UNITED NUCLEAR CORPORATION

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Gallup, New Mexico 87305-3077

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February 26, 2007

Mr. Jack Whitten
U.S. Nuclear Regulatory Commission, Region IV
Division of Radiation Safety & Safeguards
611 Ryan Plaza Drive, Suite # 400
Dallas, TX 76011-4351

Re: Semi-Annual Effluent and Environmental Monitoring Report from July to December, 2006

Dear Mr. Whitten:

In compliance with our Nuclear Regulatory Commission Radioactive Material License No. SUA-1475, Amendment No. 34, Condition 12 and 30; the attached Effluent and Environmental Monitoring Report is described and presented as listed below. The applicable and available data will specify the concentration of each principle radionuclide released to unrestricted areas in water effluent during the period of July 01, 2006 through December 31, 2006. The data is also reported on the format required in regulatory Guide 4.14.

Available monitoring data in this report are in order as listed below:

- Environmental Inspection Report (continued this procedure to show and maintain the integrity of the restricted tailings area.)
- Ground Water Result (available data on GW-3 Well).
- Sample Location

Presently, our environmental monitoring program is limited and the above reported items are solely based on available data only. The required radiation monitoring and protection program will be under an RWP (Radiation Work Permit) and no RWP was issued during this semi-annual period.

Additionally, our active radiation monitoring instruments are routinely calibrated and the personnel radiation monitoring and protection program under RWP is still in effect but in standby status awaiting the final pond closure reclamation activity.

Sincerely,

Max Chischilly, Jr.
Radiation Safety Officer-UNC

MC

Enclosure

Cc: Gary Jonosko, NRC
Paul Michalak, NRC
Roy Blickwedel, GE
Steve Hill, GE

ENVIRONMENTAL INSPECTION REPORTS

ENVIRONMENTAL INSPECTION

DATE: 7-31-06 TIME START: 1020

INSPECTOR: Mag Chadilly Jr. TIME END: 1200

TAILINGS AREA:	OKAY	PROBLEM	COMMENTS
1. Fences		✓	See below
2. Air Monitors	— NA	—	monitor only under an RWP if needed
3. Radiation Warning Signs	✓		
4. Locked Gates	✓		

ACTION TAKEN: Major flood events had occurred on 7-10-06 and 7-11-06 which damaged or downed the perimeter fenceline on UNC's Sec. 36 and Sec. 2 (location of reclaimed tailings) property areas. Thereby, the following conditions and actions were as follows:

Section 2 AREA

1) 240' of downed fenceline located across/east of reclaimed Borrow Pit #2 was repaired on 7-20-06.

2) 180' of downed fenceline located in the northern portion near the main gate entrance was repaired on 7-21-06.

3) Pending action until after the rainy season, to lift/empty 2 sediment filled steel culverts and repair 20' of downed fenceline around it (near the main gate entrance) which will be done after the rainy season.

4) Daily surveliance was done to keep out livestock and 8 heads of cattle was chased out on 7-21-06.

Section 36 AREA

1) 100' of downed fenceline located in the northern most portion near a cattle guard was repaired/straighten out on 7-13-06 including 2 arroya area fence.

2) Daily surveliance was done to keep out livestock.

Finally, no livestock was observed during today's inspection.

ENVIRONMENTAL INSPECTION

DATE: 8-30-06 TIME START: 1350

INSPECTOR: Mark Chischilly Jr. TIME END: 1458

TAILINGS AREA:	OKAY	PROBLEM	COMMENTS
1. Fences	✓		Also see below
2. Air Monitors	— NA	—	Under an RWP if needed
3. Radiation Warning Signs	✓		
4. Locked Gates	✓		

ACTION TAKEN: Pending action is still active as described on the 7-31-06 report under Section 2, No. 3. Daily surveillance is ongoing to keep out livestock and were chased out of Section 36 (not tailings area) on 4 different days during the month of August.

ENVIRONMENTAL INSPECTION

DATE: 9-29-06 TIME START: 1445

INSPECTOR: Mal Chudley Jr. TIME END: 1550

TAILINGS AREA:	OKAY	PROBLEM	COMMENTS
1. Fences	✓		See below
2. Air Monitors	— NA	—	Monitor only under an RWP if needed.
3. Radiation Warning Signs	✓		
4. Locked Gates	✓		

ACTION TAKEN: Pending action to repair 20' of downed fence line was done near the main gate entrance drainage culvert area (see also the 7-31-06 report under Section 2 area, item #3).

ENVIRONMENTAL INSPECTION

DATE: 10-31-06 TIME START: 1410

INSPECTOR: Mary Chisolly J. TIME END: 1500

TAILINGS AREA:	OKAY		PROBLEM	COMMENTS
1. Fences	✓			
2. Air Monitors	—	NA	—	Under RWP
3. Radiation Warning Signs	✓			
4. Locked Gates	✓			

ACTION TAKEN:

ENVIRONMENTAL INSPECTION

DATE: 11-30-06 TIME START: 1100

INSPECTOR: Mag Chailly D. TIME END: 1155

TAILINGS AREA:	OKAY	PROBLEM	COMMENTS
1. Fences	✓		See below
2. Air Monitors	— NA	—	Under RWP
3. Radiation Warning Signs	✓		
4. Locked Gates	✓		

ACTION TAKEN: Small temporary opening is made (≈6' long) along fenceline near the main entrance gate for access to install an underground domestic water pipe feed line to storage tanks as part of the In-Situ Alkalinity Stabilization Pilot Study project. This opening is closely monitored to prevent livestock or unauthorized entry and will be closed after the pipe is installed.

ENVIRONMENTAL INSPECTION

DATE: 12-20-06 TIME START: 1320

INSPECTOR: Mac Chisholm Jr. TIME END: 1422

TAILINGS AREA:	OKAY		PROBLEM	COMMENTS
1. Fences	✓			
2. Air Monitors	—	NA	—	Under RWP
3. Radiation Warning Signs	✓			
4. Locked Gates	✓			

ACTION TAKEN:

GROUNDWATER RESULTS

QUARTERLY LIQUID SAMPLES

Date/Qr.	Location	Type	Radionuclide	Concentration Mg/l	Concentration µci/ml	Error Est. µci/ml	LLD µci/ml
07/18/06	GW-3	GROUND	U-Nat (dissolved) or total		7.92E-08		2.00E-10
3RD-QR.		WATER WELL					
			Th-230 (dissolved) or total		2.00E-10		2.00E-10
			Ra-266 (dissolved) or total		4.00E-10	2.00E-10	2.00E-10
			Pb-210 (dissolved) or total		1.00E-09		1.00E-09
			Po-210 (dissolved) or total				1.00E-09

UNC Field Data:
PH (STD. Units) = 6.33
Cond. (µ MHOS) = 5,240
Water Depth (Ft.) = 51.40
Temp. (°C) = 20.1

COMMENTS:

QUARTERLY LIQUID SAMPLES

Date/Qr.	Location	Type	Radionuclide	Concentration Mg/l	Concentration µci/ml	Error Est. µci/ml	LLD µci/ml
10/03/06	GW-3	GROUND	U-Nat (dissolved) or total		7.58E-08		2.00E-10
4TH-QR.		WATER WELL					
			Th-230 (dissolved) or total		2.00E-10		2.00E-10
			Ra-266 (dissolved) or total		2.00E-10		2.00E-10
			Pb-210 (dissolved) or total		1.00E-09		1.00E-09
			Po-210 (dissolved) or total				1.00E-09

UNC Field Data:
PH (STD. Units) = 6.44
Cond. (µ MHOS) = 5,180
Water Depth (Ft.) = 51.45
Temp. (°C) = 17.2

COMMENTS:

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LABORATORY ANALYTICAL REPORT

Client: United Nuclear Corp
Project: Alluvium
Lab ID: C06070992-014
Client Sample ID: GW-3

Report Date: 08/22/06
Collection Date: 07/18/06 13:04
DateReceived: 07/21/06
Matrix: Aqueous

Analyses	Result	Units	Qualifiers	RL	MCL/ QCL	Method	Analysis Date / By
MAJOR IONS							
Bicarbonate as HCO3	1580	mg/L		1		A2320 B	07/25/06 11:22 / th
Calcium	978	mg/L	D	0.6		E200.7	07/28/06 15:35 / ts
Chloride	167	mg/L		1		E200.7	07/28/06 15:32 / ts
Magnesium	328	mg/L	D	0.5		E200.7	07/28/06 15:35 / ts
Nitrogen, Ammonia as N	0.07	mg/L		0.05		A4500-NH3 G	07/24/06 12:28 / jal
Nitrogen, Nitrate+Nitrite as N	91	mg/L	D	2		E353.2	07/26/06 11:14 / jal
Potassium	10.2	mg/L		0.5		E200.7	07/28/06 15:32 / ts
Sodium	293	mg/L		0.5		E200.7	07/28/06 15:32 / ts
Sulfate	2360	mg/L	D	8		E200.7	07/28/06 15:35 / ts
PHYSICAL PROPERTIES							
pH	6.88	s.u.		0.01		A4500-H B	07/26/06 15:44 / th
Solids, Total Dissolved TDS @ 180 C	5290	mg/L		10		A2540 C	07/26/06 16:13 / jdh
METALS - TOTAL							
Aluminum	ND	mg/L		0.1		E200.8	07/25/06 02:03 / bws
Beryllium	ND	mg/L		0.01		E200.8	07/25/06 02:03 / bws
Cadmium	ND	mg/L		0.005		E200.8	07/25/06 02:03 / bws
Cobalt	0.01	mg/L		0.01		E200.8	07/25/06 02:03 / bws
Lead	ND	mg/L		0.05		E200.8	07/25/06 02:03 / bws
Manganese	1.81	mg/L		0.01		E200.8	07/25/06 02:03 / bws
Molybdenum	ND	mg/L		0.1		E200.8	07/25/06 02:03 / bws
Nickel	ND	mg/L		0.05		E200.8	07/25/06 02:03 / bws
Uranium	0.117	mg/L		0.0003		E200.8	07/25/06 02:03 / bws
Vanadium	ND	mg/L		0.1		E200.8	07/25/06 02:03 / bws
METALS - SPECIATED							
Arsenic-III	ND	mg/L		0.001		A3114 B	07/27/06 15:42 / sml
Selenium-IV	ND	mg/L		0.001		A3114 B	07/27/06 11:26 / sml
RADIONUCLIDES - TOTAL							
Gross Alpha minus Rn & U	ND	pCi/L		1.0		E900.1	07/28/06 15:20 / rs
Lead 210	ND	pCi/L		1.0		NERHL-65-4	08/01/06 13:15 / df
Radium 226	0.4	pCi/L		0.2		E903.0	08/02/06 15:55 / trs
Radium 226 precision (±)	0.2	pCi/L				E903.0	08/02/06 15:55 / trs
Radium 228	1.8	pCi/L		1.0		RA-05	07/28/06 11:16 / pj
Radium 228 precision (±)	0.8	pCi/L				RA-05	07/28/06 11:16 / pj
Thorium 230	ND	pCi/L		0.2		E907.0	08/01/06 08:30 / df

Report Definitions:
RL - Analyte reporting limit.
QCL - Quality control limit.
D - RL increased due to sample matrix interference.
MCL - Maximum contaminant level.
ND - Not detected at the reporting limit.

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LABORATORY ANALYTICAL REPORT

Client: United Nuclear Corp
Project: Alluvium
Lab ID: C06070992-014
Client Sample ID: GW-3

Report Date: 08/22/06
Collection Date: 07/18/06 13:04
DateReceived: 07/21/06
Matrix: Aqueous

Analyses	Result	Units	Qualifiers	RL	MCL/ QCL	Method	Analysis Date / By
DATA QUALITY							
A/C Balance (± 5)	1.51	%				Calculation	08/01/06 14:17 / cp
Anions	86.3	meq/L				Calculation	08/01/06 14:17 / cp
Cations	88.9	meq/L				Calculation	08/01/06 14:17 / cp
Solids, Total Dissolved Calculated	5330	mg/L				Calculation	08/01/06 14:17 / cp
TDS Balance (0.80 - 1.20)	0.990	dec. %				Calculation	08/01/06 14:17 / cp
VOLATILE ORGANIC COMPOUNDS							
Chloroform	ND	ug/L		1.0		E624	07/29/06 03:43 / jlr
Surr: 1,2-Dichlorobenzene-d4	105	%REC			80-120	E624	07/29/06 03:43 / jlr
Surr: Dibromofluoromethane	96.0	%REC			80-120	E624	07/29/06 03:43 / jlr
Surr: p-Bromofluorobenzene	98.0	%REC			80-120	E624	07/29/06 03:43 / jlr
Surr: Toluene-d8	100	%REC			80-120	E624	07/29/06 03:43 / jlr

Report Definitions:
RL - Analyte reporting limit.
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LABORATORY ANALYTICAL REPORT

Client: United Nuclear Corp
Project: Alluvium
Lab ID: C06100367-015
Client Sample ID: GW-3

Report Date: 11/10/06
Collection Date: 10/03/06 14:18
DateReceived: 10/06/06
Matrix: Aqueous

Analyses	Result	Units	Qualifiers	RL	MCL/ QCL	Method	Analysis Date / By
MAJOR IONS							
Bicarbonate as HCO3	1590	mg/L		1		A2320 B	10/15/06 18:01 / bmm
Calcium	865	mg/L	D	0.6		E200.7	10/20/06 17:07 / ts
Chloride	149	mg/L		1		E200.7	10/23/06 14:46 / ts
Magnesium	289	mg/L	D	0.5		E200.7	10/20/06 17:07 / ts
Nitrogen, Ammonia as N	0.16	mg/L		0.05		A4500-NH3 G	10/09/06 10:55 / jal
Nitrogen, Nitrate+Nitrite as N	100	mg/L	D	2		E353.2	10/10/06 15:00 / jal
Potassium	9.0	mg/L		0.5		E200.7	10/20/06 16:44 / ts
Sodium	253	mg/L		0.5		E200.7	10/20/06 16:44 / ts
Sulfate	1920	mg/L	D	8		E200.7	10/20/06 17:07 / ts
PHYSICAL PROPERTIES							
pH	6.78	s.u.		0.01		A4500-H B	10/09/06 09:24 / th
Solids, Total Dissolved TDS @ 180 C	5070	mg/L		10		A2540 C	10/09/06 09:32 / th
METALS - TOTAL							
Aluminum	0.1	mg/L		0.1		E200.8	10/12/06 22:42 / bws
Beryllium	ND	mg/L		0.01		E200.8	10/12/06 22:42 / bws
Cadmium	ND	mg/L		0.005		E200.8	10/12/06 22:42 / bws
Cobalt	ND	mg/L		0.01		E200.8	10/12/06 22:42 / bws
Lead	ND	mg/L		0.05		E200.8	10/12/06 22:42 / bws
Manganese	1.85	mg/L		0.01		E200.8	10/12/06 22:42 / bws
Molybdenum	ND	mg/L		0.1		E200.8	10/12/06 22:42 / bws
Nickel	ND	mg/L		0.05		E200.8	10/12/06 22:42 / bws
Uranium	0.112	mg/L		0.0003		E200.8	10/12/06 22:42 / bws
Vanadium	ND	mg/L		0.1		E200.8	10/12/06 22:42 / bws
METALS - SPECIATED							
Arsenic-III	ND	mg/L		0.001		A3114 B	10/20/06 15:27 / kes
Selenium-IV	ND	mg/L		0.001		A3114 B	10/23/06 15:21 / kes
RADIONUCLIDES - TOTAL							
Gross Alpha minus Rn & U	ND	pCi/L		1.0		E900.1	10/24/06 06:50 / trs
Lead 210	ND	pCi/L		1.0		NERHL-65-4	10/20/06 10:30 / pj
Radium 226	ND	pCi/L		0.2		E903.0	10/24/06 15:54 / trs
Radium 228	ND	pCi/L		1.0		RA-05	10/18/06 14:15 / pj
Thorium 230	ND	pCi/L		0.2		E907.0	10/25/06 14:30 / df
DATA QUALITY							
A/C Balance (± 5)	4.74	%				Calculation	10/30/06 14:36 / cp
Anions	71.3	meq/L				Calculation	10/30/06 14:36 / cp
Cations	78.4	meq/L				Calculation	10/30/06 14:36 / cp
Solids, Total Dissolved Calculated	4540	mg/L				Calculation	10/30/06 14:36 / cp
TDS Balance (0.80 - 1.20)	1.12	dec. %				Calculation	10/30/06 14:36 / cp

Report Definitions:
RL - Analyte reporting limit.
MCL - Maximum contaminant level.
QCL - Quality control limit.
ND - Not detected at the reporting limit.
D - RL increased due to sample matrix interference.

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LABORATORY ANALYTICAL REPORT

Client:	United Nuclear Corp	**Report Date:**	11/10/06
Project:	Alluvium	**Collection Date:**	10/03/06 14:18
Lab ID:	C06100367-015	**DateReceived:**	10/06/06
Client Sample ID:	GW-3	**Matrix:**	Aqueous

Analyses	Result	Units	Qualifiers	RL	MCL/ QCL	Method	Analysis Date / By
VOLATILE ORGANIC COMPOUNDS							
Bromodichloromethane	ND	ug/L		0.50		E624	10/11/06 03:47 / jlr
Bromoform	ND	ug/L		0.50		E624	10/11/06 03:47 / jlr
Chlorodibromomethane	ND	ug/L		0.50		E624	10/11/06 03:47 / jlr
Chloroform	ND	ug/L		0.50		E624	10/11/06 03:47 / jlr
Trihalomethanes, Total	ND	ug/L		0.50		E624	10/11/06 03:47 / jlr
Surr: 1,2-Dichlorobenzene-d4	99.0	%REC			80-120	E624	10/11/06 03:47 / jlr
Surr: Dibromofluoromethane	96.0	%REC			80-120	E624	10/11/06 03:47 / jlr
Surr: p-Bromofluorobenzene	94.0	%REC			80-120	E624	10/11/06 03:47 / jlr
Surr: Toluene-d8	100	%REC			80-120	E624	10/11/06 03:47 / jlr

Report Definitions: RL - Analyte reporting limit. MCL - Maximum contaminant level.
QCL - Quality control limit. ND - Not detected at the reporting limit.

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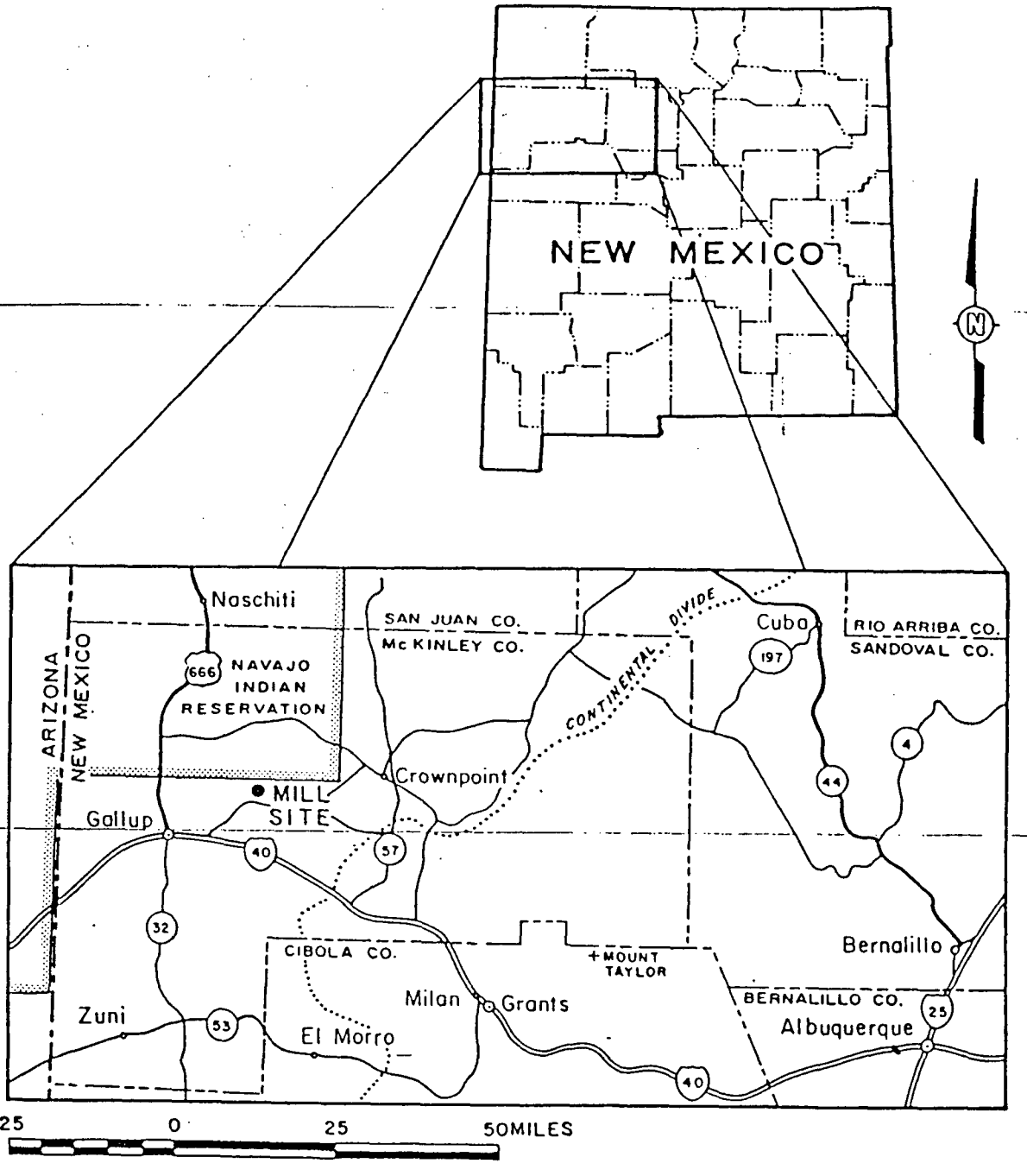
UNC Mining and Milling ChurchRock Operations					
GroundWater Monitoring Summary: Alluvium Monitor Wells					
Well ID:		GW-3	GW-3	GW-3	GW-3
Collection Date:		10/3/2006	7/18/2006	4/4/2006	1/9/2006
Receive Date:		10/6/2006	7/21/2006	4/7/2006	1/13/2006
Report Date:		11/8/2006	8/21/2006	5/12/2006	2/22/2006
Analyte	Units	C06100367-015	C06070992-014	C06040330-014	C06010650-014
Bicarbonate as HCO3	mg/L	1590	1580	1460	1650
Calcium	mg/L	865	978	977	843
Chloride	mg/L	149	167	183	152
Magnesium	mg/L	289	328	337	285
Nitrogen, Ammonia as N	mg/L	0.16	0.07	0.24	ND(0.05)
Nitrogen, Nitrate+Nitrite as N	mg/L	100	91	94	90
Potassium	mg/L	9.0	10.2	9.0	6.4
Sodium	mg/L	253	293	258	272
Sulfate	mg/L	1920	2360	2150	1940
pH	s.u.	6.78	6.88	7.14	7.62
Solids, Total Dissolved TDS @ 180 C	mg/L	5070	5290	5300	5100
Aluminum	mg/L	0.1	ND(0.1)	ND(0.1)	ND(0.1)
Beryllium	mg/L	ND(0.01)	ND(0.01)	ND(0.01)	ND(0.01)
Cadmium	mg/L	ND(0.005)	ND(0.005)	ND(0.005)	ND(0.005)
Cobalt	mg/L	ND(0.01)	0.01	0.01	ND(0.01)
Lead	mg/L	ND(0.05)	ND(0.05)	ND(0.05)	ND(0.05)
Manganese	mg/L	1.85	1.81	1.79	1.81
Molybdenum	mg/L	ND(0.1)	ND(0.1)	ND(0.1)	ND(0.1)
Nickel	mg/L	ND(0.05)	ND(0.05)	ND(0.05)	ND(0.05)
Uranium	mg/L	0.112	0.117	0.0975	0.115
Vanadium	mg/L	ND(0.1)	ND(0.1)	ND(0.1)	ND(0.1)
Arsenic-III	mg/L	ND(0.001)	ND(0.001)	ND(0.001)	ND(0.001)
Selenium-IV	mg/L	ND(0.001)	ND(0.001)	ND(0.001)	ND(0.001)
Gross Alpha minus Rn & U	pCi/L	ND(1.0)	ND(1.0)	ND(1.0)	ND(1.0)
Gross Alpha minus Rn & U Precision (±)	pCi/L				
Lead 210	pCi/L	ND(1.0)	ND(1.0)	ND(1.0)	ND(1.0)
Lead 210 precision (±)	pCi/L				
Radium 226	pCi/L	ND(0.2)	0.4	ND(0.2)	ND(0.2)
Radium 226 precision (±)	pCi/L		0.2		
Radium 228	pCi/L	ND(1.0)	1.8	2.3	1.1
Radium 228 precision (±)	pCi/L		0.8	0.9	0.8
Thorium 230	pCi/L	ND(0.2)	ND(0.2)	ND(0.2)	ND(0.2)
Thorium 230 precision (±)	pCi/L				
A/C Balance (± 5)	%	4.74	1.51	4.49	-0.258
Anions	meq/L	71.3	86.3	80.5	78.0
Cations	meq/L	78.4	88.9	88.1	77.6
Solids, Total Dissolved Calculated	mg/L	4540	5330	5060	4720
TDS Balance (0.80 - 1.20)	dec. %	1.12	0.990	1.05	1.08
Trihalomethanes, Total	ug/L	ND(0.50)	NA	NA	NA
Chloroform	ug/L	ND(0.50)	ND(1.0)	ND(1.0)	ND(1.0)

****Note: The data presented on this form is intended for summary purposes only. Laboratory approved data is contained within the attached database reports.**

kls: r:\clients2006\unc_mining\unc_gallup_4th_2006_final.xls

SAMPLING LOCATION MAPS



SOURCE:
URANIMIUM MILL LICENSE RENEWAL APPLICATION- ENVIRONMENTAL REPORT. LICENSE NO. NM-UNC-ML. JNC 1981

SKETCH 1-1
CHURCH ROCK PROJECT
SITE LOCATION PLAN
16674-000

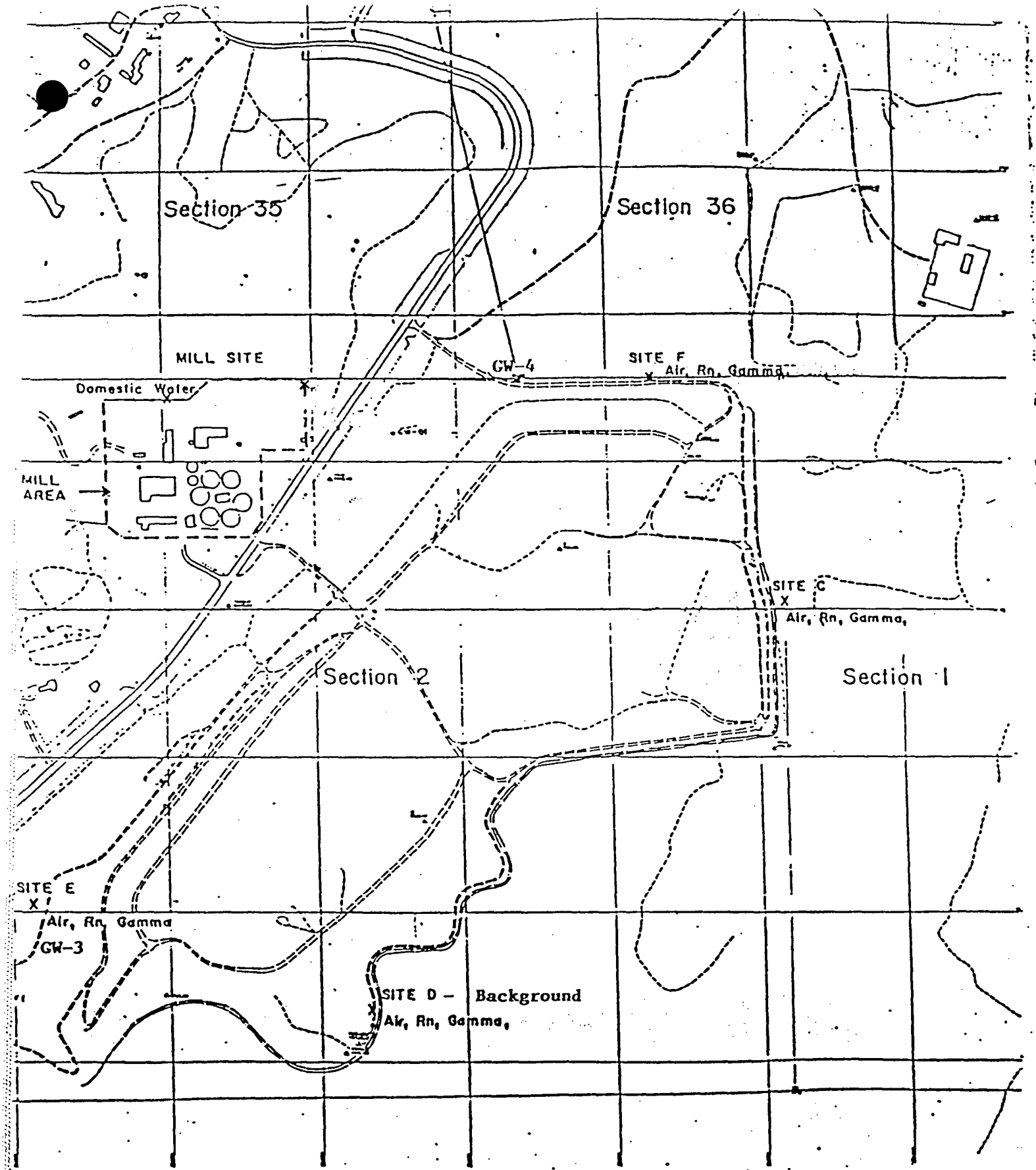

Section 35
Section 36
MILL SITE
GW-4
SITE F
Air, Rn, Gamma
Domestic Water
MILL AREA
SITE C
Air, Rn, Gamma
Section 2
Section 1
SITE E
Air, Rn, Gamma
GW-3
SITE D – Background
Air, Rn, Gamma

FIGURE 2