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CERTIFIED MAIL – RETURN RECEIPT REQUESTED

December 8, 2023

Randy B. Ellison, General Manager
Freeport-McMoRan Chino Mines Company
P.O. Box 10
Bayard, NM 88023

RE: Draft Discharge Permit Renewal and Modification; DP-459, Santa Rita Open Pit Area, Freeport-McMoRan Chino Mines Company

Dear Randy Ellison:

Notice is hereby given pursuant to Subsection H of 20.6.2.3108 NMAC that the Ground Water Discharge Permit Renewal and Modification of the existing Discharge Permit 459 (DP-459) for the Freeport-McMoRan Chino Mine Company (Applicant) Santa Rita Open Pit Area has been proposed for approval (copy enclosed). The New Mexico Environment Department (NMED) Ground Water Quality Bureau (GWQB) will publish notice of the availability of the draft Discharge Permit Renewal and Modification in the near future and will forward a copy of the notice to you. The Application for Discharge Permit Renewal and Modification of DP-459 was deemed technically complete on August 28, 2023.

Prior to making a final ruling on the proposed DP-459 Discharge Permit Renewal and Modification, NMED will allow 30 days from the date the public notice is published, during which time written comments can be submitted or a public hearing requested. Comments and/or request for a public hearing may be submitted by any interested person or the Applicant. Written comments or hearing requests may be submitted to the GWQB either by utilizing the SmartComment portal at <https://nmed.commentinput.com/comment/search> or by email to jordan.anderson@env.nm.gov or mecs.general@env.nm.gov. Hearing requests shall set forth the reasons why a hearing should be held. A hearing will be held only if hearing requests are received from the public or the Applicant during the 30-day comment period and NMED determines there is substantial public interest regarding the proposed DP-459 Discharge Permit Renewal and Modification. Hearings are presided over by the NMED Secretary, or a hearing officer appointed by the Secretary.

NMED has imposed additional conditions on the Renewal and Modification of DP-459 that are not requirements of the Copper Mine Rule (20.6.7 NMAC), and are not conditions that can be pulled forward from the existing DP-459 or DP-1568 in accordance with Paragraph (2) of 20.6.7.20.B NMAC (leach stockpiles), Paragraph (2) of 20.6.7.21.C NMAC (waste rock stockpiles), Paragraph (2) of 20.6.7.22.B NMAC (copper crushing, milling, concentrator, smelting and tailing impoundments), and Paragraph (2) of 20.6.7.23.B NMAC (pipelines and tanks). Pursuant to Subsection I of 20.6.7.10 NMAC, NMED is providing the following written explanations of the reasons for the additional conditions.

1. Condition C103.C – The reason for this condition is to minimize the potential for impacted stormwater from Reservoir 5 South to seep into groundwater.
2. Condition C103.D.1 – The reason for this condition is to require the Applicant to relocate waste rock located adjacent to the Highway 152 easement to prevent stormwater from discharging beyond the fenced perimeter of the operational area.
3. Condition C103.E – The reason for this condition is to require that the Applicant dewater Reservoir 9, in accordance with the Discharge Plan, prior to placement of waste rock material in the permitted footprint of the 9 Waste Rock Stockpile.
4. Condition C108.D (also see C100.B, C105.A, and C108.I) – The reason for this condition is to require that the Applicant combine three separate water management plans required by the Copper Mine Rule into one comprehensive sitewide plan (“Sitewide Water Management Plan”) that meets the requirements of Paragraph (4) of 23 20.6.7.17.C NMAC (Stormwater Management Plan), Subsection C of 20.6.7.24 NMAC (Mine Operation Water Management Plan), and Subsection K of 20.6.7.30 NMAC (Interim Emergency Water Management Plan).
5. Condition C108.E – The reason for this condition is to require that the Applicant provide annual updates to the North Mine Area Master Document so that multiple versions of the document are not necessary for each discharge permit renewal in technical review.
6. Condition C108.E.1 – The reason for this condition is to require the Applicant provide an updated, singular geologic map that covers the area within a one-mile radius of the North Mine Area. The current geologic map provided in the North Mine Area Master Document was published in 1964, does not cover a one-mile radius around the North Mine Area, and does not accurately represent current conditions in the North Mine Area.
7. Condition C108.G.4 – The reason for this condition is to update the reporting requirements for transducer groundwater level data from monitoring wells equipped

with transducers so that the data is available with groundwater data in semi-annual monitoring reports.

8. Condition C109.E – The reason for this condition is to ensure that contingency plans and schedules are provided should an unforeseen circumstance occur that may have the potential to directly or indirectly impact groundwater quality. This condition is intentionally broad to cover an event or situation not foreseen or covered by Section 20.6.7.30 NMAC that may have the potential to impact groundwater quality.
9. Condition D105.A – The reason for this condition is to ensure that the Applicant submits proper notification prior to destruction or removal of any monitoring wells required under DP-459.
10. Condition D105.B – The reason for this condition is to ensure that the Applicant submits consistent information supporting requests to plug and abandon monitoring wells.
11. Condition D106.A – The reason for this condition is to ensure that the Applicant submits consistent and accurate location information in the event that an unauthorized discharge occurs.
12. Condition D106.B – The reason for this condition is to ensure that the Applicant properly notifies NMED in the event of any and all unauthorized discharges so that a determination of applicable reporting requirements can be made pursuant to Section 20.6.7 NMAC.
13. Condition D107.D – The reason for this condition is to assert NMED authority to require that the permittee amend or modify DP-459 should NMED determine that the requirements of 20.6.2 NMAC are being or may be violated or the water quality standards of Section 20.6.2.3103 NMAC are being or may be violated.

Please review the enclosed draft DP-459 Discharge Permit Renewal and Modification carefully for accuracy and completeness, and to make sure you understand what it requires. Please be aware that the proposed DP-459 Discharge Permit Renewal and Modification may contain conditions that require the Applicant to implement operational, monitoring, or closure actions by a specified deadline.

The Water Quality Control Commission (WQCC) Regulations, 20.6.2 NMAC and 20.6.7 NMAC, are available online at <https://www.env.nm.gov/gwqb/gw-regulations>.

Any comments relating to this draft DP-459 Discharge Permit Renewal and Modification can be sent through the SmartComment portal at <https://nmed.commentinput.com/comment/search> or by email to jordan.anderson@env.nm.gov or mecs.general@env.nm.gov. If written comments or a written request for a hearing are not received during the public comment period, the draft DP-459 Discharge Permit Renewal and Modification will become final. Thank you for your cooperation during the review process.

Sincerely,

Jordan Anderson
Mining Environmental Compliance Section
Ground Water Quality Bureau
New Mexico Environment Department

Enclosures: Draft Discharge Permit Renewal and Modification, DP-459

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

Certified Mail No:
Return Receipt Requested

Mine Facility Name: Santa Rita Open Pit Area

GWQB Discharge Permit No.: DP-459
GWQB TEMPO AI No.: 526

Permittee Name/Responsible Party: Freeport-McMoRan Chino Mines Company
Mailing Address: P.O. Box 10
Bayard, NM 88023

Mine Facility Contact: Sherry Burt-Kested; (575) 912-5927
Mine Facility Location: 99 Santa Rita Mine Road
Vanadium, NM 88023

County: Grant County

Permitting Action: Renewal and Modification
Effective Date: DRAFT
Expiration Date: DRAFT

NMED Permit Contact: Jordan Anderson; (505) 660-8908
E-mail Address: jordan.anderson@env.nm.gov
Or: mecs.general@env.nm.gov

Justin Ball, Chief
Ground Water Quality Bureau

Date

draft

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TABLE OF CONTENTS

Part A	GENERAL INFORMATION.....	1
A100	Introduction.....	1
A101	Applicable Regulations.....	1
A102	Permit Duration.....	2
A103	Terms of Permit Issuance.....	2
Part B	FACILITY SPECIFIC INFORMATION.....	3
B100	History and Facility Description.....	3
B101	Permit Modification.....	5
B102	Permitting History.....	5
B103	Facility Location, Groundwater, and Process Water Characteristics.....	6
B104	Authorized Mine Units.....	6
B105	Authorized Discharges.....	10
Part C	FACILITY SPECIFIC REQUIREMENTS.....	12
C100	Santa Rita Open Pit.....	12
C101	Leach Stockpiles.....	12
C102	Waste Rock Stockpiles.....	13
C103	Impoundments.....	13
C104	Sumps, Tanks, Pipelines, and Other Containment Systems.....	14
C105	Stormwater Management.....	14
C106	Dust Suppression.....	15
C107	Flow Measurement.....	15
C108	Monitoring and Reporting.....	15
C109	Contingency Plan.....	19
C110	Closure Plan.....	20
Part D	GENERAL CONDITIONS.....	20
D100	Enforcement.....	20
D101	General Inspection and Entry Requirements.....	21
D102	General Operational Requirements.....	21
D103	General Record Keeping and Reporting Requirements.....	22
D104	General Sampling and Analytical Methods.....	22
D105	Monitoring Well Abandonment.....	22
D106	Reporting Requirements for Unauthorized Discharges.....	23
D107	Modifications and Amendments.....	23
D108	Compliance with Other Laws.....	24

LIST OF TABLES AND FIGURES

Table 1 – Monitoring and Reporting Summary for DP-459 25
Figure 1 – DP-459 Monitoring and Reporting Sample Locations27
Figure 2 – Authorized DP-459 Mine Unit Footprints28
Figure 3 – Authorized Santa Rita Open Pit 29

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Part A GENERAL INFORMATION

A100 Introduction

- A. The New Mexico Environment Department (NMED) issues this Ground Water Discharge Permit Renewal and Modification, DP-459 (Discharge Permit) to Freeport-McMoRan Chino Mines Company (Permittee) pursuant to the New Mexico Water Quality Act (WQA), NMSA 1978, §§ 74-6-1 through 74-6-17, and the New Mexico Water Quality Control Commission (WQCC) Regulations, Part 20.6.2 (Ground and Surface Water Protection) and Part 20.6.7 NMAC Ground Water Protection – Supplemental Permitting Requirements for Copper Mine Facilities (the Copper Mine Rule). NMED is issuing this Discharge Permit to control the discharge of water contaminants from the Santa Rita Open Pit; North In-Pit Leach Stockpile; 9, East In-Pit Road, South In-Pit Road, 3A, Highway to Heaven, Northeast, North, Northwest, and Lee Hill Waste Rock Stockpiles; Rustler Canyon Containment; Reservoir 5 and Reservoir 9; 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 discharge up to 7,128,000 gallons per day (GPD) of acidic leach solution (raffinate) to the North In-Pit Leach Stockpile for the purpose of leaching copper. This discharge may move directly or indirectly into groundwater of the State of New Mexico which 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 water quality 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 Part 20.6.7 NMAC apply to discharges specific to copper mine facilities and their operations.
- B. The discharges from the facilities regulated pursuant to this Discharge Permit are not subject to any of the exemptions of Section 20.6.2.3105 NMAC except as provided in Condition B104.D.

- C. Groundwater quality as observed in monitoring wells required by Condition C108.G of this Discharge Permit and consistent with Subsection B of 20.6.7.28 NMAC 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 to NMSA 1978 § 74-6-5(l) and Subsection H of 20.6.2.3109 NMAC, the term of this Discharge Permit Renewal and Modification is **five (5) years** from the effective date.
- B. If the Permittee submits an application for renewal in accordance with Subsection G of 20.6.2.3106 NMAC, and the Permittee is not in violation of the discharge permit on the date of its expiration; then the existing discharge permit shall not expire until NMED approves or disapproves the application for renewal.

A103 Terms of Permit Issuance

- A. **Permit Fees** – As a discharge permit associated with Freeport-McMoRan Chino Mines Company, 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 Chino Mines Company. [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 pursuant to WQA 74-6-5: Condition C103.C, Condition C103.D.1, Condition C103.E, Condition C108.D, Condition C108.E, Condition C108.E.1, Condition C108.G.4, Condition C109.E, Condition D105.A, Condition D105.B, Condition D106.A, Condition D106.B and Condition D107.D.

Part B FACILITY SPECIFIC INFORMATION

B100 History and Facility Description

- A. The Chino Mine is an open pit copper mine facility owned by Freeport-McMoRan Chino Mines Company which covers an area of approximately 35,000 acres. The Chino Mine consists of the Santa Rita Open Pit, associated waste rock and leach stockpiles, collection systems, a solution extraction and electrowinning (SX/EW) plant, a concentrator and associated mineral processing units, an active tailing impoundment, and reclaimed mine units. The mine is regulated pursuant to multiple operational Ground Water Discharge Permits, a supplemental discharge permit for closure, and an abatement plan.
- B. The mine units regulated pursuant to the DP-459 that produce discharges that may move directly or indirectly into groundwater include the Santa Rita Open Pit; the North In-Pit Leach Stockpile; 9, East In-Pit Road, South In-Pit Road, 3A, Highway to Heaven, Northeast, North, Northwest, and Lee Hill Waste Rock Stockpiles; Rustler Canyon Containment and Reservoir 5. The Santa Rita Open Pit includes the Estrella, East, South, and Lee Hill Sub-pits. The associated infrastructure includes reservoirs, impoundments, pregnant leach solution (PLS) collection units, sumps, tanks, booster stations and pipelines. DP-459 currently covers approximately 2,474 acres.
- C. Stockpiling of waste rock on the Northeast Waste Rock Stockpile commenced in 1969. Stockpiling of waste rock on the 3A Waste Rock Stockpile commenced in 2017.
- D. The North In-Pit Leach Stockpile receives ore for leaching from the Santa Rita Open Pit and Continental Mine. Stockpiling of leach ore on the North In-Pit Leach Stockpile, application of raffinate, and collection of PLS to recover copper commenced in 1986. The stockpile is leached through the application of raffinate to the top and side surfaces. Raffinate removes metals from the mined ore as it passes through the stockpile. PLS, which has a TDS concentration up to approximately 194,000 mg/L, is collected at the base of the stockpile in the 5900 PLS Sump and associated French drain collection system. The PLS is then conveyed by pipelines to the SX/EW Plant for copper cathode production using an electrolytic procedure.
- E. Stockpiling of waste rock on the Lee Hill Waste Rock Stockpile commenced in 1998. NMED required a modification of DP-459 to incorporate the Lee Hill Stockpile in March 2003. Phelps Dodge Corporation submitted a renewal and modification request in March 2003 for DP-459 which included incorporation of the Lee Hill Waste Rock Stockpile plus a plan to expand and leach the stockpile. NMED denied the modification on the grounds that Lee Hill Stockpile had significantly deteriorated water quality in the Lee Hill Pit and required the Permittee to obtain a variance from the requirements of Section 20.6.2.3109.C(1), C(2), and H(3) NMAC in order to construct the Lee Hill Leach Stockpile. The variance was issued by the WQCC on June 12,

2007. The variance is no longer necessary pursuant to Section D of 20.6.7.24 NMAC which states, "During operation of an open pit, the standards of 20.6.2.3103 NMAC do not apply within the area of open pit hydrologic containment."

- F. PLS from the North In-Pit Leach Stockpile and other regulated leach stockpiles (DP-526 and DP-376) and waste rock stockpiles proximal to the Santa Rita Open Pit, and process water, impacted stormwater and groundwater collects in the Santa Rita Open Pit bottom. These facilities are all located within the Area of Open Pit Hydrologic Containment as defined by existing monitoring wells (Paragraph 5 of Section 20.6.7.7.B NMAC).
- G. Process water, impacted stormwater, and groundwater collected in the Santa Rita Open Pit is pumped back into the process water and/or leaching circuit through the 6525 Raffinate Tank (DP-526), Reservoir 7 (DP-591), the PLS Feed Pond (DP-591) or the Raffinate Tanks (DP-591) using the Santa Rita Open Pit dewatering system.
- H. Reservoir 5 North collects stormwater from the Santa Rita Creek watershed and is part of the Chino North Mine Area (NMA) stormwater management system. Reservoir 5 South collects stormwater impacted by portions of the Reservoir 5 area that contain acid-generating materials which have impacted groundwater.
- I. The 3A Waste Rock Stockpile is located at the site of former Reservoir 3A. Reservoir 3A was a process water impoundment regulated pursuant to DP-493. The Permittee ceased discharging to Reservoir 3A and began dewatering in early 2015. The process water that was formerly discharged to Reservoir 3A is now discharged to permitted leach stockpiles. Dewatering of Reservoir 3A was completed by April 1, 2015. Placement of waste rock over the basal layer commenced in February 2017.
- J. Reservoir 9 has a capacity of approximately 15 million gallons and is formed by an earthen dam located along the southeast toe of the Upper South Stockpile. It receives impacted stormwater runoff from the south side of the dam face, areas to the south of the reservoir, and collected seepage water from the Highway to Heaven Waste Rock Stockpile. The June 5, 2019 DP-459 Modification authorized decommissioning of the reservoir to facilitate construction of 9 Waste Rock Stockpile.
- K. Highway to Heaven is a waste rock stockpile constructed during the mid-to-late 1990s and is located in the headwaters of Rustler Canyon and the drainage containing Reservoir 9. A majority of the sulfide-containing rock was removed from the Highway to Heaven in Rustler Canyon and placed on the South Stockpile. In addition, stormwater controls were put in place to prevent runoff and minimize stormwater contact with the remaining sulfide-containing rock.

- L. Construction of the East In-Pit Road and South In-Pit Road Waste Rock Stockpiles will infill a portion of the Santa Rita Open Pit and create 46 acres of top surface which will be reclaimed at mine closure pursuant to DP-1340 and the Copper Mine Rule.
- M. Water from the Lampbright Tank, Island Queue Tank, Café Queue Tank, South Side Tank, and Frog Pond, located at various locations at the Chino NMA, is used for dust suppression on mine haul roads within the Santa Rita Open Pit and on adjacent stockpiles. Water is supplied from various sources including the Star Shaft, Oswaldo Shaft, Princess Shaft, Bullfrog Shaft, LB East wells north of the Lampbright Leach Stockpile, Reservoir 5 South, 700R and 593 potable supply wells near Reservoir 5 North, Chino Tailing Pond 7 decant water, and pit wall dewatering wells within the Santa Rita Open Pit. Water from the Bullfrog Shaft and the Continental Mine is delivered via the Bullfrog Pipeline. Water quality data for these various sources is currently being reported pursuant to applicable Chino and Continental Mine operational discharge permits, including DP-181, DP-376, DP-459, DP-484, and DP-526. The haul roads that water is applied to for dust control typically are constructed with mined rock that has acid-generating potential and are within demonstrated areas of ground and surface water capture. Dust suppression is a necessary action to meet air quality requirements and is not expected to result in a net impact to ground or surface water quality impairments within these heavily impacted and active mine areas.

B101 Permit Modification

- A. The modification of DP-459 consists of incorporating the mine units permitted pursuant to DP-1568 into DP-459, including the Lee Hill Waste Rock Stockpile. DP-1568, dated September 17, 2007, included authorization to convert the Lee Hill Waste Rock Stockpile to a leach stockpile and apply raffinate at a rate of up to 22,000,000 GPD.

B102 Permitting History

- A. The Discharge Plan for DP-459 includes the Discharge Permit Renewal and Modification Application dated March 23, 2022, request for additional information response correspondences from the Permittee dated December 16, 2022, and April 28, 2023, and materials contained in the administrative record prior to issuance of this Discharge Permit. The Permittee provided a document dated April 2023 referred to as the Chino North Mine Area (NMA) Master Document (NMA Master Document) which addresses Copper Mine Rule application requirements and is applicable to all the Permittee's discharge permits in the NMA, including DP-459. In addition, the Discharge Plan includes information and materials submitted as part of the original plan approved on April 23, 1987, renewed on April 6, 1992, December 18, 1998, July 10, 2011, and December 18, 2017; renewed and modified on June 15, 2005; modified on June 8, 2016 and June 5, 2019; and amended on July 2, 2003, August

28, 2003, November 12, 2003, April 26, 2010, January 12, 2011, June 22, 2012, October 10, 2014, April 28, 2015, April 30, 2019, and September 1, 2020.

B103 Facility Location, Groundwater, and Process Water Characteristics

- A. The mine units regulated pursuant DP-459 are located at 99 Santa Rita Mine Road, Vanadium, approximately 3 miles northeast of Bayard and 2 miles southeast of Hanover in Sections 23, 26-28, 33-35, T17S, R12W, and Sections 2, 3 and 10, T18S, R12W, Grant County.
- B. Groundwater beneath the mine units regulated pursuant to DP-459 is at a depth of approximately 22 to 276 feet and had a pre-discharge TDS concentration of approximately 220 mg/L.
- C. The Santa Rita Open Pit walls, the North In-Pit Leach Stockpile, 9, East In-Pit Road, South In-Pit Road, 3A, Highway to Heaven, Northeast, North, Northwest, and Lee Hill Waste Rock Stockpiles, and portions of the Reservoir 5 area contain sulfide minerals which, when oxidized, generate acidic solutions. These acidic solutions react with in situ minerals to produce acid rock drainage (ARD).
- D. Process water and impacted stormwater discharges regulated pursuant to DP-459, including raffinate, PLS, and ARD exceed water quality standards of Section 20.6.2.3103 NMAC for aluminum, cadmium, chloride, chromium, cobalt, copper, fluoride, iron, lead, manganese, nickel, selenium, sulfate, TDS, and zinc, and is outside the acceptable range for pH.
- E. Water quality of sources used for dust control typically exceed the water quality standards of Section 20.6.2.3103 NMAC for TDS, sulfate, iron, and manganese, and intermittently exceed Section 20.6.2.3103 NMAC water quality standards for pH, cobalt, fluoride, and selenium.

B104 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 inside the Open Pit Surface Drainage Area (OPSDA) as defined by Section 20.6.7.7 NMAC, unless otherwise noted. Authorized mine units are displayed on Figure 2.

- A. Open Pit
 - 1. The Santa Rita Open Pit includes the Estrella, East, South, and Lee Hill Sub-pits and is approximately 2.2 miles in greatest diameter and approximately 0.30 miles deep (from 6600 to 5050 feet above mean sea level).

B. Leach Stockpiles

1. The North In-Pit Leach Stockpile – The North In-Pit Leach Stockpile is situated along the northern rim high wall of the Santa Rita Open Pit and extends down into the East and Lee Hill Sub-pits. The current footprint is contiguous with the North Waste Rock Stockpile, and both cover approximately 141 acres. The permitted footprint of both stockpiles is 184 acres. PLS is collected at the base of the stockpile in the synthetically lined 5900 PLS Sump and associated French drain collection system.

C. Waste Rock Stockpiles

1. 9 Waste Rock Stockpile – The 9 Waste Rock Stockpile will be located along the southern margin of the Santa Rita Open Pit in the closed surface water drainage that contains Reservoir 9. The permitted footprint of the stockpile will be approximately 159 acres upon full build out. The 9 Waste Rock Stockpile meets the definition of a “new waste rock stockpile” subject to the requirements of Paragraph (1) of 20.6.7.21.C NMAC.
2. Highway to Heaven Waste Rock Stockpile – The Highway to Heaven Waste Rock Stockpile is located in both the headwaters of Rustler Canyon and the drainage containing Reservoir 9. The portion of the waste rock stockpile that extends into Rustler Canyon is located outside the OPSDA. The permitted footprint of the stockpile is approximately 52 acres as shown in Figure 2.
3. East In-Pit Road Waste Rock Stockpile – The East In-Pit Road Stockpile will occupy the bottom portion of the East Pit and will have a 7-acre top surface upon full build-out.
4. South In-Pit Road Waste Rock Stockpile – The South In-Pit Road Waste Rock Stockpile will occupy the bottom portion of the South Pit and will have a 39-acre top surface upon full build-out.
5. 3A Waste Rock Stockpile – The 3A Waste Rock Stockpile is located in the drainage that formerly contained Reservoir 3A. The permitted footprint of the stockpile is approximately 210 acres.
6. Northeast Waste Rock Stockpile – The Northeast Waste Rock Stockpile is located west of the SX/EW Plant and south of Reservoir 5. The current permitted footprint covers approximately 77 acres.
7. North Waste Rock Stockpile – The North Waste Rock Stockpile is located north of and contiguous with the North In-Pit Leach Stockpile. The current and permitted footprint of both stockpiles is show in Figure 2..

8. Northwest Waste Rock Stockpile – The Northwest Waste Rock Stockpile is located north of the Lee Hill Sub-pit. The permitted footprint of the stockpile is approximately 20 acres, and the current footprint covers approximately 10 acres.
9. Oxide Ore Staging Area – The Oxide Ore Staging Area is located on top of the former equipment laydown yard along the east high wall of the East Sub-pit and south of the Whitehouse Waste Rock Stockpile. The permitted footprint of the staging area is approximately 30 acres. The staging area is used to temporarily stage ore prior to placement on the Lampbright Leach Stockpiles which are regulated pursuant to DP-376.
10. Lee Hill Waste Rock Stockpile – The Lee Hill Waste Rock Stockpile is located within the Lee Hill Sub-pit. The permitted footprint of the stockpile is approximately 140 acres.
 - a. The Permittee is not authorized to convert Lee Hill Waste Rock Stockpile into a leach stockpile or apply raffinate to the stockpile.

D. Conditionally Exempt Waste Rock Stockpile

1. The Whitehouse Waste Rock Stockpile – The Whitehouse Waste Rock Stockpile is located along the east high wall of the Santa Rita Open Pit south of Reservoir 7 and north of the Oxide Ore Staging Area. It is underlain by sulfide-containing rock. The Whitehouse Waste Rock Stockpile is composed of un-mineralized volcanic waste rock proposed for use as reclamation cover material. The upper portion of this stockpile is authorized for storage of reclamation cover material on condition that the Permittee adheres to the approved material characterization and handling plan to ensure the conditionally exempt status as a stockpile that does not generate water contaminants.

E. Impoundments

1. Reservoir 5 – Reservoir 5 includes two un-lined reservoirs separated by an earthen dam located north of Northeast Waste Rock Stockpile. The permitted footprint of both reservoirs is approximately 52 acres.
 - b. Reservoir 5 North – Reservoir 5 North captures non-impacted stormwater from the Santa Rita Creek watershed to the north. The capacity of Reservoir 5 North is 86,350,628 gallons. Overflow from Reservoir 5 North reports to Reservoir 5 South.
 - c. Reservoir 5 South – Reservoir 5 South captures impacted stormwater and overflow from Reservoir 5 North. The capacity of Reservoir 5 South is 5,474,304 gallons. The reservoir receives stormwater from two diversion channels, one diversion channel diverts impacted stormwater generated from historic waste rock stockpiles north of Highway 152, and the second diverts non-impacted stormwater from the Reservoir 6 watershed. Stormwater collected in Reservoir 5 South is pumped to either Reservoir

7, Reservoir 6, or the Café Queue Tank by a vertical barge pump with a pumping capacity of 1,000 gallons per minute (GPM). Overflow from Reservoir 5 South reports to Reservoir 6 via a concrete-lined channel that runs below Highway 152.

2. Reservoir 9 – Reservoir 9 is an earthen dam located south of Santa Rita Open Pit and east of the 3A Waste Rock Stockpile. The reservoir has a capacity of approximately 15,000,000 gallons. The reservoir receives impacted stormwater from the Highway to Heaven Waste Rock Stockpile and the south side of the dam face as well as solution from the Rustler Canyon Containment. Solutions from Reservoir 9 are pumped to Reservoir 7.

F. Sumps, Tanks, Pipelines and Other Containment Systems

1. 5400 Sump – The 5400 sump is an 80-mil HDPE lined sump located in the Lee Hill Sub-pit with a capacity of 237,871 gallons. The sump receives solution from Lee Hill Sub-pit and pumps solution to the Estrella Sub-pit by diesel pumps. The purpose of the sump is to prevent seepage into the Lee Hill Sub-pit during mining operations.
2. 5900 PLS Sump – The 5900 PLS Sump is a two-celled HDPE-lined sump equipped with a French drain solution containment system located at the base of the North In-Pit Leach Stockpile. The sump has a capacity of 499,989 gallons and collects PLS from the North In-Pit Leach Stockpile. Solution from the sump is pumped to the 6250 Booster Tank.
3. 6250 Booster Tank – The 6250 Booster Tank is a stainless steel tank that replaced the 6300 PLS Booster Station and is used to transfer PLS from the 5900 PLS Sump to Reservoir 7 or the SX/EW Plant. The tank has a capacity of 16,900 gallons.
4. Dust Suppression Tanks – The tanks and spouts used for NMA dust suppression located within the DP-459 permit area include the 37,448-gallon capacity carbon-steel Island Queue Tank and associated Island Queue Spout, and two 126,386-gallon capacity carbon-steel Café Queue Tanks and associated Café Queue Spout. The remaining water sources and spouts are located in areas regulated by other discharge permits.
5. Santa Rita Open Pit dewatering system – The Santa Rita Open Pit dewatering system includes four 9,600-gallon booster tanks (Estrella Boosters #1 - #4) equipped with pumps. Solutions from the Estrella Boosters are pumped to either Reservoir 7, or the SX/EW plant.
6. Rustler Canyon Containment System (RCCS) – The RCCS consists of a 100-mil HDPE-lined containment pond located in the Rustler Canyon outside of the OPSDA and has a capacity of 1.3 million gallons. The containment collects impacted stormwater runoff and leachate from the Highway to Heaven Waste Rock Stockpile. There is one vertical pump with a capacity of 2,000 GPM, and one horizontal submersible pump with a capacity of 100 GPM mounted above a concrete sump on the north end of the RCCS and two HDPE discharge

pipes, each equipped with a flow meter. The pumps remove solutions collected in the containment within 24 to 48 hours of a storm event. This ensures the containment will be empty under normal operating conditions. The seepage interceptor system consists of a 1-foot vertical by 2-foot horizontal trench with a perforated HDPE pipe that has been backfilled with aggregate. The perforated pipe then ties into a concrete anti-seep collar and transitions to a non-perforated HDPE pipe that gravity flows into a 500-gallon polyethylene tank. The 500-gallon tank includes a submersible pump that discharges back into the RCCS. Solution from the RCCS is pumped to either Reservoir 6, Reservoir 7, Reservoir 9, or the Santa Rita Open Pit.

7. Pipelines – Pipelines serving the DP-459 mine units, including the pit dewatering, and seepage collection trench pipelines, consist of HDPE and stainless-steel material and range in size from 6 inches or less in diameter to greater than 16 inches in diameter. The pipelines are described in Table 7 and Figure 4 of the NMA Master Document.

G. 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-459 are described in Table 1 of this Discharge Permit as well as Table 9 and Figure 6 of the NMA Master Document.

B105 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. [20.6.2.3109 NMAC]

- A. The Permittee is authorized to discharge up to 7,128,000 GPD of raffinate to the North In-Pit Leach Stockpile for the purpose of leaching copper. [20.6.2.3109 NMAC]
- B. The Permittee is authorized to operate the synthetically lined 5900 PLS Sump and the 6250 PLS Booster Tank to collect and pump PLS from the North In-Pit leach Stockpile to Reservoir 7 or the SX/EW plant (DP-591). [20.6.2.3109 NMAC]
- C. The Permittee is authorized to remove accumulated sediment from the 5900 PLS Sump as necessary to maintain sump capacity. Sediments are dewatered on an adjacent bermed haul road. Dewatered sediments are authorized to be placed on permitted leach or waste rock stockpiles.
- D. The Permittee is authorized to place ore from the Santa Rita Open Pit, ore from Continental Mine including Hanover Mountain, dewatered acid or copper-bearing material resulting from

cleaning out currently permitted mine units, and discharge water contaminants resulting from placement of these materials within the authorized North In-Pit Leach Stockpile footprint south of the dotted line displayed on Figure 2.

- E. The Permittee is authorized to place waste rock from the Santa Rita Open Pit within the permitted footprints of 9, East In-Pit Road, South In-Pit Road, 3A, Northwest, North, Northeast, and Lee Hill Waste Rock Stockpiles and discharge water contaminants in leachate generated from the waste rock stockpiles.
- F. The Permittee is not authorized to place additional waste rock within the permitted footprint of the Highway to Heaven Waste Rock Stockpile.
- G. The Permittee is authorized to discharge impacted stormwater and acidic leachate from waste rock stockpiles, leach stockpiles and pit walls into the Santa Rita Open Pit unlined pit bottoms. [20.6.2.3109 NMAC]
- H. The Permittee is authorized to operate the Santa Rita Open Pit dewatering system to return process water and impacted stormwater pumped from the Santa Rita Open Pit the process water reuse circuit and/or leaching circuit via the 5900 PLS Sump, 6250 Booster Tank, 6525 Raffinate Tank, Reservoir 7, the PLS Feed Pond, or the Raffinate Tanks. Process water and impacted stormwater are authorized to be moved from one sub-pit sump to another as necessary. [20.6.2.3109 NMAC]
- I. The Permittee is authorized to operate Reservoir 5 North to collect stormwater or intermittent stream flows from Santa Rita Creek.
- J. The Permittee is authorized to operate Reservoir 5 South to collect impacted stormwater generated in the vicinity of Reservoir 5.
- K. The Permittee is authorized to operate the Rustler Canyon Containment System to collect impacted stormwater and seepage generated from the Highway to Heaven Waste Rock Stockpile, and to pump solutions to Reservoir 6, Reservoir 7, Reservoir 9, or the Santa Rita Open Pit.
- L. The Permittee is authorized to construct 9 Waste Rock Stockpile in the footprint of Reservoir 9 pursuant to DP-459 dated June 5, 2019. The Permittee is authorized to maintain Reservoir 9 until construction of 9 Waste Rock Stockpile begins.
- M. The Permittee is authorized to discharge up to a maximum of 2,000,000 GPD (for all permitted facilities in the NMA) of water from the Café Queue Spout, Frog Pond Spout, South Side Spout,

Lampbright Spout, and the Island Queue Spout for dust suppression within the Santa Rita Open Pit, surrounding leach and waste rock stockpiles, and associated haul roads.

- N. 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 Subsection G of 20.6.7.30 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 Part 20.6.2 NMAC.

C100 Santa Rita Open Pit

- A. The Santa Rita Open Pit shall be operated in accordance with the applicable requirements of Section 20.6.7.24 NMAC.
- B. Fluids generated within the open pit shall be managed according to the applicable requirements of Subsection C of 20.6.7.24 NMAC, and the Sitewide Water Management Plan required pursuant to Condition C108.D.
- C. Pursuant to Subsection A of 20.6.7.24 NMAC, expansion of the Santa Rita Open Pit shall not exceed the area as shown on Figure 3 of this Discharge Permit. The Permittee must obtain a permit modification or amendment prior to expanding the Santa Rita Open Pit beyond the area shown on Figure 3.

C101 Leach Stockpiles

- A. Design, construction, and location of leach stockpiles shall be in accordance with the Discharge Plan, and applicable requirements of Subsections A and B of 20.6.7.20 NMAC.
- B. The Permittee shall operate the North In-Pit Leach Stockpile pursuant to the applicable operational requirements of Subsection C of 20.6.7.20 NMAC.
- C. Construction of new leach stockpiles; or expansion of leach stockpiles beyond footprints, location, or configuration identified in Figure 2 of this Discharge Permit, or for the purpose of facility closure as approved through DP-1340, must be evaluated in accordance with the requirements of Section 20.6.7.20 NMAC and may be subject to additional permitting requirements as described in Section D107.

C102 Waste Rock Stockpiles

- A. Design, construction, and location of the waste rock stockpiles shall be in accordance with the Discharge Plan, and applicable requirements of Subsections B and C of 20.6.7.21 NMAC.
- B. The Permittee shall comply with applicable operational requirements listed in Paragraphs (2) through (8) of 20.6.7.21.D NMAC including the requirement to place waste rock on waste rock stockpiles to plan for closure, to the extent practicable, and be in accordance with the operating plan required in Condition C108.I (Sections 20.6.7.18, 20.6.7.21 and 20.6.7.33 NMAC).
- C. Construction of new waste rock stockpiles; or expansion of waste rock stockpiles beyond footprints, location, or configuration identified in Figure 2 of this Discharge Permit, or for the purpose of facility closure as approved through DP-1340, must be evaluated in accordance with the requirements of Section 20.6.7.21 NMAC and may be subject to additional permitting requirements as described in Section D107.
- D. Waste rock shall be handled in accordance with applicable requirements of Section 20.6.7.21 NMAC and the NMED-approved material characterization and handling plans summarized and referenced in the Chino NMA Master Document and titled: "Waste Rock Characterization, Chino Mine," dated August 10, 1998, and "Materials Handling Plan South Pit Area" dated July 7, 2006.

C103 Impoundments

- A. The design, construction, and location of all impoundments shall be in accordance with the Discharge Plan, and applicable requirements of Subsection D of 20.6.7.17 NMAC.
- B. The Permittee shall operate Reservoir 5 South in accordance with the applicable requirements of Subsection F of 20.6.7.18 NMAC.
- C. The water level in Reservoir 5 South shall be maintained as low as practicable under standard operating conditions and during rainfall events.
- D. Reservoir 5 Area Upgrades:
 - 1. Condition C103.C.2 of DP-459, dated June 5, 2019, requires the Permittee to relocate waste rock located adjacent to or within the Highway 152 easement (i.e., southeast portion of the Reservoir 5 area) to prevent stormwater from discharging beyond the fenced perimeter of the operational area. NMED observed erosional features that indicate stormwater runoff continues to discharge beyond the fenced perimeter of the operational area during an inspection conducted on January 31, 2023. Within 180 days of

the effective date of this Discharge Permit (by DATE), the Permittee shall either relocate additional waste rock or construct additional berms in such a manner to prevent stormwater runoff from this area discharging beyond the fenced operational area.

- E. Reservoir 9 shall be dewatered prior to placing waste rock in the permitted footprint of 9 Waste Rock Stockpile. As detailed in the Discharge Plan, solutions shall be pumped to Reservoir 6, Reservoir 7, or the Santa Rita Open Pit using an existing 18-inch HDPE pipeline. The Permittee shall notify NMED in writing one month prior to dewatering and rerouting the RCCS pipelines from Reservoir 9 to Reservoir 6, Reservoir 7, or the Santa Rita Open Pit.

C104 Sumps, Tanks, Pipelines, and Other Containment Systems

- A. The design, construction and location of all pipelines, tanks, and sumps shall be in accordance with the Discharge Plan, and applicable requirements of Subsections A and B of 20.6.7.23 NMAC.
- B. 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.
- C. Detailed and complete construction plans, specifications, and supporting design calculations for any proposed or required tanks, pipelines, sumps, or other containment systems, including any replacements thereof, shall be submitted for NMED approval a minimum of 30 days prior to the commencement of construction pursuant to Paragraph (2) of 20.6.7.17.C NMAC, Section 20.6.7.23 NMAC, and Section 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.
- D. 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.

C105 Stormwater Management

- A. Stormwater shall be managed in accordance with the applicable requirements of Paragraph (4) of 20.6.7.17.C NMAC, and in accordance with the most recent version of the Sitewide Water Management Plan required by Condition C108.D.
- B. The Permittee shall inspect monthly or after rain events exceeding one inch - as determined by the nearest appropriate rain gauge(s) - all stormwater impoundments, conveyance

channels, and collection ponds for evidence of stormwater accumulations that exceed designed capacities or containing excessive sediment buildup. Inspections after one-inch rain events shall occur as soon as practicable. If any inspection reveals a condition that may compromise the ability of a stormwater management structure to function properly, it shall be reported in accordance with Subsection I of 20.6.7.30 NMAC (see Condition C108.C).

- C. During upset conditions (i.e., during a power or pipeline shutdown event), intense precipitation events or during maintenance and repair activities, PLS, process water, and impacted stormwater from the 5400, 5900, and 6250 Sumps as well as other authorized sumps, pipelines, conveyance channels, tanks, or other containment systems located within the Santa Rita Open Pit may discharge to the Estrella, East, South, or Lee Hill Sub-pit bottoms pursuant to Paragraph 2 of 20.6.7.17.D NMAC.

C106 Dust Suppression

- A. If at some time in the future the Permittee wishes to use an alternate source of dust suppression water or change the location in which discharges have been approved, the Permittee shall notify NMED for approval prior to the proposed change pursuant to 20.6.7.14 NMAC.
- B. Dust suppression water applied to haul roads located on the STS2, Upper South Stockpile (DP-526), Whitehouse Waste Rock Stockpile, or other conditionally exempt mine units shall be conducted using water sources that do not exceed water quality standards set forth in Section 20.6.2.3103 NMAC.

C107 Flow Measurement

- A. Pursuant to Paragraph (2) of 20.6.7.18.E NMAC, and Subsection F of 20.6.7.29 NMAC, the Permittee shall visually inspect all flow meters on a monthly basis for evidence of malfunction and repair or replace malfunctioning flow meters within 30 days of or as soon as practicable following discovery.

C108 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 displays sampling locations.

- B. Samples of pit sump water, stormwater, and process water, including seeps shall be analyzed for total and dissolved concentrations in accordance with Table 1. Samples of groundwater and springs shall be analyzed for dissolved concentrations in accordance with Table 1.
- C. 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 Sections 20.6.7.18 and 20.6.7.29 NMAC. Semi-annual reports are due by February 28 and August 31 of each year. Data or reports required to be submitted annually shall be submitted in the monitoring report due by February 28 of each year.
- D. The Permittee shall submit to NMED for approval updates to the Sitewide Water Management Plan. The Sitewide Water Management Plan shall be a comprehensive plan that describes all water management systems at the Chino North Mine Area and be designed, at a minimum, to meet the requirements of Paragraph (4) of 20.6.7.17.C NMAC (Stormwater Management Plan), Subsection C of 20.6.7.24 NMAC (Mine Operation Water Management Plan), and Subsection K of 20.6.7.30 NMAC (Interim Emergency Water Management Plan). A statement indicating that no update is necessary may be provided in the event there are no changes to the Sitewide Water Management Plan. The update shall be submitted in the semi-annual monitoring reports.
 - 1. The next applicable update to the Sitewide Water Management Plan shall include the revisions request in Comment 8 of the First Request for Additional Information dated July 13, 2022 and Comment 11 of the Second Request for Additional Information dated February 27, 2023.
- E. The Permittee shall update the North Mine Area Master Document annually. The update shall include all changes to the North Mine Area for all relevant discharge permits from the past year or as required by NMED. The update shall be submitted with the annual DP-459 monitoring reports. A statement indicating that no update is necessary may be provided in the event there are no changes to the North Mine Area Master Document are needed.
 - 1. The next applicable update to the North Mine Area Master Document shall include an updated geologic map for NMED approval pursuant to Paragraph (2) of 20.6.7.11.K NMAC. The geologic map shall have the most recently available topographic elevation model, identify key mine units, include a description of all geologic units and geologic features. The geologic map shall incorporate the most recently available geologic information.
 - 2. The next applicable update to the North Mine Area Master Document shall include the updates requested by NMED in Comment 10 of the Second Request for Additional

Information dated February 27, 2023.

F. 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]

G. Groundwater

1. The Permittee shall monitor groundwater at locations specified by Subsection B of 20.6.7.28 NMAC and listed in Table 1 of this Discharge Permit.
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 from the DP-459 monitoring wells in accordance with the schedule and parameters provided in Table 1, and 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.
4. The Permittee shall report pressure transducer data from monitoring wells 459-2016-01, 459-2016-02, 459-2016-03, 526-96-18, 459-2017-02, and 459-2017-02 in semi-annual monitoring reports in a single table electronic spreadsheet and corresponding water-level-over-time figure. The Permittee shall continue to manually measure depth to water at these monitoring wells during sampling events to verify transducer data and report the depth to water with groundwater quality sampling results in accordance with Table 1.

H. Surface Water

1. The Permittee shall sample and analyze surface water collected semi-annually from the highest-elevation seep located in the tributary to Martin Canyon in accordance with the schedule listed in Table 1, and applicable requirements of Subsection N of 20.6.7.28 NMAC. The seep is designated as Martin Canyon Spring 01 in Table 1 and is located at approximately a latitude/longitude of 32.754948°, -108.078207° (World Geodetic System 84 – WGS 84). Analytical results shall be submitted in the semi-annual monitoring reports in the format specified by Subsection C of 20.6.7.29 NMAC.

I. Santa Rita Open Pit

1. Pursuant to Subsection C of 20.6.7.24 NMAC, the Permittee shall submit on a semi-annual

basis, a Mine Operation Water Management Plan and Report summarizing pit dewatering activities for the Santa Rita Open Pit for the previous six months, including reporting on volumes of water pumped and location of pumping. The plan shall also discuss changes and planned activities for dewatering for the coming six months. The planned future dewatering activities shall be submitted in semi-annual monitoring reports in the format specified by Subsection C of 20.6.7.29 NMAC.

J. Waste Rock Stockpiles

1. Pursuant to Paragraph (7) of 20.6.7.21.D NMAC, the Permittee shall submit on an annual basis an operating plan that describes the sequencing of waste rock deposition on the DP-459 waste rock stockpiles and describes the operation of any applicable systems utilized to contain or transport process water, seepage, or impacted stormwater from the waste rock stockpiles. The operating plan shall be submitted with the monitoring report due by February 28 of each year.

K. Discharge Volumes

1. The Permittee shall measure and report average daily discharge volumes (unless otherwise noted) for process water, interceptor collection systems, raffinate, and impacted stormwater discharges in accordance with Subsections B, E, and F of 20.6.7.29 NMAC using flow meters listed in Table 1 of this Discharge Permit. In addition to discharge volume reporting required by Subsection B of 20.6.7.29 NMAC, the Permittee shall measure and report discharge volumes 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. The daily volume of raffinate (GPD) discharged to the top of the North In-Pit Leach Stockpile.
 - b. The daily volume of PLS (GPD) pumped from the 5900 PLS Sump to the SX/EW plant.
 - c. The daily volume of water pumped from the Estrella, East, South, and Lee Hill Sub-pits to the 6525 Raffinate Tank (DP-526), Reservoir 7 (DP-591), the PLS Feed Pond (DP-591), the Raffinate Tanks (DP-591), or other permitted process water re-use location.
 - d. The daily volume of water used for dust suppression from each spout including the Café Queue Spout, Frog Pond Spout, South Side Spout, Lampbright Spout, and Island Queue Spout.
 - e. The daily volume of impacted stormwater pumped from Reservoir 5 South to Reservoir 7 or the Café Queue Tank.
 - f. The daily volume of stormwater (GPD) pumped from the Rustler Canyon Containment System to Reservoir 9 or Reservoir 7 as measured by two flow meters.

- g. The daily volume of process water (GPD) pumped from the Princess Shaft to the Frog Pond.

L. Flow Measurement

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.

M. Meteorological Data

1. Pursuant to Paragraph G of 20.6.7.29 NMAC, Meteorological data shall be measured as stipulated in the NMA Master Document. The data shall be submitted to NMED in the monitoring report due on February 28 of each year.

C109 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, impacted stormwater or seepage that exceeds the water quality standards of Section 20.6.2.3103 NMAC to unauthorized areas must be reported under Section 20.6.2.1203 NMAC.
- 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-459.
- D. The Permittee has been required to submit to NMED for approval a proposed abatement plan for the Chino Mine pursuant to Section C114 of DP-1340. 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 or Section 20.6.7.20 NMAC 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]

C110 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-1340, as applicable. Closure and financial assurance requirements associated with facilities authorized by this permit are included in DP-1340.

Part D GENERAL CONDITIONS

General conditions issued by the Ground Water Quality Bureau pursuant to Part 20.6.2 NMAC and Part 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 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 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 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. [74-6-10 WQA, 74-6-10.1 WQA]
- 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 74-6-9(B) & (E) WQA]
- 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) WQA]:
 - 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. New 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.
- C. 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.
- D. The permittee shall meet all applicable setback requirements for any new mine units pursuant to Section 20.6.7.19 NMAC.

- E. 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 which it may request 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) WQA]

D104 General Sampling and Analytical Methods

- A. Unless otherwise specified by this Discharge Permit, or approved in writing by NMED, the permittee shall use sampling and analytical techniques that conform with the references listed in Subsection B of 20.6.2.3107 NMAC. [20.6.2.3107.B NMAC, 20.6.7.29.D NMAC]

D105 Monitoring Well Abandonment

- A. The Permittee shall submit a written request for NMED approval in accordance with Condition C108.F at least 30 days prior to the anticipated destruction or removal of any monitoring wells required under this Discharge Permit. After the Permittee receives NMED approval, monitoring well plugging and abandonment shall be completed in accordance with the document titled, *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 Section 19.27.4 NMAC, unless an alternate method is approved by NMED. [20.6.2.3107 NMAC]
- B. The request required in Condition 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. Recent (i.e., most recent four quarters of data) groundwater analytical results from the monitoring well(s).

5. Proposed replacement well(s), if applicable.
6. The same details, as applicable, listed in Conditions D105.B.1, and D105.B.3 are required for the proposed replacement monitoring well(s). 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 and Subsection G of 20.6.7.30 NMAC. The Permittee shall take immediate corrective action to contain and remove or mitigate any damage caused by the discharge. Process water or impacted stormwater or other material that is spilled or released that has the potential to impact water quality shall be contained and pumped to a sump, impoundment, or leach stockpile permitted pursuant to the Copper Mine Rule. Contaminated soils shall be removed and placed in 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. 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. The Permittee shall repair or replace failed components within 48 hours from the time of failure or as soon as practicable pursuant to Subsection G of 20.6.7.30 NMAC. Within 7 days of discovering 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. Pursuant to Paragraph (6) of 20.6.2.1203.A NMAC, the Permittee shall submit a corrective action report within 15 days after discovery of the discharge that describes corrective actions taken and/or to be taken. [20.6.2.1203 NMAC; 20.6.7.29.B(2) and (3) NMAC; Subsection G of 20.6.7.30 NMAC]
- B. As part of the 24-hour spill notification requirements, the Permittee shall submit a figure to NMED by the end of the next business day 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.XXXXXX, 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 Section 20.6.7.10 NMAC and 20.6.7.11 NMAC. Plans and specifications shall be included in the request, 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 of the Copper Mine Rule. Plans and specifications shall be included in the request, 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]

**Table 1
 Monitoring and Reporting Summary for DP-459**

Monitoring Report Schedule of Submittal (Subsection A of 20.6.7.29 NMAC)								
1	January 1 - June 30 (first and second quarter sample periods) Semi-annual report due by August 31 of each year							
2	July 1 - December 31 (third and fourth quarter sample periods) Semi-annual report due by February 28 of each year							
3	Annual reports due by February 28 of each year							
Reporting Summary								
Annual Reporting Frequency	Description							
2	Monitoring reports – All applicable requirements of Subsections A through H of 20.6.7.29 NMAC, and C108.							
2	Additional depth-to-water and discharge volume reporting required by Conditions C108.G.4 and C108.K.							
2	Sitewide Water Management Plan							
Monitoring Schedule								
Area	Identification Number	Aquifer	Sampling					Notes
			type	Q1	Q2	Q3	Q4	
North Leach & WRSP	459-96-01B	P	MW			BW		
	459-96-02	P	MW			BW		Upgradient MW
	459-96-03	P	MW			BW		Upgradient MW
Reservoir 5	459-99-01	P	MW	BW		BCW		
	700R	R	Prod	BW		BCW		Dust Control Source
	593	R	Prod	BW		BCW		Dust Control Source
	459-2002-01	P	MW			BW		Upgradient of process water reservoirs
	Reservoir 5 North		SW	BC		BC		Total + dissolved concentrations of Suite C
	Reservoir 5 South		PW	BC		BC		Total + dissolved concentrations of Suite C
9 WRSP	459-2017-01	R	MW	BCW	BCW	BCW	BCW	
	459-2017-02	R	MW	BCW	BCW	BCW	BCW	
	526-96-15	R	MW			BW		
	526-96-18	R	MW	BW		BW		
	Reservoir 9		PW	BC		BC		Moved from DP-526
Rustler Canyon	H2H Pond		PW	BC	BC	BC	BC	Total + dissolved concentrations of Suite C
	H2H Underliner		PW	BC	BC	BC	BC	Total + dissolved concentrations of Suite C
	H2H SW		SP	B		BC		
	526-96-16	R	MW	BW		BW		
	526-96-17	P	MW			BW		
Santa Rita Open Pit	Estrella Booster #4		PW	BC		BCD		Total + dissolved concentrations (except D)
	Oswaldo Shaft		SH	BC		BC		Dust Control Source
	Bullfrog Shaft		SH	BC		BC		Dust Control Source
	Princess Shaft		SH	BC		BC		Dust Control Source
3A WRSP	3A-7	R	MW			B		
	493-99-02	P	MW	BW		BW		
	493-2007-01	P	MW	BW		BW		
	459-2016-01	R	MW	BCW	BCW	BCW	BCW	

	459-2016-02	R	MW	BCW	BCW	BCW	BCW	
	459-2016-03	P	MW	BCW	BCW	BCW	BCW	
	Martin Canyon Spring 01		SP	B		B		Martin Canyon Seep. Total + dissolved concentrations
	Other Observable Seeps		SP	BC	BC	BC	BC	Martin Canyon Only. Total + dissolved concentrations
Flow Meters	Meter Number	Meter Name						
	1	Estrella Booster#4						
	2	Raffinate Tank to North In-Pit Leach – Line 1						
	3	Raffinate Tank to North In-Pit Leach – Line 2						
	4	6250 Booster to SX/EW						
	5	Water from Lee Hill Sub-pit to Estrella Sub-pit						
	6	Reservoir 6 to Reservoir 7						
	18	5900 PLS Sump to 6250 Booster Tank						
	33	Estrella Booster#1						
	34	Estrella Booster#2						
	35	Estrella Booster#3						
	36	Estrella Meter at 6525						
20	RCCS to Reservoir 9 or 7 (2 flow meters)							

Sampling Analytical Suites:

A = Field parameters: Temperature, (°C), pH, specific conductance (µS/cm)

B = Indicator parameters: Suite A, sulfate, total dissolved solids (TDS)

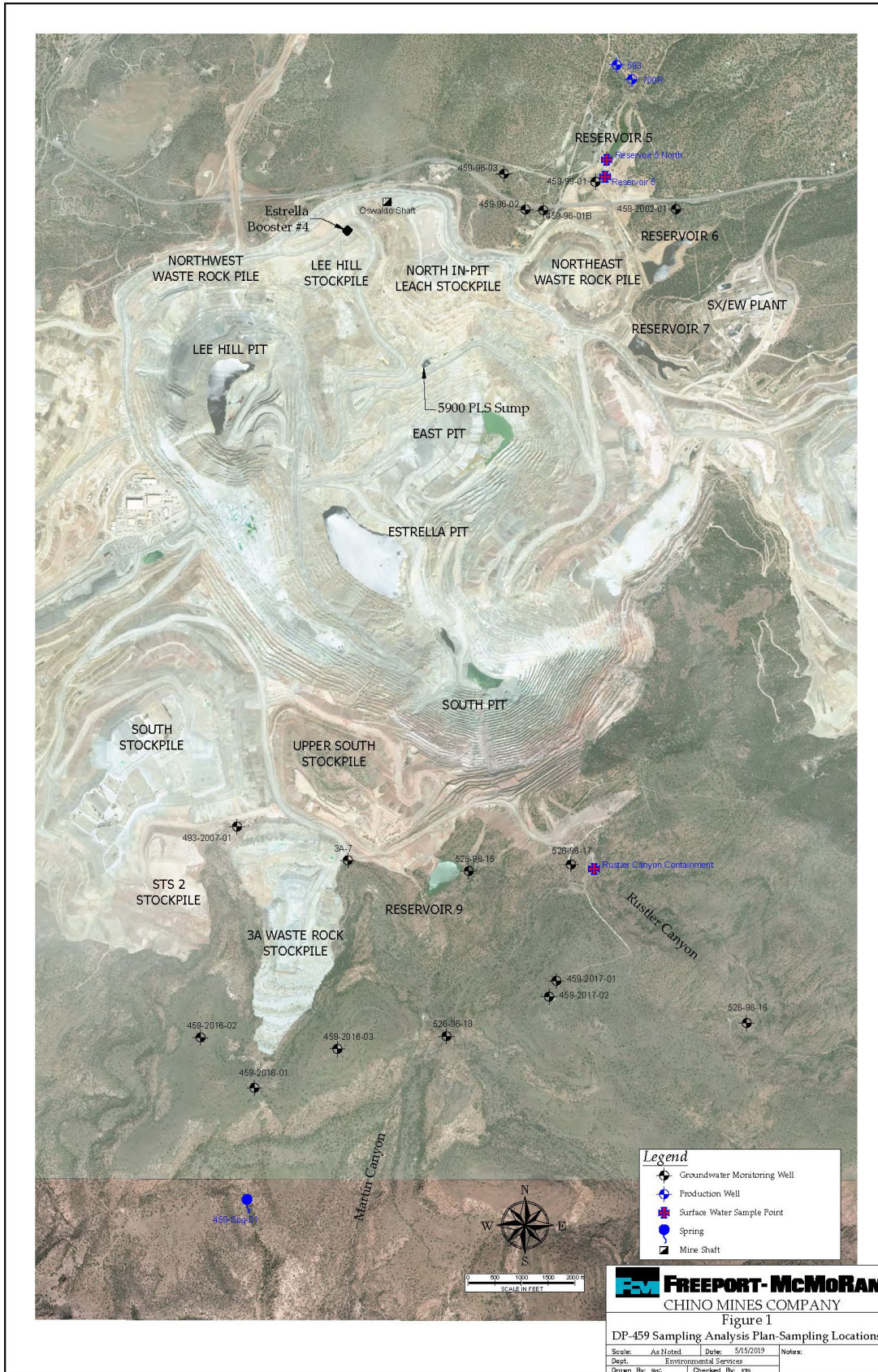
C = Comprehensive inorganic suite: alk-HCO₃, alk-CO₃, alk-Tot, Ca, Mg, Na, K, F, Cl, Al, As, Ba, Cd, Cr, Co, Cu, Fe, Pb, Mn, Ni, Se, U, Zn

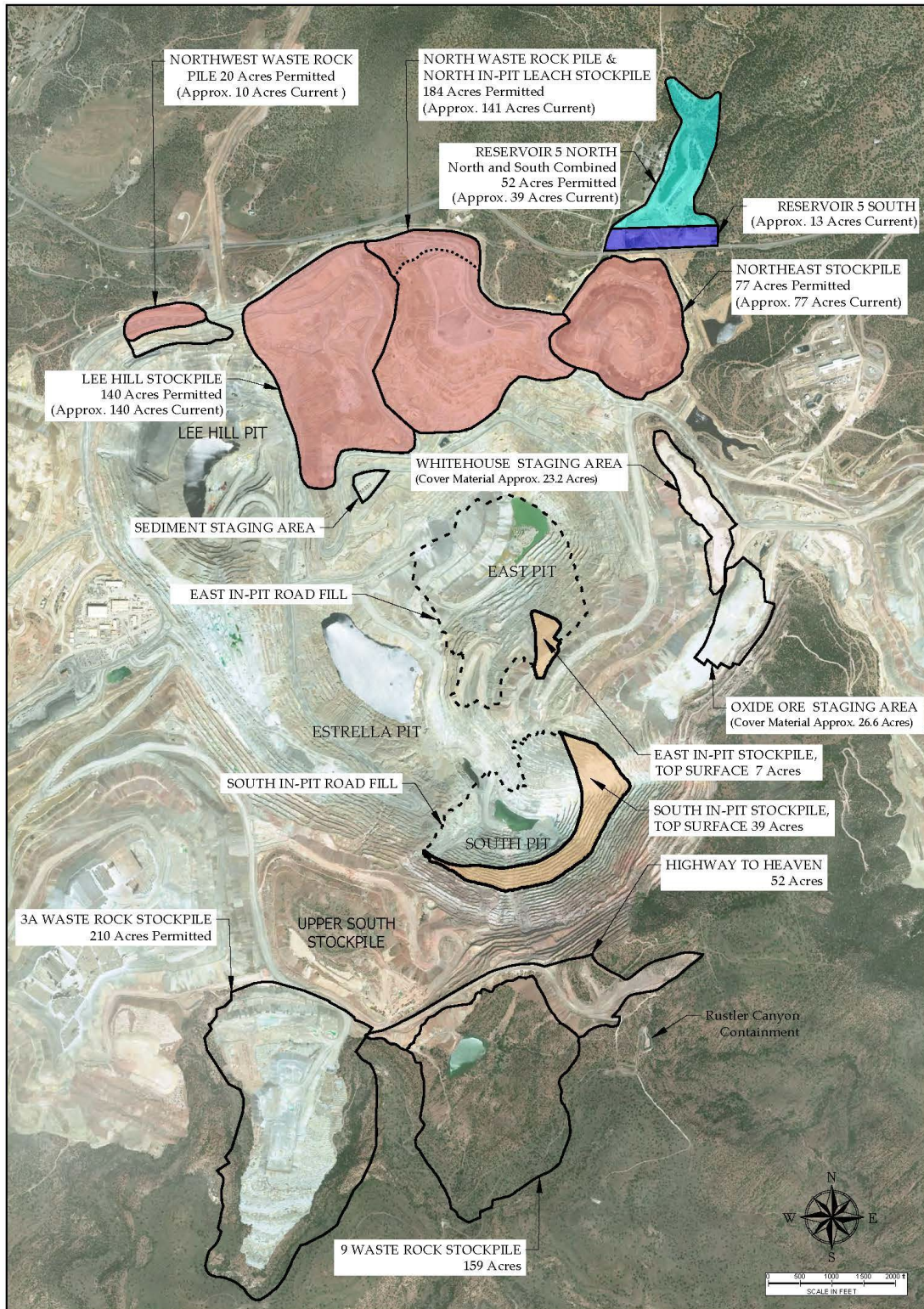
D = Organic Parameters I: Total Petroleum Hydrocarbons (TPH)

W = Depth-to-water measurement to the nearest 0.01 foot (including pressure transducer data; see C108.G.4)

Explanation to Abbreviations and Symbols

<p>Type: MW = monitoring well Prod = production well PW = Process Water RCCS = Rustler Canyon Containment System SH = shaft SW = surface water SPG = spring SP = seep TNK = tank WRSP = Waste Rock Stockpile</p>	<p>Aquifer: P = Perched R = Regional</p>	<p>Sampling Quarter: Q1 = Jan-Mar Q2 = Apr-Jun Q3 = Jul-Sep Q4 = Oct-Dec</p>	<p>Sampling Analytes Suite C: alk-HCO₃ = alkalinity-bicarbonate alk-CO₃ = alkalinity-carbonate alk-Tot = alkalinity total Ca = Calcium Mg = Magnesium Na = Sodium K = Potassium F = Fluoride Cl = Chloride Al = Aluminum As = Arsenic Ba = Barium</p>	<p>Cd = Cadmium Cr = Chromium Co = Cobalt Cu = Copper Fe = Iron Pb = Lead Mn = Manganese Ni = Nickel Se = Selenium U = Uranium Zn = Zinc</p>
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FMC FREEPORT-McMORAN
 CHINO MINES COMPANY

Figure 2
 Mine Units Associated with DP-459

Scale: As Noted	Date: 4-04-2023	Notes:
Drawn By: snc	Checked By: ip	

