UMTRA GROUND WATER PROJECT

DATA VALIDATION FOR THE GUNNISON, CO UMTRA SITE

June 1997
Water Sampling

Prepared by the

U.S. Department of Energy
Grand Junction Projects Office

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GUNNISON, COLORADO
Sampled June 1997

DATA PACKAGE CONTENTS

This data package includes the following information:

Item No.	Description of Contents
1.	**Site Sampling Lead/ Site Hydrologist Summary**
2.	**Data Package Assessment,** which includes the following: a. Field procedures verification checklist b. Confirmation that chain-of-custody was maintained. c. Confirmation that holding time requirements were met. d. Evaluation of the adequacy of the QC sample results.
3.	**Data Assessment Summary,** which describes problems identified in the data validation process and summarizes the validator's findings.
4.	**Suspected Anomalies Reports** generated by the UMTRA database system. This report compares the new data set with historical data and designates "suspected anomalies" based on the many criteria listed as footnotes on each page. In aggregate, these criteria cause the suspected anomaly program to be very conservative; many of the data shown in the tables are not, in the evaluators judgment, truly anomalies, but merely natural variations in data or routine changes in laboratory detection limits. The designation "OK" affirms the judgment that the particular entry is not an anomaly and, therefore, requires no further inquiry.
5.	**Anomalous Data Review Checksheets** which list the subset of data from the Suspected Anomalies Report that merits explanation or follow-up action. The "Disposition" column of this report describes the evaluators judgments on the listed anomalies.
6.	**UMTRA Database Printouts** of analytical data organized as follows: a. Ground Water Quality Data (included on disk) b. Surface Water Data (included on disk) c. Field QC Sample Data (included on disk) d. Static Groundwater Level Measurement Data
7.	**Sampling and Analysis Work Order and Trip Report.**

Site Sampling Lead Summary

Site: Gunnison

Sampling Period: June 1997

SUMMARY CRITERIA

1. **Did concentrations in water from any domestic wells sampled exceed a primary drinking water standard or health advisory?**

   The uranium concentration (0.029 mg/L) in the sample from domestic well 455 exceeded the proposed primary drinking water standard of 0.020 mg/L.

2. **Were standards exceeded at any point-of-compliance wells?**

   Analyte concentrations in point-of-compliance wells were below the concentration limits listed in the *Long Term Surveillance Plan for the Gunnison, Colorado, Disposal Site.*

3. **As a result of this sampling round, is there any indication of contaminated ground water movement?**

   There is no indication of recent movement of contaminated ground water; however, previous ground water sampling at the Gunnison site has indicated that contamination has been present in the alluvial aquifer system. Contaminant plume movement will be evaluated during the revision of the Site Observational Work Plan.

4. **Is there statistical evidence that UMTRA Project related contaminants were detected in a surface body of water in greater concentrations than upstream ambient water quality?**

   Surface water samples were collected from the Gunnison River at locations 792 (upgradient of the site) and 795 (downgradient of the site). Because this was the first time these locations were sampled, a statistical comparison is not possible. However, sample concentrations of cadmium, gross alpha, radium-226, radium-228, and uranium were below detection at both locations or were detected in a greater concentration in the upgradient sample. These results indicate minimal impact to downgradient water quality in the Gunnison River.

Site Sampling Lead Summary (continued)

Wells with sample concentrations that exceeded UMTRA ground water standards are listed in Table 1.

Table 1. Gunnison Wells where UMTRA Standards were Exceeded in April 1997.

Analyte	Standard (mg/L)[1]	Site	Wells Exceeding Standards (Concentration[1])
Gross Alpha[2]	15	GUN01	136 (16.19)
Uranium	0.044	GUN01	006 (0.880), 014 (0.620), 113 (0.361), 130 (0.337)

[1] Units are in mg/L for inorganic analytes and pCi/L for radiological analytes.
[2] Values displayed include uranium; however, uranium activities were subtracted from the gross alpha results in order to compare to the standard, which excludes uranium and radon.

David Miller
Site Sampling Lead

8/18/97
Date

Roberta Bowen
Site Hydrologist

8/18/97
Date

DATA ASSESSMENT

UGW Water Sampling Field Activities Verification Checklist

Project Gunnison

Date(s) of Ground Water Sampling June 1997

Date(s) of Verification 8-13-97

Name of Verifier Sam Campbell

	Response (Yes, No, N/A)	Comments
1 Is the SAP the primary document directing field procedures?	Yes	
List other documents, SOPs, Instructions		Work order memo 5-1-97
2. Were the sampling locations specified in the planning documents sampled?	No	Domestic well 600 was not sampled due to a non-functic pump and lack of access.
3 Was field equipment calibrated as specified in the above named documents?	Yes	
Were the number and types (alkalinity, temperature, conductivity pH, turbidity, DO, Eh) of field measurements taken as specified?	Yes	
Were the standard solutions used for the calibration and operational checks of the field instruments brought to within 10°C of the temperature of the water to be sampled?	No	155 (10.6°), 469 (11.2°)
Was the calibration information recorded on the field data sheets?	Yes	
4. Was a duplicate alkalinity measurement conducted on a frequency of one duplicate per 20 samples?	Yes	
5. Was depth to water measured before purging?	Yes	
Was this information used to calculate the purge volume?	Yes	
6 If conventional purging was used, were the wells purged until parameters stabilized and 3 casing volumes were removed or until the well was purged dry?	Yes	
7 If low-flow purging was used, was the purge rate less than 0 125 gal/min, and was the drawdown less than 0 3 feet?	NA	

8 Were duplicates taken at a frequency of one per 20 samples?	Yes	
9 Were equipment blanks taken at a frequency of one per 20 samples that were collected with nondedicated equipment?	Yes	
10 Were trip blanks prepared and included with each shipment of VOC samples?	NA	
11 Were QC samples assigned a fictitious site identification number?	Yes	
Was the true identity of the samples recorded in the field notes?	Yes	
12 Were samples collected in the containers specified?	Yes	
Were certified pre-cleaned containers used for the sampling?	Yes	
13 Were samples filtered and preserved as specified?	Yes	
14 Were the number and types of samples collected as specified?	Yes	
15 Were chain of custody records completed and was sample custody maintained?	Yes	
16 Were sample ticket book numbers recorded in the field notebook, on field data forms, and on the chain of custody?	Yes	
17 Are field notebooks and field data sheets signed and dated by the field team leader?	Yes	
18 Was all other pertinent information documented on the field data sheets forms?	Yes	
19 Was the presence or absence of ice in the cooler documented in the field notebook for every sample location?	No	Several locations not documented.
20 Were water levels measured at the locations specified in the planning documents?	Yes	

DATA PACKAGE ASSESSMENT

REQUISITION NUMBERS: 15474/15475 SITE: Gunnison LABORATORY: GTC ANALYSIS DATES: 6-97/7-97

REVIEWER: Sam Campbell (NAME (prnt)) Sam Campbell (SIGNATURE) 8-12-97 (DATE)

	ICP-MS	ICP-AES	GFAA	FAA	$NaBH_4$	AS	LSc	PC	IC	Gravimetric	Colorimetric	Other β-γcc	
CHAIN OF CUSTODY	ok	ok	NA	NA	NA	ok	ok	ok	ok	ok	NA	ok	—
HOLDING TIME	ok	ok				ok	ok	ok	ok	ok		ok	—
CALIB. VERIFICATION (For AS, internal tracer)	ok	ok				ok	ok	ok	ok	NA		ok	—
PREP. BLANKS (Only if digestion)	ok	*				ok	ok	ok	*	NA		ok	—
INT. CAL. BLANKS	*	*				NA	NA	NA	*	NA		NA	—
CONT. CAL. BLANKS	**	*				NA	NA	NA	**	NA		NA	—
ICS (ICP ONLY)	ok	ok	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	—
LCS	ok	ok				ok	ok	ok	ok	ok		ok	—
DUPLICATES	ok	ok				ok	ok	+	ok	ok		ok	—
POSTDIGEST. SPKS. (Only if MS fails)	NA	NA				NA	NA	NA	NA	NA	NA	NA	~~NA~~
MATRIX SPKS.	ok	ok				NA	ok	ok	ok	NA		NA	—
OVERALL ASSESS.	ok	ok				ok	ok	ok	ok	ok		ok	—

REVIEWER COMMENTS: * Blank contamination - no samples affected.
** Blank contamination - samples affected - see Data Assessment Summary.
+ Duplicate samples did not meet criteria - see Data Assessment Summary.

ITEMS REQUIRING ATTENTION:

GUNNISON, COLORADO
APRIL 1997 SAMPLING
DATA ASSESSMENT SUMMARY

The DOE-GJO Analytical Laboratory analyzed samples and reported results for this sampling event under requisition number 15474 for the UMTRA Groundwater Project and requisition number 15475 for the UMTRA Surface Project.

RADIOCHEMICAL ANALYSIS

The determination of gross alpha was performed using gas proportional counting (PC). The determination of polonium-210 was performed using alpha spectrometry. Lead-210 was analyzed by liquid scintillation spectrometry. Radium-226 was analyzed by alpha spectroscopy and radium-228 by beta/gamma coincidence counting. Thorium-230 was analyzed by inductively coupled plasma-mass spectrometry (ICP-MS). Although not requested, gross beta results are included in this report because gross beta activity is determined concurrently with gross alpha activity. Except as noted, all quality control requirements were met during the course of these analyses.

The detection limits for gross alpha are higher than those specified in the planning documents due to high TDS in the samples.

Radiological results that were less than the MDA and/or the 3-sigma counting statistic range were qualified with a non-detect flag (U) in the data base, as reflected on the Ground Water Quality Data by Parameter or Surface Water Quality Data by Parameter printout.

The thorium-230 result from sample 244498 (014) was qualified with a "U" flag because of continuing calibration blank (CCB) contamination

The following gross alpha and gross beta results were qualified with a "J" flag because laboratory duplicate did not meet criteria: gross alpha results 244426 (132), 244427 (132 duplicate), 244428 (130), 244429 (188), 244430 (088), 244431 (186), 244432 (equipment blank), 244433 (006), 244434 (equipment blank), 244435 (106), 244436 (106 duplicate), 244437 (468), 244488 (145), 244489 (147), 244490 (013), 244491 (155), 244492 (157), 244493 (189); and gross beta results 244494 (136), 244495 (059), 244496 (058), 244497 (122), 244498 (014), 244499 (113), 244500 (170), 244501 (125), 244502 (126), 244503 (127), 244504 (792), 244505 (795), 244506 (795 duplicate).

METALS/MAJOR CATIONS ANALYSIS

The determination of calcium, cobalt, iron, magnesium, manganese, potassium, and sodium was performed by inductively coupled plasma-atomic emission spectrometer (ICP-AES). Cadmium and uranium were analyzed by ICP-MS. Except as noted, all quality control requirements were met during the course of these analyses

INORGANIC ANALYSIS

Chloride, nitrate, and sulfate were determined by ion chromatography (IC). TDS was determined gravimetrically. All quality control requirements were met during the course of these analyses.

The following chloride and nitrate results were qualified with a "U" because of CCB contamination: chloride results 244432 (equipment blank), 244504 (792), 244505 (795), 244506 (795 duplicate); and nitrate results 244436 (106 duplicate), 244491 (155), 244492 (157), 244493 (189).

FIELD ANALYSIS/ACTIVITIES

The pH measured at well 136 was 12.08; therefore data from this well was qualified with a "G" flag indicating potential grout contamination.

Wells 725, 724, 723, 157, and 136 were purged dry prior to three casing volumes being removed. Because these wells were purged dry, it was assumed that all of the stagnant water in the well casing was removed, and the sample collected was representative of the formation water. Therefore, results from this well will not be qualified with an "L" flag in the database.

Two equipment blanks were collected for the 33 locations where samples were collected using non-dedicated equipment. The equipment blanks were analyzed for the same constituents as the Gunnison environmental samples. There were no UMTRA related contaminants detected in the equipment blank in concentrations above the CRDL or MDA/3-sigma.

Four field duplicates were collected for the 42 locations sampled. Duplicate samples were collected from wells 683, 132, and 106 and surface location 795. There is no established regulatory criteria for the evaluation of field duplicate samples. However, using the EPA guidance for *laboratory* duplicates (which is conservative for field duplicates), inorganic duplicate sample results met the laboratory duplicate criteria and are considered acceptable. Only one radiological duplicate, radium-226 results from well 106, did not have 3σ agreement between duplicate results.

SAR

A problem in the SEEUMTRA database precludes the generation of a Suspected Anomalies Report (SAR) for the landfill (GUN 08) area at the Gunnison site. ***Instead, historical data were reviewed as part of the evaluation of suspected anomalous data.*** Data from the Gunnison site were compared to historical minimum and maximum values. Results from this sampling event that were new all-time maximums or all-time minimums (excluding results with less than 4 historical data points) are listed on the Anomalous Data Review Checksheet and will be compared to results of the next sampling round to make a final determination of validity.

A SAR was produced for the Gunnison repository data. Values listed in the SAR were considered valid if: (1) identified low concentrations were the result of low detection limits; (2) the concentration detected was within the concentration range during the previous sampling events; or (3) there were fewer than 4 historical samples for comparison.

Results that did not meet the above criteria are listed on the Anomalous Data Review Checksheet; these values will be compared to the results of the next sampling round to make a final determination of validity. At this time, all data from this sampling event may be treated as final results.

SUMMARY

All analytical quality control criteria were met except as qualified on the Ground Water Quality Data by Parameter printout. The meaning of data qualifiers is as defined on the UMTRA database printout or as defined in the USEPA Contract Laboratory Program Statement of Work for Inorganic Analysis, Multi-Media Multi-Concentration, Document Number ILM02.0, 1991. All data in this package meet the validation criteria and may be treated as final results.

A disk copy of the Ground Water Quality Data by Parameter database printout with the qualifiers incorporated is included in this package.

D J Miller 8/18/97

Dave Miller
Site Sampling Lead

Date

Robert C Bowen 8/18/97

Roberta Bowen
Site Hydrologist

Date

SAR

Site : GUN06 LANDFILL GUNNISO Test Data Date Range : 6/1/97 to 6/30/97 Older Data Only Used for Baseline Data 27 Chemical Records 161 History Records

LOC. ID.	ERR. TYPE FLAG	PARAM CODE / UNITS	ANOMALOUS TEST DATA POINT: LOG DATE	SAMPLE	VALUE	FLAGS	UNCERTAINTY	DETLIM	# OF SAMP. / %NON DETEC	ALL TIME MINIMUMS / ALL TIME MAXIMUMS		LOWER BOUND / UPPER BOUND	3 MOST RECENT SAMPLING EVENTS: LOG DATE	SAMPLE	VALUE	FLAGS	UNCERTAINTY	DETLIM	LOG DATE	SAMPLE	VALUE	FLAGS	UNCERTAINTY	DETLIM
0609	3	FE	6/3/97	0001	0.0010				6	0.010	0.030	0.0067	4/26/92	0001	0.0300				2/21/91	0001	0.2200			
	ok	mg/L	U		0.001				66.667	0.030	0.220	0.3300	U	0	0.03					0	0.03			
	5	TDS	6/3/97	0001	347.0000				6	336.000	339.000	358.5351	4/26/92	0001	363.0000				2/21/91	0001	340.0000			
	ok	mg/L							0	351.000	363.000	400.9786		0	10					0	10			
	5	U	6/3/97	0001	0.0037				6	0.003	0.003	0.0068	4/26/92	0001	0.0070				2/21/91	0001	0.0033			
	ok	mg/L							0	0.004	0.007	0.0133		0	0.001					0	0.0003			
0718	6	CACO3	6/10/97	N001	152.0000				7	147.000	161.000	129.4466	10/27/95	N001	162.0000				6/3/95	N001	161.0000			
	ok	mg/L							0	216.000	216.000	148.9595		0	10					0	10			
	5	FE	6/10/97	0001	0.0472				7	0.030	0.040	0.0489	10/27/95	0001	0.0600				6/3/95	0001	0.0600			
	ok	mg/L							14.286	0.040	0.060	0.0877		0	0.03					0	0.03			
	5	MG	6/10/97	0001	5.1600				7	3.340	5.190	5.6425	10/27/95	0001	5.5800				6/3/95	0001	5.1900			
	ok	mg/L							0	5.580	5.730	7.0672	E	0	0.1					0	0.1			
	4	MN	6/10/97	0001	0.2570				1	0.070	0.070	0.0350	2/23/91	0001	0.0700				2/23/91	0001	0.0700			
	ok	mg/L							0	0.070	0.070	0.1400		0	0.01					0	0.01			
	6	PH	6/10/97	N001	7.8600				7	7.160	7.330	7.3082	10/27/95	N001	7.5100				6/3/95	N001	7.3300			
	ok	s.u.							0	7.620	7.650	7.8283		0	0.1					0	0.1			
	6	SO4	6/10/97	0001	28.1000				6	19.300	21.200	21.9660	10/27/95	0001	22.0000				6/3/95	0001	22.8000			
		mg/L							0	22.800	23.000	24.8084		0	1					0	1			
	6	TDS	6/10/97	0001	262.0000				6	240.000	250.000	217.2941	10/27/95	0001	240.0000				6/3/95	0001	252.0000			
	ok	mg/L							0	290.000	290.000	242.4589		0	10					0	10			
	6	U	6/10/97	0001	0.0033				7	0.001	0.001	0.0008	10/27/95	0001	0.0020				6/3/95	0001	0.0010			
		mg/L							14.286	0.001	0.002	0.0028		0	0.001					0	0.001			

LOC. ID.	ERR. TYPE FLAG	PARAM CODE / UNITS	3 MOST RECENT SAMPLING EVENTS: LOG DATE	SAMPLE	VALUE	FLAGS	UNCERTAINTY	DETLIM
0609	3	FE	2/21/91	0001	0.2200			
	ok	mg/L		0	0.03			
	5	TDS	2/21/91	0001	340.0000			
	ok	mg/L		0	10			
	5	U	2/21/91	0001	0.0033			
	ok	mg/L		0	0.0003			
0718	6	CACO3	6/3/95	N001	161.0000			
	ok	mg/L		0	10			
	5	FE	6/3/95	0001	0.0600			
	ok	mg/L		0	0.03			
	5	MG	6/3/95	0001	5.1900			
	ok	mg/L		0	0.1			
	4	MN	2/23/91	0001	0.0700			
	ok	mg/L		0	0.01			
	6	PH	6/3/95	N001	7.3300			
	ok	s.u.		0	0.1			
	6	SO4	6/3/95	0001	22.8000			
		mg/L		0	1			
	6	TDS	6/3/95	0001	252.0000			
	ok	mg/L		0	10			
	6	U	6/3/95	0001	0.0010			
		mg/L	U	0	0.001			

LOC. ID.	ERR. TYPE FLAG	PARAM CODE / UNITS	3 MOST RECENT SAMPLING EVENTS: LOG DATE	SAMPLE	VALUE	FLAGS	UNCERTAINTY	DETLIM
0609	3	FE	10/27/90	0001	0.0300			
	ok	mg/L	U	0	0.03			
	5	TDS	10/27/90	0001	338.0000			
	ok	mg/L		0	10			
	5	U	10/27/90	0001	0.0030			
	ok	mg/L		0	0.001			
0718	6	CACO3	10/14/94	N001	175.0000			
	ok	mg/L		0	0			
	5	FE	10/14/94	0001	0.0400			
	ok	mg/L		0	0.03			
	5	MG	10/14/94	0001	5.5200			
	ok	mg/L		0	0.1			
	4	MN	2/23/91	0001	0.0700			
	ok	mg/L		0	0.01			
	6	PH	10/14/94	N001	7.5500			
	ok	s.u.		0	0			
	6	SO4	6/29/94	0001	21.9000			
		mg/L		0	1			
	6	TDS	6/29/94	0001	258.0000			
	ok	mg/L	H	0	10			
	6	U	10/14/94	0001	0.0020			
		mg/L		0	0.001			

Error Type Flags :
2 - All time high detection limit
3 - Too low (non-trend approach)
4 - Too high (non-trend approach)
5 - Too low (trend approach)
6 - Too high (trend approach)

Flags :
I - Increased detection limit due to required dilution.
L - Less than three bore volumes removed before sampling.
J - Estimated value.
H - Hold time expired, value suspect.

Approved by Sam Campbell Date 8-15-97

Hydrologist "Ok" indicates insignificant variation

DATA REVIEW CHECKSHEET

ANOMALOUS DATA REVIEW CHECKSHEET

SITE: Gunnison SAMPLING DATA: Groundwater/Surface Water

REVIEWER(s): Sam Campbell Sam Campbell 8-15-97
NAME (print) SIGNATURE DATE

SITE HYDROLOGIST: _____
NAME (print) SIGNATURE DATE

SITE GEOCHEMIST: _____
NAME (print) SIGNATURE DATE

DATE OF REVIEW: 8-15-97

WELL NO.	ANALYTE	TYPE OF ANOMALY	DISPOSITION
716	SO_4	All-time high	Compare to next sampling round
716	U	↓	↓
006	Na	All-time low	
013	Ca	↓	
↓	Gross α		
	Gross β		
	Na		
	TDS		
↓	U		
014	Gross α		
↓	Gross β	↓	
058	Mg	All-time high	
↓	Mn	↓	
	TDS		
↓	U	↓	
088	Ca	All-time low	
↓	Mg	↓	
	K		
	TDS	↓	
↓	U	All-time high	↓

ANOMALOUS DATA REVIEW CHECKSHEET

SITE: Gunnison SAMPLING DATA: Groundwater / Surface Water

REVIEWER(s): Sam Campbell [signature] 8-18-97
NAME (print) SIGNATURE DATE

SITE HYDROLOGIST: _____
NAME (print) SIGNATURE DATE

SITE GEOCHEMIST: _____
NAME (print) SIGNATURE DATE

DATE OF REVIEW: 8-18-97

WELL NO.	ANALYTE	TYPE OF ANOMALY	DISPOSITION
122	Fe	All-time high	Compare to next sampling round
↓	SO_4	All-time low	
125	TDS	All-time high	
126	Ca	All-time low	
	Mg		
	Mn		
	Na		
	SO_4		
	TDS		
↓	U		
127	Ca		
	TDS		
↓	U		
132	Ca		
↓	SO_4	↓	
145	Mn	All-time high	
155	Ca	All-time low	
↓	Na		
157	Ca		
	Cl		
↓	Ra-226	↓	↓

ANOMALOUS DATA REVIEW CHECKSHEET

SITE: Gunnison SAMPLING DATA: Groundwater/Surface water

REVIEWER(s): Sam Campbell Sam Campbell 8-18-97
NAME (print) SIGNATURE DATE

SITE HYDROLOGIST: _____
NAME (print) SIGNATURE DATE

SITE GEOCHEMIST: _____
NAME (print) SIGNATURE DATE

DATE OF REVIEW: 8-18-97

WELL NO.	ANALYTE	TYPE OF ANOMALY	DISPOSITION
157	Na	All-time low	
↓	SO_4	↓	
	TDS		
170	K	All-time high	
181	Pb-210	↓	
↓	TDS	All-time low	
188	Gross α	All-time high	
	Mg		
	Po-210		
	SO_4		
	TDS		
	U		
468	Fe		

ANALYTICAL LABORATORY RESULTS

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:04:54

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	SAMPLE: ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UN-CERTAINTY
Alkalinity as CaCO3	mg/L	0006	06/04/97	N001	AL	D	129			#	-	-
	mg/L	0013	06/04/97	N001	AL	D	171			#	-	-
	mg/L	0014	06/05/97	N001	AL	D	236			#	-	-
	mg/L	0058	06/04/97	N001	AL	D	210			#	-	-
	mg/L	0059	06/04/97	N001	AL	D	243			#	-	-
	mg/L	0068	06/03/97	N001	AL	D	108			#	-	-
	mg/L	0106	06/04/97	N001	AL	D	35			#	-	-
	mg/L	0113	06/05/97	N001	AL	D	204			#	-	-
	mg/L	0122	06/04/97	N001	AL	D	286			#	-	-
	mg/L	0125	06/05/97	N001	AL	D	208			#	-	-
	mg/L	0126	06/05/97	N001	AL	D	231			#	-	-
	mg/L	0127	06/05/97	N001	AL	D	251			#	-	-
	mg/L	0130	06/03/97	N001	AL	D	230			#	-	-
	mg/L	0132	06/03/97	N001	AL	D	172			#	-	-
	mg/L	0136	06/06/97	N001	AL	D	1520		G	#	-	-
	mg/L	0145	06/04/97	N001	AL	D	234			#	-	-
	mg/L	0147	06/04/97	N001	AL	D	211			#	-	-
	mg/L	0155	06/05/97	N001	AL	D	217			#	-	-
	mg/L	0157	06/05/97	N001	AL	D	78			#	-	-
	mg/L	0170	06/05/97	N001	AL	D	195			#	-	-
	mg/L	0186	06/04/97	N001	AL	D	263			#	-	-
	mg/L	0188	06/03/97	N001	AL	D	220			#	-	-
	mg/L	0189	06/05/97	N001	AL	D	881			#	-	-
	mg/L	0455	06/02/97	N001	AL	D	189			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	216			#	-	-
	mg/L	0469	06/02/97	N001	AL	D	103			#	-	-
	mg/L	0472	06/02/97	N001	AL	D	59			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:04:55

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UNCERTAINTY
Alkalinity as CaCO3	mg/L	0665	06/02/97	N001	AL	C	107			#	-	-
	mg/L	0667	06/02/97	N001	NA	N	79			#	-	-
	mg/L	0680	06/02/97	N001	NR	N	98			#	-	-
	mg/L	0683	06/02/97	N001	NR	N	108			#	-	-
	mg/L	0685	06/02/97	N001	NR	N	109			#	-	-
Cadmium	mg/L	0006	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0013	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0014	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0058	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0059	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0068	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0106	06/04/97	0001	AL	D	0.0012			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	0.0011			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0122	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0125	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0126	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0127	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0130	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0132	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0132	06/03/97	0002	AL	D	0.0010	U		#	0.001	-
	mg/L	0136	06/06/97	0001	AL	D	0.0010	U	G	#	0.001	-
	mg/L	0145	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0147	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0155	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0157	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0170	06/05/97	0001	AL	D	0.0010	U		#	0.001	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:04:56

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Cadmium	mg/L	0186	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0188	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0189	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0468	06/02/97	N001	AL	D	0.0011	U		#	0.0011	-
Calcium	mg/L	0006	06/04/97	0001	AL	D	574.000			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	68.400			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	383.000			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	84.700			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	116.000			#	-	-
	mg/L	0068	06/03/97	0001	AL	D	31.100			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	399.000			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	403.000			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	319.000			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	116.000			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	87.100			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	78.900			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	259.000			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	272.000			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	64.200			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	62.300			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	167.000		G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	87.600			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	107.000			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	72.300			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	15.600			#	-	-
	mg/L	0170	06/05/97	0001	AL	D	74.300			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	190.000			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:04:57

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	ID	ZONE COMPL.	FLOW REL.	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Calcium	mg/L	0188	06/03/97	0001	AL	D	133.000			#	-	-
	mg/L	0189	06/05/97	0001	AL	D	240.000			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	118.000			#	-	-
Chloride	mg/L	0006	06/04/97	0001	AL	D	22.100			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	3.040			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	18.400			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	9.020			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	5.370			#	-	-
	mg/L	0068	06/03/97	0001	AL	D	1.410			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	21.300			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	21.300			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	9.700			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	4.170			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	5.160			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	4.010			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	5.650			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	9.920			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	3.380			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	3.380			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	3.960		G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	4.810			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	3.490			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	2.720			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	2.300			#	-	-
	mg/L	0170	06/05/97	0001	AL	D	3.900			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	4.910			#	-	-
	mg/L	0188	06/03/97	0001	AL	D	11.300			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 04 59

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL.	FLOW REL.	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Chloride	mg/L	0189	06/05/97	0001	AL	D	93.300			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	6.040			#	-	-
Cobalt	mg/L	0006	06/04/97	0001	AL	D	0.0607			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0014	06/05/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0058	06/04/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0059	06/04/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0068	06/03/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0106	06/04/97	0001	AL	D	0.0022	B		#	-	-
	mg/L	0106	06/04/97	0002	AL	D	0.0050	B		#	-	-
	mg/L	0113	06/05/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0122	06/04/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0125	06/05/97	0001	AL	D	0.0021	B		#	-	-
	mg/L	0126	06/05/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0127	06/05/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0130	06/03/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0132	06/03/97	0001	AL	D	0.0026	B		#	-	-
	mg/L	0132	06/03/97	0002	AL	D	0.0020	U		#	0.002	-
	mg/L	0136	06/06/97	0001	AL	D	0.0024	B	G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0147	06/04/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0155	06/05/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0157	06/05/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0170	06/05/97	0001	AL	D	0.0024	B		#	-	-
	mg/L	0186	06/04/97	0001	AL	D	0.0027	B		#	-	-
	mg/L	0188	06/03/97	0001	AL	D	0.0020	U		#	0.002	-
	mg/L	0189	06/05/97	0001	AL	D	0.0031	B		#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 05 00

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL.	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UNCERTAINTY
Cobalt	mg/L	0468	06/02/97	N001	AL	D	0 0022	U		#	0 0022	-
Dissolved Oxygen	mg/L	0455	06/02/97	N001	AL	D	1 31			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	0 36			#	-	-
	mg/L	0469	06/02/97	N001	AL	D	0 98			#	-	-
	mg/L	0472	06/02/97	N001	AL	D	0 34			#	-	-
	mg/L	0665	06/02/97	N001	AL	C	0 51			#	-	-
	mg/L	0667	06/02/97	N001	NA	N	0 62			#	-	-
	mg/L	0680	06/02/97	N001	NR	N	2 61			#	-	-
	mg/L	0683	06/02/97	N001	NR	N	0 65			#	-	-
	mg/L	0685	06/02/97	N001	NR	N	4 69			#	-	-
Gross Alpha	pCi/L	0006	06/04/97	0001	AL	D	605 04		J	#	16 52	± 50 6
	pCi/L	0013	06/04/97	0001	AL	D	14 17		J	#	3 45	± 3 51
	pCi/L	0014	06/05/97	0001	AL	D	324 64			#	13 88	± 32 3
	pCi/L	0058	06/04/97	0001	AL	D	5 66			#	3 31	± 2 52
	pCi/L	0059	06/04/97	0001	AL	D	18 41			#	4 6	± 4 63
	pCi/L	0088	06/03/97	0001	AL	D	1 06	U	J	#	1 06	± 0 61
	pCi/L	0106	06/04/97	0001	AL	D	11 97	U	J	#	11 97	± 6 92
	pCi/L	0106	06/04/97	0002	AL	D	11 96	U	J	#	11 96	± 6 48
	pCi/L	0113	06/05/97	0001	AL	D	157 46			#	11 84	± 20 3
	pCi/L	0122	06/04/97	0001	AL	D	4 76	U		#	4 76	± 3 00
	pCi/L	0125	06/05/97	0001	AL	D	8 26			#	5 21	± 3 89
	pCi/L	0126	06/05/97	0001	AL	D	6 60			#	3 09	± 2 51
	pCi/L	0127	06/05/97	0001	AL	D	23 46			#	10 96	± 8 91
	pCi/L	0130	06/03/97	0001	AL	D	131 61		J	#	8 68	± 15 9
	pCi/L	0132	06/03/97	0001	AL	D	3 55	U	J	#	3 55	± 2 00
	pCi/L	0132	06/03/97	0002	AL	D	3 78		J	#	3 48	± 2 38
	pCi/L	0136	06/06/97	0001	AL	D	16 19		G	#	5 69	± 5 06

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:01

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UNCERTAINTY
Gross Alpha	pCi/L	0145	06/04/97	0001	AL	D	4.78	U	J	#	4.78	± 3.00
	pCi/L	0147	06/04/97	0001	AL	D	14.34		J	#	3.19	± 3.37
	pCi/L	0155	06/05/97	0001	AL	D	3.96	U	J	#	3.96	± 2.42
	pCi/L	0157	06/05/97	0001	AL	D	1.44	U	J	#	1.44	± 0.81
	pCi/L	0170	06/05/97	0001	AL	D	2.75	U		#	2.75	± 1.85
	pCi/L	0186	06/04/97	0001	AL	D	19.02		J	#	6.49	± 5.84
	pCi/L	0188	06/03/97	0001	AL	D	28.97		J	#	3.88	± 5.06
	pCi/L	0189	06/05/97	0001	AL	D	41.79		J	#	18.07	± 15.0
	pCi/L	0468	06/02/97	N001	AL	D	11.61		J	#	3.35	± 3.20
Gross Beta	pCi/L	0006	06/04/97	0001	AL	D	131.26			#	20.04	± 16.8
	pCi/L	0013	06/04/97	0001	AL	D	7.25			#	3.95	± 2.63
	pCi/L	0014	06/05/97	0001	AL	D	119.59		J	#	16.48	± 14.4
	pCi/L	0058	06/04/97	0001	AL	D	7.76		J	#	3.45	± 2.37
	pCi/L	0059	06/04/97	0001	AL	D	11.93		J	#	4.95	± 3.43
	pCi/L	0088	06/03/97	0001	AL	D	1.44	U		#	1.44	± 0.89
	pCi/L	0106	06/04/97	0001	AL	D	12.91	U		#	12.91	± 7.64
	pCi/L	0106	06/04/97	0002	AL	D	12.89	U		#	12.89	± 7.39
	pCi/L	0113	06/05/97	0001	AL	D	62.33		J	#	13.88	± 10.8
	pCi/L	0122	06/04/97	0001	AL	D	10.72		J	#	4.5	± 3.12
	pCi/L	0125	06/05/97	0001	AL	D	8.34		J	#	5.84	± 3.77
	pCi/L	0126	06/05/97	0001	AL	D	5.12		J	#	3.1	± 2.04
	pCi/L	0127	06/05/97	0001	AL	D	15.73		J	#	11.75	± 7.53
	pCi/L	0130	06/03/97	0001	AL	D	52.40			#	9.06	± 7.52
	pCi/L	0132	06/03/97	0001	AL	D	4.43			#	3.87	± 2.41
	pCi/L	0132	06/03/97	0002	AL	D	3.88	U		#	3.88	± 2.39
	pCi/L	0136	06/06/97	0001	AL	D	15.72		JG	#	5.91	± 4.17
	pCi/L	0145	06/04/97	0001	AL	D	5.80	U		#	5.8	± 3.47

3P GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:02

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UNCERTAINTY
Gross Beta	pCi/L	0147	06/04/97	0001	AL	D	4.86			#	3.95	± 2.51
	pCi/L	0155	06/05/97	0001	AL	D	4.47	U		#	4.47	± 2.70
	pCi/L	0157	06/05/97	0001	AL	D	4.25			#	1.45	± 1.05
	pCi/L	0170	06/05/97	0001	AL	D	3.55		J	#	2.92	± 1.85
	pCi/L	0186	06/04/97	0001	AL	D	6.97			#	6.57	± 4.12
	pCi/L	0188	06/03/97	0001	AL	D	8.03			#	4.65	± 3.06
	pCi/L	0189	06/05/97	0001	AL	D	38.06			#	19.59	± 13.1
	pCi/L	0468	06/02/97	N001	AL	D	7.00			#	3.93	± 2.61
Iron	mg/L	0006	06/04/97	0001	AL	D	2.740			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0014	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0058	06/04/97	0001	AL	D	0.0041	B		#	-	-
	mg/L	0059	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0088	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0105	06/04/97	0001	AL	D	2.770			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	2.810			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	0.0772			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	0.259			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	0.0010	U		#		-
	mg/L	0126	06/05/97	0001	AL	D	0.0177	B		#	-	-
	mg/L	0127	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0130	06/03/97	0001	AL	D	0.0080	B		#	-	-
	mg/L	0132	06/03/97	0001	AL	D	0.0288	B		#	-	-
	mg/L	0132	06/03/97	0002	AL	D	0.0010	U		#	0.001	-
	mg/L	0136	06/06/97	0001	AL	D	0.0010	U	G	#	0.001	-
	mg/L	0145	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0147	06/04/97	0001	AL	D	0.0010	U		#	0.001	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 05 03

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS. LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Iron	mg/L	0155	06/05/97	0001	AL	D	0 0023	B		#	-	-
	mg/L	0157	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0170	06/05/97	0001	AL	D	0 0010	U		#	0 001	-
	mg/L	0186	06/04/97	0001	AL	D	0 0010	U		#	0 001	-
	mg/L	0188	06/03/97	0001	AL	D	0 0072	B		#	-	-
	mg/L	0189	06/05/97	0001	AL	D	6 160			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	8.020			#	-	-
Lead-210	pCi/L	0006	06/04/97	0001	AL	D	1 15	U		#	1 15	± 0 69
	pCi/L	0013	06/04/97	0001	AL	D	1 13	U		#	1 13	± 0 67
	pCi/L	0014	06/05/97	0001	AL	D	1 09	U		#	1 09	± 0 65
	pCi/L	0058	06/04/97	0001	AL	D	1 05	U		#	1 05	± 0 63
	pCi/L	0059	06/04/97	0001	AL	D	1 06	U		#	1 06	± 0 63
	pCi/L	0068	06/03/97	0001	AL	D	1 15	U		#	1 15	± 0 68
	pCi/L	0106	06/04/97	0001	AL	D	1 14	U		#	1 14	± 0 68
	pCi/L	0106	06/04/97	0002	AL	D	1 11	U		#	1 11	± 0 66
	pCi/L	0113	06/05/97	0001	AL	D	1 04	U		#	1 04	± 0 62
	pCi/L	0122	06/04/97	0001	AL	D	1.05	U		#	1.05	± 0.62
	pCi/L	0125	06/05/97	0001	AL	D	1.13	U		#	1.13	± 0.67
	pCi/L	0126	06/05/97	0001	AL	D	1.06	U		#	1 06	± 0 62
	pCi/L	0127	06/05/97	0001	AL	D	1 05	U		#	1 05	± 0.62
	pCi/L	0130	06/03/97	0001	AL	D	1.15	U		#	1 15	± 0.68
	pCi/L	0132	06/03/97	0001	AL	D	1 :0	U		#	1.1	± 0.66
	pCi/L	0132	06/03/97	0002	AL	D	1 14	U		#	1.14	± 0 67
	pCi/L	0136	06/06/97	0001	AL	D	1 04	U	G	#	1 04	± 0 61
	pCi/L	0145	06/04/97	0001	AL	D	1 06	U		#	1 06	± 0 63
	pCi/L	0147	06/04/97	0001	AL	D	1 11	U		#	1 11	± 0 66
	pCi/L	0155	06/05/97	0001	AL	D	1 10	U		#	1 1	± 0.65

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4:05:04

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UNCERTAINTY
Lead-210	pCi/L	0157	06/05/97	0001	AL	D	1.18	U		#	1.18	± 0.70
	pCi/L	0170	06/05/97	0001	AL	D	1.02	U		#	1.02	± 0.61
	pCi/L	0186	06/04/97	0001	AL	D	1.13	U		#	1.13	± 0.67
	pCi/L	0188	06/03/97	0001	AL	D	1.15	U		#	1.15	± 0.68
	pCi/L	0189	06/05/97	0001	AL	D	1.13	U		#	1.13	± 0.68
	pCi/L	0468	06/02/97	N001	AL	D	1.17	U		#	1.17	± 0.69
Magnesium	mg/L	0006	06/04/97	0001	AL	D	24.900			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	9.670			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	27.600			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	19.200			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	26.000			#	-	-
	mg/L	0088	06/03/97	0001	AL	D	6.990			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	31.200			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	31.400			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	29.300			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	21.900			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	20.100			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	15.800			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	66.500			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	26.000			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	15.300			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	14.900			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	15.400		G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	17.100			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	24.900			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	15.000			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	11.900			#	-	-

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Magnesium	mg/L	0170	06/05/97	0001	AL	D	17.600			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	43.200			#	-	-
	mg/L	0188	06/03/97	0001	AL	D	29.000			#	-	-
	mg/L	0189	06/05/97	0001	AL	D	29.400			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	24.500			#	-	-
Manganese	mg/L	0006	06/04/97	0001	AL	D	2.850			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0014	06/05/97	0001	AL	D	0.594			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	0.757			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	0.219			#	-	-
	mg/L	0068	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0106	06/04/97	0001	AL	D	20.000			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	20.300			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	7.370			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	0.142			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	0.248			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	0.0212			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0130	06/03/97	0001	AL	D	0.0078	B		#	-	-
	mg/L	0132	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0132	06/03/97	0002	AL	D	0.0010	U		#	0.001	-
	mg/L	0136	06/06/97	0001	AL	D	0.0010	U	G	#	0.001	-
	mg/L	0145	06/04/97	0001	AL	D	0.157			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0155	06/05/97	0001	AL	D	0.600			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0170	06/05/97	0001	AL	D	0.0010	U		#	0.001	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:07

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UNCERTAINTY
Manganese	mg/L	0186	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0188	06/03/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0189	06/05/97	0001	AL	D	0.932			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	0.215			#	-	-
Nitrate	mg/L	0006	06/04/97	0001	AL	D	0.380	B		#	-	-
	mg/L	0013	06/04/97	0001	AL	D	6.330			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	6.960			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	0.0228	B		#	-	-
	mg/L	0059	06/04/97	0001	AL	D	0.330	B		#	-	-
	mg/L	0068	06/03/97	0001	AL	D	0.376	B		#	-	-
	mg/L	0106	06/04/97	0001	AL	D	0.0327	B		#	-	-
	mg/L	0106	06/04/97	0002	AL	D	0.0290	B	U	#	-	-
	mg/L	0113	06/05/97	0001	AL	D	0.0254	B		#	-	-
	mg/L	0122	06/04/97	0001	AL	D	0.0317	B		#	-	-
	mg/L	0125	06/05/97	0001	AL	D	0.0522	B		#	-	-
	mg/L	0126	06/05/97	0001	AL	D	0.121	B		#	-	-
	mg/L	0127	06/05/97	0001	AL	D	1.270			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	9.710			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	2.760			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	2.760			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	0.344	B	G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	0.472	B		#	-	-
	mg/L	0147	06/04/97	0001	AL	D	1.710			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	0.0291	B	U	#	-	-
	mg/L	0157	06/05/97	0001	AL	D	0.0314	B	U	#	-	-
	mg/L	0170	06/05/97	0001	AL	D	2.880			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	0.351	B		#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:07

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Nitrate	mg/L	0188	06/03/97	0001	AL	D	0.814	B		#	-	-
	mg/L	0189	06/05/97	0001	AL	D	0.0202	B	U	#	-	-
	mg/L	0468	06/02/97	N001	AL	D	0.284	B		#	-	-
pH	s.u	0006	06/04/97	N001	AL	D	6.38			#		-
	s.u	0013	06/04/97	N001	AL	D	7.17			#	-	-
	s.u	0014	06/05/97	N001	AL	D	6.91			#	-	-
	s.u.	0058	06/04/97	N001	AL	D	7.02			#	-	-
	s.u	0059	06/04/97	N001	AL	D	7.15			#	-	-
	s.u	0088	06/03/97	N001	AL	D	7.10			#	-	-
	s.u	0106	06/04/97	N001	AL	D	5.28			#	-	-
	s.u	0113	06/05/97	N001	AL	D	6.72			#	-	-
	s.u	0122	06/04/97	N001	AL	D	6.74			#	-	-
	s.u	0125	06/05/97	N001	AL	D	7.16			#	-	-
	s.u	0126	06/05/97	N001	AL	D	7.17			#	-	-
	s.u	0127	06/05/97	N001	AL	D	7.14			#	-	-
	s.u	0130	06/03/97	N001	AL	D	6.81			#	-	-
	s.u	0132	06/03/97	N001	AL	D	7.51			#	-	-
	s.u	0136	06/06/97	N001	AL	D	12.08		G	#	-	-
	s.u	0145	06/04/97	N001	AL	D	7.10			#	-	-
	s.u	0147	06/04/97	N001	AL	D	7.39			#	-	-
	s.u	0155	06/05/97	N001	AL	D	7.02			#	-	-
	s.u	0157	06/05/97	N001	AL	D	8.42			#	-	-
	s.u	0170	06/05/97	N001	AL	D	8.46			#	-	-
	s.u	0186	06/04/97	N001	AL	D	7.18			#	-	-
	s.u	0188	06/03/97	N001	AL	D	7.00			#	-	-
	s.u	0189	06/05/97	N001	AL	D	6.19			#	-	-
	s.u	0455	06/02/97	N001	AL	D	7.23			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 05 06

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UN-CERTAINTY
pH	s u	0468	06/02/97	N001	AL	D	7 50			#	-	-
	s u	0469	06/02/97	N001	AL	D	6 93			#	-	-
	s u	0472	06/02/97	N001	AL	D	7.12			#	-	-
	s u	0665	06/02/97	N001	AL	C	7.29			#	-	-
	s u	0667	06/02/97	N001	NA	N	6 83			#	-	-
	s u	0680	06/02/97	N001	NR	N	7.21			#	-	-
	s u.	0683	06/02/97	N001	NR	N	7 27			#	-	-
	s.u.	0685	06/02/97	N001	NR	N	7 21			#	-	-
Polonium-210	pCi/L	0006	06/04/97	0001	AL	D	0 19		U	#	0.06	± 0 13
	pCi/L	0013	06/04/97	0001	AL	D	0 15		U	#	0 15	± 0 19
	pCi/L	0014	06/05/97	0001	AL	D	0.22		U	#	0.09	± 0 16
	pCi/L	0058	06/04/97	0001	AL	D	0.12		U	#	0 12	± 0 15
	pCi/L	0059	06/04/97	0001	AL	D	0 20		U	#	0.16	± 0 21
	pCi/L	0068	06/03/97	0001	AL	D	0.17		U	#	0 12	± 0 17
	pCi/L	0106	06/04/97	0001	AL	D	0 18		U	#	0 07	± 0 13
	pCi/L	0106	06/04/97	0002	AL	D	0.20		U	#	0.06	± 0 14
	pCi/L	0113	06/05/97	0001	AL	D	0 17		U	#	0.06	± 0.12
	pCi/L	0122	06/04/97	0001	AL	D	0.13	U		#	0.13	± 0.16
	pCi/L	0125	06/05/97	0001	AL	D	0.10		U	#	0.06	± 0 10
	pCi/L	0126	06/05/97	0001	AL	D	0 15		U	#	0.13	± 0 17
	pCi/L	0127	06/05/97	0001	AL	D	0 11	U		#	0 11	± 0 14
	pCi/L	0130	06/03/97	0001	AL	D	0 17			#	0.05	± 0 10
	pCi/L	0132	06/03/97	0001	AL	D	0 11	U		#	0.11	± 0 14
	pCi/L	0132	06/03/97	0002	AL	D	0 21		U	#	0 12	± 0 18
	pCi/L	0136	06/06/97	0001	AL	D	0.16		UG	#	0 07	± 0 11
	pCi/L	0145	06/04/97	0001	AL	D	0 16		U	#	0 12	± 0 16
	pCi/L	0147	06/04/97	0001	AL	D	0 19		U	#	0 09	± 0 15

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 05 10

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL.	FLOW REL.	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UN-CERTAINTY
Polonium-210	pCi/L	0155	06/05/97	0001	AL	D	0 19		U	#	0.16	± 0.22
	pCi/L	0157	06/05/97	0001	AL	D	0.16		U	#	0.1	± 0.15
	pCi/L	0170	06/05/97	0001	AL	D	0.15		U	#	0 1	± 0.14
	pCi/L	0186	06/04/97	0001	AL	D	0.31			#	0.11	± 0.19
	pCi/L	0188	06/03/97	0001	AL	D	0 44			#	0 13	± 0.25
	pCi/L	0189	06/05/97	0001	AL	D	0.22		U	#	0.14	± 0 20
	pCi/L	0458	06/02/97	N001	AL	D	0.14		U	#	0.11	± 0.15
Potassium	mg/L	0006	06/04/97	0001	AL	D	4.990			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	2.800			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	3.880			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	2 020			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	2.420			#	-	-
	mg/L	0088	06/03/97	0001	AL	D	1.000			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	3 720			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	3 730			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	3.260			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	8.770			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	2.420			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	3.320			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	2.930			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	3 150			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	1.940			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	1 870			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	5 190		G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	2 710			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	3.010			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	2.200			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 05 10

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UN-CERTAINTY
Potassium	mg/L	0157	06/05/97	0001	AL	D	5.490			#	-	-
	mg/L	0170	06/05/97	0001	AL	D	2.610			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	2.250			#	-	-
	mg/L	0188	06/03/97	0001	AL	D	2.750			#	-	-
	mg/L	0189	06/05/97	0001	AL	D	35.900			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	2.480			#	-	-
Radium-226	pCi/L	0006	06/04/97	0001	AL	D	0.09			#	0.01	± 0.05
	pCi/L	0013	06/04/97	0001	AL	D	0.14			#	0.01	± 0.06
	pCi/L	0014	06/05/97	0001	AL	D	0.06			#	0.02	± 0.04
	pCi/L	0058	06/04/97	0001	AL	D	0.10		U	#	0.03	± 0.07
	pCi/L	0059	06/04/97	0001	AL	D	0.14			#	0.02	± 0.06
	pCi/L	0088	06/03/97	0001	AL	D	0.06			#	0.02	± 0.04
	pCi/L	0106	06/04/97	0001	AL	D	0.05			#	0.01	± 0.03
	pCi/L	0106	06/04/97	0002	AL	D	0.11			#	0.02	± 0.05
	pCi/L	0113	06/05/97	0001	AL	D	0.04		U	#	0.02	± 0.03
	pCi/L	0122	06/04/97	0001	AL	D	0.20			#	0.01	± 0.07
	pCi/L	0125	06/05/97	0001	AL	D	0.09			#	0.02	± 0.05
	pCi/L	0126	06/05/97	0001	AL	D	0.15			#	0.02	± 0.06
	pCi/L	0127	06/05/97	0001	AL	D	0.06			#	0.01	± 0.04
	pCi/L	0130	06/03/97	0001	AL	D	0.12			#	0.01	± 0.05
	pCi/L	0132	06/03/97	0001	AL	D	0.07			#	0.01	± 0.04
	pCi/L	0132	06/03/97	0002	AL	D	0.20			#	0.02	± 0.06
	pCi/L	0136	06/06/97	0001	AL	D	0.46		G	#	0.02	± 0.12
	pCi/L	0145	06/04/97	0001	AL	D	0.14			#	0.02	± 0.06
	pCi/L	0147	06/04/97	0001	AL	D	0.06			#	0.01	± 0.04
	pCi/L	0155	06/05/97	0001	AL	D	0.14			#	0.02	± 0.07
	pCi/L	0157	06/05/97	0001	AL	D	0.20			#	0.02	± 0.06

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 05 11

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UNCERTAINTY
Radium-226	pCi/L	0170	06/05/97	0001	AL	D	0 08			#	0 02	± 0 05
	pCi/L	0186	06/04/97	0001	AL	D	0 04		U	#	0 02	± 0.03
	pCi/L	0188	06/03/97	0001	AL	D	0 11			#	0 01	± 0 04
	pCi/L	0189	06/05/97	0001	AL	D	0 86			#	0 01	± 0 13
	pCi/L	0468	06/02/97	N001	AL	D	0 09			#	0 01	± 0 04
Radium-228	pCi/L	0006	06/04/97	0001	AL	D	0 9	U		#	0 9	± 0 50
	pCi/L	0013	06/04/97	0001	AL	D	0,7	U		#	0 7	± 0 40
	pCi/L	0014	06/05/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0058	06/04/97	0001	AL	D	1 2	U		#	1 2	± 0 60
	pCi/L	0059	06/04/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0068	06/03/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0106	06/04/97	0001	AL	D	1 0	U		#	1	± 0 50
	pCi/L	0106	06/04/97	0002	AL	D	0 8	U		#	0 8	± 0 40
	pCi/L	0113	06/05/97	0001	AL	D	0 8	U		#	0 8	± 0 40
	pCi/L	0122	06/04/97	0001	AL	D	0 4	U		#	0 4	± 0 20
	pCi/L	0125	06/05/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0126	06/05/97	0001	AL	D	0 8	U		#	0 8	± 0 40
	pCi/L	0127	06/05/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0130	06/03/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0132	06/03/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0132	06/03/97	0002	AL	D	0 8	U		#	0 8	± 0 40
	pCi/L	0136	06/06/97	0001	AL	D	1 1	U	G	#	1 1	± 0 50
	pCi/L	0145	06/04/97	0001	AL	D	0 4	U		#	0 4	± 0 20
	pCi/L	0147	06/04/97	0001	AL	D	0 7	U		#	0 7	± 0 40
	pCi/L	0155	06/05/97	0001	AL	D	0 8	U		#	0 8	± 0 50
	pCi/L	0157	06/05/97	0001	AL	D	0 4	U		#	0 4	± 0 20
	pCi/L	0170	06/05/97	0001	AL	D	0 7	U		#	0 7	± 0 40

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UN-CERTAINTY
Radium-226	pCi/L	0186	06/04/97	0001	AL	D	0 7	U		#	0.7	± 0.40
	pCi/L	0188	06/03/97	0001	AL	D	0 6	U		#	0.6	± 0.30
	pCi/L	0189	06/05/97	0001	AL	D	0 5			#	0.5	± 0.30
	pCi/L	0468	06/02/97	N001	AL	D	0 8	U		#	0 8	± 0.40
Redox Potential	mV	0006	06/04/97	N001	AL	D	31			#	-	-
	mV	0013	06/04/97	N001	AL	D	37			#	-	-
	mV	0014	06/05/97	N001	AL	D	190			#	-	-
	mV	0058	06/04/97	N001	AL	D	168			#	-	-
	mV	0059	06/04/97	N001	AL	D	223			#		-
	mV	0068	06/03/97	N001	AL	D	9			#	-	-
	mV	0106	06/04/97	N001	AL	D	29			#	-	-
	mV	0113	06/05/97	N001	AL	D	138			#	-	-
	mV	0122	06/04/97	N001	AL	D	106			#	-	-
	mV	0125	06/05/97	N001	AL	D	90			#	-	-
	mV	0126	06/05/97	N001	AL	D	91			#	-	-
	mV	0127	06/05/97	N001	AL	D	100			#	-	-
	mV	0130	06/03/97	N001	AL	D	27			#	-	-
	mV	0132	06/03/97	N001	AL	D	-5			#	-	-
	mV	0136	06/06/97	N001	AL	D	-118		G	#	-	-
	mV	0145	06/04/97	N001	AL	D	34			#	-	-
	mV	0147	06/04/97	N001	AL	D	19			#	-	-
	mV	0155	06/05/97	N001	AL	D	26			#	-	-
	mV	0157	06/05/97	N001	AL	D	35			#	-	-
	mV	0170	06/05/97	N001	AL	D	134			#	-	-
	mV	0186	06/04/97	N001	AL	D	4			#	-	-
	mV	0188	06/03/97	N001	AL	D	23			#	-	-
	mV	0189	06/05/97	N001	AL	D	-5			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05 12

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UN-CERTAINTY
Redox Potential	mV	0455	06/02/97	N001	AL	D	136			#	-	-
	mV	0468	06/02/97	N001	AL	D	218			#	-	-
	mV	0469	06/02/97	N001	AL	D	81			#	-	-
	mV	0472	06/02/97	N001	AL	D	221			#	-	-
	mV	0665	06/02/97	N001	AL	C	77			#	-	-
	mV	0667	06/02/97	N001	NA	N	201			#	-	-
	mV	0680	06/02/97	N001	NR	N	82			#	-	-
	mV	0683	06/02/97	N001	NR	N	108			#	-	-
	mV	0685	06/02/97	N001	NR	N	85			#	-	-
Sodium	mg/L	0006	06/04/97	0001	AL	D	12.800			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	4 100			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	11.400			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	6 670			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	7.390			#	-	-
	mg/L	0088	06/03/97	0001	AL	D	3 660			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	19.900			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	20.200			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	16.100			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	23.300			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	15 400			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	6.810			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	10 000			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	8 060			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	5 250			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	5.090			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	9 790		G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	4 530			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:13

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UNCERTAINTY
Sodium	mg/L	0147	06/04/97	0001	AL	D	8.680			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	4.230			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	6.410			#	-	-
	mg/L	0170	06/05/97	0001	AL	D	5.540			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	6.820			#	-	-
	mg/L	0188	06/03/97	0001	AL	D	8.060			#	-	-
	mg/L	0189	06/05/97	0001	AL	D	222.000			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	10.500	E		#	-	-
Sulfate	mg/L	0006	06/04/97	0001	AL	D	1330.000			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	43.700			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	801.000			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	80.200			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	159.000			#	-	-
	mg/L	0068	06/03/97	0001	AL	D	18.500			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	1110.000			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	1110.000			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	721.000			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	35.300			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	101.000			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	59.000			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	642.000			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	557.000			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	41.200			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	40.900			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	393.000		G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	70.300			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	161.000			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:14

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Sulfate	mg/L	0155	06/05/97	0001	AL	D	23.900			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	18.300			#	-	-
	mg/L	0170	06/05/97	0001	AL	D	72.600			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	392.000			#	-	-
	mg/L	0188	06/03/97	0001	AL	D	230.000			#	-	-
	mg/L	0189	06/05/97	0001	AL	D	152.000			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	177.000			#	-	-
Temperature	C	0006	06/04/97	N001	AL	D	9.3			#	-	-
	C	0013	06/04/97	N001	AL	D	10.0			#	-	-
	C	0014	06/05/97	N001	AL	D	8.9			#	-	-
	C	0058	06/04/97	N001	AL	D	8.1			#	-	-
	C	0059	06/04/97	N001	AL	D	6.8			#	-	-
	C	0068	06/03/97	N001	AL	D	5.9			#	-	-
	C	0106	06/04/97	N001	AL	D	10.4			#	-	-
	C	0113	06/05/97	N001	AL	D	9.8			#	-	-
	C	0122	06/04/97	N001	AL	D	9.6			#	-	-
	C	0125	06/05/97	N001	AL	D	7.0			#	-	-
	C	0126	06/05/97	N001	AL	D	10.1			#	-	-
	C	0127	06/05/97	N001	AL	D	9.4			#	-	-
	C	0130	06/03/97	N001	AL	D	10.3			#	-	-
	C	0132	06/03/97	N001	AL	D	10.5			#	-	-
	C	0136	06/06/97	N001	AL	D	9.2		G	#	-	-
	C	0145	06/04/97	N001	AL	D	9.2			#	-	-
	C	0147	06/04/97	N001	AL	D	10.7			#	-	-
	C	0155	06/05/97	N001	AL	D	8.5			#	-	-
	C	0157	06/05/97	N001	AL	D	9.1			#	-	-
	C	0170	06/05/97	N001	AL	D	10.4			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:14

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	SAMPLE: ID	ZONE COMPL.	FLOW REL.	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UN-CERTAINTY
Temperature	C	0186	06/04/97	N001	AL	D	8.4			#	-	-
	C	0188	06/03/97	N001	AL	D	7.7			#	-	-
	C	0189	06/05/97	N001	AL	D	8.2			#	-	-
	C	0455	06/02/97	N001	AL	D	11.0			#	-	-
	C	0468	06/02/97	N001	AL	D	9.1			#	-	-
	C	0469	06/02/97	N001	AL	D	11.2			#	-	-
	C	0472	06/02/97	N001	AL	D	14.8			#	-	-
	C	0665	06/02/97	N001	AL	C	14.7			#	-	-
	C	0667	06/02/97	N001	NA	N	16.6			#	-	-
	C	0680	06/02/97	N001	NR	N	7.7			#	-	-
	C	0683	06/02/97	N001	NR	N	11.3			#	-	-
	C	0685	06/02/97	N001	NR	N	13.4			#	-	-
Thorium-230	pCi/L	0006	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0013	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0014	06/05/97	0001	AL	D	0.90	B	U	#	-	±
	pCi/L	0058	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0059	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0068	06/03/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0106	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0106	06/04/97	0002	AL	D	0.64	U		#	0.64	±
	pCi/L	0113	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0122	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0125	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0126	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0127	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0130	06/03/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0132	06/03/97	0001	AL	D	0.64	U		#	0.64	±

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4:05:15

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UN-CERTAINTY
Thorium-230	pCi/L	0132	06/03/97	0002	AL	D	0.64	U		#	0.64	±
	pCi/L	0136	06/06/97	0001	AL	D	0.64	U	G	#	0.64	±
	pCi/L	0145	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0147	06/04/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0155	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0157	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0170	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0186	06/04/97	0001	AL	D	0.89	B		#	-	±
	pCi/L	0188	06/03/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0189	06/05/97	0001	AL	D	0.64	U		#	0.64	±
	pCi/L	0468	06/02/97	N001	AL	D	0.64	U		#	0.64	±
Total Dissolved Solids	mg/L	0006	06/04/97	0001	AL	D	2300			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	260			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	1500			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	358			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	502			#	-	-
	mg/L	0068	06/03/97	0001	AL	D	137			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	1760			#	-	-
	mg/L	0106	06/04/97	0002	AL	D	1760			#	-	-
	mg/L	0113	06/05/97	0001	AL	D	1320			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	467			#	-	-
	mg/L	0125	06/05/97	0001	AL	D	2900			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	322			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	1270			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	1110			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	260			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	275			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE 8/14/97 4 05 15

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UN-CERTAINTY
Total Dissolved Solids	mg/L	0136	06/06/97	0001	AL	D	665		G	#	-	-
	mg/L	0145	06/04/97	0001	AL	D	352			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	500			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	295			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	135			#	-	-
	mg/L	0170	06/05/97	0001	AL	D	305			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	675			#	-	-
	mg/L	0188	06/03/97	0001	AL	D	607			#	-	-
	mg/L	0189	06/05/97	0001	AL	D	1400			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	525			#	-	-
Uranium	mg/L	0006	06/04/97	0001	AL	D	0.880			#	-	-
	mg/L	0013	06/04/97	0001	AL	D	0 0439			#	-	-
	mg/L	0014	06/05/97	0001	AL	D	0.620			#	-	-
	mg/L	0058	06/04/97	0001	AL	D	0.0071			#	-	-
	mg/L	0059	06/04/97	0001	AL	D	0.0209			#	-	-
	mg/L	0068	06/03/97	0001	AL	D	0.0013			#	-	-
	mg/L	0106	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0106	06/04/97	0002	AL	D	0.0010	U		#	0.001	-
	mg/L	0113	06/05/97	0001	AL	D	0.361			#	-	-
	mg/L	0122	06/04/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0125	06/05/97	0001	AL	D	0.0190			#	-	-
	mg/L	0126	06/05/97	0001	AL	D	0 0149			#	-	-
	mg/L	0127	06/05/97	0001	AL	D	0.0400			#	-	-
	mg/L	0130	06/03/97	0001	AL	D	0.337			#	-	-
	mg/L	0132	06/03/97	0001	AL	D	0 0057			#	-	-
	mg/L	0132	06/03/97	0002	AL	D	0 0057			#	-	-
	mg/L	0136	06/06/97	0001	AL	D	0 0010	U	G	#	0 001	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:16

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	SAMPLE: ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UNCERTAINTY
Uranium	mg/L	0145	06/04/97	0001	AL	D	0.0123			#	-	-
	mg/L	0147	06/04/97	0001	AL	D	0.0263			#	-	-
	mg/L	0155	06/05/97	0001	AL	D	0.0037			#	-	-
	mg/L	0157	06/05/97	0001	AL	D	0.0010	U		#	0.001	-
	mg/L	0170	06/05/97	0001	AL	D	0.0074			#	-	-
	mg/L	0186	06/04/97	0001	AL	D	0.0420			#	-	-
	mg/L	0188	06/03/97	0001	AL	D	0.0379			#	-	-
	mg/L	0189	06/05/97	0001	AL	D	0.0151			#	-	-
	mg/L	0455	06/02/97	N001	AL	D	0.0290			#	-	-
	mg/L	0468	06/02/97	N001	AL	D	0.0183			#	-	-
	mg/L	0469	06/02/97	N001	AL	D	0.0014			#	-	-
	mg/L	0472	06/02/97	N001	AL	D	0.0138			#	-	-
	mg/L	0665	06/02/97	N001	AL	C	0.0011			#	-	-
	mg/L	0667	06/02/97	N001	NA	N	0.0011	U		#	0.0011	-
	mg/L	0680	06/02/97	N001	NR	N	0.0014			#	-	-
	mg/L	0683	06/02/97	N001	NR	N	0.0018			#	-	-
	mg/L	0683	06/02/97	N002	NR	N	0.0018			#	-	-
	mg/L	0685	06/02/97	N001	NR	N	0.0019			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:05:17

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	ID	ZONE COMPL.	FLOW REL.	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY

RECORDS: SELECTED FROM USEE200 WHERE site_code='GUN01' AND DATE_SAMPLED between 9/1/97# and 9/30/97#

SAMPLE ID CODES: 0000X = Filtered sample (0.45 µm) N000X = Unfiltered sample. X = replicate number.

LAB QUALIFIERS:

*	Replicate analysis not within control limits.
+	Correlation coefficient for MSA < 0.995
A	TIC is a suspected aldol-condensation product
B	Inorganic: Result is between the IDL and CRDL. Organic: Analyte also found in method blank.
E	Inorganic: Estimate value because of interference, see case narrative. Organic: Analyte exceeded calibration range of the GC-MS
Z	Laboratory defined (USEPA CLP organic) qualifier, see case narrative
H	Holding time expired, value suspect.
I	Increased detection limit due to required dilution.
C	Pesticide result confirmed by GC-MS
M	GFAA duplicate injection precision not met
N	Inorganic or radiochemical: Spike sample recovery not within control limits. Organic: Tentatively identified compund (TIC)
S	Result determined by method of standard addition (MSA)
U	Analytical result below detection limit
W	Post-digestion spike outside control limits while sample absorbance < 50% of analytical spike absorbance.
D	Analyte determined in diluted sample
P	> 25% difference in detected pesticide or Arochlor concentrations between 2 columns.
X	Laboratory defined (USEPA CLP organic) qualifier, see case narrative
Y	Laboratory defined (USEPA CLP organic) qualifier, see case narrative

DATA QUALIFIERS:

J	Estimated value.	F	Low flow sampling method used.	G	Possible grout contamination, pH > 9.
L	Less than 3 bore volumes purged prior to sampling	R	Unusable result.	X	Location is undefined.
U	Parameter analyzed for but was not detected.				

QA QUALIFIER: # = validated according to Quality Assurance guidelines

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN06, LANDFILL GUNNISON
REPORT DATE: 8/14/97 4:07:03

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UNCERTAINTY
Alkalinity as CaCO3	mg/L	0609	06/03/97	N001	GC	O	174			#	-	-
	mg/L	0716	06/10/97	N001	GC	D	152			#	-	-
	mg/L	0720	06/03/97	N001	TG	D	212			#	-	-
	mg/L	0721	06/03/97	N001	TG	D	93			#	-	-
	mg/L	0722	06/03/97	N001	TG	D	114			#	-	-
	mg/L	0723	06/04/97	N001	TG	D	94			#	-	-
	mg/L	0724	06/04/97	N001	TG	D	92			#	-	-
	mg/L	0725	06/04/97	N001	TG	D	154			#	-	-
Calcium	mg/L	0609	06/03/97	0001	GC	O	35.700			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	39.200			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	60.900			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	30.700			#	-	-
	mg/L	0722	06/03/97	0001	TG	D	37.100			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	35.800			#	-	-
	mg/L	0724	06/04/97	0001	TG	D	33.300			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	35.600			#	-	-
Chloride	mg/L	0609	06/03/97	0001	GC	O	10.700			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	4.990			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	14.500			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	4.170			#	-	-
	mg/L	0722	06/03/97	0001	TG	D	5.210			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	10.300			#	-	-
	mg/L	0724	06/04/97	0001	TG	D	4.780			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	8.350			#	-	-
Iron	mg/l	0609	06/03/97	0001	GC	O	0.0010	U		#	0.001	-
	mg/L	0716	06/10/97	0001	GC	D	0.0472			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN08, LANDFILL GUNNISON
REPORT DATE: 8/14/97 4 07 04

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL.	FLOW REL.	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UN-CERTAINTY
Iron	mg/L	0720	06/03/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0721	06/03/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0722	06/03/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0723	06/04/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0724	06/04/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0725	06/04/97	0001	TG	D	0.0010	U		#	0.001	-
Magnesium	mg/L	0609	06/03/97	0001	GC	O	3.090			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	5.160			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	6.020			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	3.820			#	-	-
	mg/L	0722	06/03/97	0001	TG	D	4.450			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	4.900			#	-	-
	mg/L	0724	06/04/97	0001	TG	D	3.320			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	3.880			#	-	-
Manganese	mg/L	0609	06/03/97	0001	GC	O	0.0109			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	0.257			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	0.0590			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0722	06/03/97	0001	TG	D	0.0010	B		#	-	-
	mg/L	0723	06/04/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0724	06/04/97	0001	TG	D	0.0635			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	0.680			#	-	-
pH	s.u	0609	06/03/97	N001	GC	O	7.59			#	-	-
	s.u	0716	06/10/97	N001	GC	D	7.86			#	-	-
	s.u	0720	06/03/97	N001	TG	D	7.62			#	-	-
	s.u	0721	06/03/97	N001	TG	D	7.30			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN08, LANDFILL GUNNISON
REPORT DATE: 8/14/97 4:07:05

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL.	FLOW REL	RESULT	QUALIFIERS: LAB	QUALIFIERS: DATA	QUALIFIERS: QA	DETECTION LIMIT	UNCERTAINTY
pH	s u	0722	06/03/97	N001	TG	D	7.37			#	-	-
	s u	0723	06/04/97	N001	TG	D	7.81			#	-	-
	s u	0724	06/04/97	N001	TG	D	7.54			#	-	-
	s u	0725	06/04/97	N001	TG	D	7.76			#	-	-
Potassium	mg/L	0609	06/03/97	0001	GC	O	8.540			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	12.800			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	10.800			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	1.440			#	-	-
	mg/L	0722	06/03/97	0001	TG	D	2.870			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	3.970			#	-	-
	mg/L	0724	06/04/97	0001	TG	D	2.830			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	7.660			#	-	-
Redox Potential	mV	0609	06/03/97	N001	GC	O	163			#	-	-
	mV	0716	06/10/97	N001	GC	D	121			#	-	-
	mV	0720	06/03/97	N001	TG	D	184			#	-	-
	mV	0721	06/03/97	N001	TG	D	68			#	-	-
	mV	0722	06/03/97	N001	TG	D	115			#	-	-
	mV	0723	06/04/97	N001	TG	D	124			#	-	-
	mV	0724	06/04/97	N001	TG	D	215			#	-	-
	mV	0725	06/04/97	N001	TG	D	186			#	-	-
Sodium	mg/L	0609	06/03/97	0001	GC	O	85.100			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	39.000			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	66.200			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	15.100			#	-	-
	mg/L	0722	06/03/97	0001	TG	D	16.200			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	23.700			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN08, LANDFILL GUNNISON
REPORT DATE 8/14/97 4:07:06

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QUALIFIERS QA	DETECTION LIMIT	UNCERTAINTY
Sodium	mg/L	0724	06/04/97	0001	TG	D	17 700			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	48 700			#	-	-
Sulfate	mg/L	0609	06/03/97	0001	GC	O	77 900			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	26 100			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	68.900			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	7.870			#	-	-
	mg/L	0722	06/03/97	0001	TG	D	10.800			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	20.200			#	-	-
	mg/L	0724	06/04/97	0001	TG	D	10 800			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	35.200			#	-	-
Temperature	C	0609	06/03/97	N001	GC	O	11.2			#	-	-
	C	0716	06/10/97	N001	GC	D	13 7			#	-	-
	C	0720	06/03/97	N001	TG	D	13.9			#	-	-
	C	0721	06/03/97	N001	TG	D	12.1			#	-	-
	C	0722	06/03/97	N001	TG	D	12 6			#	-	-
	C	0723	06/04/97	N001	TG	D	13.3			#	-	-
	C	0724	06/04/97	N001	TG	D	13.8			#	-	-
	C	0725	06/04/97	N001	TG	D	11.9			#	-	-
Total Dissolved Solids	mg/L	0609	06/03/97	0001	GC	O	347			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	262			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	382			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	172			#	-	-
	mg/L	0722	06/03/97	0001	TG	D	175			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	210			#	-	-
	mg/L	0724	06/04/97	0001	TG	D	178			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	245			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN06, LANDFILL GUNNISON
REPORT DATE: 8/14/97 4:07:07

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Uranium	mg/L	0609	06/03/97	0001	GC	O	0.0037			#	-	-
	mg/L	0716	06/10/97	0001	GC	D	0.0033			#	-	-
	mg/L	0720	06/03/97	0001	TG	D	0.0048			#	-	-
	mg/L	0721	06/03/97	0001	TG	D	0.0010	U		#	0.001	-
	mg/L	0722	06/03/97	0001	TG	D	0.0017			#	-	-
	mg/L	0723	06/04/97	0001	TG	D	0.0033			#	-	-
	mg/L	0724	06/04/97	0001	TG	D	0.0011			#	-	-
	mg/L	0725	06/04/97	0001	TG	D	0.0030			#	-	-

GROUND WATER QUALITY DATA BY PARAMETER (USEE200) FOR SITE GUN08, LANDFILL GUNNISON
REPORT DATE: 8/14/97 4:07:08

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	ID	ZONE COMPL	FLOW REL	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY

RECORDS: SELECTED FROM USEE200 WHERE site_code='GUN08' AND DATE_SAMPLED between 9/1/979 and 9/30/979

SAMPLE ID CODES: 0000X = Filtered sample (0.45 µm) N000X = Unfiltered sample X = replicate number.

LAB QUALIFIERS:

- * Replicate analysis not within control limits
- + Correlation coefficient for MSA < 0.995
- A TIC is a suspected aldol-condensation product
- B Inorganic: Result is between the IDL and CRDL. Organic: Analyte also found in method blank.
- E Inorganic: Estimate value because of interference, see case narrative. Organic: Analyte exceeded calibration range of the GC-MS.
- Z Laboratory defined (USEPA CLP organic) qualifier, see case narrative
- H Holding time expired, value suspect
- I Increased detection limit due to required dilution.
- C Pesticide result confirmed by GC-MS.
- M GFAA duplicate injection precision not met
- N Inorganic or radiochemical: Spike sample recovery not within control limits. Organic: Tentatively identified compound (TIC).
- S Result determined by method of standard addition (MSA).
- U Analytical result below detection limit
- W Post-digestion spike outside control limits while sample absorbance < 50% of analytical spike absorbance.
- D Analyte determined in diluted sample
- P > 25% difference in detected pesticide or Arochlor concentrations between 2 columns.
- X Laboratory defined (USEPA CLP organic) qualifier, see case narrative.
- Y Laboratory defined (USEPA CLP organic) qualifier, see case narrative.

DATA QUALIFIERS:

- J Estimated value.
- L Less than 3 bore volumes purged prior to sampling.
- U Parameter analyzed for but was not detected.
- F Low flow sampling method used.
- R Unusable result
- G Possible grout contamination, pH > 9.
- X Location is undefined.

QA QUALIFIER: 9 = validated according to Quality Assurance guidelines.

SURFACE WATER QUALITY DATA BY PARAMETER (USEE800) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:41:20 PM

PARAMETER	UNITS	LOCATION ID	SAMPLE DATE	SAMPLE ID	RESULT	QUALIFIERS LAB	QUALIFIERS DATA	QA	DETECTION LIMIT	UNCERTAINTY
Alkalinity as CaCO3	mg/L	0792	06/06/97	N001	52			#	-	-
	mg/L	0795	06/06/97	N001	70			#	-	-
Cadmium	mg/L	0792	06/06/97	0001	0.0010	U		#	0.001	-
	mg/L	0795	06/06/97	0001	0.0010	U		#	0.001	-
	mg/L	0795	06/06/97	0002	0.0010	U		#	0.001	-
Calcium	mg/L	0792	06/06/97	0001	20.900			#	-	-
	mg/L	0795	06/06/97	0001	22.300			#	-	-
	mg/L	0795	06/06/97	0002	21.300			#	-	-
Chloride	mg/L	0792	06/06/97	0001	0.267	B	U	#	-	-
	mg/L	0795	06/06/97	0001	0.379	B	U	#	-	-
	mg/L	0795	06/06/97	0002	0.340	B	U	#	-	-
Cobalt	mg/L	0792	06/06/97	0001	0.0020	U		#	0.002	-
	mg/L	0795	06/06/97	0001	0.0022	B		#	-	-
	mg/L	0795	06/06/97	0002	0.0020	U		#	0.002	-
Gross Alpha	pCi/L	0792	06/06/97	0001	1.28	U		#	1.28	± 0.74
	pCi/L	0795	06/06/97	0001	1.31	U		#	1.31	± 0.77
	pCi/L	0795	06/06/97	0002	1.32	U		#	1.32	± 0.78
Gross Beta	pCi/L	0792	06/06/97	0001	2.09		J	#	1.45	± 0.94
	pCi/L	0795	06/06/97	0001	1.45	U	J	#	1.45	± 0.90
	pCi/L	0795	06/06/97	0002	1.60		J	#	1.45	± 0.92
Iron	mg/L	0792	06/06/97	0001	0.0604			#	-	-
	mg/L	0795	06/06/97	0001	0.0626			#	-	-
	mg/L	0795	06/06/97	0002	0.0606			#	-	-
Lead-210	pCi/L	0792	06/06/97	0001	1.17	U		#	1.17	± 0.69
	pCi/L	0795	06/06/97	0001	1.21	U		#	1.21	± 0.72
	pCi/L	0795	06/06/97	0002	1.18	U		#	1.18	± 0.70
Magnesium	mg/L	0792	06/06/97	0001	4.410			#	-	-
	mg/L	0795	06/06/97	0001	4.730			#	-	-
	mg/L	0795	06/06/97	0002	4.550			#	-	-
Manganese	mg/L	0792	06/06/97	0001	0.0099	B		#	-	-
	mg/L	0795	06/06/97	0001	0.0139			#	-	-
	mg/L	0795	06/06/97	0002	0.0119			#	-	-
Nitrate	mg/L	0792	06/06/97	0001	0.274	B		#	-	-
	mg/L	0795	06/06/97	0001	0.247	B		#	-	-

SURFACE WATER QUALITY DATA BY PARAMETER (USEE800) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:41:22 PM

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	ID	RESULT	QUALIFIERS LAB	DATA	QA	DETECTION LIMIT	UN-CERTAINTY
Nitrate	mg/L	0795	06/06/97	0002	0.254	B		#	-	-
pH	s.u.	0792	06/06/97	N001	7.68			#	-	-
	s.u	0795	06/06/97	N001	7.49			#	-	-
Polonium-210	pCi/L	0792	06/06/97	0001	0.18		U	#	0.1	± 0.15
	pCi/L	0795	06/06/97	0001	0.15		U	#	0.11	± 0.15
	pCi/L	0795	06/06/97	0002	0.24			#	0.08	± 0.15
Potassium	mg/L	0792	06/06/97	0001	0.763			#	-	-
	mg/L	0795	06/06/97	0001	0.826			#	-	-
	mg/L	0795	06/06/97	0002	0.795			#	-	-
Radium-226	pCi/L	0792	06/06/97	0001	0.14			#	0.02	± 0.07
	pCi/L	0795	06/06/97	0001	0.08			#	0.01	± 0.05
	pCi/L	0795	06/06/97	0002	0.08			#	0.02	± 0.05
Radium 228	pCi/L	0792	06/06/97	0001	0.3	U		#	0.3	± 0.20
	pCi/L	0795	06/06/97	0001	0.3	U		#	0.3	± 0.20
	pCi/L	0795	06/06/97	0002	0.3	U		#	0.3	± 0.20
Redox Potential	mV	0792	06/06/97	N001	161			#	-	-
	mV	0795	06/06/97	N001	149			#	-	-
Sodium	mg/L	0792	06/06/97	0001	1 750			#	-	-
	mg/L	0795	06/06/97	0001	1.940			#	-	-
	mg/L	0795	06/06/97	0002	1.660			#	-	-
Sulfate	mg/L	0792	06/06/97	0001	9 160			#	-	-
	mg/L	0795	06/06/97	0001	9 990			#	-	-
	mg/L	0795	06/06/97	0002	9 480			#	-	-
Temperature	C	0792	06/06/97	N001	7 1			#	-	-
	C	0795	06/06/97	N001	7 5			#	-	-
Thorium-230	pCi/L	0792	06/06/97	0001	0 64	U		#	0 64	±
	pCi/L	0795	06/06/97	0001	0 64	U		#	0 64	±
	pCi/L	0795	06/06/97	0002	0 64	U		#	0 64	±
Total Dissolved Solids	mg/L	0792	06/06/97	0001	98 0			#	-	-
	mg/L	0795	06/06/97	0001	95 0			#	-	-
	mg/L	0795	06/06/97	0002	98.0			#	-	-
Uranium	mg/L	0792	06/06/97	0001	0 0010	U		#	0 001	-
	mg/L	0795	06/06/97	0001	0 0010	U		#	0.001	-
	mg/L	0795	06/06/97	0002	0 0010	U		#	0.001	-

SURFACE WATER QUALITY DATA BY PARAMETER (USEE800) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/14/97 4:41:23 PM

PARAMETER	UNITS	LOCATION ID	SAMPLE: DATE	ID	RESULT	QUALIFIERS: LAB	DATA	QA	DETECTION LIMIT	UNCERTAINTY

RECORDS: SELECTED FROM USEE800 WHERE site_code='GUN01' AND DATE_SAMPLED between 6/1/97# and 6/30/97#

SAMPLE ID CODES: 000X = Filtered sample (0.45 µm). N00X = Unfiltered sample. X = replicate number.

LAB QUALIFIERS:

- * Replicate analysis not within control limits.
- + Correlation coefficient for MSA < 0.995.
- A TIC is a suspected aldol-condensation product.
- B Inorganic: Result is between the IDL and CRDL. Organic: Analyte also found in method blank.
- E Inorganic: Estimate value because of interference, see case narrative Organic: Analyte exceeded calibration range of the GC-MS
- Z Laboratory defined (USEPA CLP organic) qualifier, see case narrative.
- H Holding time expired, value suspect.
- I Increased detection limit due to required dilution
- C Pesticide result confirmed by GC-MS.
- M GFAA duplicate injection precision not met.
- N Inorganic or radiochemical: Spike sample recovery not within control limits. Organic: Tentatively identified compund (TIC)
- S Result determined by method of standard addition (MSA).
- U Analytical result below detection limit.
- W Post-digestion spike outside control limits while sample absorbance < 50% of analytical spike absorbance
- D Analyte determined in diluted sample
- P > 25% difference in detected pesticide or Arochlor concentrations between 2 columns.
- X Laboratory defined (USEPA CLP organic) qualifier, see case narrative.
- Y Laboratory defined (USEPA CLP organic) qualifier, see case narrative.

DATA QUALIFIERS:

- J Estimated value.
- G Possible grout contamination, pH > 9.
- R Unusable result.
- U Parameter analyzed for but was not detected
- F Low flow sampling method used.
- L Less than 3 bore volumes purged prior to sampling.
- X Location is undefined.

QA QUALIFIER # = validated according to Quality Assurance guidelines

ANALYTE	SITE_CODE	LOCATION_CO	DATE_SAMPL	SAMPLE_ID	WATER	UNIT_OF_MEA	RESULT	LAB_QUALIFIE	DATA_VALIDATION_QUAL	DETECTION_LI	UNCERTAINTY
Cadmium	GUN01	0999	6/4/97	0001		mg/L	0.001	U		0.001	
Cadmium	GUN01	0999	6/4/97	0002		mg/L	0.001	U		0.001	
Calcium	GUN01	0999	6/4/97	0001		mg/L	0.0305	B			
Calcium	GUN01	0999	6/4/97	0002		mg/L	0.0073	B			
Chloride	GUN01	0999	6/4/97	0001		mg/L	0.004	U		0.004	
Chloride	GUN01	0999	6/4/97	0002		mg/L	0.0252	B	U		
Cobalt	GUN01	0999	6/4/97	0001		mg/L	0.002	U		0.002	
Cobalt	GUN01	0999	6/4/97	0002		mg/L	0.002	U		0.002	
Gross Alpha	GUN01	0999	6/4/97	0001		pCi/L	0.79	U	J	0.79	0.42
Gross Alpha	GUN01	0999	6/4/97	0002		pCi/L	0.79	U	J	0.79	0.44
Gross Beta	GUN01	0999	6/4/97	0001		pCi/L	1.43	U		1.43	0.83
Gross Beta	GUN01	0999	6/4/97	0002		pCi/L	1.43	U		1.43	0.84
Iron	GUN01	0999	6/4/97	0001		mg/L	0.0017	B			
Iron	GUN01	0999	6/4/97	0002		mg/L	0.001	U		0.001	
Lead-210	GUN01	0999	6/4/97	0001		pCi/L	1.19	U		1.19	0.7
Lead-210	GUN01	0999	6/4/97	0002		pCi/L	1.19	U		1.19	0.7
Magnesium	GUN01	0999	6/4/97	0001		mg/L	0.007	U		0.007	
Magnesium	GUN01	0999	6/4/97	0002		mg/L	0.007	U		0.007	
Manganese	GUN01	0999	6/4/97	0001		mg/L	0.001	U		0.001	
Manganese	GUN01	0999	6/4/97	0002		mg/L	0.001	U		0.001	
Nitrate	GUN01	0999	6/4/97	0001		mg/L	0.0403	B			
Nitrate	GUN01	0999	6/4/97	0002		mg/L	0.0412	B			
Polonium-210	GUN01	0999	6/4/97	0001		pCi/L	0.14		U	0.08	0.13
Polonium-210	GUN01	0999	6/4/97	0002		pCi/L	0.19		U	0.11	0.17
Potassium	GUN01	0999	6/4/97	0001		mg/L	0.034	U		0.034	
Potassium	GUN01	0999	6/4/97	0002		mg/L	0.034	U		0.034	
Radium-226	GUN01	0999	6/4/97	0001		pCi/L	0.13		U	0.09	0.14
Radium-226	GUN01	0999	6/4/97	0002		pCi/L	0.04		U	0.02	0.03
Radium-228	GUN01	0999	6/4/97	0001		pCi/L	0.7	U		0.7	0.4
Radium-228	GUN01	0999	6/4/97	0002		pCi/L	0.7	U		0.7	0.4
Sodium	GUN01	0999	6/4/97	0001		mg/L	0.151	U		0.151	
Sodium	GUN01	0999	6/4/97	0002		mg/L	0.151	U		0.151	
Sulfate	GUN01	0999	6/4/97	0001		mg/L	0.111	B			
Sulfate	GUN01	0999	6/4/97	0002		mg/L	0.0826	B			
Thorium-230	GUN01	0999	6/4/97	0001		pCi/L	0.64	U		0.64	
Thorium-230	GUN01	0999	6/4/97	0002		pCi/L	0.64	U		0.64	
Total Dissolved Solids	GUN01	0999	6/4/97	0001		mg/L	5	B			
Total Dissolved Solids	GUN01	0999	6/4/97	0002		mg/L	13				
Uranium	GUN01	0999	6/4/97	0001		mg/L	0.001	U		0.001	
Uranium	GUN01	0999	6/4/97	0002		mg/L	0.001	U		0.001	

WATER LEVELS

STATIC GROUND WATER LEVELS (USEE700) FOR SITE GUN01, GUNNISON
REPORT DATE. 8/15/97 1:53:53 PM

LOCATION CODE	FLOW CODE	TOP OF CASING ELEVATION (FT NGVD)	MEASUREMENT DATE	MEASUREMENT TIME	DEPTH FROM TOP OF CASING (FT)	GROUND WATER ELEVATION (FT NGVD)
0006	D	7647.07	06/04/97		6.53	7640.54
		7647.07	06/10/97		6.25	7640.82
0009	D	7645.24	06/10/97		5.82	7639.42
0012	D	7645.35	06/10/97		6.41	7638.94
0013	D	7643.70	06/04/97		4.09	7639.61
0014	D	7644.07	06/05/97		7.50	7636.57
0058	D	7605.92	06/04/97		1.57	7604.35
0059	D	7607.63	06/04/97		0.00	7607.63
0060	D	7604.69	06/04/97		3.28	7601.41
0061	D	7604.27	06/04/97		2.75	7601.52
0068	D	7613.08	06/03/97		4.00	7609.08
0096	C	7618.44	06/04/97		2.20	7616.24
0097	C	7618.92	06/03/97		2.41	7616.51
0106	D	7647.18	06/04/97		6.71	7640.47
		7647.18	06/10/97		6.46	7640.72
0107	D	7646.25	06/10/97		6.77	7639.48
0109	D	7644.96	06/10/97		6.50	7638.46
0112	D	7644.80	06/10/97		6.31	7638.49
0113	D	7643.77	06/04/97		4.83	7638.94
		7643.77	06/05/97		4.82	7638.95
0120	D	7636.50	06/10/97		2.63	7633.87
0121	D	7636.44	06/10/97		4.89	7631.55
0122	D	7636.60	06/04/97		5.41	7631.19
0123	D	7636.68	06/10/97		2.84	7633.84
0125	D	7632.57	06/05/97		2.35	7630.22
0126	D	7632.82	06/05/97		2.80	7630.02
0127	D	7632.91	06/05/97		4.97	7627.94
0130	D	7641.48	06/03/97		7.75	7633.73
0132	D	7641.57	06/03/97		10.21	7631.36

STATIC GROUND WATER LEVELS (USEE700) FOR SITE GUN01, GUNNISON
REPORT DATE: 8/15/97 1:53:54 PM

LOCATION CODE	FLOW CODE	TOP OF CASING ELEVATION (FT NGVD)	MEASUREMENT DATE	MEASUREMENT TIME	DEPTH FROM TOP OF CASING (FT)	GROUND WATER ELEVATION (FT NGVD)
0133	D	7641.70	06/10/97		5.96	7635.74
0134	D	7641.94	06/10/97		6.21	7635.73
0135	D	7626.17	06/10/97		3.24	7622.93
0136	D	7626.28	06/06/97		3.88	7622.40
0145	D	7632.53	06/04/97		2.45	7630.08
0147	D	7632.64	06/04/97		4.94	7627.70
0155	D	7620.70	06/05/97		2.44	7618.26
0157	D	7620.55	06/05/97		3.65	7616.90
0160	D	7599.12	06/04/97		2.35	7596.77
0161	D	7599.11	06/04/97		3.77	7595.34
0163	C	7606.62	06/04/97		5.85	7600.77
0170	D	7642.26	06/04/97		9.86	7632.40
		7642.26	06/05/97		9.82	7632.44
0181	D	7617.40	06/04/97		4.29	7613.11
0183	D	7617.32	06/04/97		4.39	7612.93
0186	D	7626.01	06/04/97		4.41	7621.60
0187	D	7625.76	06/10/97		3.66	7622.10
0188	D	7613.67	06/03/97		4.02	7609.65
0189	D	7613.75	06/03/97		4.40	7609.35
		7613.75	06/05/97		5.03	7608.72
0196	D	7620.53	06/03/97		4.13	7616.40
0197	D	7620.58	06/03/97		2.37	7618.21

RECORDS SELECTED FROM USEE700 WHERE site_code='GUN01' AND LOG_DATE between 6/1/97 and 6/30/97

FLOW CODES
C CROSS GRADIENT D DOWN GRADIENT

STATIC GROUND WATER LEVELS (USEE700) FOR SITE GUN08, LANDFILL GUNNISO
REPORT DATE: 8/15/97 1:56:56 PM

LOCATION CODE	FLOW CODE	TOP OF CASING ELEVATION (FT NGVD)	MEASUREMENT DATE	MEASUREMENT TIME	DEPTH FROM TOP OF CASING (FT)	GROUND WATER ELEVATION (FT NGVD)
0609	O	8012.64	06/03/97		102.85	7909.79
0621	O	8013.44	06/09/97		103.51	7909.93
0628	O	8052.11	06/09/97		86.91	7965.20
0630	O	8010.58	06/09/97		100.84	7909.74
0631	O	8030.18	06/09/97		44.73	7985.45
0632	O	7979.61	06/09/97		70.09	7909.52
0633	O	7984.70	06/09/97		75.33	7909.3
0634	O	7977.87	06/09/97		68.60	7909.27
0635	O	8007.68	06/09/97		97.81	7909.87
0640	O	7992.30	06/09/97		7.17	7985.13
0663	O	8068.33	06/09/97		166.35	7901.98
0665	O	8038.61	06/09/97		139.83	7898.78
0703	O	8016.11	06/09/97		106.35	7909.76
0704	O	8014.03	06/09/97		104.20	7909.83
0708	U	8052.21	06/09/97		143.21	7909.00
0709	D	7928.68	06/09/97		55.47	7873.21
0710	U	8071.00	06/09/97		100.60	7970.40
0711	C	8021.81	06/09/97		82.42	7939.39
0712	D	7972.90	06/09/97		97.60	7875.30
0713	D	7992.72	06/09/97		69.49	7923.23
0714	D	7890.96	06/09/97		62.32	7828.64
0715	D	8022.91	06/09/97		139.76	7883.15
0716	D	8087.22	06/10/97		181.16	7906.06
0717	D	8049.57	06/09/97		168.74	7880.83
0720	D	8026.54	06/03/97		116.20	7910.34
0721	D	8047.15	06/03/97		111.50	7935.65
0722	D	8051.96	06/03/97		149.80	7902.16
0723	D	8040.49	06/04/97		139.29	7901.20
0724	D	8028.21	06/04/97		132.62	7895.59

STATIC GROUND WATER LEVELS (USEE700) FOR SITE GUN06, LANDFILL GUNNISO
REPORT DATE: 8/15/97 1:56:57 PM

LOCATION CODE	FLOW CODE	TOP OF CASING ELEVATION (FT NGVD)	MEASUREMENT DATE	MEASUREMENT TIME	DEPTH FROM TOP OF CASING (FT)	GROUND WATER ELEVATION (FT NGVD)
0725	D	8015.47	06/04/97		122.80	7892.67

RECORDS: SELECTED FROM USEE700 WHERE site_code='GUN06' AND LOG_DATE between 06/1/97 and 06/30/97

FLOW CODES:
C CROSS GRADIENT
D DOWN GRADIENT
O ON-SITE
U UPGRADIENT

TRIP REPORT/WORK ORDER

nuclec-ers
EC ENVIRONMENTAL RESTORATION SERVICES, LLC

UGUN000023

CONTRACT NO.: DE-AC13-96GJ87335
TASK ORDER NO.: 96-5.5
CONTROL NO.: 3100-T97-0634

May 1, 1997

Technical Manager
Department of Energy
Grand Junction Office
2597 B¾ Road
Grand Junction, CO 81503
ATTN: Don Metzler

SUBJECT: Contract No. DE-AC13-96GJ87335—June 1997 UMTRA Ground Water Sampling at Gunnison, Colorado

Dear Mr. Metzler

Attached are a map and tables specifying the sampling locations and analytes for routine monitoring at the Gunnison, Colorado, UMTRA site. Water quality data will be collected from monitoring wells at this site as part of the routine UMTRA Ground Water Sampling. Sampling is scheduled to begin June 2, 1997. Also attached is the *Addendum to the Sampling and Analysis Plan for the UMTRA Ground Water Project* which describes the procedures for sampling and managing waste.

The following lists show the well locations (with the associated zone of completion), and surface locations that will be sampled during this sampling event.

Ground Water Project Monitor Wells (filtered)*

006 Al	059 Al	122 Al	130 Al	147 Al	186 Al
013 Al	088 Al	125 Al	132 Al	155 Al	188 Al
014 Al	106 Al	126 Al	136 Al	157 Al	189 Al
058 Al	113 Al	127 Al	145 Al	170 Al	

Surface Project Monitor Wells (filtered)*

609 Gc	720 Tg	722 Tg	723 Tg	724 Tg	725 Tg
716 Gc	721 Tg				

Private Wells (unfiltered)*

455 Al	469 Al	600 Nr	667 Nr	683 Nr	685 Nr
468 Al	472 Al	665 Al	680 Nr		

*NOTE: Al = Alluvium; Gc = Clayey gravel or clayey sandy gravel; Nr = No recovery of data for classifying; Tg = Tertiary gravels

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2597 B 3/4 ROAD
GRAND JUNCTION, COLORADO 81503
970/248-6000 (FAX) 970/248-6040

Surface Water (filtered)

792	795

Data loggers will be downloaded from the following locations.

058	061	097	160	183	196
059	088	145	161	188	197
060	096	147	181	189	

One QA/QC sample will be collected for every 20 water samples. Samples collected for alkalinity will not be filtered. Access agreements for the Gunnison site are currently in review. It is anticipated that all access agreements will be in place prior to the start of fieldwork. Water level information will be collected from all wells at the Gunnison site and monitor well inspections will be conducted and documented to confirm the status of all existing wells.

If you have any questions, please call me at extension 6059 or Dave Miller at extension 6652.

Sincerely,

Sam Marutzky
Project Manager

lcg/lad
Attachments

cc w/o att: Contract File (C. Spor)
D. E. Miller
K. E. Miller
R. I. Smith
D. G. Traub
cc w/att: GWGUN 14.6

mactec-ers
MACTEC ENVIRONMENTAL RESTORATION SERVICES, LLC

CONTRACT NO.: DE-AC13-96GJ87335
TASK ORDER NO.: 96-05.05.10
CONTROL NO.: NA

MEMO TO: Sam Marutzky

FROM: David Miller

DATE: June 30, 1997

SUBJECT: UMTRA Ground Water Trip Report

Site: Gunnison, CO

Dates of Sampling Event: June 2, 1997 to June 10, 1997.

Team Members: David Miller, Ken Pill, Sam Campbell, Jeff Price, Dave Traub, and Barbara Wethington

Number of Locations Sampled: 31 monitor wells, 2 surface water locations, and 9 domestic wells were sampled. Filtered samples were collected at all locations except the domestic wells.

Locations Not Sampled/Reason: Domestic well 600 was not sampled due to a non-functional pump and lack of access to the well during this visit.

Surface water-level elevations were not measured during this event, with the exception of the staff gauge on the Gunnison river (location 794) Collecting these measurements will require surveyors

Location Specific Information: Wells 136, 157, 723, 724, and 725 were purged dry prior to sampling

The total depth of Well 157 is reported as 99.00 feet but the total depth of this well measured 30 93 feet. The discrepancy could be due to an obstruction present in the well or the database could be incorrect.

The depth of Well 716 is reported as 229 feet in the database. Actual total depth of the well is 210 feet

Well 088 is listed in the database as being located on the Loken's property. The actual location of this well falls within the property boundaries of Roberta Harper (641-2346). I talked to Ms Harper and she has some concerns about this discrepancy. I let Rob Bleil know about this, and he will contact her.

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All wells to the south and east of the Valco property, located in the hay fields, are leased by Wallace Hildreth.

Field Variance: Wells 155 and 157 were located in the middle of a flooded meadow. Because the equipment needed to be carried some distance, instrument calibration was completed once for both wells prior to transporting equipment to the wells and sampling.

Well 189 was purged below the pump intake. Samples were taken after recharge.

Quality Control Sample Cross Reference: Duplicate field alkalinity measurements were collected at locations 716 and 683. The following are the false identifications assigned to the quality control samples submitted to the GJO analytical laboratory:

False ID	True ID	Sample Type	Associated Matrix	Ticket Number
800	795	Duplicate	Surface Water	NDC-274
900	683	Duplicate	Domestic Well	NDB-504
901	132	Duplicate	Ground Water	NDB-506
902	Equipment Blank	Equipment Blank	Ground Water	NDB-515
903	Equipment Blank	Equipment Blank	Ground Water	NDB-513
904	104	Duplicate	Ground Water	NDB-517

Requisition Number Assigned: 15474 and 15475.

Water Level Measurements: Water levels were completed on all wells at the site, with the exception of those located within the airport fence. The field maps for this site show many of the wells in the wrong locations. The Airport Manager did not want us to spend a lot of time wandering around the runways looking for wells. The water levels for wells on the airport property will not be collected until the maps are corrected, and the field team has a better idea of their true location.

Well Inspection Summary: The PVC casing on Well 125 has been melted and is crimped.

The concrete pad on Well 126 moves when stepped on and is not stable. The PVC casing may be cracked below the pad introducing water from the flooded meadow. Water can be heard trickling in the casing when pumping the well.

The surface casing of well 133 is damaged and there is no lock present. The surface casing on wells 120, 181, and 183 are loose.

Corrective Action Required/Taken: A lock was placed on well 133. However, this well and the wells with loose casings require more extensive repair than was possible at this time. These wells should be repaired during the late summer/fall after flooding of the field is completed (the field is flood irrigated by the owner).

The data logger from Well 059 was removed because the well vault was filled with water.

Data Loggers: Sixteen Geogaurd LH400 data loggers were downloaded and recalibrated; one data logger (from well 059) was completely submerged in water and therefore not downloaded and was removed. Well 181 was listed as having a data logger and did not; well 013 did have a data logger and was listed as questionable.

Equipment: All equipment operated satisfactorily.

Regulatory: None.

Site Issues: Surface locations were staked and recorded in the logbook where they were sampled. The majority of roads and landmarks on the maps are incorrect. Several wells were located in flooded fields due to high runoff conditions. Due to flooding and access problems sampling of wells from least contaminated to most was not possible at several locations.

The owners of all of the domestic well sites would like to be informed of the results of analysis, as soon as available.

cc: R Bowen
R Edge
D Metzler
K Miller
GWGUN 14 12