

# Draft Environmental Impact Statement for the Disposal of Mine Waste at the United Nuclear Corporation Mill Site

### Meeting Overview

- Overview UNC's License Amendment Application
- NRC's Role and Review Process
- NRC's Environmental Review Results
- Information Resources and Ways to Comment
- Question and Answers

# License Amendment Request

- United Nuclear Corporation (UNC)/General Electric (GE) is seeking to amend its NRC License for the UNC mill site
- If approved, would allow UNC/GE to transfer approximately 1,000,000 cubic yards of mine waste from the Northeast Church Rock (NECR) mine site to the existing tailings impoundment at the mill site

# NRC's role

- Jurisdiction at the UNC mill site
- Authority to approve or deny license amendment request
- Evaluating whether the proposal can be done safely and how the environment would be affected
- No authority at the NECR mine site
- No role in the remedy selection (location) for the cleanup of the NECR mine

### NRC's Review Process

Safety Evaluation Report (SER) September 2020

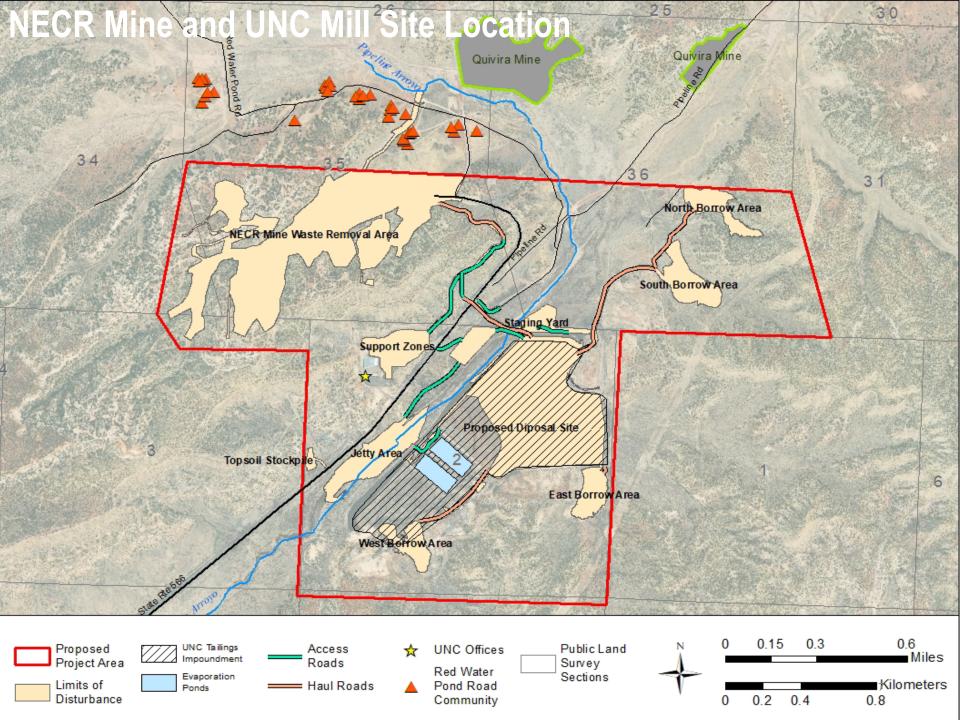
Environmental Impact Statement (EIS)

NRC's licensing decision June 2022 **Draft EIS:** November 2020

> Final EIS: May 2022

# Environmental Impact Statement

- Evaluate and discusses impacts to the environment
- Chapter 1 Introduction
- Chapter 2 Proposed Action and Alternatives
- Chapter 3 Affected Environment (current site conditions)
- Chapter 4 Impacts
- Chapter 5 Cumulative Impacts
- Chapter 6 Mitigation Measures
- Appendix A Consultation Correspondence
- References for the Draft EIS lists of documents at the end of each chapter



# UNC Mill Site History

- Past milling operations produced waste materials called tailings
- Tailings were placed on the Mill Site in an impoundment for permanent disposal
- 1979 tailings impoundment dam failure releasing 94 million gallons of mill tailings liquids into the Pipeline Arroyo
- Two evaporation ponds still being used for the on-going groundwater cleanup activities

# **Proposed Action**

- Amend NRC license to allow the 1M cubic yards of mine waste to be placed on the mill site tailings impoundment for permanent disposal
- Waste consists of soil, waste rock, mine debris, and vegetation
- Transferred by truck
- Cover material obtained from 4 borrow areas
- Pipeline Arroyo stabilized using a riprap chute to replace current rock jetty

# Alternatives

#### No-Action

- NRC would not approve the license amendment request
- Evaluation assumes waste would remain in place for approximately 10 years before EPA selects another remedy

#### **Secondary Alternatives**

- Same as proposed action but include modifications to specific activities
- 1) Conveyor system to transfer the waste
- 2) Cover material obtained from Jetty Area

# Current site environment

- Mill site is located on privately owned land
- Mine site is located on Navajo trust land
- NM Highway 566 is a two-lane highway provides primary access to the sites
- 34 occupied homesites within 2 miles
- Pipeline Arroyo is a dry stream that fills with water after rains

# Impact Evaluation

- EIS evaluates impacts for three phases of the proposed project
  - Construction Surface disturbing activities, including excavation
  - Transfer Loading and transport of waste from mine to mill
  - Closure Reclamation and revegetation of disturbed areas including the evapotranspiration (ET) cover

# Results of NRC's Environmental Review

RESOURCE	IMPACT EVALUATION
Land Use	SMALL
Transportation	SMALL TO MODERATE
Geology and Soils	SMALL
Surface Water	SMALL TO MODERATE
Groundwater	SMALL
Ecology	SMALL (wildlife) SMALL TO MODERATE (vegetation)
Air Quality	SMALL (greenhouse gases) SMALL TO MODERATE (nongreenhouse gases)

# Results of NRC's Environmental Review

RESOURCE	IMPACT EVALUATION
Noise	MODERATE
Historic and Cultural	SMALL TO LARGE
Visual and Scenic	MODERATE
Socioeconomic	SMALL
Environmental Justice	Disproportionately high and adverse environmental impacts
Public and Occupational Health	SMALL
Waste Management	SMALL

### **Transportation Impacts**

- Increased traffic, during construction traffic (near haul road crossing) expected to increase by 68 percent
- Construction of haul roads (crossing highway 566)
- 280 truck trips per day, or 40 trips per hour
- Road closures limited to 15 minutes or less
- UNC/GE would install a temporary traffic light system at the Highway 566 crossing

# Noise Impacts

- Impacts would occur from the use of construction equipment and from excavation activities
- Increased traffic would also contribute to increase noise levels
- Closest noise receptors are residents of the Red Water Pond Road community due to their proximity

# Surface Water and Groundwater Impacts

- Impacts to surface waters may result from stormwater runoff and resulting erosion
- Stabilization work in Pipeline Arroyo (Jetty Area) to address potential future undercutting near existing tailings impoundment
- Improvements to stormwater drainage in existing drainage channel

# Air Quality Impacts

- Dust generated from vehicle travel on unpaved roads
- Wind erosion in disturbed areas
- Emissions from mobile sources and construction equipment
- UNC proposed measures in its application for controlling fugitive dust
  - Maximum speed limit of 20 mph
  - Suppress dust with spraying water on haul roads, excavation areas, and placement areas
  - Covering of stockpiles

# Historic and Cultural Resources

- Cultural resource sites identified within the limits of disturbance and recommended as eligible for the National Register Historic Places
  - 4 sites on the mine site; 1 site on the mill site
  - Anasazi Pueblo habitation and artifact scatter, and Anasazi and historic Navajo pictographs
- Programmatic agreement (PA) developed in coordination with:
  - US EPA, Bureau of Indian Affairs, Navajo Nation Tribal Historic Preservation Office, and the New Mexico Historic Preservation Office, and United Nuclear Corporation
- PA describes all the procedures needed to ensure protection and that proper procedures are followed

# Information Resources

Draft Environmental Impact Statement

https://www.nrc.gov/docs/ML2028/ML20289A621.pdf

#### Reader's Guide

https://www.nrc.gov/docs/ML2029/ML20295A709.pdf

Application material and NRC project website

<u>https://www.nrc.gov/info-finder/decommissioning/uranium/united-nuclear-corporation-unc-.html</u>

# SUBMIT COMMENTS ON DRAFT EIS BY NOVEMBER 1, 2021

- E-mail comments to: UNC-ChurchRockEIS.resource@nrc.gov
- Leave a (toll-free) voicemail at: 888-672-3425
- Federal Rulemaking Web Site: Go to https://www.regulations.gov/and search for Docket ID NRC-2019-0026
- Mail comments to: Office of Administration, Mail Stop:TWFN-7-A60M, ATTN: Program Management, Announcements and Editing Staff, U.S. Nuclear Regulatory Commission, Washington, DC 20555-0001

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