

FACTSHEET
(pursuant to NAC 445A.236)

Permittee Name: NEVADA DEPARTMENT OF WILDLIFE (NDOW)
6980 SIERRA CENTER PKWY #120
RENO, NV 89511

Permit Number: NV0020664

Permit Type: EXISTING MANUFACTURING, COMMERCIAL, MINING AND SILVICULTURAL DISCHARGE

Designation: MINOR NPDES

New/Existing: EXISTING

Location: NEVADA DEPARTMENT OF WILDLIFE (NDOW) - SPRING CREEK REARING STATION, WHITE PINE
HC64-64900, BAKER, NV 89311
LATITUDE: 38.91777780, LONGITUDE: -114.105208
TOWNSHIP: 12 N, RANGE: 70 E, SECTION: 15

Outfall / Well Num	Outfall / Well Name	Location Type	Well Log Num	Latitude	Longitude	Receiving Water
001	REARING STATION RACEWAY FLOW-THROUGH DISCHARGE FROM LANES 18 & 19	External Outfall		38.917557	-114.104009	SPRING CREEK TRIBUTARY TO SNAKE CREEK
002	DISCHARGE PIPE FROM THE SECOND HYPALON-LINED SETTLING POND	External Outfall		38.917886	-114.103440	SPRING CREEK TRIBUTARY TO SNAKE CREEK
00A	WEIR AT THE HEADER BOX, INFLOW WATER	Intake Structure		38.917501	-114.105593	NOT APPLICABLE
00D	THE CONSTRUCTED DRAINAGE DITCH MONITORING POINT TEN (10) METERS DOWNSTREAM OF OUTFALL 002, PRIOR TO ENTERING THE SPRING CREEK NATURAL CHANNEL. THIS IS THE DISCHARGE COMPLIANCE POINT, EXCEPT FOR FLOW.	External Outfall		38.918110	-114.102893	SPRING CREEK TRIBUTARY TO SNAKE CREEK

Permit History/Description of Proposed Action

The Permittee, Nevada Department of Wildlife (NDOW), has applied for the renewal of their National Pollutant Discharge Elimination System Permit NV0020664, for their Spring Creek Rearing Station (SCRS) located at 1067 East Snake Canyon Road/HC64-64900, southwest of Baker and 70 miles east of Ely, within White Pine County, Nevada. The Permittee proposes to continue to discharge flow-through water, made up of Spring Creek and Snake Creek waters, after it flows through the raceways, which stairstep down the hillside, and eventually terminate into two raceways (18 and 19) at the discharge point, Outfall 001. A fish

screen at the discharge outlet prevents most of the fish from escaping into Spring Creek, which flows into Snake Creek.

This permit was first issued on January 11, 1994. The most recent permit was issued on February 1, 2018, and expired on January 31, 2023; the permit has been administratively continued since.

Facility Overview

NDOW owns and operates the SCRS, a flow-through and recirculating aquaculture facility. SCRS is located nine miles southwest of the town of Baker and 70 miles east of Ely in White Pine County. The station sits on 200 acres of land owned by the NDOW. The facility is at an elevation of 6,200 feet. The station received its first stock of fish in 1950 and since 1962 has a permanent diversion structure to receive additional water from Snake Creek.

SCRS does not have an incubation or early rearing capabilities and receives 3"-4" fish, primarily trout, from either Gallagher Hatchery or from Mason Valley Hatchery for grow-out rearing. There are 19 raceways available for rearing fish with an estimated 39,900 cubic feet when completely filled based on standard sizing used in Nevada being 100 feet x 6 feet x 3.5 feet or 2,100 cubic feet. The rearing station's reported feeding rate during the calendar month of maximum feeding was 3,688 lbs and annual harvestable weight was 40,000 lbs qualifying the facility to be designated as a Concentrated Aquatic Animal Facility (CAAF). Normally, water flows through the SCRS and is discharged directly into Snake Creek via the raceways, that stairstep down the hillside, and eventually terminate into two raceways (18 and 19) at the discharge point, Outfall 001. A fish screen at the discharge outlet prevents most of the fish from escaping into the creek. The discharge constitutes flow-through water from the fish hatchery. The inflow at the headworks is approximately 75% from the Spring Creek and 25% from the Snake Creek. During cleaning operations, however, the wastewater is diverted to a plastic-lined, aerated settling pond. From there, the overflow goes into a second settling pond prior to discharging into the Snake Creek. The facility's reported daily maximum inflow rate is 2.4 millions gallons per day (Mgal/d) with a long term average of 1.8 Mgal/d, below the estimated maximum capacity of 42,974 cubic feet, or 0.321 million gallons per day, for the system including the two ponds.

NDOW's Spring Creek Rearing Station's Best Management Practices (BMP) and Standard Operating Procedures (SOP) were last reviewed and approved on February 12, 2018. The Technical, Compliance, and Enforcement Branch of the Bureau of Water Pollution Control requires BMPs and SOPs to be updated every ten (10) years, with an updated BMP and SOP being due on February 12, 2028.

NDOW Spring Creek Rearing Station's Operation & Maintenance Manual (O&M Manual) was last reviewed and approved by the Division on February 12, 2016. The Technical, Compliance, and Enforcement Branch of the Bureau of Water Pollution Control requires O&M Manuals to be updated every ten (10) years, with an updated O&M Manual due on February 12, 2028.

Pursuant to Title 40 of the Code of Federal Regulations (CFR) section 451.3(a)(1),(2), and (3), reporting is not required for an investigational new animal drug (INAD) or extralabel drug used of a drug previously approved by FDA for a different aquatic animal species or diseases if the INAD or extralabel use is at or below the approved dosage and involves similar conditions of use. The Permittee shall notify the Division of any anticipated use of a drug that will not qualify for nonreporting in accordance with this provision. Following Permittee notification to the Division, the Permittee shall, for the drug or constituent of concern, meet the concentration limit and the sampling and reporting frequency set by the Division. The Permittee shall apply for permit modification if necessary.

Outfall Summary

Outfall 001 - This external outfall is for measuring of the rearing station raceway flow-through discharge from Lanes 18 and 19 in Spring Creek.

Outfall 00A - This internal outfall is for measuring inflow water diverted through the weir at the header box.

Outfall 00D - This external outfall is for measuring and monitoring the effluent/flow-through to Spring Creek water, through the constructed drainage ditch, approximately 10 meters downstream of Outfall 002, prior to entering the Spring Creek's natural channel.

Outfall 002 - This external outfall is for measuring the effluent/flow-through water being piped from the second hyphalon-lined settling pond.

Effluent Characterization

Nevada State Network Discharge Monitoring Report (NetDMR) data, as reported from January 2021 through March 2026, was reviewed as part of this permit renewal process.

The following averages were calculated from the numbers reported during the period reviewed (January 2021 through March 2026):

Abbreviations:

mg/L = Milligrams per Liter
 Mgal/d = Million Gallons per Day
 MPN/100ml T = Most Probable Number per 100 millimeters
 S.U. = Standard Unit
 deg C = degrees Celsius
 BOD5 = Biochemical Oxygen Demand, 5-Day
 D.O. = Dissolved Oxygen
E. coli = *Escherichia coli*
 N = Nitrogen
 TDS = Total Dissolved Solids
 TSS = Total Suspended Solids

Outfall 001 (Rearing Station Raceway):

Flow Rate: 1.75 Mgal/d

Outfall 002 (Discharge pipe from the second Hypalon-lined settling pond):

Flow Rate: 0.03 Mgal/d

Outfall 00A (Weir at the Header Box/Intake Structure):

Flow Rate: 1.75 Mgal/d

D.O.: 7.45 mg/L

BOD5: 2.30 mg/L

E. coli: 4.40 MPN/100ml T

pH: 8.28 S.U.

Phosphorus: 0.02 mg/L

TDS: 203 mg/L

TSS: 10.88 mg/L

Temperature: 12.04° C

Outfall 00D (Fish Hatchery Discharge 30 feet Downstream of Rearing Station):

Ammonia (as N): 0.20 mg/L

BOD5: 2 mg/L

D.O.: 6.99 mg/L

pH: 8.16 S.U.

Temperature: 11.89°C

Difference in Temperature: 0.70°C

Note: Although the lab tested General Fecal Coliform, it was not a reportable parameter on the previous permit. It was added during this permit renewal, as it is a Water Quality Standard (WQS), as prescribed under Nevada Administrative Code (NAC) 445A.2098, and with sample results showing high levels of

concentration during the period reviewed (January 2021 through March 2026), with an average of 1,621 MPN/100ml T, warranting its addition. The WQS for Coliform is 1,000 MPN/100ml T. This parameter was added both upstream (Outfall 00A) and after leaving the facility (Outfall 00D) to determine the actual source.

Pollutants of Concern

Pollutants of concern are any pollutant, or parameters, that are believed to be present in the discharge and could affect or alter the physical, chemical, or biological conditions of the receiving water. Pollutants of concern are Ammonia (as N), D.O., *E. coli*, pH, Phosphorus, TDS, and Temperature.

Receiving Water

The receiving water is Spring Creek, which is a tributary of Snake Creek, below the fish hatchery.

Applicable Water Quality Standards/Beneficial Uses

The WQSs for the nearest downstream control point, "Snake Creek below the fish hatchery" (NAC 445A.2098) apply. WQSs for Snake Creek below the fish hatchery include beneficial uses for water of livestock, irrigation, aquatic life, recreation involving contact with the water, recreation not involving contact with the water, municipal or domestic supply, industrial supply, and propagation of wildlife. Additional WQSs applicable to this section of the Snake Creek include ammonia (NAC 445A.118) and water quality narrative standards applicable to all surface waters (NAC 445A.121).

303 (d) Listing Status

Snake Creek below the fish hatchery is not included in the 2024 303(d) List of Impaired Waters. According to Nevada's 2024 Water Quality Integrated Report, this segment is classified as Category 2, indicating that some beneficial uses are supported; insufficient or no data available to assess other uses.

TMDL

There are no applicable Total Maximum Daily Loads (TMDLs) for this segment of Snake Creek.

Waste Load Allocation

There are no applicable wasteload allocations applicable to this segment of Snake Creek.

Compliance History

The SCRS was in compliance during the period reviewed (January 2021 through March 2026) with the exception of D.O. and General Fecal Coliform (the latter not being a permitted parameter). Coliform was added during this permit renewal to both the intake structure (Outfall 00A) and the discharge (Outfall 00D).

Proposed Effluent Limitations

The discharge shall be limited and monitored by the Permittee as specified below.

Discharge Limitations Table for Influent Sampling Location 00A (Weir At The Header Box/ Inflow Water) To Be Reported Monthly^[1]

Discharge Limitations				Monitoring Requirements			
Parameter	Base	Quantity	Concentration	Monitoring Loc	Sample Loc	Measurement Frequency	Sample Type
Flow rate	Daily Maximum	<= 5.0 Million Gallons per Day (Mgal/d)		Intake from Stream	00A	Monthly	DISCRT
Flow rate	30 Day Average	M&R Million Gallons per Day (Mgal/d)		Intake from Stream	00A	Monthly	DISCRT
Coliform, fecal general	Daily Maximum		M&R Colony Forming Units per 100ml T (CFU/100mL) ^[2]	Intake from Stream	00A	Monthly	DISCRT
Oxygen, dissolved (DO)	Daily Minimum		M&R Milligrams per Liter (mg/L)	Intake from Stream	00A	Monthly	DISCRT
pH, maximum	Daily Maximum		M&R Standard Units (SU)	Intake from Stream	00A	Monthly	DISCRT
pH, minimum	Daily Minimum		M&R Standard Units (SU)	Intake from Stream	00A	Monthly	DISCRT
Temperature, water deg. centigrade	Daily Maximum		M&R Degrees Centigrade (deg C)	Intake from Stream	00A	Monthly	DISCRT

Notes (Discharge Limitations Table):

1. Incoming creek water. Parameters reported are based on the existing water quality prior to the rearing station.
2. CFU/100mL or MPN/100mL.

Discharge Limitations Table for Influent Sampling Location 00A (Weir At The Header Box/ Inflow Water) To Be Reported Quarterly^[1]

Discharge Limitations				Monitoring Requirements			
Parameter	Base	Quantity	Concentration	Monitoring Loc	Sample Loc	Measurement Frequency	Sample Type
BOD, 5-day, 20 deg. C	Daily Maximum		M&R Milligrams per Liter (mg/L)	Intake from Stream	00A	Quarterly	DISCRT
E. coli	Daily Maximum		M&R Most Probable Number per 100ml T (MPN/100mL)	Intake from Stream	00A	Quarterly	DISCRT
Phosphorus, total (as P)	Daily Maximum		M&R Milligrams per Liter (mg/L)	Intake from Stream	00A	Quarterly	DISCRT
Solids, total dissolved	Daily Maximum		M&R Milligrams per Liter (mg/L)	Intake from Stream	00A	Quarterly	DISCRT
Solids, total suspended	Daily Maximum		M&R Milligrams per Liter (mg/L)	Intake from Stream	00A	Quarterly	DISCRT

Notes (Discharge Limitations Table):

1. Incoming creek water. Parameters reported are based on existing water quality prior to the rearing station.

CAAP Discharge Limitations Table for Flow Measurement Location 001 (Rearing Station Raceway Flow-Through Discharge From Lanes 18 & 19) To Be Reported Monthly

Discharge Limitations				Monitoring Requirements			
Parameter	Base	Quantity	Concentration	Monitoring Loc	Sample Loc	Measurement Frequency	Sample Type
Flow rate	Daily Maximum	<= 5.0 Million Gallons per Day (Mgal/d)		Effluent Gross	001	Monthly	DISCRT
Flow rate	30 Day Average	<= 4.50 Million Gallons per Day (Mgal/d)		Effluent Gross	001	Monthly	DISCRT

CAAP Discharge Limitations Table for Flow Measurement Location 002 (Discharge Pipe From The Second Hypalon-Lined Settling Pond) To Be Reported Monthly

Discharge Limitations				Monitoring Requirements			
Parameter	Base	Quantity	Concentration	Monitoring Loc	Sample Loc	Measurement Frequency	Sample Type
Flow rate	Daily Maximum	<= 0.5 Million Gallons per Day (Mgal/d)		Effluent Gross	002	Monthly	DISCRT
Flow rate	30 Day Average	<= 0.2 Million Gallons per Day (Mgal/d)		Effluent Gross	002	Monthly	DISCRT

CAAP Discharge Limitations Table for Effluent Sample Location 00D (Constructed Drainage Ditch Monitoring Pt 10 M Downstream Of Outfall 002, Prior To Entering The Spring Creek Natural Channel. This Is The Discharge Compliance Point, Except For Flow) To Be Reported Monthly^[1] [2]

Discharge Limitations				Monitoring Requirements			
Parameter	Base	Quantity	Concentration	Monitoring Loc	Sample Loc	Measurement Frequency	Sample Type
Coliform, fecal general	Daily Maximum		M&R Colony Forming Units per 100ml T (CFU/100mL) ^[4]	Effluent Gross	00D	Monthly	DISCRT
Nitrogen, ammonia total (as N)	Daily Maximum		≤ 0.885 Milligrams per Liter (mg/L) ^[3]	Effluent Gross	00D	Monthly	DISCRT
Oxygen, dissolved (DO)	Daily Minimum		≥ 6.0 Milligrams per Liter (mg/L)	Effluent Gross	00D	Monthly	DISCRT
pH, maximum	Daily Maximum		≤ 9.0 Standard Units (SU)	Effluent Gross	00D	Monthly	DISCRT
pH, minimum	Daily Minimum		≥ 6.5 Standard Units (SU)	Effluent Gross	00D	Monthly	DISCRT
Temperature, water deg. centigrade	Daily Maximum		≤ 20 Degrees Centigrade (deg C)	Effluent Gross	00D	Monthly	DISCRT

Notes (CAAP Discharge Limitations Table):

1. See special approvals/conditions item 6 for requirement to synchronize the sampling with the discharge timelines.
2. The field measurements of pH and Temperature must be taken at the same time and location as the water sample destined for the laboratory analysis of ammonia.
3. For cold-water fisheries, acute water quality criteria as applicable for this parameter should not exceed more than once every 3 years on average. See Nevada Administrative Code (NAC) 445A.118, Water Quality Criteria for Total Ammonia, Acute Water Quality Criteria for Total Ammonia for Freshwater Aquatic Life Table. This limit is based on the creek being a cold-water fishery and a pH of 9.0 S.U.
4. CFU/100mL or MPN/100mL.

CAAP Discharge Limitations Table for Effluent Sampling Location 00D (Constructed Drainage Ditch Monitoring Point Ten (10) Meters Downstream Of Outfall 002, Prior To Entering The Spring Creek Natural Channel. This Is The Discharge Compliance Point, Except For Flow) To Be Reported Quarterly^[1]

Discharge Limitations				Monitoring Requirements			
Parameter	Base	Quantity	Concentration	Monitoring Loc	Sample Loc	Measurement Frequency	Sample Type
BOD, 5-day	Daily Maximum		<= 5 Milligrams per Liter (mg/L)	Effluent Gross	00D	Quarterly	DISCRT
E. coli	Daily Maximum	[2]	M&R Most Probable Number per 100ml T (MPN/100mL) ^[4]	Effluent Gross	00D	Quarterly	DISCRT
E. coli	30 Day Geometric Mean ^[3]	[2]	M&R Most Probable Number per 100ml T (MPN/100mL) ^[4]	Effluent Gross	00D	Quarterly	DISCRT
Nitrogen, ammonia total (as N)	30 Day Average		<= 0.486 Milligrams per Liter (mg/L) ^[5]	Effluent Gross	00D	Quarterly	DISCRT
Phosphorus, total (as P)	Daily Maximum		<= 0.33 Milligrams per Liter (mg/L)	Effluent Gross	00D	Quarterly	DISCRT
Solids, total dissolved	Daily Maximum		<= 500 Milligrams per Liter (mg/L)	Effluent Gross	00D	Quarterly	DISCRT
Solids, total suspended	Daily Maximum		<= 25 Milligrams per Liter (mg/L)	Effluent Gross	00D	Quarterly	DISCRT

Notes (CAAP Discharge Limitations Table):

1. Please see special approvals/conditions item 6 for requirement to synchronize the sampling with the discharge timelines.
2. This limit applies for the 4th quarter rolling geometric mean *E.coli* value only.
3. Report rolling geometric mean from the 1st quarter through the 4th quarter each year.
4. CFN/100mL or MPN/100mL.
5. Refer to Nevada Administrative Code (NAC) 445A.118, Water quality criteria for total ammonia, for Chronic Water Quality Criteria for Total Ammonia for Waters where Freshwater Fish in Early Life Stages May Be Present. This limit being based on average reported temperature and a pH of 9.0 S.U.

Summary of Changes From Previous Permit

Under Outfall 00A, To Be Reported Monthly, the following additions, changes or deletions were made:

DELETED – Oxygen, dissolved (DO), with a “30-Day Average” Base.

DELETED – pH, maximum, with a “Maximum Monthly Average” Base.

DELETED – pH, minimum, with a “Minimum Monthly Average” Base.

DELETED – Temperature, water deg. centigrade, with a “30-Day Average” Base.

ADDED – Coliform, fecal general, with an “M&R Most Probable Number per 100 ml T (MPN/100mL)” Base, an “Intake from Stream” Monitoring Location, a “00A” Sample Location, a “Monthly” Measurement Frequency, and a “Discrt” Sample Type.

ADDED – Footnote 1.

1. CFN/100mL or MPN/100mL.

Under Outfall 00D, To Be Reported Monthly, the following additions and deletions were made:

DELETED – Nitrogen, ammonia total (as N), with a “30-Day Average” Base.

DELETED – Oxygen, dissolved (DO), with a “Monthly Average Minimum” Base.

DELETED – pH, maximum, with a “Maximum Monthly Average” Base.

DELETED – pH, minimum, with a “Monthly Average Minimum” Base.

DELETED – Temperature, water degree centigrade, with a “30-Day Average” Base.

DELETED – Temperature, difference between sample & upstream degrees C, with a “30-Day Average” Base.

DELETED - Temperature, difference between sample & upstream degrees C, with a "Daily Maximum" Base.

DELETED – Footnotes 4 and 6 with the remaining footnotes re-numbered.

ADDED – Coliform, fecal general, with a “Daily Maximum” Base, a “M&R Most Probable Number per 100 ml T (MPN/100mL)” Concentration, a “Effluent Gross” Monitoring Location, a “00D” Sample Location, a “Monthly” Measurement Frequency, and a “discrt” Sample Type.

ADDED – Nitrogen, ammonia total (as n), with a “Daily Maximum” Base, a “ ≤ 0.885 Milligrams per Liter (mg/L)” Concentration, a “Effluent Gross” Monitoring Location, a “00D” Sample Location, a “Monthly” Measurement Frequency, and a “discrt” Sample Type.

CHANGED - Footnote 3.

From:

3. For cold-water fisheries, acute water quality criteria as applicable for this parameter should not exceed more than once every 3 years on average.

To:

3. For cold-water fisheries, acute water quality criteria as applicable for this parameter should not exceed more than once every 3 years on average. See Nevada Administrative Code (NAC) 445A.118, Water Quality Criteria for Total Ammonia, Acute Water Quality Criteria for Total Ammonia for Freshwater Aquatic Life Table. This limit is based on the creek being a cold-water fishery and a pH of 9.0 S.U.

ADDED – Footnote 4.

4. CFN/100mL or MPN/100mL.

Under Outfall 00D, To Be Reported Quarterly, the following parameters were added, changed, or deleted:

DELETED - BOD, 5-Day, with a "Quarterly Average" Base.

DELETED - Phosphorus, total (as P), with a "Quarterly Average" Base.

DELETED - Solids, total dissolved, with a "Quarterly Average" Base.

DELETED - Solids, total suspended, with a "Quarterly Average" Base.

DELETED - *E. coli*, with a "Geometric Mean" Base.

ADDED - *E. coli*, with a "30-Day Geometric Mean" Base, a "M&R Most Probable Number per 100 ml T (MPN/100mL)" Concentration, a "Effluent Gross" Monitoring Location, a "00D" Sample Location, a "Quarterly" Measurement Frequency, and a "Discret" Sample Type.

ADDED – Nitrogen, ammonia total (as n), with a "Daily Maximum" Base, a " ≤ 0.486 Milligrams per Liter (mg/L)" Concentration, a "Effluent Gross" Monitoring Location, a "00D" Sample Location, a "Quarterly" Measurement Frequency, and a "discret" Sample Type.

ADDED - Footnote 4.

4. Refer to Nevada Administrative Code (NAC) 445A.118, Water quality criteria for total ammonia, for Chronic Water Quality Criteria for Total Ammonia for Waters where Freshwater Fish in Early Life Stages May Be Present. This limit being based on average report temperature and a pH of 9.0 S.U.

Technology Based Effluent Limitations

Permittee is subject to comply with the effluent limitations attainable by the application of the best practicable control technology currently available (BPT) pursuant to 40 CFR section 451.11 (a) through (e). This compliance shall be implemented via the Schedule of Compliance Item 1 as well as Item 7, of the Special Approvals/Conditions Table, to maintain a current and approved effluent management plan, record keeping practices, and timely reporting of all significant changes to the approved version of the O&M Manual.

Water Quality Based Effluent Limitations

The following water quality based effluent limit (WQBEL) requirements, based on NAC 445A.2098, are included in the proposed permit to ensure that the discharge does not cause or contribute to excursions above WQSs. In addition, the proposed permit requires monitoring and reporting of constituents that are subject of WQSs and may be present in the discharge.

The proposed permit maintains a daily maximum of 9.0 Standard Units (S.U.) limit for pH and a daily minimum of 6.5 S.U. limit for pH, as prescribed under NAC 445A.2098, to protect the aquatic life beneficial use, with a monthly reporting requirement.

The proposed permit maintains a daily maximum of 20 Degrees Centigrade (deg C) limit for Temperature, as prescribed under NAC 445A.2098, to protect the aquatic life beneficial use, with a monthly reporting requirement.

The proposed permit maintains a daily maximum of M&R Most Probable Number per 100 ml T (MPN/100ml) limit for *E. coli*, as prescribed under NAC 445A.2098, to protect the recreation involving contact with water beneficial use, with a quarterly reporting requirement.

The proposed permit maintains a daily maximum of 0.33 Milligrams per Liter (mg/L) limit for Phosphorus, as prescribed under NAC 445A.2098, to protect the aquatic life beneficial use, with a quarterly reporting requirement.

The proposed permit maintains a daily maximum of 500 Milligrams per Liter (mg/L) limit for TDS, as prescribed under NAC 445A.2098, to protect the municipal or domestic supply beneficial use, with a quarterly reporting requirement.

Reasonable Potential Analysis (RPA)

Section 301(b)(1)(c) of the CWA requires effluent limitations necessary to meet WQSs, and Title 40 of the CFR section 122.44(d) requires permits to include conditions that are necessary to achieve WQSs established under section 303 of the CWA, including state narrative criteria for water quality. Federal regulations at 40 CFR 122.44(d)(1)(i) state, "Limitations must control all pollutants or pollutant parameters (either conventional, nonconventional, or toxic pollutants) which the Director determines are or may be

discharged at a level that will cause, have the reasonable potential to cause, or contribute to an excursion above any State water quality standard, including State narrative criteria for water quality.” The process to determine whether a WQBEL is required as described in 40 CFR 122.44(d)(1)(i) is referred to as a reasonable potential analysis, or RPA. Furthermore, NAC 445A.243 requires the Division to consider the establishment of effluent limitations necessary to meet WQSs.

For conducting the RPA, the Division used a mass-balanced approach to determine the expected critical downstream receiving water concentration using statistics recommended in the United States Environmental Protection Agency’s Technical Support Document (TSD) for Water Quality-Based Toxic Control for statistically calculating the projected maximum effluent concentration (i.e., Table 31 of the TSD using the 99 percent probability basis and 99 percent confidence interval). For purposes of the RPA, the critical receiving water flow was assumed to be zero (i.e., no dilution); therefore, the critical effluent pollutant concentrations were compared with the most restrictive water quality criteria under NAC 445A.2098 to determine if the discharge has reasonable potential to cause, or contribute to, an excursion above a State WQS.

The RPA was based on data collected from January 2021 to March 2026 which includes effluent data submitted in DMRs and the Permittee’s monitoring laboratory reports. Based on the RPA, the discharge exhibits reasonable potential to cause, or contribute to, instream excursion above the applicable water quality criteria for Ammonia (as N). Based on this finding, Ammonia (as N) was added to Outfall 00D with both a monthly reporting requirement (for acute water quality criteria for freshwater aquatic life) and a quarterly reporting (for chronic water quality criteria for freshwater aquatic life).

Proposed Water Quality Based Effluent Limits (monthly/weekly/daily)

The proposed permit establishes a daily maximum of 0.885 Milligrams per Liter (mg/L) limit for Ammonia (as N), as prescribed under NAC 445A.118, for acute water quality criteria to protect the aquatic life beneficial use, with a monthly reporting requirement. The ammonia limits were based on the WQS for pH’s maximum value (9.0 S.U.) and the creek being classified as a cold-water fishery.

The proposed permit establishes a 30-day average of 0.486 Milligrams per Liter (mg/L) limit for Ammonia (as N), as prescribed under NAC 445A.118, for chronic water quality criteria for waters where freshwater fish in early life stages may be present, to protect the aquatic life beneficial use, with a monthly reporting requirement. The ammonia limit was based on the average temperature reported during the past five years and the WQS for the pH’s maximum value.

The proposed permit establishes a daily minimum of 6 Milligrams per Liter (mg/L) limit for Dissolved Oxygen, as prescribed under NAC 445A.2098, to protect the aquatic life beneficial use, with a monthly reporting requirement.

The proposed permit establishes a 30-day geometric mean of M&R Most Probable Number per 100 ml T (MPN/100ml) limit for E. coli, as prescribed under NAC 445A.2098, to protect the recreation involving contact with water beneficial use, with a quarterly reporting requirement.

The proposed permit establishes a daily maximum of M&R Most Probable Number per 100 ml T (MPN/100ml) limit for General Fecal Coliform, as prescribed under NAC 445A.2098, to protect the irrigation beneficial use, with a quarterly reporting requirement.

Basis for Effluent Limitations

BOD5 and TSS are continued from the prior permit cycles as these two parameters continue to serve as indicators for overall facility operational efficiency and also keeps the permit as strict as it was through the prior permit cycles.

The requirement to sample BOD5 was maintained based on it being a critical water quality parameter, in a freshwater flow-through fishery, that measures the oxygen consumed by microorganisms to decompose organic matter (uneaten food, fish waste) over 5 days. In flow-through systems, managing BOD5 is

essential because high levels indicate excessive pollution, which consumes dissolved oxygen (D.O.). Low levels of D.O. can threaten fish health and cause stress or death, particularly when levels drop below 5 mg/L. The proposed permit maintains a daily maximum of 5 Milligrams per Liter (mg/L) with a quarterly reporting requirement.

The requirement to sample TSS, in a freshwater flow-through fish rearing system, is used to measure the concentration of non-soluble, particulate matter (silt, clay, organic matter, algae) in mg/L, indicating water clarity and quality. The proposed permit maintains a daily maximum of 25 Milligrams per Liter (mg/L) with a quarterly reporting requirement.

Fish rearing activities can increase or decrease effluent/flow-through water's pH; therefore, monthly monitoring for pH is included in assessing compliance with the WQSs limits for pH, as prescribed under NAC 445A.2098, of 6.5 S.U. as a daily minimum and 9.0 S.U. as a daily maximum.

Total ammonia as N is limited pursuant to NAC 445A.2018 that directs to the limits from NAC 445A.118: Table 1: Acute water quality criteria for total ammonia for freshwater aquatic life & Table 2: Chronic criteria for total ammonia for waters where fish in early life stages may be present.

Anti-backsliding

Sections 402(o) and 303(d)(4) of the CWA and federal regulations of 40 CFR 122.44(i) prohibit backsliding and require effluent limitations in a reissued permit to be as stringent as those in the previous permit.

CWA section 402(o)(2) outlines specific exceptions to the general prohibition against revising an existing TBEL that was developed on a case-by-case basis using best professional judgment (BPJ) to reflect subsequently promulgated, less stringent effluent guidelines in a renewed, reissued, or modified permit. CWA section 402(o)(2) provides that relaxed limitations may be allowed where:

New information (other than revised regulations, guidance, or test methods) is available that was not available at the time of permit issuance and that would have justified a less stringent effluent limitation. If the effluent limitation was based on water quality standards, any changes must result in a decrease in pollutants discharged.

Pursuant to 40 CFR 122.45(d)(1), for continuous discharges all permit effluent limitations, standards, and prohibitions, including those necessary to achieve water quality standards, shall unless impracticable be stated as:

(1) Maximum daily and average monthly discharge limitations for all dischargers other than publicly owned treatment works. For Outfall 00A, since monitoring is only required once per month for Coliform, D.O., pH, and Temperature, the "30-day average" is simply the value of that single sample, as there are no other data points to average, which is also being reported as the "Daily Maximum", making it redundant in nature; and

For Outfall 00D, the requirement to sample phosphorus, TDS, BOD5, and TSS was removed as it is not a WQS under NAC 445A.2098, with single value limits being based on a "Daily Maximum" Base.

Antidegradation

The Division has developed an antidegradation regulation that is applied on a statewide basis, and which meets the statutory requirements of Nevada's water pollution control law found at Nevada Revised Statute (NRS) 445A.520 and NRS 565 and is consistent with the federal antidegradation policy found at Title 40 in the CFR section 131.12. The objective of the Division's antidegradation regulation is to prevent degradation of Nevada's surface water and maintain the unique attributes and special characteristics and water quality associated with high-quality waters. This objective is achieved through the implementation of procedures to ensure that water is protected from regulated activities that have the potential to degrade the water quality.

The regulation uses four (4) tiers of antidegradation protection. Tier 1 protects water quality for beneficial

uses of the water on a parameter-by-parameter basis. Tier 2 protects high-quality waters where data show the water quality is better than levels needed to protect beneficial uses (on a parameter-by-parameter basis). Tier 2.5 and Tier 3 protect water quality and the special characteristics of waterbodies designated with the beneficial uses of “extraordinary, ecological, aesthetic or recreational value” (NAC 445A.122). The Division will conduct an antidegradation review only when a permit application is submitted for a new or expanding point source discharge to a surface water or for a new or altered zone of mixing.

Since the proposed renewal of this permit does not include a new, or expanding, point source discharge; or, a new or altered zone of mixing, the antidegradation review is not required.

Special Conditions

See the Special Approvals/Conditions applicable to this permit.

SA – Special Approvals / Conditions Table

Item #	Description
	<u>Parameter</u> <u>Discharge Limits</u> <u>Measurement Frequency</u> <u>Location</u> <u>Sample Type</u> Drugs¹ M&R² Report per Permit Section B and 40 CFR 451.3(a) (1),(2), and (3). 1. Reporting is not required for an investigational new animal drug (INAD) or extra-label drug use of a drug previously approved by FDA for a different aquatic animal species or diseases if the INAD or extralabel use is at or below the approved dosage and involves similar conditions of use. The permittee shall notify the Division of any anticipated use of a drug that will not qualify for non-reporting in accordance with this provision. Following permittee notification to the Division, the permittee shall, for the drug or constituent of concern, meet the concentration limit and the sampling and reporting frequency set by the Division. The permittee shall apply for permit modification if necessary. 2. 30-Day average and Daily Max.
2	<u>Parameter</u> <u>Discharge Limits</u> <u>Measurement Frequency</u> <u>Location</u> <u>Sample Type</u> Failure or Damage to the Structure of Aquatic Animal Contamination System M&R¹ Perform Permit Section B requirements; and Report per 40 CFR 451.3(b) (1) through (3). 1. 30-Day average and Daily max
3	<u>Parameter</u> <u>Discharge Limits</u> <u>Measurement Frequency</u> <u>Location</u> <u>Sample Type</u> Spills M&R Perform Permit Section C requirements; and Report per 40 CFR 451.3(c).
4	A statistically significant number of samples must be collected to develop the 95th percentile value that characterizes the background natural conditions of receiving waters for a parameter/location combination. Monitoring and reporting by the permittee for specified parameters is required relative to the receiving waters and facility discharge. Until a sufficient number of representative factors of the combination have been encountered for inclusion in developing the 95th percentile value, the data collection time period at a particular site is indeterminate. In many instances, establishing discharge limits for a given parameter/location that are dependent on receiving waters characterization, may be resource intensive to the permittee. During the period this permit is in force, the permittee may work with NDEP to establish limits and controls by modification of the permit. Pursuant to 40 CFR 122.62,

Item #	Description
	modification is allowed by using available receiving waters characterization results and reviewing, if possible, other appropriate criteria guidelines so long as any resulting limitations established by a modification will be protective of the beneficial uses of the receiving water at the given location.
5	Samples obtained at the outfall 00D reflect co-mingling of facility discharges contributed by Outfall 001 and 002. Flow from 002 is intermittent providing irregular contribution to discharge at location 00D. Samples obtained at 00D shall be gathered at a time within the parameter measurement frequency period when 002 is contributing flow. However, requirement to synchronize the sampling does not apply if and when there is no discharge through an entire measurement frequency period.
6	Permittee shall submit for approval all proposed changes to the best practicable control technology (BPT), if significantly different from the then approved version of O&M of the facility, as and when such a need arises. All the modifications shall be reviewed pursuant to the requirements set forth in 40 CFR 451.11 (a) through (e).

Discharges From Future Outfalls/ Planned Facility Changes

There are no planned future outfalls or facility changes.

Corrective Action Sites

There are no active Bureau of Corrective Actions (BCA) remediation sites within a one-mile radius of the SCRS.

Wellhead Protection Program

The outfalls are not located within a Wellhead Protection Area, which represents an approximate 10-year capture zone of a well, or within a Drinking Water Protection Area, which is defined by a 3,000-foot radius around a public water supply (PWS) well.

Schedule of Compliance:

SOC – Schedule of Compliance Table

Item #	Description	Due Date
1	An updated Best Management Practices (BMP) plan and Operations and Maintenance (O&M) manuals, two copies (one hard copy and one electronic copy), for the facility must be submitted to the Division for review and approval. The BMP plan must describe how the Permittee will achieve the requirements of Section B.CA of this permit as well as include the description of how the facility will function to meet 40 CFR 451.3(d) 1-3 requirements. The O&M manual must also include the following: • Sludge Management Practice Plans; and • Site Plan of the SCRS showing, but not limited to, the general flow paths (piping) for routing of pass-through source water and discharge flows.	2/12/2028

Deliverable Schedule:

DLV– Deliverable Schedule for Reports, Plans, and Other Submittals

Item #	Description	Interval	First Scheduled Due Date
1	Quarterly DMRs	Quarterly	1/28/2027
2	Once During the Permit Term DMRs	Once during the permit term	7/31/2031

Procedures for Public Comment:

The Notice of the Division's intent to issue a permit authorizing the facility to discharge to groundwater of the State of Nevada subject to the conditions contained within the permit, is being mailed to interested persons on our mailing list and will be posted on our website at <https://ndep.nv.gov/posts>. Anyone wishing to comment on the proposed permit can do so in writing until 5:00 P.M. **10/7/2026**, a period of 30 days following the date of the public notice. The comment period can be extended at the discretion of the Administrator.

A public hearing on the proposed determination can be requested by the applicant, any affected State, any affected interstate agency, the Regional Administrator of EPA Region IX or any interested agency, person or group of persons. The request must be filed within the comment period and must indicate the interest of the person filing the request and the reasons why a hearing is warranted. Any public hearing determined by the Administrator to be held must be conducted in the geographical area of the proposed discharge or any other area the Administrator determined to be appropriate. All public hearings must be conducted in accordance with NAC 445A.238.

The final determination of the Administrator may be appealed to the State Environmental Commission pursuant to NRS 445A.605.

Proposed Determination:

The Division has made the tentative determination to issue/re-issue the proposed 5-year permit.

Prepared by: **Melissa Hanson**

Date: **9/1/2026**

Title: **Staff II Engineer**

Summary of Reasonable Potential Analysis

Parameter	Units	No. of Effluent Samples	Critical Effluent Concentration	Most Stringent Criterion	Criterion Basis	Does RP Exist?
Ammonia, Total (as N)	mg/L	25	0.96	0.342	Chronic Aquatic Life	Yes
Phosphorus, Total (as P)	mg/L	24	0.19	0.33	QC to Protect Beneficial Us	No
Total Dissolved Solids	mg/L	24	248.87	500	QC to Protect Beneficial Us	No