

CROW.BUTTE RESOURCES, INC.

86 Crow Butte Road
P.O. Box 169
Crawford, Nebraska 69339-0169



(308) 665-2215
(308) 665-2341 – FAX

April 28, 2000

Mr. Thomas Essig, Chief
Uranium Recovery Branch
Division of Waste Management
Office of Nuclear Material Safety and Safeguards
Mail Stop T-7-J-8
U.S. Nuclear Regulatory Commission
11545 Rockville Pike
Rockville, Maryland 20850

Re: Source Materials License SUA-1534
Docket No. 40-8943
Monitor Well SM7-23 Upper Control Limit Exceedance

Dear Mr. Essig:

On April 27, 2000 during routine biweekly water sampling of Crow Butte Resources, Inc. (CBR) shallow monitor well SM7-23, the single parameter upper control limit (UCL) was exceeded for sulfate. As required by SUA-1534, a second sample was collected within 48 hours and analyzed for the five excursion indicator parameters. The results of the second sample (and a third sample taken on April 28) also exceeded the single UCL for sulfate. Based upon these results, monitor well SM7-23 was placed on excursion status.

Mr. Jolliff of the NRC Operations Center was notified verbally at 1144 MDT on April 28, 2000 of the confirmation of the exceedance. As required by License Condition 12.2, this letter provides written notification of the exceedance. Laboratory results for the analysis of both samples are attached. In addition, graphs are attached for the excursion monitoring for SM7-23 that covers the period from November 11, 1999 through April 28, 2000.

CBR believes that the exceedance of the sulfate single UCL in SM7-23 is due to drilling activities in the immediate vicinity of the well and is not due to migration of mining solutions. SM7-23 is located in a new area of Mine Unit 7 where mining activities have not begun. The nearest active mining well is approximately 800 feet from SM7-23. In addition, there are several other shallow monitor wells located between SM7-23 and these active mining wells. If the excursion were due to mining solutions, these wells would also be affected.

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Mr. Thomas Essig
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The conclusion that this UCL exceedance is not caused by a migration of mining solutions is further supported by the trends for the other four excursion parameters. As shown in the attached graphs, none of the other parameter concentrations exhibit an upward trend. If the exceedance were due to mining solutions, it is certain that some of the other parameter concentrations would be affected.

In accordance with License Condition 11.2, CBR will increase the sampling frequency for SM7-23 to weekly until three consecutive weekly samples are below the exceeded UCL. At that time, the well will be returned to normal status.

If you have any questions or require any further information, please do not hesitate to call me at (308) 665-2215.

Sincerely,
CROW BUTTE RESOURCES, INC.

A handwritten signature in black ink, appearing to read 'M. Griffin', written over a circular stamp or mark.

Michael Griffin
Manager of Environmental and Regulatory Affairs

Enclosures: As Stated

cc: Mr. Steve Collings - CBR, Denver
Mr. William Ford - NRC, Washington D.C.

Crow Butte Project
Monitor Well Laboratory Report

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Sample Date: 04-²⁷~~26~~-2000
Analysis Date: 04-27-2000

Analyst: LG/HD

Well Number	Sodium (mg/L)	Sulfate (mg/L)	Chloride (mg/L)	Conductivity (UMHOS)	Alkalinity (mg/L)
SM6-13 Multiple	42	18	8	640	300
Single	50	21	10	768	360
SM6-21 Multiple	24	20	8	594	260
Single	29	24	10	713	312
SM6-22 Multiple	23	18	5	562	258
Single	27	21	6	674	310
SM6-23 Multiple	30	17	5	576	262
Single	36	21	6	691	314
SM6-24 Multiple	28	18	7	560	258
Single	33	21	9	672	310
SM6-25 Multiple	30	18	7	580	270
Single	36	22	8	696	324
SM6-26 Multiple	32	18	7	605	257
Single	39	22	9	726	308
SM6-27 Multiple	30	18	6	564	264
Single	36	21	7	677	317
SM6-28 Multiple	38	33	7	648	293
Single	46	39	9	778	351
SM7-23 Multiple	118*	81*	7.9*	580*	190*
Single	134	52	45	708	232
	161	62	54	850	278
SM7-24 Multiple	137	74	30	674	216
Single	164	89	37	809	259
SM7-25 Multiple	100	26	44	538	168
Single	120	32	52	645	202
CM6-23 Multiple	475	416	240	2436	382
Single	570	500	288	2923	458
CM6-24 Multiple	474	410	239	2328	384
Single	569	492	287	2794	461

* - Denotes 5% change from previous sample.

Crow Butte Project
Monitor Well Laboratory Report

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Sample Date: 04-27-2000
Analysis Date: 04-28-2000

Analyst: LG/HD

Well Number	Sodium (mg/L)	Sulfate (mg/L)	Chloride (mg/L)	Conductivity (UMHOS)	Alkalinity (mg/L)
SM6-13	26*	21*	6.7*	560	255
Multiple	42	18	8	640	300
Single	50	21	10	768	360
SM6-21	23*	15	6.5	490	205*
Multiple	24	20	8	594	260
Single	29	24	10	713	312
SM6-22	23*	13	4.6*	470	205
Multiple	23	18	5	562	258
Single	27	21	6	674	310
SM6-23	28*	15*	4.6	510	240*
Multiple	30	17	5	576	262
Single	36	21	6	691	314
SM6-24	26*	14	5.0*	470	215
Multiple	28	18	7	560	258
Single	33	21	9	672	310
SM6-25	26*	13*	6.2*	480	210
Multiple	30	18	7	580	270
Single	36	22	8	696	324
SM6-26	28*	12	5.4	460	210
Multiple	32	18	7	605	257
Single	39	22	9	726	308
SM6-27	28*	12*	4.8*	470	220*
Multiple	30	18	6	564	264
Single	36	21	7	677	317
SM6-28	31*	21	5.0*	520	235
Multiple	38	33	7	648	293
Single	46	39	9	778	351
SM7-23	120*	82*	8.5*	590*	180
Multiple	134	52	45	708	232
Single	161	62	54	850	278
SM7-24	119	73	12	580	185
Multiple	137	74	30	674	216
Single	164	89	37	809	259
SM7-25	77	18*	4.2	360	165
Multiple	100	26	44	538	168
Single	120	32	52	645	202
CM6-23	404	334	189	1920	315
Multiple	475	416	240	2436	382
Single	570	500	288	2923	458
CM6-24	402	334	183	1900	310
Multiple	474	410	239	2328	384
Single	569	492	287	2794	461

* - Denotes 5% change from previous sample.

Crow Butte Project
Monitor Well Laboratory Report

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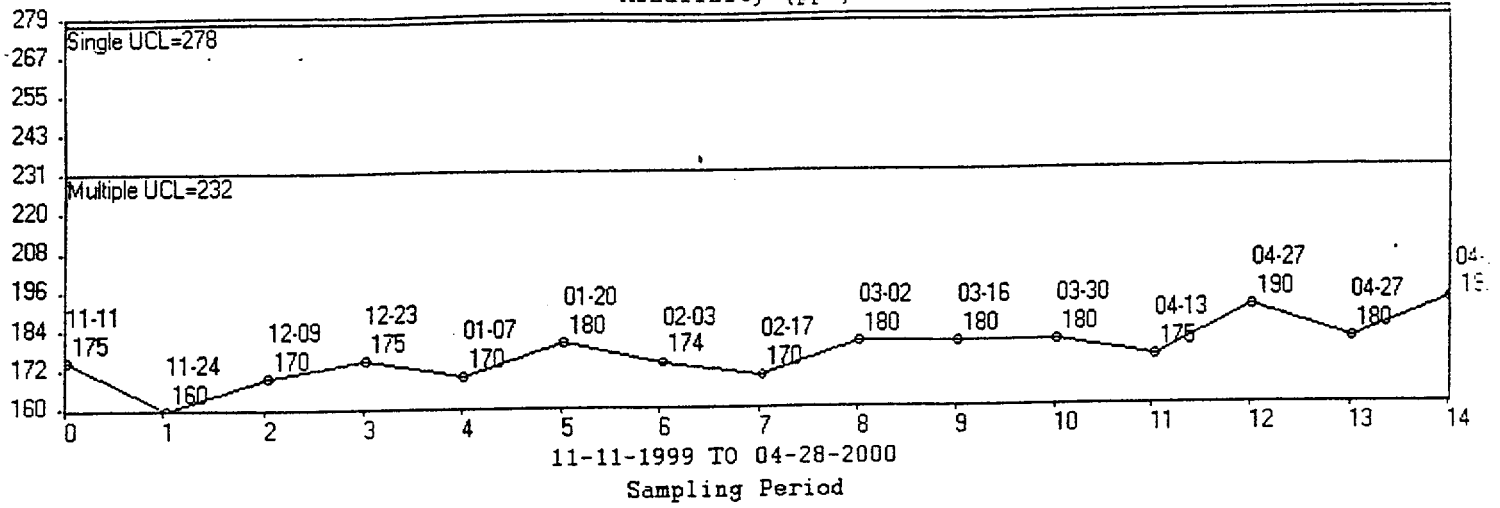
Sample Date: 04-28-2000
Analysis Date: 04-28-2000

Analyst: IG/HD

Well Number	Sodium (mg/L)	Sulfate (mg/L)	Chloride (mg/L)	Conductivity (UMHOS)	Alkalinity (mg/L)
SM6-13 Multiple	42	18	8	640	300
Single	50	21	10	768	360
SM6-21 Multiple	24	20	8	594	260
Single	29	24	10	713	312
SM6-22 Multiple	23	18	5	562	258
Single	27	21	6	674	310
SM6-23 Multiple	30	17	5	576	262
Single	36	21	6	691	314
SM6-24 Multiple	28	18	7	560	258
Single	33	21	9	672	310
SM6-25 Multiple	30	18	7	580	270
Single	36	22	8	696	324
SM6-26 Multiple	32	18	7	605	257
Single	39	22	9	726	308
SM6-27 Multiple	30	18	6	564	264
Single	36	21	7	677	317
SM6-28 Multiple	38	33	7	648	293
Single	46	39	9	778	351
SM7-23 Multiple	120	82	8.5	580	192*
Single	134	52	45	708	232
Single	161	62	54	850	278
SM7-24 Multiple	137	74	30	674	216
Single	164	89	37	809	259
SM7-25 Multiple	100	26	44	538	168
Single	120	32	52	645	202
CM6-23 Multiple	475	416	240	2436	382
Single	570	500	288	2923	458
CM6-24 Multiple	474	410	239	2328	384
Single	569	492	287	2794	461

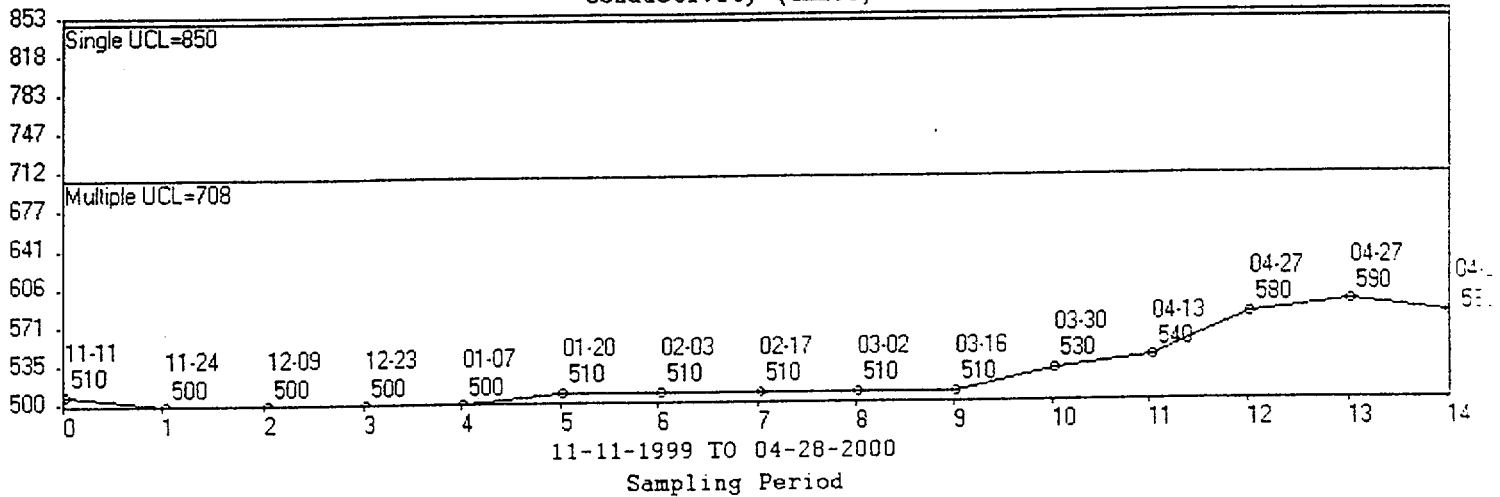
* - Denotes 5% change from previous sample.

Alkalinity (ppm)

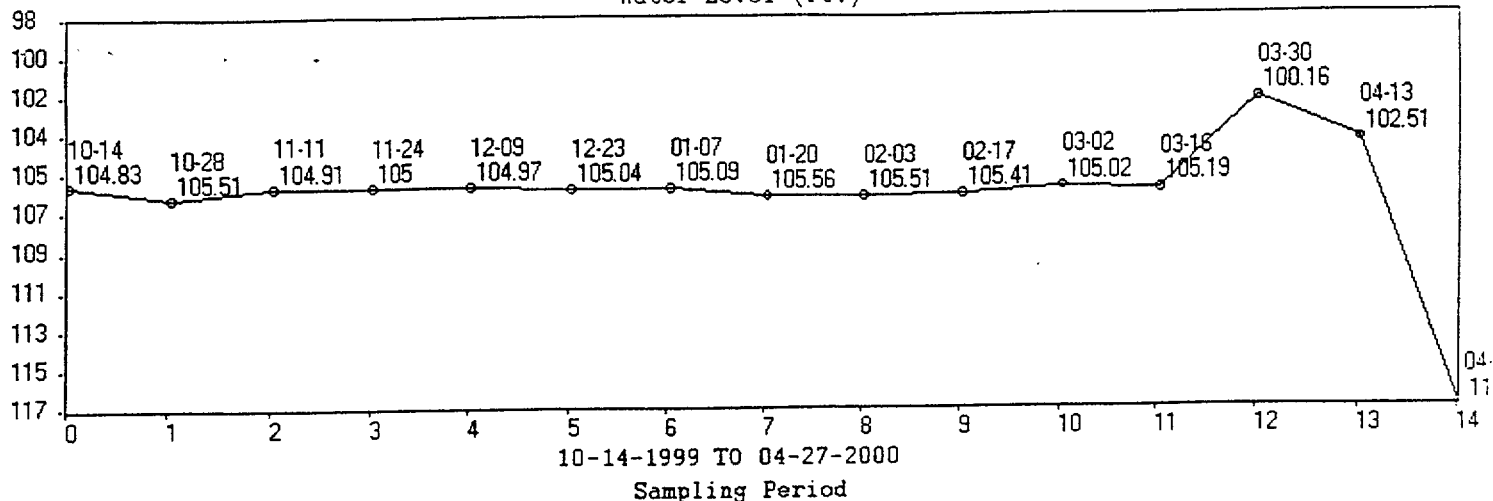


SM7-23

Conductivity (umhos)

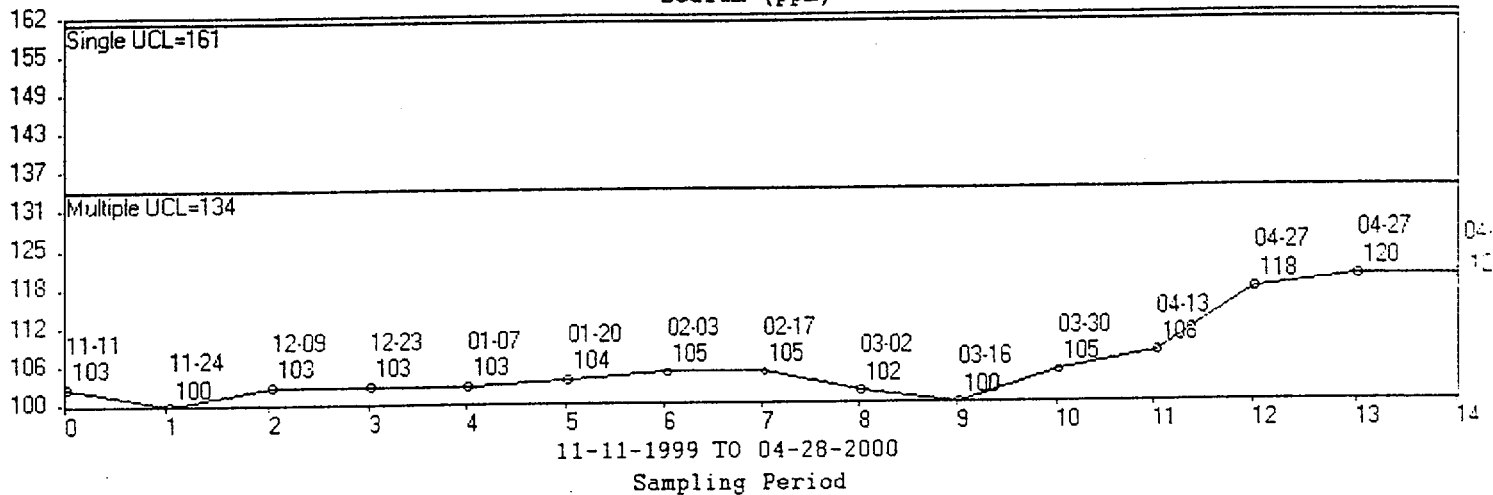


Water Level (ft.)

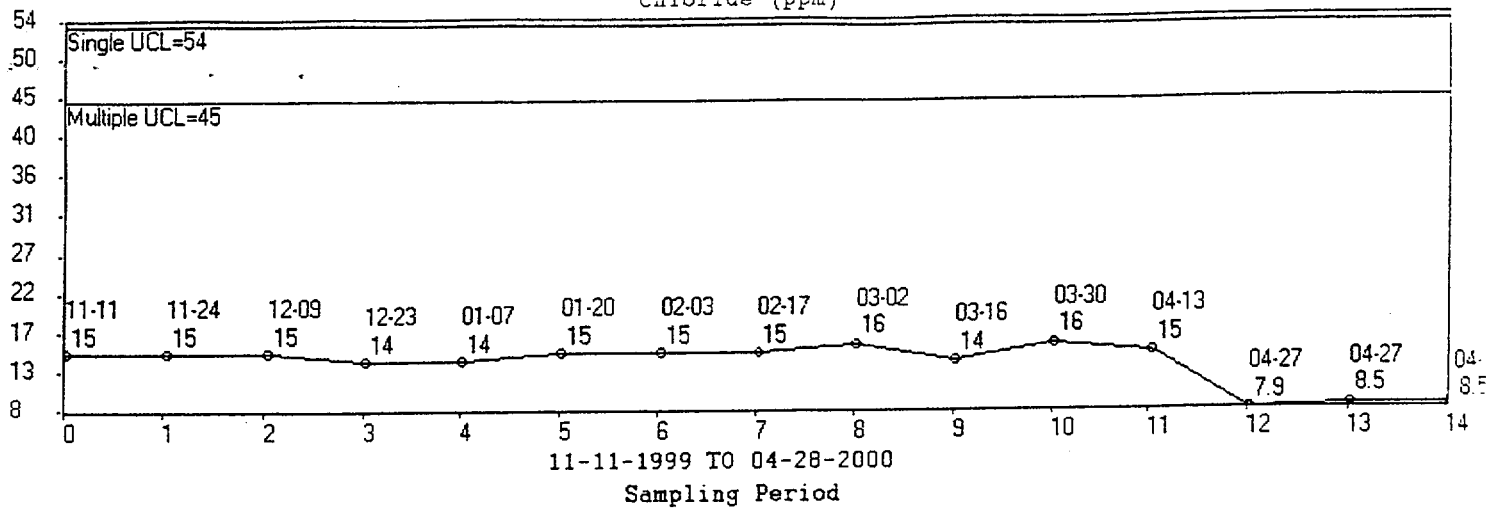


SM7-23

Sodium (ppm)



Chloride (ppm)



SM7-23

Sulfate (ppm)

