

MICHELLE LUJAN GRISHAM GOVERNOR JAMES C. KENNEY CABINET SECRETARY

# GROUND WATER QUALITY BUREAU (GWQB) DISCHARGE PERMIT RENEWAL EXISTING COPPER MINE FACILITY Issued under 20.6.2 and 20.6.7 NMAC

Return Receipt Requested					
Mine Facility Name:	No. 1 Stockpile and Acid Unloading Area				
GWQB Discharge Permit No.: GWQB TEMPO AI No.:	DP-896 527				
Permittee Name/Responsible Party: Mailing Address:	Freeport-McMoRan Tyrone Inc. P.O. Drawer 571 Tyrone, NM 88065				
Facility Contact: Facility Location:	Lee Nix; (575) 313-6048 Highway 90 South Tyrone Mine Road Tyrone, NM 88065				
County:	Grant County				
Permitting Action: Renewal Effective Date: Renewal Expiration Date:	Renewal XXXX XXXX				
NMED Permit Contact: E-mail Address:	George Llewellyn; (575) 313-1496 george.llewellyn@state.nm.us				

John Rhoderick, Acting Director Water Protection Division Date

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#### Part A GENERAL INFORMATION

#### A100 Introduction

- A. The New Mexico Environment Department (NMED) issues this Ground Water Discharge Permit Renewal, DP-896 (Discharge Permit) to Freeport-McMoRan Tyrone Inc. (permittee) pursuant to the New Mexico Water Quality Act (WQA), NMSA 1978, §§ 74-6-1 to 74-6-17, and the New Mexico Water Quality Control Commission (WQCC) Regulations, 20.6.2 NMAC (Ground and Surface Water Protection) and 20.6.7 NMAC (Ground Water Protection – Supplemental Permitting Requirements for Copper Mine Facilities; aka the Copper Mine Rule). NMED is issuing this Discharge Permit to control the discharge of water contaminants from the reclaimed No. 1 Stockpile, Acid Unloading Area and associated facilities for the protection of groundwater and those segments of surface water gaining from groundwater inflow, for present and potential future use as domestic and agricultural water supply and other uses, and to protect public health.
- B. Pursuant to this Discharge Permit, the permittee is authorized to transfer seepage water discharged from the No. 1 Stockpile and collected in interceptor systems located at the toe of the No. 1 Stockpile, and impacted groundwater collected in the Oak Grove Brick Kiln Alluvial (OGBKA) Collection System to the 1 AST Tank. Solutions collected in the 1 AST Tank are discharged to the No. 1B PLS Tank regulated under DP-363. In addition, impacted stormwater from areas within DP-896 is regulated pursuant to this Discharge Permit. These discharges may move directly or indirectly into groundwater of the State of New Mexico that has an existing concentration of 10,000 milligrams per liter (mg/L) or less of total dissolved solids (TDS) within the meaning of Section 20.6.2.3104 and Subsection A of 20.6.2.3101 NMAC. The discharge may contain water contaminants or toxic pollutants elevated above the standards of Section 20.6.2.3103 NMAC in compliance with the terms and conditions of this Discharge Permit.
- C. The permittee is authorized to discharge water contaminants pursuant to this Discharge Permit, which requires compliance with 20.6.2 NMAC and 20.6.7 NMAC and is enforceable by NMED.

## A101 Applicable Regulations

- A. The permittee is discharging from a facility that meets the definition of "existing copper mine facility." Sections 20.6.2.3000 through 20.6.2.3114 NMAC and 20.6.7 NMAC apply to discharges specific to copper mine facilities and their operations.
- B. The discharge from the facilities regulated pursuant to this Discharge Permit are not subject to any of the exemptions of Section 20.6.2.3105 NMAC.
- C. Groundwater quality as observed in monitoring wells required by C105.D of this Discharge Permit is subject to the criteria of Sections 20.6.2.3101 and 20.6.2.3103 NMAC except those excluded pursuant to Subsection D of 20.6.7.24 NMAC.

# A102 Permit Duration

- A. Pursuant NMSA 1978 § 74-6-5(I) and Subsection H of 20.6.2.3109 NMAC, the term of this Discharge Permit Renewal is **five (5) years** from the effective date.
- B. If the permittee submits an application for renewal in accordance with Subsection F of 20.6.2.3106 NMAC, then the existing discharge permit shall remain in effect until NMED approves or disapproves the application for renewal.

# A103 Terms of Permit Issuance

- A. **Permit Fees** As a discharge permit associated with the Freeport-McMoRan Tyrone Inc. copper mine facility, the permittee shall remit an annual permit fee payment equal to the applicable permit fee based on mine size listed in Subsection A of 20.6.7.9 NMAC on August 1 of each year until termination of all discharge permits for the Freeport-McMoRan Tyrone Inc. [20.6.7.9.A NMAC]
- B. **Transfer of Discharge Permit** Prior to the transfer of any ownership, control, or possession of this permitted facility or any portion thereof, the permittee shall notify the proposed transferee in writing of the existence of this Discharge Permit and include a copy of this Discharge Permit with the notice. The permittee shall deliver or send by certified mail to NMED a copy of the notification and proof that such notification has been received by the proposed transferee. [20.6.7.38 NMAC and 20.6.2.3111 NMAC]
- C. **Permit Renewal** To renew this Discharge Permit, the permittee shall submit an application and associated fees for renewal at least 270 days prior to the expiration date of this Discharge Permit (by DATE) in accordance with Sections 20.6.7.9, 20.6.7.10, and 20.6.7.11 NMAC.

D. Additional Conditions - In addition to the requirements of 20.6.7 NMAC, the permittee shall comply with the following additional conditions as authorized by Subsection I of 20.6.7.10 NMAC: Condition B104.B

## Part B FACILITY SPECIFIC INFORMATION

## B100 History and Facility Description

- A. The Tyrone Mine is an open pit copper mine facility owned by Freeport-McMoRan Tyrone Inc that covers an area of approximately 9,000 acres. The Tyrone mine consists of several open pits, associated waste rock stockpiles and leach stockpiles, collections systems, and a solution extraction and electrowinning (SX/EW) plant located in the northwestern portion of the mine, six reclaimed tailing impoundments in the northern portion of the mine, and other reclaimed facilities. The mine is regulated under eight operational Ground Water discharge permits, including DP-896, one closure discharge permit, one settlement agreement and an abatement plan. The facilities regulated under DP-896 that produce discharges that may move directly or indirectly into ground water include the No. 1 Stockpile and the Acid Unloading Area. The associated infrastructure includes the seepage collection system consisting of collection trenches (Seepage Collection Trenches No. 1 5) located along the toe of the No. 1 Stockpile, 1 AST Tank, 1 AST Overflow Pond and various pipelines. These mine units are described in B103 and shown on Figure 1 attached to this discharge permit.
- B. The No. 1 Stockpile was leached for copper recovery from 1976 to 2005 and was reclaimed in 2010. The No. 1 Stockpile covers approximately 247 acres and is no longer leached. The seepage collection system was modified in 2008 to accommodate postclosure seepage collection.

## B101 Permitting History

A. The Discharge Plan for the DP-896 includes application materials submitted to NMED dated January 17, 2012, the *Sampling and Analysis Plan for DP-896* submitted April 30, 2020, and material contained in the Administrative Record prior to issuance of this Discharge Permit. As part of the application process, the permittee also provided a document dated October 6, 2015 referred to as the Tyrone Master Document (TMD) which address Copper Mine Rule application requirements and is applicable to all the Tyrone Mine discharge permits, including DP-896. In addition, the Discharge Plan includes information and materials submitted as part of the original Discharge Plan approved on October 8, 1993 and renewed on May 18, 2007.

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## **B102** Facility Location, Groundwater and Process Water Characteristics

- A. The mine units regulated pursuant to DP-896 are located approximately 10 miles southwest of Silver City at the Tyrone Mine in Sections 13, 18, 19 and 24, T19S, R15W, Grant County, New Mexico.
- B. Groundwater beneath the mine units regulated pursuant to DP-896 is at a depth of approximately 10 to 30 feet in the alluvial aquifer and 500 to 600 feet in the regional aquifer and both aquifers had a pre-discharge TDS concentration of approximately 100 500 mg/L.
- C. The No. 1 Leach Stockpile contains sulfide materials which, when oxidized, generate acid solutions. The No. 1 Leach Stockpile also contains residual acid solutions from leach activities. These acid solutions react with in situ minerals to produce Acid Rock Drainage (ARD) that contains metals and sulfate in elevated concentrations that exceed water quality standards of 20.6.2.3.3103 NMAC.
- D. Process water and impacted stormwater discharges regulated pursuant to DP-896, including PLS and ARD typically exceed the water quality standards of Section 20.6.2.3103 NMAC for aluminum, cadmium, chromium, cobalt, copper, fluoride, iron, manganese, nickel, lead, sulfate, TDS, and zinc, and is outside the acceptable range for pH.

## B103 Authorized Mine Units

This Discharge Permit contains requirements associated with the following mine units as identified in the Discharge Plan. All mine units listed below meet the definition of "existing" mine units pursuant to the Copper Mine Rule and are located outside the Open Pit Surface Drainage Area (OPSDA) as defined by Section 20.6.7.7 NMAC, unless otherwise noted.

# A. Leach Stockpile

- 1. The footprint of the reclaimed No. 1 Leach Stockpile covers approximately 147 acres.
- B. Impoundments
  - 1 AST Overflow Pond The 140,000-gallon 80 mil high-density polyethylene (HDPE) lined 1 AST Overflow Pond is located in Brick Kiln Gulch. The 1 AST Overflow Pond receives overflow seepage water from the 1 AST Tank. Solutions

from the 1 AST Overflow Pond are pumped back to the 1 AST Tank.

- C. Sumps, Tanks, Pipelines and Other Containment Systems
  - 1. Seepage Collection Trenches Nos. 1 5 Five shallow HDPE lined seepage collection trenches are located along the southern toe of the No. 1 Stockpile and are listed below. Seepage from the No. 1 Stockpile is collected in the five seepage collection trenches and gravity flows via HDPE pipelines to the 1 AST Tank.
    - a. Seepage Collection Trench No. 1
    - b. Seepage Collection Trench No. 2
    - c. Seepage Collection Trench No. 3
    - d. Seepage Collection Trench No. 4
    - e. Seepage Collection Trench No. 5 (Monitoring Point)
  - Monitoring Wells 896-2010-01, 896-2010-02, 896-2010-03 and 896-2010-04 are located downgradient of Seepage Collection Trench No.1, Seepage Collection Trench No. 2, Seepage Collection Trench No. 3 and Seepage Collection Trench No. 4, respectively. Seepage Collection Trench No. 5 is sampled via a standpipe.
  - Oak Grove-Brick Kiln Alluvial Collection System The OGBKA Collection System is a trench well collection system. Impacted groundwater is pumped to the 1 AST Tank.
  - 4. 1 AST Tank The 2,260-gallon fiberglass 1 AST Tank is located in Brick Kiln Gulch. The 1 AST Tank receives seepage water from the Seepage Collection Trenches Nos.
    1 5 and impacted groundwater from the OGBKA Collection System. Overflow is conveyed to the 1 AST Overflow Pond. Process water from 1 AST Tank is pumped to the 1B PLS Tank (DP-363).
  - 5. Acid Unloading Area The Acid Unloading Area is located west of State Highway 90. The area is used to unload sulfuric acid from rail cars and trucks and transfer it to Tyrone Mine process water system. The Acid Unloading Area is concrete lined with some areas sealed with an acid-resistant coating (e.g., truck unloading area, lower segment of the Acid Tank Area channel), which provides containment of solutions generated in this area. The Acid Unloading Area consists of the following sub-units:
    - a. Sump Impacted stormwater, acid, and washdown water from the Acid Unloading Area discharges to the Sump located in the southwest corner of the Acid Unloading Area. The Sump has two basins, a Pump Down Sump (PDS), and a concrete-lined Containment Sump. The PDS, which is the deeper portion of the Sump, is lined with stainless-steel. The capacity of the PDS is 1,550 gallons. The contents of the PDS is discharged to the 1B PLS Tank using a float-activated

pump. Overflow from the Containment Sump is conveyed to the PDS.

- b. Truck Unloading Area Impacted stormwater, acid, and washdown water from the Truck Unloading Area discharges via a HDPE conveyance pipe to the PDS.
- c. Rail Car Unloading Area Stormwater and washdown water from the Rail Car Unloading Area discharges to the Containment Sump and PDS. Acid Tank Area - All unloaded sulfuric acid is transferred to the 267,000-gallon steel Acid Holding Tank. Sulfuric acid from the Acid Holding Tank is combined with raffinate from the SX/EW in the 13,000-gallon steel Mixing Tank. The Mixing Tank treats up to 3,000 gallons per minute (gpm) of raffinate in a continuous process. Impacted Stormwater and washdown water from the Acid Tank Area discharges to the Containment Sump via a concrete lined channel.
- 6. Pipelines serving the DP-896 mine units are constructed of HDPE material and stainless-steel and range in size from 2 to 6 inches. Pipelines are described in Table 8 and Plate 1b of the TMD.
- D. Flow Measurement
  - 1. The permittee utilizes flow meters to measure regulated discharge volumes pursuant to this Discharge Permit and as required by the Copper Mine Rule. Flow meters utilized by DP-896 are described in Table 10 of the TMD and Table 1 attached to this discharge permit.

# B104 Authorized Discharges

The permittee is authorized to discharge water contaminants from the following mine units in accordance with all applicable system design and operational constraints as described in this Discharge Permit and the Discharge Plan.

- A. The permittee is authorized to transfer seepage water collected in Seepage Collection Trenches Nos. 1-5 located at the toe of the No. 1 Stockpile, and impacted groundwater collected in the Oak Grove Brick Kiln Alluvial (OGBKA) Collection System to the 1 AST Tank. Solutions collected in the 1 AST Tank are transferred to the 1B PLS Tank (DP-363).
- B. The permittee is authorized to use water from various sources located at the Tyrone Mine for dust suppression within the area of DP-896 and associated haul roads that meets Section 20.6.2.3103 NMAC groundwater standards. Water is supplied from Bill Evans Lake or water supply wells at the Tyrone Mine that meet Section 20.6.2.3103 NMAC ground water standards. If at some time in the future the permittee wishes to use an alternate source of dust suppression water, the permittee shall notify NMED.

C. This Discharge Permit authorizes only those discharges specified herein. Any unauthorized discharges such as spills or leaks must be reported to NMED and remediated as required by Section 20.6.2.1203 NMAC, and any additional requirements listed in this Discharge Permit.

#### Part C FACILITY SPECIFIC REQUIREMENTS

The permittee shall conduct operations in accordance with the requirements set forth below to ensure compliance with 20.6.2 NMAC, and in accordance with the applicable requirements of 20.6.7 NMAC.

#### C100 Leach Stockpiles

A. The footprint of the reclaimed No. 1 Stockpile shall not exceed 147 acres. The permittee may only expand the land surface area of the No. 1 Stockpile through a NMED-approved permit amendment or modification to DP-896.

#### C101 Impoundments

- A. The permittee shall operate the 1 AST Overflow Pond in accordance with the applicable requirements of Subsection F of 20.6.7.18 NMAC.
- B. The 1 AST Overflow Pond shall be maintained to achieve a minimum of 2 feet of freeboard in compliance with Paragraph (4) of 20.6.7.18.F NMAC.

## C102 Sumps, Tanks, Pipelines and Other Containment Systems

- A. The permittee shall operate all pipelines, tanks, and sumps in existence on the effective date of the Copper Mine Rule in accordance with the applicable requirements of Subsection C of 20.6.7.23 NMAC and Paragraph (2) of 20.6.7.23.B NMAC.
- B. Detailed and complete construction plans and specifications and supporting design calculations for any proposed or required sumps, tanks, pipelines, or other containment systems, including any replacements thereof, shall be submitted to NMED pursuant to Paragraph (2) of 20.6.7.17.C NMAC, Section 20.6.7.23 NMAC, and D107 of this Discharge Permit. This requirement does not apply to portable or temporary tanks, pipelines, sumps, or other containment systems that are subject to periodic relocation during mining operations.

- C. Pursuant to Subsection J of 20.6.7.33 NMAC, upon discontinuing the operation of, or before moving tanks, pipelines, sumps, or other containment systems, all liquids shall be released to a location specifically authorized in the discharge permit, an alternate location subject to NMED approval, or otherwise properly contained, transferred, or disposed of in a manner that does not result in discharge to non-authorized areas.
- D. Pursuant to Subsection A of 20.6.7.35 NMAC, the permittee shall perform quarterly inspections of Seepage Collection Trenches Nos. 1 5 and perform maintenance as necessary to ensure that all water contaminants are managed in a manner that is protective of ground water quality. The permittee shall expand or add seepage collection as needed to address new areas of contamination when ongoing groundwater monitoring indicates such measures are needed.

#### C103 Stormwater Management

- A. Stormwater shall be managed in accordance with the applicable requirements of Paragraph (4), Subsection C of 20.6.7.17 NMAC and the Tyrone Mine Sitewide Water Management Plan (May 28, 2021 or more current version) required by DP-166.
- B. The permittee shall inspect monthly all stormwater impoundments, conveyance channels, and collection ponds for evidence of stormwater accumulations that exceed designed capacities.

#### C104 Flow Measurement

A. Pursuant to Paragraph (2) of 20.6.7.18.E NMAC, the permittee shall visually inspect all flow meters on a monthly basis for evidence of malfunction and repair and replace malfunctioning flow meters within 30 days of or as soon as practicable following discovery.

## C105 Monitoring and Reporting

A. Pursuant to applicable requirements of Sections 20.6.7.28 and 20.6.7.29 NMAC, the permittee shall collect, preserve, transport, and analyze all groundwater, process water, tailings slurry, impacted stormwater, seep, spring, and surface water samples from the facility in accordance with Table 1 of this Discharge Permit, and any additional requirements listed in this Discharge Permit. Table 1 provides a summary of monitoring and reporting requirements. Figure 1 of this Discharge Permit shows sampling locations.

Freeport-McMoRan Tyrone Mine, DP-896 Renewal Draft Permit Date: September 14, 2021

- B. The permittee shall submit monitoring reports to NMED in both electronic and hard copy format on a semi-annual schedule that contain all quarterly monitoring data and information collected pursuant to the requirements of this Discharge Permit, and the applicable requirements of Section 20.6.7.29 NMAC. Semi-annual reports are due by February 28 and August 31 of each year. If applicable to this Discharge Permit, data required to be submitted annually shall be submitted in the monitoring report due by February 28 of each year.
- C. Requests to change monitoring and reporting requirements may require modification or amendment of this Discharge Permit as required by the NMED Secretary. [20.6.2.7 NMAC]
- D. Groundwater
  - 1. Pursuant to Subsection B of 20.6.7.28 NMAC, "the permittee shall monitor groundwater quality as close as practicable around the perimeter and downgradient of each open pit, leach stockpile, waste rock stockpile, tailings impoundment, process water impoundment, and impacted stormwater impoundment."
  - 2. Pursuant to Paragraph (1) of 20.6.7.28.B NMAC, the existing monitoring wells listed in Table 1 have been deemed appropriate by NMED for continued use as groundwater monitoring wells under this Discharge Permit. These groundwater monitoring wells, installed prior to the effective date of the Copper Mine Rule, have been identified to be constructed in accordance with the Copper Mine Rule.
  - 3. Pursuant to Subsection G of 20.6.7.28 NMAC, the permittee shall sample and analyze groundwater quarterly from the monitoring wells in accordance with Table 1, and the applicable requirements of Subsection F of 20.6.7.28 NMAC. Analytical results shall be submitted in the semi-annual monitoring reports in the format specified by Subsection C of 20.6.7.29 NMAC.
- E. Discharge Volumes
  - In addition to discharge volume reporting required by Subsection B of 20.6.7.29 NMAC, the permittee shall measure and report discharge volumes from flow meters listed in Table 1 of this Discharge Permit pursuant to Subparagraphs (g) and (h) of 20.6.7.20.C(1) NMAC and Subsections E and F of 20.6.7.29 NMAC for the following discharges:

- a. Daily volume of No. 1 Stockpile seepage water (gpd) transferred from the 1 AST Tank to the 1B PLS Tank.
- b. Daily volume of water (gpd) transferred from the OGBKA Collection System to the 1 AST Tank.
- F. Flow Measurement Reporting
  - 1. Pursuant to Subparagraph (a) of 20.6.7.18.E.2 NMAC, the permittee shall submit a report of repaired or replaced flow meters in the semi-annual monitoring reports that include a description of any flow meter malfunctions with a statement verifying the repair and description of calibration of the flow meter pursuant to Paragraph (3) of 20.6.7.18.E NMAC.
- G. Meteorological Data
  - 1. Meteorological data shall be measured as stipulated in the TMD. The data shall be submitted to NMED in the monitoring report due on February 28 of each year as required in C105.B.

## C106 Contingency Plan

- A. The permittee shall comply with all applicable contingency requirements and submit to NMED all applicable information or documentation specified in Subsections A through J of 20.6.7.30 NMAC.
- B. Pursuant to Subsection G of 20.6.7.30 NMAC, discharges of process water or seepage to unauthorized areas that exceed the standards of Section 20.6.2.3103 NMAC must be reported under Section 20.6.2.1203 NMAC and as required by D106.A.
- C. Pursuant to Subsection I of 20.6.7.30 NMAC, the permittee shall notify NMED of any significant erosion or condition that may compromise conveyance structures utilized in DP-896.
- D. The permittee has been required to submit to NMED for approval a proposed abatement plan for the Tyrone Mine pursuant to Section C114 of DP-1341. All abatement plans and activities shall be performed in accordance with Sections 20.6.2.4000 through 4115 NMAC and Paragraphs (3) and (4) of 20.6.7.30.A NMAC.
- E. If NMED or the permittee identifies any other failures of the discharge plan or system not specifically noted in this permit that may have the potential to impact water

quality, NMED may require the permittee to develop and submit contingency plans and schedules for NMED approval to address such failures. [20.6.2.3107.A.10 NMAC]

#### C107 Closure Plan

- A. Closure of all mine units associated with this Discharge Permit shall be performed in accordance with the requirements of Section 20.6.7.33 NMAC and Section 20.6.7.34 NMAC, and in accordance with DP-1341, as applicable.
- B. Pursuant to Paragraph (4) of 20.6.7.33.F NMAC and Subsection F of 20.6.7.34 NMAC, the permittee shall submit for NMED approval 60 days prior to construction, a Construction Quality Assurance/Construction Quality Control (CQA/CQC) plan for any mine units regulated pursuant to DP-896 where cover is applied under an approved closure plan.
- C. For each mine unit closed, the closure period shall cease, and the post-closure period shall commence following NMED approval of a final CQA/CQC report that is in accordance with Subsection G of 20.6.7.34 NMAC.
- D. Post-Closure Requirements
  - 1. Post-closure requirements shall be performed in accordance with the applicable requirements of Section 20.6.7.35 NMAC, and in accordance with the Closure/Closeout Plan and associated materials submitted as part of this Discharge Permit. Pursuant to Subsection D of 20.6.7.35 NMAC, the permittee shall submit to NMED semi-annual reports pursuant to the schedule in Subsection A of 20.6.7.29 NMAC that include, but are not limited to, a description and the results of post-closure monitoring, any work completed during the preceding semi-annual period, any maintenance and repair work conducted for any closure unit, status of post-closure activities, and semi-annual potentiometric maps.
  - Pursuant to Subsection E of 20.6.7.35 NMAC, the contingency requirements of Section 20.6.7.30 NMAC apply to any deficiencies discovered during post-closure monitoring and inspections, including, but not limited to, the requirements for possible corrective action plans, abatement plans, monitoring well replacement, reporting and correction of unauthorized discharges, and significant erosion of, or ponding of water on, a cover system.

#### C108 Financial Assurance

A. The permittee shall maintain the existing and any revised joint financial assurance with NMED and the Mining and Minerals Division of the New Mexico Energy, Minerals and Natural Resources Department to cover costs associated with closure and post-closure activities approved under this Discharge Permit and DP-1341. [20.6.2.3107 NMAC]

#### Part D GENERAL CONDITIONS

General conditions issued by the Ground Water Quality Bureau pursuant to 20.6.2 NMAC and 20.6.7 NMAC are listed below.

#### D100 Enforcement

- A. Any violation of the requirements and conditions of this Discharge Permit, including any failure to allow NMED staff to enter and inspect records or facilities, or any refusal or failure to provide NMED with records or information, may subject the permittee to a civil enforcement action pursuant to the WQA, NMSA 1978, Section 74-6-10(A) and (B). Such action may include a compliance order requiring compliance immediately or in a specified time, assessing a civil penalty, modifying or terminating the discharge permit, or any combination of the foregoing; or an action in district court seeking injunctive relief, civil penalties, or both. Pursuant to the WQA, NMSA 1978, Section 74-6-10(C) and 74-6-10.1, civil penalties of up to \$15,000 per day of noncompliance may be assessed for each violation of the WQA, NMSA 1978, Section 74-6-5, the WQCC Regulations, or this Discharge Permit, and civil penalties of up to \$10,000 per day of noncompliance may be assessed for each violation of any other provision of the WQA, or any regulation, standard, or order adopted pursuant to such other provision. In any action to enforce this Discharge Permit, the permittee waives any objection to the admissibility as evidence of any data generated pursuant to this Discharge Permit. The permittee does not waive any argument as to the weight such evidence should be given. [NMSA 1978 Section 74-6-10, Section 74-6-10.1]
- B. Pursuant to the NMSA 1978, Section 74-6-10.2(A-F), criminal penalties may be assessed for any person who knowingly violates or knowingly causes or allows another person to:
  - 1. Make any false material statement, representation, certification or omission of material fact in an application, record, report, plan or other document filed, submitted or required to be maintained under the WQA;

- 2. Falsify, tamper with or render inaccurate any monitoring device, method or record required to be maintained under the WQA; or
- 3. Fail to monitor, sample or report as required by a permit issued pursuant to a state or federal law or regulation.

## D101 General Inspection and Entry Requirements

- A. Nothing in this Discharge Permit shall be construed as limiting in any way the inspection and entry authority of NMED under the WQA, the WQCC Regulations, or any other applicable law or regulation. [20.6.2.3107 NMAC, NMSA 1978, Section 74-6-9(B) & (E)]
- B. The permittee shall allow the Secretary or an authorized representative, upon the presentation of credentials, to [20.6.2.3107.D NMAC, NMSA 1978, 74-6-9(B) & (E)]:
  - 1. Enter at regular business hours or at other reasonable times upon the permittee's premises or other location where records must be kept under the conditions of this Discharge Permit, or under any federal or WQCC regulation.
  - 2. Inspect and copy, during regular business hours or at other reasonable times, any records required to be kept under the conditions of this Discharge Permit, or under any federal or WQCC regulation.
  - 3. Inspect, at regular business hours or at other reasonable times, any facility, equipment (including monitoring and control equipment or treatment works), practices or operations regulated or required under this Discharge Permit, or under any federal or WQCC regulation.
  - 4. Sample or monitor, at reasonable times for the purpose of assuring compliance with this Discharge Permit or as otherwise authorized by the WQA, any effluent, water contaminant, or receiving water at any location before or after discharge.

## D102 General Operational Requirements

- A. Mine units shall be designed in accordance with the applicable requirements of Section 20.6.7.17 NMAC.
- B. Mine units shall be operated in accordance with the applicable requirements of Section 20.6.7.18 NMAC.
  - 1. Pursuant to Subsection A of 20.6.7.18 NMAC, to the extent practicable, mine units shall be designed and operated in a manner that contemplates the closure plan,

including identifying and segregating suitable material to construct covers and consideration of closure grading and drainage plans in the design and construction of operational mine units.

- C. The permittee shall meet all applicable setback requirements pursuant to Section 20.6.7.19 NMAC.
- D. The permittee shall provide written notice to NMED of the commencement, or recommencement of operations in accordance with Subsection C of 20.6.7.18 NMAC.

## D103 General Record Keeping and Reporting Requirements

- A. The permittee shall retain written records at the copper mine facility as required pursuant to Section 20.6.7.37 NMAC.
- B. The permittee shall furnish to NMED, within a reasonable time, any documents or other information that NMED requests to determine whether cause exists for modifying, terminating and/or renewing this Discharge Permit or to determine compliance with this Discharge Permit. The permittee shall also furnish to NMED, upon request, copies of documents required to be kept by this Discharge Permit. [20.6.2.3107.D NMAC, NMSA 1978, 74-6-9 (B) & (E)]

# D104 General Sampling and Analytical Methods

- A. Unless otherwise approved in writing by NMED, the permittee shall conduct sampling and analysis in accordance with the most recent edition of the following documents [Subsection B of 20.6.2.3107 NMAC]:
  - 1. American Public Health Association, Standard Methods for the Examination of Water and Wastewater (18<sup>th</sup>, 19<sup>th</sup>, or current)
  - 2. U.S. Environmental Protection Agency, Methods for Chemical Analysis of Water and Waste, and other publications of the analytical quality laboratory, EPA.
  - 3. U.S. Geological Survey, Techniques for Water Resources Investigations of the U.S. Geological Survey
  - American Society for Testing and Materials, Annual Book of ASTM Standards, Part 31. Water
  - 5. U.S. Geological Survey, et al., National Handbook of Recommended Methods for Water Data Acquisition

- 6. Federal Register, latest methods published for monitoring pursuant to Resource Conservation and Recovery Act regulations
- Methods of Soil Analysis: Part 1. Physical and Mineralogical Methods; Part 2. Microbiological and Biochemical Properties; Part 3. Chemical Methods, American Society of Agronomy

## D105 Monitoring Well Abandonment

- A. The permittee shall submit a written request for NMED approval to amend or modify this Discharge Permit at least 30 days prior to the anticipated destruction or removal of any monitoring wells required by this Discharge Permit. After the permittee receives NMED approval, monitoring well plugging and abandonment shall be completed in accordance with the *Ground Water Discharge Permit Monitoring Well Construction and Abandonment Conditions*, Revision 1.1, March 2011, or according to regulations issued by the Office of the State Engineer in 19.27.7 NMAC, unless an alternate method is approved by NMED. [20.6.2.3107 NMAC]
- B. The request required in D105.A shall include the following information:
  - 1. A scaled map showing the location of the monitoring well(s) and the mine units it is intended to monitor;
  - 2. The purpose for plugging and abandoning the monitoring well(s);
  - 3. Details, if available, on the monitoring well(s), including depth-to-water elevation, top-of-casing elevation, construction and lithologic logs;
  - 4. Groundwater analytical results from a minimum of the most recent eight sampling events from the monitoring well(s);
  - 5. Proposed replacement well(s), if applicable;
  - 6. For any proposed replacement monitoring well(s), the same details of the proposed replacement monitoring well(s)as provided in D105.B.1, D105.B.3, and D105.B.4; and
  - 7. New replacement wells require monitoring well completion reports pursuant to Subsection K of 20.6.7.28 NMAC.

# D106 Reporting Requirements for Unauthorized Discharges

A. In the event of a spill or release that is not authorized under this Discharge Permit, the permittee shall initiate the notifications and corrective actions as required in

20.6.2.1203 NMAC. The permittee shall take immediate corrective action to contain and remove or mitigate any damage caused by the discharge. Within 24 hours after discovery of the discharge, the permittee shall verbally notify NMED and provide the information required by Paragraph (1) of 20.6.2.1203.A NMAC, and to determine applicable monitoring and reporting requirements pursuant to Paragraphs (2) and (3) of 20.6.7.29.B NMAC. Within 7 days of discovery of a discharge reportable under 20.6.2.1203 NMAC, the permittee shall submit a written report to NMED verifying the oral notification and providing any additional information or changes. The permittee shall submit a corrective action report within 15 days after discovery of the discharge. [20.6.2.1203 NMAC]

B. As part of the 24-hour spill notification requirements, the permittee shall submit a figure to NMED that clearly displays the location (or locations) of the spill and identifies nearby mine units and/or location information in latitude/longitude coordinates in decimal degrees (XX.XXXXXX and –XXX.XXXXX, respectively), using a specified datum of WGS 84. Submittal of location information in Universal Transverse Mercator (UTM) format is also acceptable.

## D107 Modifications and Amendments

- A. The permittee shall notify and obtain approval from NMED of a proposed change to the facility or the facility's discharge that would result in a change in the volume discharged; the location of the discharge; or in the amount or character of water contaminants received, treated or discharged by the facility, prior to implementing such changes. Such changes may require modification or amendment to this Discharge Permit, including payment of applicable fees as specified in Section 20.6.7.9 NMAC. [20.6.2.3107.C NMAC, 20.6.2.3109.E NMAC, 20.6.7.7.B(19) NMAC, 20.6.7.14 NMAC]
- B. As determined by NMED, for any proposed change that would meet the definition of a discharge permit modification as specified in Paragraph P of 20.6.2.7 NMAC, the permittee shall submit for NMED approval an application for modification of this Discharge Permit pursuant to Sections 20.6.7.10 NMAC and 20.6.7.11 NMAC. Plans and specifications shall be included in the requests as applicable, pursuant to Section 20.6.7.17 NMAC.
- C. As determined by NMED, for any proposed change that meets the definition of a discharge permit amendment as specified in Paragraph 19 of 20.6.7.7.B NMAC, the permittee shall submit a request to NMED for amendment of this Discharge Permit

pursuant to Section 20.6.7.14 NMAC. Plans and specifications shall be included in the requests as applicable, pursuant to Section 20.6.7.17 NMAC.

D. Pursuant to Section 20.6.2.3109 NMAC, NMED reserves the right to require a discharge permit modification or amendment in the event NMED determines that the requirements of 20.6.2 NMAC are being or may be violated, or the standards of Section 20.6.2.3103 NMAC are being or may be violated. This may include a determination that structural controls and/or management practices approved under this Discharge Permit are not protective of groundwater quality, and that more stringent requirements are needed to protect groundwater quality.

## D108 Compliance with Other Laws

A. Nothing in this Discharge Permit shall be construed in any way as relieving the permittee of the obligation to comply with all applicable federal, state, and local laws, regulations, permits or orders. [20.6.2 NMAC, 20.6.7.8(D) NMAC]



Мо	Monitoring Report Schedule of Submittal (Subsection A of 20.6.7.29 NMAC)								
1	January 1 through June 30 (first and second quarter sample periods) – Semi-annual report due by								
	-	of each year							
2	July 1 thro	ough December 31 (third and fourth quarter sample periods) – Semi-annual report due							
	by February 28 of each year								
3	3 Annual reports due by February 28 of each year								
Rep	oorting Sum	nmary							
Anr	nual	Number of	Description						
Rep	oorting	Sites							
	quency								
2		NA						ons A through C and E	
			through	H of 2	0.6.7.29 1	IMAC			
Мо	nitoring Sc		1					1	
Are	а	Designation			Samplin	g		Notes	
			type	Q1	Q2	Q3	Q4		
DP-	896	896-2010-01	mw		ABCW		ABCW	Perched Groundwater	
		896-2010-02	mw		ABCW		ABCW	Perched Groundwater	
		896-2010-03	mw		ABCW		ABCW	Perched Groundwater	
		896-2010-04	mw		ABCW		ABCW	Perched Groundwater	
		896 Trench 5	ct		ABCW		ABCW	Collection Trench	
		MB-34	mw		ABCW		ABCW	Perched Groundwater	
		MB-40	mw		ABCW		ABCW	Perched Groundwater	
		896-2005-01	mw		ABCW		ABCW	Regional Groundwater	
		896-2016-01	mw		ABCW		ABCW	Regional Groundwater	
		896-2007-AST	tnk		ABC		ABC	Tank	
Flo	w Meters	53	1 AST T	ank to	the 1B P	LS Tan	k		
			OGBKA	Collec	tion Syste	em to	1 AST Tan	k	
		<u>ytical Suites:</u>							
				eters:	temperat	ure, p	H, specifio	c conductance (μs/cm),	
	-	tal dissolved solid							
					lkalinity-o	arbon	ate, alkali	nity-total, calcium, chloride,	
	-	esium, potassium							
		minum, arsenic, o	admiun,	chrom	iun, coba	lt, cop	per, iron,	lead, manganese, nickel and	
zino									
	asurements		0++0++-	00000	+ 0 01 f-	<b>.</b> +			
	-	water measureme			ST U.UI TO	Jt			
-		Abbreviations a	ia symbo	15		C			
<u>Type</u> : mw = monitoring well					Sampling Quarter:				
sp = seep					Q1 = Jan-Mar				
tnk = tank						Q2 = Apr-Jun			
ct = collection trench						Q3 = Jul-Sep Q4 = Oct-Dec			

Table 1 – DP-896 Monitoring and Reporting Summary



