuance.

XI. PERMIT REOPENER

The permit may be reopened and modified during the life of the permit if NMWQS are promulgated or revised. In addition, if the State develops a TMDL, this permit may be reopened to establish effluent limitations for the parameter(s) to be consistent with that TMDL. Modification of the permit is subject to the provisions of 40 CFR §124.5.

XII. VARIANCE REQUESTS

None

XIII. CERTIFICATION

The permit is in the process of certification by the State Agency following regulations promulgated at 40 CFR 124.53. A draft permit and draft public notice will be sent to the District Engineer of COE, to the Regional Director of FWS and to the National Marine Fisheries Service prior to the publication of that notice.

XIV. FINAL DETERMINATION

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

XV. ADMINISTRATIVE RECORD

The following information was used to develop the draft permit:

A. APPLICATION(s)

EPA Application Forms 2A and 2S dated December 30, 2025. Additional information was received on February 09, 2026, March 16, 2026 and May 26, 2026.

B. 40 CFR CITATIONS

Sections 122, 124, 125, 133, 136, 434

C. STATE OF NEW MEXICO REFERENCES

New Mexico State Standards for Interstate and Intrastate Surface Water, 20.6.4 NMAC, effective August 14, 2025

State of New Mexico 303(d) List for Assessed Stream and River Reaches, 2026-2028

TMDL For the Main Stem of The Lower Rio Grande dated June 11, 2007

D. MISCELLANEOUS

Procedures for Implementing National Pollutant Discharge Elimination System Permits in New Mexico – NMIP, March 15, 2012

NMED emails dated February 18, 2026; March 3, 2026