

**RECEIVED**

JAN 22 2015

**NMED
Hazardous Waste Bureau**

National Nuclear Security Administration
Los Alamos Field Office, MS A316
Environmental Projects Office
Los Alamos, New Mexico 87544
(505) 667-4255/FAX (505) 606-2132

Date: **JAN 22 2015**

Refer To: ADESH-14-158

LAUR: 14-29494

Locates Action No.: N/A

John Kieling, Bureau Chief
Hazardous Waste Bureau
New Mexico Environment Department
2905 Rodeo Park Drive East, Building 1
Santa Fe, NM 87505-6303

Subject: Submittal of the Fact Sheets for Chromium Corehole 3

Dear Mr. Kieling:

Enclosed please find two hard copies with electronic files of the fact sheets for chromium corehole 3 (CrCH-1). This corehole is the second of six to be completed as part of the New Mexico Environment Department- (NMED-) approved Drilling Work Plan for Chromium Project Coreholes. The attached completion details reflect the corehole-specific NMED-approved work plan design.

If you have any questions, please contact Stephani Swickley at (505) 606-1628 (sfuller@lanl.gov) or Hai Shen at (505) 665-5046 (hai.shen@nnsa.doe.gov).

Sincerely,

Michael T. Brandt, DrPH, CIH, Associate Director
Environment, Safety, and Health
Los Alamos National Laboratory

Sincerely,

Peter Maggiore, Assistant Manager
Environmental Projects Office
Los Alamos Field Office

MB/PM/DM/SS:sm

Enclosures: Two hard copies with electronic files – Fact Sheets for CrCH-3

Cy: (w/enc.)

Hai Shen, DOE-NA-LA, MS A316
Cheryl Rodriguez, DOE-NA-LA, MS A316
Stephani Swickley, ADEP-CAP, MS M992
Public Reading Room (EPRR)
ADESH Records (electronic copy)

Cy: (Letter and CD and/or DVD)

Laurie King, EPA Region 6, Dallas, TX
Steve Yanicak, NMED-DOE-OB, MS M894
Vern Christensen, Yellow Jacket Drilling
Ted Ball, ADEP-CAP, MS M992
PRS Database

Cy: (w/o enc.)

Tom Skibitski, NMED-DOE-OB (date-stamped letter emailed)
lasomailbox@nnsa.doe.gov
Annette Russell, DOE-NA-LA (date-stamped letter emailed)
David Rhodes, DOE-NA-LA (date-stamped letter emailed)
Kimberly Davis Lebak, DOE-NA-LA (date-stamped letter emailed)
Dave McInroy, ADEP-CAP (date-stamped letter emailed)
Randy Erickson, ADEP (date-stamped letter emailed)
Tony Grieggs, ADESH-ENV-CP (date-stamped letter emailed)
Alison Dorries, ADESH-ENV-CP (date-stamped letter emailed)
Michael Brandt, ADESH (date-stamped letter emailed)
Amy De Palma, PADOPS (date-stamped letter emailed)
Michael Lansing, PADOPS (date-stamped letter emailed)

TOTAL LENGTH OF CASING AND SCREEN (FT) 970.13
 DEPTH TO WATER FOLLOWING INSTALLATION (FT BGS) 932.7 (12/15/14)

DIAMETER OF BOREHOLE
 20.00 (IN) FROM 0.0 TO 61.0 (FT BGS)
 11.00 (IN) FROM 61.0 TO 680.0 (FT BGS)
 6.00 (IN) FROM 680.0 TO 990.0 (FT BGS)

SURFACE COMPLETION (proposed)
 PROTECTIVE CASING TYPE STEEL SIZE (IN) 16
 PROTECTIVE POSTS INSTALLED YES
 SURFACE SEAL AND PAD CHECK FOR SETTLEMENT YES
 PAD MATERIAL CONCRETE REINFORCED WIRE MESH
 PAD DIMENSIONS (FT) 10 (L) 10 (W) 0.5 (H)

SURFACE SEAL 1.0 TO 61.0 (FT BGS)

BENTONITE SEAL 61.0 TO 932.0 (FT BGS)

FINE SAND COLLAR 932.0 TO 934.0 (FT BGS)

FILTER PACK 934.0 TO 966.0 (FT BGS)

SCREENED INTERVAL 939.4 TO 959.4 (FT BGS)

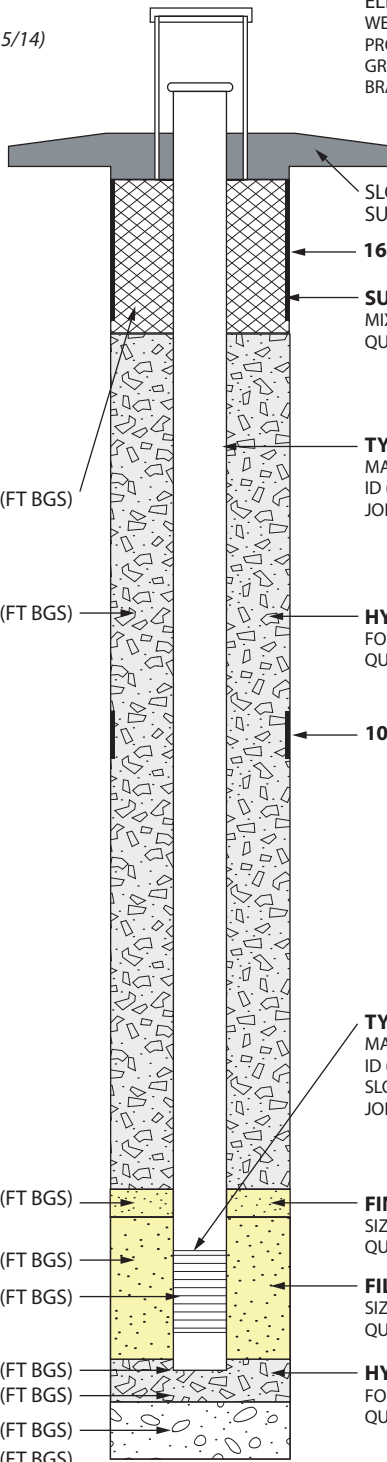
BOTTOM OF CASING 969.63 (FT BGS)

BENTONITE SEAL 966.0 TO 990.0 (FT BGS)

SLOUGH AND SAND 990.0 TO 1023.0 (FT BGS)

BOTTOM OF BORING 1023.0 (FT BGS)

LOCKING COVER



ELEVATIONS (FT AMSL)
 WELL CASING TBD
 PROTECTIVE CASING TBD
 GROUND SURFACE TBD
 BRASS CAP (MARKER) TBD

SLOPED CONCRETE PAD/
 SURFACE SEAL
 16-IN CSG 0 TO 60 (FT BGS)

SURFACE SEAL
 MIX (WT%) PORTLAND CEMENT 92 BENTONITE 8
 QUANTITY USED 80.0 FT³ CALC 81.2 FT³

TYPE OF CASING
 MATERIAL PASSIVATED A304 STAINLESS STEEL
 ID (IN) 2.00 OD (IN) 2.375
 JOINT TYPE THREADED

HYDRATED BENTONITE SEAL
 FORM 3/8-IN BENTONITE CHIP
 QUANTITY USED 428.5 FT³ CALC 423.0 FT³

10-IN CSG/SHOE 685.0 TO 690.0 (FT BGS)

TYPE OF SCREEN(S)
 MATERIAL A304 STAINLESS STEEL
 ID (IN) 2.00 OD (IN) 2.375
 SLOT SIZE (IN) 0.040
 JOINT TYPE THREADED

FINE SAND COLLAR
 SIZE/TYPE 20/40 SILICA
 QUANTITY USED 0.25 FT³ CALC 0.33 FT³

FILTER PACK SAND
 SIZE/TYPE 10/20 SILICA
 QUANTITY USED 5.25 FT³ CALC 5.30 FT³

HYDRATED BENTONITE SEAL
 FORM 3/8-IN BENTONITE CHIP
 QUANTITY USED 4.90 FT³ CALC 4.62 FT³

STAINLESS-STEEL CENTRALIZERS
 USED YES
 ABOVE AND BELOW SCREEN

WELL COMPLETION BEGAN
 DATE 12/5/14 TIME 1302h
WELL COMPLETION FINISHED
 DATE 12/9/14 TIME 1800h

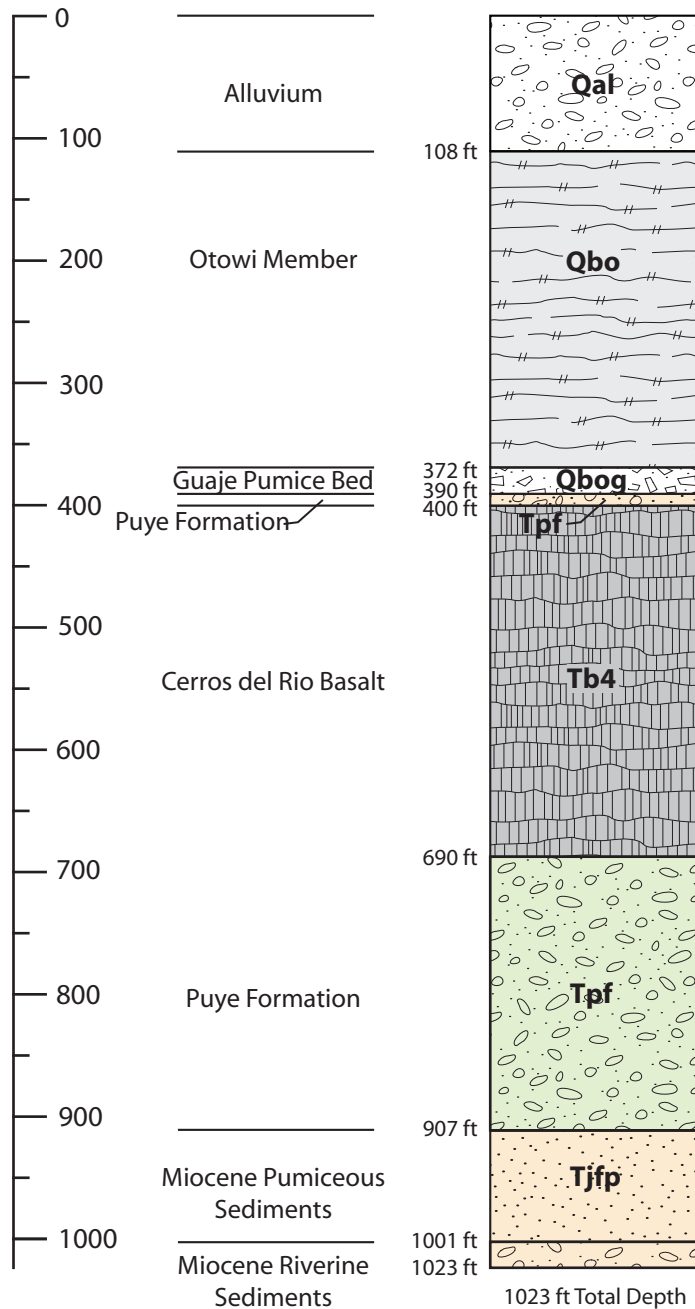


Drafted By: PTM
 Date: December 18, 2014
 File Name: CrCH-3_AsBuiltDiagram_FactSheet

Well CrCH-3 As-Built Well Construction Diagram
 Technical Area 05 (TA-05)
 Los Alamos National Laboratory
 Los Alamos, New Mexico

Fact Sheet
 NOT TO SCALE

DEPTH (FT BGS)



DRILLING INFORMATION

DRILLING COMPANY/PERSONNEL:

Yellow Jacket Drilling
 A. Adams, A. Lamon, S. Walker, J. Saldana,
 S. Jorge, M. Williams, C. Hillman, J. Oropeza

DRILL RIGS:

0–695 ft bgs: Foremost DR-24HD
 695–1023 ft bgs: Terrasonics 150T

DRILLING METHOD:

- 0–695 ft bgs: DUAL ROTARY WITH CASING ADVANCE USING AIR AND WATER
- 695–1023 ft bgs: SONIC CORING WITH CASING ADVANCE

DRILLING FLUID TYPE:

- | | |
|---|--|
| 0–695 ft bgs | 695–1023 ft bgs |
| <input checked="" type="checkbox"/> WATER | <input checked="" type="checkbox"/> NONE DURING CORING;
WATER USED TO REMOVE
SLOUGH BETWEEN CORE
RUNS |
| <input checked="" type="checkbox"/> AIR | |
| <input checked="" type="checkbox"/> AQF-2 FOAMING AGENT | |

DRILLING START/FINISH:

DATE: 09/29/2014
 DATE: 11/24/2014

▼ 931 ft bgs (12/3/14)
 (in corehole prior to
 well installation)



Prepared By: GW and DB
 Date: December 5, 2014
 File Name: CrCH-3_Lithology_FactSheet

Well Summary Data Sheet
CrCH-3 Borehole Stratigraphy
 Technical Area 05 (TA-05)
 Los Alamos National Laboratory
 Los Alamos, New Mexico

Fact Sheet
 NOT TO SCALE