60001338

Mining District File Summary Sheet

DISTRICT	Rosebud
DIST_NO	4010
COUNTY If different from written on document	Pershing
TITLE If not obvious	Rosebud Drill Hole File - Hole No. RL-107
AUTHOR	N. Brown; K. Tullar; R. Grondin
DATE OF DOC(S)	1990; 1996
MULTI_DIST Y / (N?) Additional Dist_Nos:	
QUAD_NAME	Sulphur 7.5'
P_M_C_NAME (mine, claim & company names)	Rosebud Mine; Rosebud Project; Coates Drilling; Lac Minerals (USA) Inc
COMMODITY If not obvious	gold silver
NOTES	Drill log; geology; assay; total depth 1030' handwritten notes 40p

Keep docs at about 250 pages if no oversized maps attached
(for every 1 oversized page (>11x17) with text reduce
the amount of pages by ~25)

	Initials	Date
SS:	DD	5/19/08
DB:	mah	
SCANNED:		

Revised: 1/22/08

Drill Log RL-107
Rosebud

60001338 4010

6 6001338

LAC MINERALS (U.S.A.) INC.

DRILL LOG SUMMARY SHEET

PROJECT Rosebud

HOLE NUMBER RL-107 TOTAL DEPTH 1030' LOGGED BY DAM

Date started 8-22-90 AM

Date completed 8·26·90 PM

Initial bearing S52E

Initial inclination -55°

Elevation 5257.2

Collar coordinates:

N 2204326

E 481702.1

Contractor: Coates

Drill Type: UDR-650

Hole Size:

Drilling Conditions:

Footage: Wet / Dry Dry 0-240, RC to 465'

Wet @ 240' HMQ - 465-730, REDUCE TO NMQ @ 730' Am 8·25

NO CIRCULATION

Comments: T.D. = 1030

DOWN HOLE SURVEY INFORMATION

FROM (0)	TO (50)	SURVEY POINT	INCLINATION (-55)	BEARING (S52E)	X (Northing)	Y (Easting)	Z (Elevation)
50	200	100	-57°	S56E			
200	400	300	-58.5	S56E			
400	600	500	-59.5	S55E			
600	800	700'	-60.5	S54E			
800	965	900	-59.5	S57E			
965	1030	1030	-61°	S56E			

LAC MINERALS (U.S.A.) INC.
ROSEBUD PROJECT

CHOCOLATE TUFF
BUD BRECCIA
BUD TUFF
BUD EPICLASTIC
BUD TUFF BRECCIA
DT DOZER WELDED TUFF

ARGILLIC
XX SILICIFICATION
OX OXIDIZED
DRUZY QUARTZ
XC CHALCEDONIC QUARTZ
XK STOCKWORK QUARTZ
P P P PROPYLITIZATION
Ca CALCITE

DRILL HOLE RL-107

Page 1 of 5

LOGGED BY DAM

	LITH.	ALT.	% ARG. ALT. W	M	S	% SIL'N W	M	S	COLOR	% FeOx W	M	S	% SULF.	COMMENTS	Au	Ag	CHECK	
									BRN					0-5' FGT?	.004	L		
05		~							LT GR					5-120' LT GR LITHIC LAPILLI TUFF— BOX, locally green clay altered and Ox.	.002			
10															.001			
15															.001			
20															.001			
25															.002			
30															.002			
35															.005			
40															.002			
45															.004			
50		~													.003			
55		~													.004			
60		~													.002			
65															.001			
70															L			
75									RUST BRN ? GREEN						.001			
80															.001			
85															.001			
90															.002			
95															.002			
100																		

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DRILL HOLE RL-107

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LOGGED BY DAM

	LITH.	ALT.	% ARG. ALT. W	M	S	% SIL'N W	M	S	COLOR	% FeOx W	M	S	% SULF.	COMMENTS	Au	Ag	CHECK	
									OL. GRN + PURPLE				<1%		.001	.18		
105															<	<		
110									LT GREEN						.001	<		
115															.002	<		
120									PURPLE +				<1%	120-210 Fine Grain, Possibly Flowbanded, Tuff & Local Volcanic Bx?	.002	<		
125									GREEN						.002			
130															.002			
135															<			
140															<			
145															.001			
150															.002			
155															.001	.17		
160															.002	<		
165															.001			
170															<			
175															.001	.15		
180															<			
185															<			
190															<			
195															<			
200																		

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DRILL HOLE RL-107

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LOGGED BY DAM

	LITH.	ALT.	% ARG. ALT. W	M	S	% SIL'N W	M	S	COLOR	% FeOx W	M	S	% SULF.	COMMENTS	Au	Ag	CHECK
									GREEN + PURPLE				<1%		<	<	
205																<	
210									PURPLE RED BROWN					210-250 VERY FINE GRAIN TUFF? OR INTRUSIVE DIKE?		<	
215	DIKE OF VERY FINE GR. TUFF															.32	
220																<	
225																<	
230																<	
235																.12	
240 ▽ WET																.10	
245																<	
250									LT GREEN				±1%	250-465 FGT ≈ LOCAL VBx, CRACKLE SPECKLE TEXTURE?		<	
255																.18	
260		Xa											±1%			<	
265		Xc													.002	<	
270													±1%		.006	.26	
275															.016	.21	
280															.001	.18	
285															.002	<	
290													±2%		.001	<	
295													±1%		.004	<	
300																	

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DRILL HOLE RL-107

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LOGGED BY DAM

	LITH.	ALT.	% ARG. ALT. W	M	S	% SIL'N W	M	S	COLOR	% FeOx W	M	S	% SULF.	COMMENTS	Au	Ag	CHECK
		Xc							LT GREEN				1-2%	FGT & VBx cont	.006	<	
305																	
310															.110	<	.174
															.002		
315																	
															.031		
320																	
															.001		
325																	
															<		
330																	
															<		
335																	
															<		
340																	
															<		
345																	
															.03		
350																	
															<		
355																	
															<		
360																	
															<		
365																	
		Cz													<		
370																	
															<		
375																	
															<	.16	
380																	
															<	<	
385																	
															<	<	
390																	
															.003	.21	
395																	
400															.02	<	

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LOGGED BY Dan

	LITH.	ALT.	% ARG. ALT. W	M	S	% SIL'N W	M	S	COLOR	% FeOx W	M	S	% SULF.	COMMENTS	Au	Ag	CHECK
									LT GREEN				1-2%	FGT + VBx	.015	.15	
405															.001	.10	
410															.165	.42	.135
415															.039	.14	
420															.001	.11	
425															.007	✓	
430															.001	✓	
435															✓	✓	
440															.001	.12	
445															✓	✓	
450															✓	✓	
455															✓	✓	
460														END RL - BEGIN HMQ CORE	✓	✓	
465																	
70																	
75																	
80																	
85																	
90																	
95																	
00																	

HOLE # RL-107 LOGGED BY CMW DATE 12-5-90 PAGE 1 OF 9

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERAL-IZATION	GRAPHIC LOG	ALTER.	DESCRIPTION	ASSAYS: Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
465	120	None	wk fract'd	None		v wk bleach	0.-465 Reverse Circ 465 - 678 RBUR/LBT, generally just weakly bleached fgt 465 -503 dark grey green dense fgt, locally mottled w/ dk green, locally "auto bx'd"/lbt? Generally fairly fresh to wk alt'd 473-481 local 6" - 1" zones more argillized. 492-500 mottled along tiny fract's? 500 - 503 wk bleached & wk crackle bx'd						
470	100												
	90					wk bleach & local arg							
480	100					v wk bleach							
490	98						503-515: Tuff bxa; large (1"-6") flow banded & mottled clast, dk grey-green color 515-533: Coarsely mottled texture - 15 to 20% amygdules filled w/ lt green (?) in dk purplish grey groundmass						
500	100					wk bleach v wk bleach							
510	100												
520	100												
530													

HOLE # RL-107 LOGGED BY CMWalck DATE 12-5-90 PAGE 2 OF ___

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERALIZATION	GRAPHIC LOG	ALTER.
	100	None	wk fract'd	minor FeOx on Fract's		fairly fresh
540	103					wk bleach
						fairly fresh
550	100		none	NONE		wk bleach
560	101		wk fract'd & wk Veined	py+ dk green ± qtz, rare Kaol, rare DrQ +Mc		
570	102		wk fract'd	dk green & FeOx on fracts		
580	98					
590	100		wk fract'd & wk vnlts	dk green +py ± Qtz, rare Kaol		
600						

DESCRIPTION

465 - 678 cont RBUR/LBT

533 - 540 : fine grained dense dk purplish grey RBUR, breaks sharply, some dk red-brown FeOx along fract's

540 - 545 : fine grained med-dk green - wkly bleached version of above

545 - 552 : dk purplish grey f gr, dense RBUR grading down to dk greenish grey

552 - 557 : spotted, med dk 1/8" green spots (30%) in med grey-green background

557 - 605 : med blue green color w/ ~5% tiny dk green specks (alt'd mafic phenos). Weakly bleached, generally wk fractured, w/ dk green & chlor? or red brown FeOx along thin fracts.

Locally weakly veined (some areas no veining, others have 1-2 1/8" - 1/4" vnlts /ft); py + dk green ± qtz, rare drusy qtz +Mc, rare Kaol

ASSAYS

Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
552-557				<.001	<.10
557-562				.001	<
562-567				.007	<
567-572				<.001	.10
572-577				<	<.10
577-582				<	<
582-587				<	<
587-592				<	<
592-597				.007	<
597-601				<	<

HOLE # RL-107 LOGGED BY CMW DATE _____ PAGE 3 OF ___

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERAL-IZATION	GRAPHIC LOG	ALTER.
	92	None	Wk vnlts, rare kaol	dk green + py		Wk Bleach
			Mod vnlts	Qtz + py + dk green + kaol		W-M to Mod Bleach
610	84		Rubble (fault?)	Abt Dr Q		Mod Bleach Wk silic?
	80					
620	100		Wk bx'd	Qtz + kaol + mc		M to M-S bleach
			Wk vnlts & wk fract	Kaol + py + dk green ± qtz & FeOx on fracts		
630	102					Wk bleach
			Wk fract	dk green & or red FeOx on thin fracts		
640	102					
650	101		Wk vnlts & fract	Pws py/Mc + kaol ± qtz		
	102		None	None		W-M bleach
660			Rubble			Wk arg
	105		Wk vnlts & fract	py + qtz, some Dr Qtz + Mc		Mod bleach W-M arg
670						

DESCRIPTION

465-678 cont:

605-612: Mod bleached fgt to med blue green & pink-grey (large blotches) w/ ~5% tiny dk green specks. Mod vnlts 6-12/ft 1/8"-1/2" wide, mix of py, qtz, dk green & kaol

612-619: Rubbly zone, mostly 1/2"-1" subrounded pebbles; mix of blue-green fgt & abt drusy qtz + minor Mc

619-623: M-S bleached to blotchy pink-grey & blue-green, ~50% is brecciated - angular clasts comprise 60%, matrix is mix of qtz & kaol w/ minor py/Mc

623-627: M-S bleached to pinkgrey (but still hard), wk kaol+py + dk green vnlts (2/ft, 1/8") w/ some drusy qtz; 626.5-627 6" rubble

627-656: Weakly bleached med blue-green fgt w/ ~5% tiny dk green specks, Weakly fract'd w/ dark green ? or dk red FeOx on thin fract's. Locally weakly veined: kaol+py ± qtz ± dk green.

656-663.5: W-M bleached to med pink-grey; No veinlets

663.5-664.5: Core broken up into 1"-3" pieces, weakly argillized

664.5-678: Mod bleached to lt-med blue green color, locally to grey-white. Weak to locally mod arg. Alteration increases ↓

ASSAYS

Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
601-605				.002	<.10
605-610.5				.005	<
610.5-615				.005	<
615-619				.002	.13
619-623				.006	.21
623-627				.001	<
627-632				.001	<
632-637				.002	<
637-642				.001	.23
642-647				<	.20
647-652				<	<.10
652-657				<	.24
657-662				.004	<
662-667				.005	<
667-672				.0116	.20

HOLE # RL-107 LOGGED BY CMW DATE _____ PAGE 4 OF ____

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERALIZATION	GRAPHIC LOG	ALTER.
	99	None	wk vnlts	Py+ Qtz, some Dr Q +Mc		Mod bleach W-M arg
			W-M vnlts + crackle bxa			
680			fault zone	Qtz+ Kaol ±Mc		silic
	102		wk vnlts, Abt thin fracts	Py+ qtz stringers		Mod to M-S bleach, W-M to Mod arg
			Bx'd	Dr Q+Mc		
690			wk vnlts, abt thin fract's	Py+ qtz		
	97					
700						
	100					
710			V wk vnlts	Py+ qtz		Mod to M-S bleach wk arg
	100					
720						
	95		wk fract	dk green on thin fract		wk Bleach
730						
	90					
740						

DESCRIPTION

465-678 cont

664.5-679 cont: 676-678 very wk crackle bx'd / fractures w/ py+qtz, & more argillized, [illegible] w/ qtz. & [illegible]

678-682 fault zone / bx'd.

678-679: Crackle bx'd to slightly rotated clast bxa, clasts comprise 85-90%. Vein matrix is qtz & Dr Qtz +Mc.

679-680: Lt grey silicified clasts (30%) floating in med to light grey silica groundmass, minor Mc

680-681: Str crackle to rotated clast bxa, 60-80% clasts dk grey-green fgt in white vein matrix of qtz + kaol

681-682: Mix grey silica & lg chunks lt green fgt

682-750 fgt & lithic poor lapilli tuff (LBT/RBUR?)

682-709: lt dull blue-grey to green-grey to pink grey fgt & dk green mottles along tiny fractures. Overall prob. W-M to Mod arg., can't scratch w/ fingernail but can easily scratch w/ plastic ruler. Abt very thin 'spider web' fractures. Locally contains minor (<10%) lithic frags. Generally weakly veined: 1-2 py+qtz stringers/ft.

688-689: 1' zone bx'd w/ Dr Q + Mc vein matrix

709-723: Slightly less argillized version of above; dull lt green grey w/ spider web of dk green; can't scratch w/ ruler. V. wk. py + qtz vnlts (1 in 2', 1/8"-1/4" wide). Locally contains minor lithic frags.

723-750: Lithic lapilli tuff or auto bxa; clasts same as matrix. Med-dk flesh & blue green. Clasts 1/8" to 3". Weakly fract'd, w/ dk green on thin fract's

741-748: 1/8"-1/4" wide stringers & some cubes of py & minor 1/8" vnlts of calc

748-750: few 1/2" irregular calc vnlts

Reduced to N at 730'

ASSAYS

Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
672-678				.004	.10
678-682				.025	<.10
682-687				.006	.17
687-692				.002	.13
692-697				.001	<.10
697-702				.003	<
702-707				.001	<
707-712				.001	<
712-717				.003	<
717-722				<.001	<
722-727				<	<
727-732				<	<
732-737				<	<
737-741				.001	<

HOLE # RL-107 LOGGED BY CMW DATE _____ PAGE 5 OF ____

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERALIZATION	GRAPHIC LOG	ALTER.
	96	None	w-m fract & wk stringers	Dk green on fract + py stringers + minor calc		wk bleach
750			wk vnlts	Calc		silic
	94		fault zone	Minor Mcq Py		
760						Mod Arg silic
	98		wk vnlts	Calc + py ± qtz & dk green on fracts		Mod Bleach
770						
	100					
780						
	97					
790						
	98			Py + qtz, minor py + calc, py + dk green		
800						
	105		crackle bx'd wk vnlts	qtz + dk gr + kaol py + qtz		
810						

DESCRIPTION

750 - 763 fault zone

750 - 759: fault zone mostly silicified blue-green & grey fgt slightly rotated clasts (80-90%) in siliceous matrix, but 750.5 - 752.5 is more strongly bx'd - silicified subrounded (1/3" avg size) clasts (30%) floating in green-grey siliceous matrix. Minor stringers (1/4" - 1/2" blades?) of Mc.

759-762: Strong crackle bx'd to somewhat rotated light green fgt w/ dk green on abt fine fractures, overall mod argillized - barely scratch w/ fingernail.

761-763: silicified bxa, slightly rotated clasts (70%) in lt grey silica matrix.

763 - 835 fgt (LBT / RBUR)

763-796: Mottled lt-med grey-green & med blue green & pink-grey fine grained tuff, prob v. wk argillized - fairly hard. Locally w/ wk-mod amnt thin fractures w/ dk green?. Generally weakly veined; 2-4 / ft, 1/8" - 1/4" wide, but a few 3/4" vnlts too; calcite + py / Mc + qtz

796 - 806: light grey-green fgt w/ 1% tiny dk green specks. Weakly fract'd & veined; dk green on thin fract's (2-10 / ft) 1-3 1/16" to 1/4" vnlts / ft; py + qtz, some py + calc, py + dk green.

806-808.5: Str crackle bx'd to barely rotated clast bxa 90% clasts; med pink grey fgt, matrix / vein fill is lt-med grey qtz ± dk green? or white kaol ± py.

ASSAYS

Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
741-745				<.001	<.10
745-749				.002	<
749-753.5				.003	.10
753.5-758				.005	.11
758-763				.002	.10
763-768				.003	<
768-772				.003	.35
772-777				.005	.69
777-782				.023	1.30
782-787				.006	1.16
787-792				.006	1.00
792-797				.007	.60
797-802				.001	<
802-807				.002	.12
807-812				.008	.24

HOLE # RL-107 LOGGED BY CMW DATE _____ PAGE 6 OF 9

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERALIZATION	GRAPHIC LOG	ALTER.
820	100	None	Wk vnlts	Py + qtz + Kaol		W-M Bleach
830	100		fault bx'd zone	Py + qtz		W to W-M Bleach
840	93			Abt qtz + Kaol vnlts		Mod bleach W-M Arg
850	101			Qtz + Kaol matrix minor blobs py		M-S bleach, mod Arg
860	99		Wk vnlts + abt thin fracts	dk green, minor py		W-M bleach wk arg
870	100		W-M vnlts	Qtz + Kaol, minor py		Mod Bleach
880				Py + qtz		M-S Bleach + M-S Arg

DESCRIPTION

763 – 835 cont

806 – 828: Mottled lt-med grey-green & med pink grey (blotchy) f.g.t, fairly hard & mod bleach. Minor thin fractures w/ dk green. Weakly veined; 3-5/ft py + qtz/chalcedony ± white Kaol (1/8" – 1/4" wide)

828 – 835: Dull grey green fgt w/ wk crackle bx'd pattern of thin fractures w/ dark grey green along fracts. At core of pieces w spots of darker grey-green. Wk py + qtz vnlts 1-3/ft, 1/8" wide

835 – 860 fault zone – brecciated.

835 – 843: Mod arg (barely scratch w/ fingernail) mod bleached lt-med green fgt clasts (w/ 5% tiny dk phenos) broken up by abt milky white qtz + Kaol vnlts/stringers (5-12/ft, 1/16" – 1/4" wide) Wk blobs & of py.

843 – 848: 50-75% clasts – lt-med grey-pink m-str argillic fgt (easily scratched by fingernail), floating in milky white qtz + Kaol matrix w/ veins. Wk blobs & of py

848 – 852: 75-80% clasts, med grey-green color w lt grey qtz ± Kaol matrix. (Less arg clasts than above). Minor blobs py.

852 – 860: Crackle bx'd lt-med blue green fgt w/ dk green on thin fract's & locally rotated clast bxa w/ qtz + py vein/matrix. Minor stringers & blobs py.

860 – 956.5 Altered fgt (LDT/RBUR?)

860 – 866 pale green fgt w/ spiderweb of peach mottles along tiny thin fractures. Mod bleached. Fairly hard. Wk py + qtz vnlts (1/8" wide, 2/ft)

ASSAYS

Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
812-816				.006	.12
816-820				.006	.19
820-825				.007	.35
825-830				.003	.14
830-835				<.001	.20
835-840				.003	.18
840-845				.025	<.10
845-850				.005	.19
850-855				.014	.19
855-860				.009	.34
860-865				.005	<.10
865-870				.002	<.10
870-875				.002	<.10
875-880.5				.001	.16

HOLE # RL-107 LOGGED BY CMW DATE _____ PAGE 2 OF 9

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERALIZATION	GRAPHIC LOG	ALTER.
890	100	None	W-M vnlts	py+ qtz		M-S Bleach & M-S Arg
900	97			py+ qtz & chalc		M-S Bleach & wk silic?
910	100					
920	100					
930	96		W to W-M vnlts	py+ qtz+ dk green, minor chalc		Mod Bleach Mod silic?
940	94		Bx'd fault zone	Silicon matrix w/ minor py		silic
950	93		W-M vnlts	py+ qtz± Kaol ± dk green		wk bleach & wk silic?
	100					

DESCRIPTION

860-956.5 Cont

866 ~ 894: Mottled texture of alteration on fgt; Peculiar color... Background is f.gr. pale yellowy-green to greenish yellow color, & is M-S argillized - easily scratched by fingernail. Contains ~ 20% flesh / grey-pink elongate mottles; slightly harder than groundmass, avg ≈ size. (Think produced by alt'n because at ~ 908' can see it grade into grey fgt). Weak to W-M vnlts; 2-4 / ft, 1/8" wide, py+ qtz.

894 ~ 926: Mottled greenish yellow, med green & lt flesh fgt, abt very thin fractures w/ med green along them, background is peculiar yellowy color & has irregular mottles of flesh. Fairly hard (can't scratch w/ plastic ruler). Below ~ 922 mottles more aligned. WK to W-M vnlts of py+ qtz (1-2 / ft, 1/8" wide) & cloudy white-grey chalcedony (1-2/ft, 1/8"-1/4" wide)

926-933: Harder... prob. silicified? Background is dull pistachio yellow-green color w/ med flesh mottles ≈ Barely scratched by metal scritcher. W to W-M vnlts py+qtz+ dk green; (2-4/ft, 1/8") & few stringers chalcedony.

933 ~ 944: Brecciated ¿ fault? zone, ~ 70-80% clasts of yellowy-green mottled tuff, matrix supported by lt grey silica. Minor blobs ≈ 0 of py.

944-956.5: Lt grey to buff color fine grained tuff; weakly fractured wk dk red FeOx or dk green on thin fracts. W-M vnlts: Py+ qtz ± duck butter (pale yellow or green) Kaol ± dk green. Fairly hard, can't tell if silicified

¿ EROSIONAL CONTACT w/ below? Seems to have ripped up pebbles at contact?

ASSAYS

Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
880.5-885.5				.001	.13
885.5-890.5				<.001	<.10
890.5-895.5				.003	.20
895.5-900.5				.003	.30
900.5-905.5				.006	<
905.5-910.5				.013	<.10
910.5-915.5				.002	<
915.5-920.5				.001	.14
920.5-925				.005	.14
925-930				.003	.15
930-935				.009	.20
935-939.5				.008	.13
939.5-946				.009	<
946-950				.007	<

HOLE # RL-107 LOGGED BY CMW DATE 12-6-90

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERALIZATION	GRAPHIC LOG	ALTER.
	103	None	w-m vnlts	py + qtz + Kaol + dk green		wk bleach & wk silic?
	101		wk vnlts	qtz + Mc/py		wk arg/bleach?
960			Bx'd fault? or dep?	minor blobs py/Mc	V or Δ	silic
	96					
970		Wisps at 45° to c.a	None	None	Δ or V	wk arg?
	22	None	fault zone	qtz + dk sulf		silic
980	18					
	95		Rubbly wk vnlts	minor py + qtz?		mod arg mod bleach
990	97					
1000	92		wk vnlts	calc + py/Mc ± Kaol		
1010	96					
1020						

DESCRIPTION

956.5 – 959 Pink-tan / lt-med flesh colored spotted/mottled fgt
- abt 1/8" white spots - gives finely pock-marked text
Wk vnlts ; qtz + Mc/py 2-4 1/8" wide stringers/ft

959 – 970.5 Mixed clast 'breccia' - Think that part of SRF ~~texture~~ to 2ndary. Clast-rich, (70%) <2mm – 2cm, unsorted; clasts mostly lt-med blue green & lt grey fgt, angular, w/ minor black (Tr/Jr slate?) frag., in lt grey silica matrix.
No veining. Minor blobs py/Mc

970.5 – 974.5 Clayey; wispy, bedded, lt-med grey-blue-green fgt. Clayey feel, but fairly competent. (epi?) (Epi in fault)
Wisps at ~ 45° to c.a

974.5 – 984.5 Poor Recovery! Fault zone. Bx'd lt. grey silicified fgt w/ dk grey qtz + sulf matrix, mostly siliceous pebbly rubble.

984.5 – 1030 T.D. Dozer fgt

984.5 – 986: Rubbly, broken up M-S bleached lt grey fgt
986 ~ 1000': Bleached to pale grey, fgt. Core fairly broken up, mostly 1" – 4" pieces. Hard.
V. Wk. veined; < 1/32" wide, py + qtz?
1000 – 1020: Bleached to pale grey, fgt. Core fairly broken up mostly 2" – 6" pieces. Weakly veined: 1/16" – 1/8", 2-4/ft, calcite ± py/Mc ± Kaol.
1020 – 1030 fgt, fairly broken up as above, but w/ mod calc. + minor py vnlts; 1/4" – 1" wide

ASSAYS

Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
950-956				<.001	<.10
956-959.7				.001	<
959.7-965				.004	<
965-970				.002	<
970-974.5				.001	<
974.5-980.5				.003	<
980.5-984.5				.003	<
984.5-988.5				<.001	<.10
988.5-992				<	<
992-996				<	.11
996-1000				<	<
1000-1005				.002	.13
1005-1010				<	.14
1010-1015				.006	.11
1015-1020				.001	.29

HOLE # RL-107 LOGGED BY CMW DATE _____ PAGE 9 OF 9

DEPTH (ft)	RECOVERY	Structure: Bd. Fol.	Structure: Faults	MINERAL-IZATION	GRAPHIC LOG	ALTER.	DESCRIPTION	ASSAYS: Sample No.	% Cu	% Pb	% Zn	oz/t Au	oz/t Ag
	100	None	Mod vnlts	calc ± py ± Kaol		Mod Bleach	984.5 – 1030 T.D. cont; Bleached Dozer	1020-1025				.001	<.10
1030 T.D.								1025-1030				.002	.14

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH: 1030'	STARTED:	PAGE: 1/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/20/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

DRILLING: DEPTH FT, REC/CUT, RQD

LITHOLOGY: ALLUVUM, MUD CGL, LITHTUF, PUMTUF, SURGTUF, ASH FLO, LAVA, AUTOBXX, INTRUSIV, BASALT, ANDESITE, RHYOLITE

STRUCT: TEC BOX, BROKEN, GOUGE, VOID

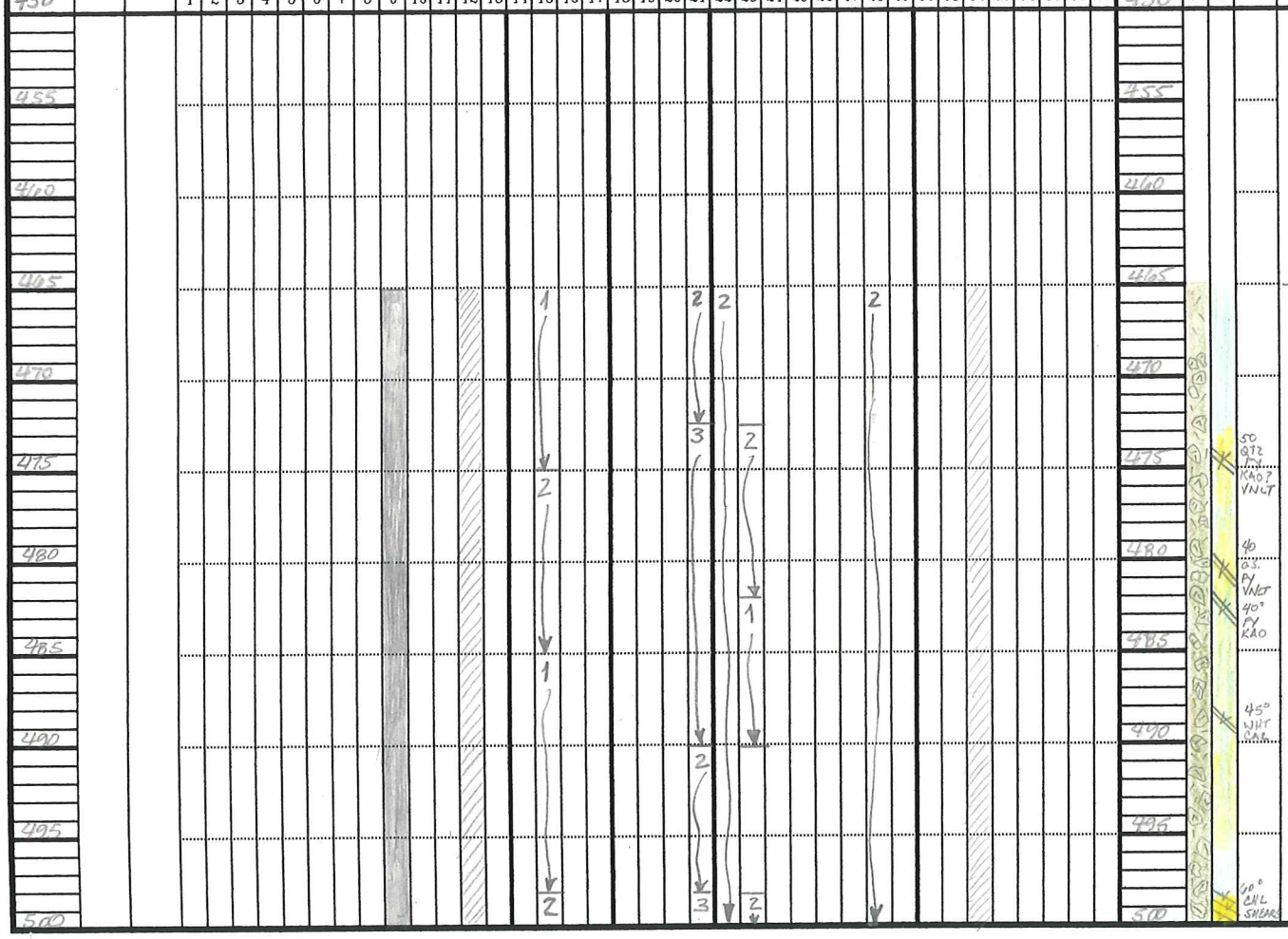
ALTERATION/MINLIZATION: Fe MIN: MNOX, HEMTITE, LIMONITE, PYRITE; PROP, ARG, ARG2, RPLSIL, QTZVNS, CALCITE, METCLAS

STRAT: BADGER, CHOCOLT, UBUD, BRADY, MKRPOR, LUD, WILDROS, DOZER

SCALE: 1" =10 ft

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff



START CORING @ 465.0'

FROM 465' TO 532.9'

BLUH GRN PORPHYRITIC AUTOBXA & DENSE LAVA OF CHOCOLATE? FM. MODERATELY PROPYLITIZED W FRACTURE CONTROLLED ARGILLIZATION VEINLETS 4mm WIDE COARSE BLADED MARCASITE W LATE INCOMPLETE FILLING OF WHITE CLAY.

PROTOLITH IS PROBABLE SOME KIND OF BLOCK FLOW OR DENSELY LITHIFIED LAHAR

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 2/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/20/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

DRILLING: DEPTH (FT), REC/CUT, Q

LITHOLOGY: ALLUVIUM (1), MUD CGL (2), (3), LITHTUF (4), PUMTUF (5), SURGTUF (6), ASH FLO (7), LAVA (8), AUTOBX (9), INTRUSIV (10), BASALT (11), ANDESITE (12), RHYOLITE (13)

STRUCT: TEC BOX (14), BROKEN (15), GOUGE (16), VOID (17)

ALTERATION/MINLIZATION: Fe MIN: MNOX (18), HEMTIT (19), LIMONIT (20), PYRITE (21); PROP (22), ARG (23), ARG2 (24), RPL SIL (25), (26), QTZ VNS (27), CALCITE (28), METCLAS (29)

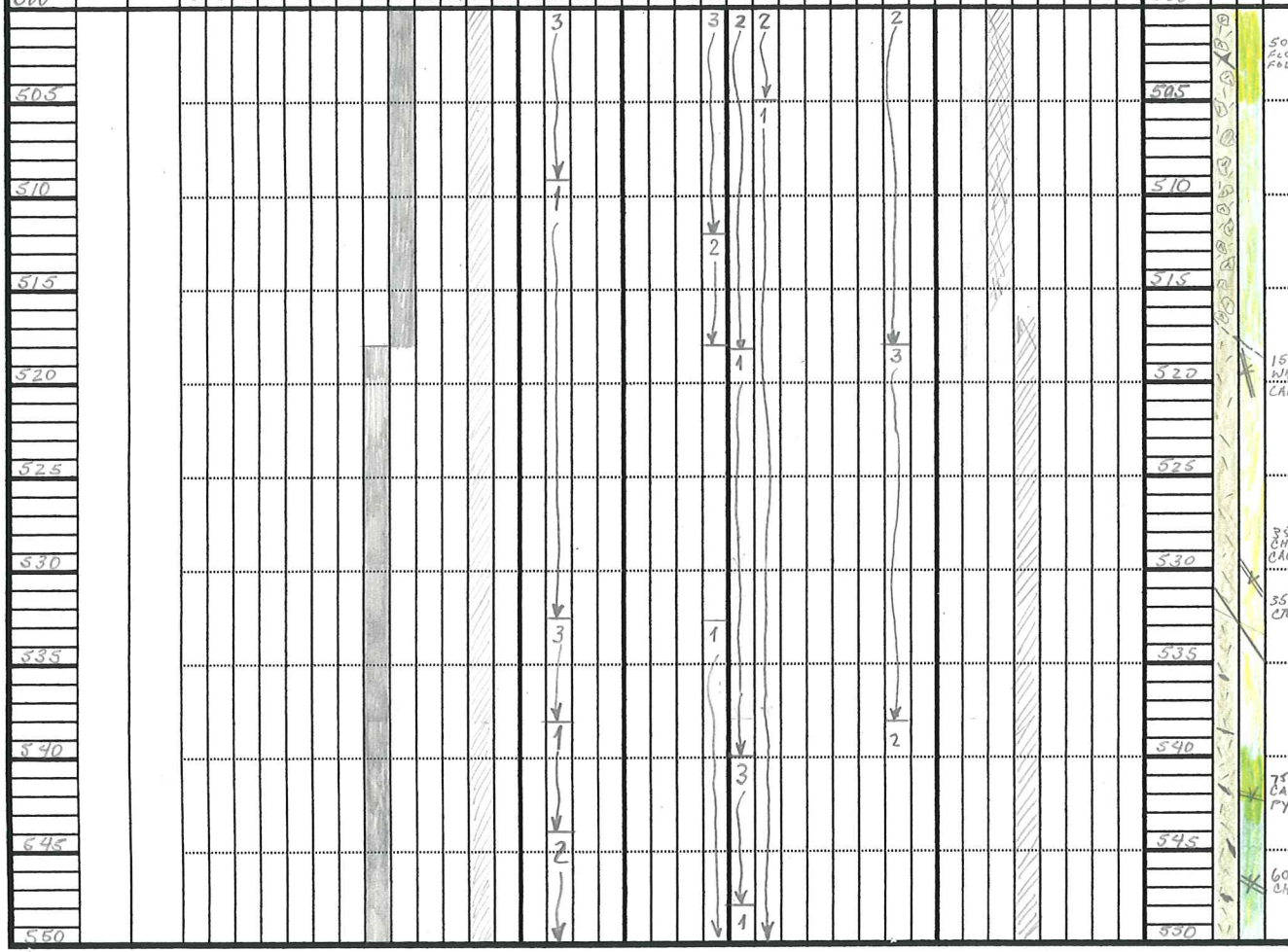
STRAT: BAD GEER (30), CHOCOLT (31), BUD (32), BRADY (33), MKR POR (34), LUD (35), WILDROS (36), DOZER (37)

DEPTH (FT), ALT, GRAPH, STRCT, SAMPLE INT

SCALE: 1" =10 ft

LITH. EXPLANATION:

MUD CGL	Mud conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff



COMMENTS

FROM 465.0' TO 532.9'
MODERATELY PROPYLITIZED DENSE CHOCOLATE LAHAR. SEE ABOVE
WHY NOT LITHIC RICH BUD?? 11/23/96 CPK

OXIDIZED FLOW TOP/OR BOTTOM
FROM 518 TO 532.9
PURPLH, FELDS → CLY
G-MASS HEM FLOODED

IRREGULAR IGNEOUS CTC @ 35°

FROM 532.9' TO _____

MEDIUM TO FINE GRAINED H.B. RICH PORPHYRITIC LAVA FLOW
SILICEOUS VY FINE GRAINED G-MASS
YTALS FLOW ALIGNED HB SUBORDINATE TO PLAG. PROBABLE CHOCOLATE DACITE → RHYODACITE.
WHY NOT BRADY CPK 11/22/96
yes CPK 11/23/96

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 3/12
LOGD BY:	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/20/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

DRILLING: DEPTH (FT), RECOVERY, RQD

LITHOLOGY: ALLUVIUM, MUD CGL, LITHTUF, PUMTUF, SURGTUF, ASH FALL, LAVA, AUTOBXA, INTRUSIVE, BANDED ASLT, RHYOLITE

STRUCT: TEC BXA, BRECCIA, GOUGE, VOID

ALTERATION/MINLIZATION: Fe MIN (MNOX, HEMTITE, LIMONITE, PYRITE), PROP, ARG, ARG2, RPL SIL, QTZ VNS, CALCITE, METCLAS

STRAT: BADGER, CHOCOLT, BUD, BRADY, MKRPOR, LBUD, WILDROS, DOZER

DEPTH (FT), LITHGRAPH, ALTGRAPH, STRCT, STRCNT

SCALE: 1" =10 ft

LITH. EXPLANATION:

MUD CGL	Mud conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff

SAMPLE INT

COMMENTS

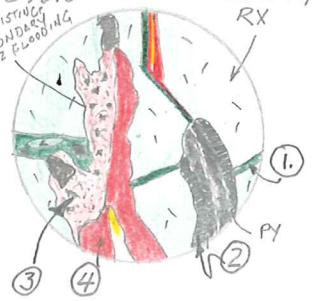
FROM 532.9 TO 763

FINE GRAINED FELTED FLOW FOLIATED PORPHYRITIC LAVA FLOW.

ROCK IS MED TO LIGHT GREEN PERVASIVELY PROPYLITIZED & CROSS CUT BY CHLORITE VNS, PY VNS AND QTZ-CHL-PY O.S. AND BXA VNLTS

PROBABLE BRADY ANDESITE

VIEW @ 593.5'



1.) BLK CHL-PY

2.) MSV PY W MICRO CHL SELVAGE

3.) PY FLOODING

4.) QTZ O.S. W. LATE KAO. & BX'TN

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 4/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/21/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

SCALE: 1" =10 ft

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff

DEPTH FT	DRILLING REC/CUT	DRILLING Q	LITHOLOGY 1 ALLUVUM	2 MUDCGL	3	4 LITHTUF	5 PUMTUF	6 SURGTUF	7 ASHFLO	8 LAVA	9 AUTOBX	10 INTRUSV	11 BASALT	12 ANDESIT	13 RHYOLIT	STRUCT 14 TEC BXA	15 BROKEN	16 GOUGE	17 VOID	ALTERATION/MINLIZATION Fe MIN 18 MNOX	19 HEMTIT	20 LIMONIT	21 PYRITE	22 PROP	23 ARG	24 ARG2	25 RPLSIL	26	27 QTZVNS	28 CALCITES	29 METCLAS	STRAT 30 BADGER	31 CHOCOLT	32 CUBOUD	33 BRADY	34 MKRPOR	35 LUDUD	36 WILDROS	37 DOZER
600																	2						2	2	1				1											
605																	3					1	3	1	2				2											
610																	5																							
615																	3						3						3											
620																	2								2				2											
625																													1											
630																														2										
635																							2	3	1															
640																																								
645																																								
650																																								

DEPTH FT	LITH GRAPH	ALT GRAPH	STRCT NT
605			50° PY VNLT KC 35° FLO FOL
610			20° VEN CHL PY
615			QTZ KAO? 75° PY QTZ CLY
620			40° FLO FOL.
625			30° FLO FOL.
630			90° QTZ 80° QTZ PY 90° FLO FOL.
635			40° PY
640			60° FOL.
645			90° KAO 40° BLK CHL w TR HEM.
650			50° FLO FOL.

COMMENTS

FROM 532.9 TO 763 CPK 11/23/96 BRADY

FINELY PORPHYRITIC CHOCOLATE LAVA FLOW. MOD ALTERED SEE ABOVE

FROM 610 - 619' BADLY BROKEN CORE ROLLED MATRIX & CORE LOSS NO DIP ON FRACTURE ZONE

@ 618 ISOLATED PIECE MORE COARSELY PORPHYRITIC MORE CLASSIC CHOCOLATE.

FROM 620-623 CORE RECOVERY IS GOOD ENOUGH TO SEE INCOMPLETELY FILLED OPEN SPACE BRECCIA.

CALCITE OCCURS IN G-MASS & AS THIN 1-4mm WIDE VEINLETS

VY MINOR AMTS LIMON (PENETRATES ROCK UP TO 3" FROM VEIN ∴ NOT OXID. SINCE DRILLING.)

SAMPLE INT

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 5/12
LOGD BY: CDK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/21/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

| DRILLING | | | LITHOLOGY | | | | | | | | | | | | | STRUCT | | | | ALTERATION/MINLIZATION | | | | | | | | | | | | STRAT | | | | | | | | | | | | |

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 6/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/22/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

DRILLING: DEPTH FT; REC/CUT; RQD

LITHOLOGY: ALUVUM, MUDCGL, LITHTUF, PUMTUF, SURGTUF, ASHFLO, LAVA, AUTOBX, INTRUSV, BASALT, ANDESIT, RHYOLIT

STRUCT: TEC BXA, BROKEN, GOUGE, OID

ALTERATION/MINLIZATION: Fe MIN: MNOX, HEMTIT, LIMON, PYRITE; PROP, ARG, ARG2, RPLSIL, QTZVNS, CALITE, METCLAS

STRAT: DGER, CHOCOLT, UBUD, BRADY, MKRPOR, LBUD, WILDROS, DOZER

DEPTH FT; LITHGRAPH; ALTGRAPH; STRCNT

SCALE:

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff

COMMENTS

FROM 532.9 TO 763

FINE GRAINED PORPHYRITIC LAVA FLOW WITH INTERBEDDED VOLCANIC BRECCIAS.

INCOMPLETE PERVASIVE PROPYLITIC ALTERATION. RELICT PURPLE HEMATITE IN G-MASS. H.B. SUBEQUAL PLAG H.B. AVGS 1MM LENGTH.

FROM 714 - 722' LARGE CLAST OR THIN FLOW.

FROM 722 - 763' ROCK IS HETEROLITHIC PROBABLE LITHIC TUFF (BRADY INTERBED?)

CHL NUCLEATED ON RIMMING CLASTS

SAMPLE INT

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 7/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/22/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

DEPTH FT	REC/CUT	RQD	ALLUVUM (1)	MUDCGL (2)	(3)	LITHTUF (4)	PUMTUF (5)	SURGTUF (6)	ASH FLO (7)	LAVA (8)	AUTOBX (9)	INTRUSV (10)	BASALT (11)	ANDESITE (12)	RHYOLITE (13)	TEC BXA (14)	BROKEN (15)	GOUGE (16)	VOID (17)	Fe MIN: MNOX (18)	HEMTIT (19)	LIMONIT (20)	PYRITE (21)	PROP (22)	ARG (23)	ARG2 (24)	REPLSIL (25)	(26)	QTZVNS (27)	CALCITE (28)	METCLAS (29)	BADGER (30)	CHOCOLT (31)	(32)	BRADY (33)	MKRPOR (34)	(35)	BUD (36)	WILDROS (37)	DOZER	DEPTH FT	LITH GRAPH	ALT GRAPH	STRCT NT
750																	2				1		2	3	1				1	2											750			
755																																									755			
																									2																			55° PY VN
760																																									760			
																						1		1					2															45° QTZ VNLT
765																																									765			
																					1	2		2																				
770																																									770			
																						1							1															60° FLO FOL.
775																																									775			
																																												65° QTZ VNLT
780																																									780			
																						2																						60° CONJ VNLTS
																																												55 PY
785																																									785			
																																												25° PY KAO
790																																									790			
																						1																						50° CAL
795																																									795			
																																												50° FLO FOL
800																																									800			

SCALE:

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff

SAMPLE INT

COMMENTS

FROM 722 TO 763
INTERBEDDED LITHIC TUFF

30° CTC W SILICIF BXTD H-T ALTD?

FROM 763.0' TO
FINE GRAINED FLOW FOLIATED PORPHYRITIC LAVAS.
H.B. → CHL AND/OR PYRITE YIELDING A SPECKLED TEXTURE.
CHLORITE OCCURS BOTH IN G MASS & AS DISCRETE VEINLETS & IN MATRIX OF HYDROTHERMAL BXA.
LOCAL VEINS INCLUDE
CHL
PY
CAL
QTZ-PY-CAL-KAO W CHL SELVAGE
TR AMTS PROTOLITH HEMATITE NOT REPLACED
FLOW BANDED ON MM – CM SCALE PLANAR
CALCITE OCCURS IN G MASS IF NO OR WK ARGILLIC. IN STRONG ARGILLIC OCCURS INTERIOR OF QTZ VEINS. ALSO LOCALLY IN CALCITE ONLY VNLTS.

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 8/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE # RL-107
DATE: 11/22/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	

DRILLING			LITHOLOGY													STRUCT				ALTERATION/MINLIZATION												STRAT							
																				Fe MIN																			
DEPTH FT	REC/CUT	RQD	ALLUVUM	MUDCGL		LITHTUF	PUMTUF	SURGTUF	ASHFLO	LAVA	AUTOBX	INTRUSV	BASALT	ANDESIT	RHYOLIT	TEC	BROKEN	GOUGE	VOID	MNOX	HEMTIT	LIMON	PYRITE	PROP	ARG	ARG2	RPLSIL		QTZVNS	CALCITES	METCLAS	BADGER	CHOCOLT	BUD	BRADY	MKROR	LBUD	WILDROS	DOZER	
800			1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	800

DEPTH FT	LITH GRAPH	ALT GRAPH	STRCT	SCALE:
800				LITH. EXPLANATION:
				MUD CGL — Mud matrix conglomerate
				LITH TUF — Lithic clast dominant tuff
				PUM TUF — Pumice rich tuff
				SURGE TUF — Bedded matrix rich lithic tuff
805			0° CHL BXA VN	
810			40° FLO POL 60° PY VNLT	
815				
820			90° PY 60° FLO POL.	
825			65° CHL PY 20° CHL 70° FLO POL	
830				
835			80° PY	
840				
845				
850				

COMMENTS

FROM 763.0' TO 830'

FINE GRAINED FLOW BANDED LAVA FLOW.

LIMONITE STAINING SOAKING IN PARALLEL TO SAWED FACE ∴ OXIDATION SINCE DRILLING? LOCALLY MARKS ZONES OF SLIGHTLY HIGHER PYRITE CONTENT OR MORE MARCASITE?

CHLORITE CONTINUES TO HAVE 2 MODES OF OCCURRENCE:

1.) REPLACING G-MASS & MAFICS
2.) NEARLY PURE CHL VEINLETS TO 1" WIDE.

ARGILLIC ALTERATION APPEARS TO INCREASE DOWNWARD SLIGHTLY

GRADATIONAL CTC

FROM 830 TO 840'

LOCAL TEXTURAL VARIANT OF "BRADY ANDESITE"?
ROCK IS FINER GRAINED, CLAY ALTERED YELLOWISH GREEN AND CROSS-CUT BY NUMEROUS SUB-CIRCULAR "PERLITIC" CRACKS. FORMING NON-ROTATIONAL BXA. INTERIORS OF CLASTS ARE PYRITIC & VERY FINE GRAINED. POSSIBLE QUENCHED VITROPHYRE?? LBT OF HECLA.

FROM 840' TO 860 HYDROTHERMAL BXA HOSTED IN AUTOBXA?

SAMPLE INT

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 9/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/23/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

SCALE: 1" =10 ft

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff

DRILLING: DEPTH FT; REC/CUT; RQD

LITHOLOGY: ALLUVIUM; MUDCGL; LITHTUF; PUMTUFF; SURGTUFF; ASH; LAVA; LAFLO; AUTOBX; INTRUSV; BASALT; ANDESITE; RHYOLITE

STRUCT: TEC BXA; BRECK; GOUGE; VOID

ALTERATION/MINLIZATION: Fe MIN: MOX; HEMTIT; LIMONIN; PYRITE; PROP; ARG; ARG2; REPLSIL; QTZVNS; CALCITE; METCLAS

STRAT: BADGER; CHOCOLT; UBUD; BRADY; MKROR; LBUD; WILDROS; DOZER

DEPTH FT; LITHGRAPH; ALTGRAPH; STRCT NT; SAMPLINT

COMMENTS

FROM 840' TO 860'
BXTD ZONE IN BRADY? ANDESITE LAVA
HYDROTHERMAL BXA. WEAKLY HETEROLITHIC
MAY POSSIBLY BE TUFFACEOUS INTERBED.

FROM 860 TO 930.0'
FINE GRAINED LAVA WITH WISPY SPOTTED
TEXTURE. LST OF HECLA IS PROBABLE
CORRELATION. WISPS MAY BE INCIPIENT
VESICLES W SLIGHT SILICIFICATION
@ 865 TEXTURE CORRELATES TO ABOVE
INTVLS LOGGED AS BRADY. GRADATIONAL CTC.
BELOW 873' PROTOLITH TEXTURE
PRETTY WELL DESTROYED.
FINE GRAINED DISSEMINATED PY
IN G-MASS
PY ALSO OCCURS AS FINE WEBLIKE
VEINLETS W CHLORITE.
REPLACEMENT SILICA PENETRATES ROCK
A FEW MM FROM VEINLETS.

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 10/12
LOGD BY: CPK	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: 11/23/96	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

SCALE: 1" =10 ft

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff

| DRILLING | | | LITHOLOGY | | | | | | | | | | | | | STRUCT | | | | ALTERATION/MINLIZATION | | | | | | | | | | | STRAT | | | | | | | | | | | | |

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH:	STARTED:	PAGE: 11/12
LOGD BY: 11/23/96	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE:	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

SCALE: 1" =10 ft

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
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| DRILLING | | | LITHOLOGY | | | | | | | | | | | | | STRUCT | | | | ALTERATION/MINLIZATION | | | | | | | | | | STRAT | | | | | | | | | | | | |

PROJECT: Rosebud JV	UTM: NK 11-10-06 C	NORTHING:	TOTAL DEPTH: 1030	STARTED:	PAGE: 12/12
LOGD BY: 11/23/96	STATE: Nevada County Pershing	EASTING:	BEARING:	COMPLETED:	HOLE #
DATE: CDK	SEC. T. N., E.	ELEVATION:	ANGLE:	DRILLER:	RL-107

DRILLING			LITHOLOGY												STRUCT				ALTERATION/MINLIZATION									STRAT								LITH GRAPH	ALT GRAPH	STRCT	SCALE: 1" =10 ft
DEPTH FT	REC/CUT	RQD	ALLUVUM	MUDCGL		LITHTUF	PUMTUF	SURGTUF	ASHFLO	LAVA	AUTOBX	INTRUSV	BASALT	ANDESIT	RHYOLIT	TE.CBXA	BROKEN	GOUGE	VOID	Fe MIN MOXIDE	HEMTIT	LIMONIT	PYRITE	PROP	ARG	ARG2	RPLSIL		QTZVNS	CALCITE	METCLAS	BACHOLT	CODBUD	BRADY	MKRPOR	LBUD	WILDROS	DOZER	DEPTH FT
1000			1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	1000
1005																																								1005
1010																																								1010
1015																																								1015
1020																																								1020
1025																																								1025
1030																																								1030

SAMPLINT

COMMENTS

FROM 984.5 TO 1030'
WHITE FINE GRAINED DOZER RHYOLITE
WHT TO PALE BUFF PERVASIVELY
ARGILLIZED W LOCAL CHL ON
FRACTS & VNLTS.

25° PY
25° KAO
10° CAL
10° CAL VNLT
0° IRREG CALCITE
50° CAL

E.O.H.

LITH. EXPLANATION:

MUD CGL	Mud matrix conglomerate
LITH TUF	Lithic clast dominant tuff
PUM TUF	Pumice rich tuff
SURGE TUF	Bedded matrix rich lithic tuff

FL-107 UDR

SAMPLE RECOVERED	% RECOVERED	SAMPLE INTERVAL	LITHOLOGY
0-465	R.C.	465-552 - NO SAMPLE	465-997 LT. GREEN VBx ?
465-469	120%	552-557	INTERBEDDED FGT - GENERALLY
469-472.5	100%	557-562	LT GREEN ; VBx CLASTS > 32mm
472.5-482	8.6/9.5	562-567	ANGULAR to SUBROUNDED, MATRIX
482-492	100%	567-572	SUPPORTED.
492-502	98%	572-577	(552-659) FGT, 659- FGT + VBx
502-512	100%	577-582	
512-522	100%	582-587	
522-532	100%	587-592	533-540 RED BROWN, HEMETITIC
532-542	100%	592-597	STAINED FRACTURES, FINE GRAIN TUFF
542-552	103%	597-601	OR DIKE?
552-562	100%	601-605	
562-572	101%	605-610.5	
572-582 (.9)	102%	610.5-615	552-642 FGT, MOD BL,
582-592	98%	615-619	LOCAL FINE STRWK, VUGGY, DRUZY
592-602	100%	619-623	Q FILLED = MARCASITE FRACTURES
602-610.5	7.8/8.5	623-627	
610.5-616	4.4/5.5	627-632	
616-618	80%	632-637	612.5-622 MAJOR FRACTURE/FAULT
618-627	100%	637-642	ZONE BOXWORK SILICA BX, MARCASITE
627-637	102%	642-647	VOIDS, VUGS. LOST CIRCULATION
637-647	102%	647-652	
647-657	101%	652-657	
657-667	102%	657-662	678-682 VBx : BOXWORK SILICA ?
667-672	5/0.6%	662-667	MARCASITE (IN VBx)
672-682	99%	667-672	
682-692	102%	672-678	
692-702	97%	678-682	655-727 WK MOD to MOD-STRG
702-712	100%	682-687 / 727-732	BL VBx, MOD Q sulfide VNG. (Q+MARC)
712-722	100%	687-692	LARGE VUGS PRESENT (IN CIRCULATION)
722-730	7.6/8	692-697	
730 REDUCE TO NMQ		697-702	
		702-707	
		707-712	
		712-717	
		717-722	
		722-727	

CUT

CUT

CUT

RL-107 HQ PAGE 2 of 2

Sample Recovered	% Recovered	Sample Interval		Sample Interval	Lithology (FGT ? Vbx cont)
NQ core		727-732		910.5-915.5	
730-741	9.9/11	732-737		915.5-920.5	* 749-753.5 XBx, Mod BL, Pebble color, Druzy Qtz Malachite Vugs.
741-751.5	10.1/10.5	737-741		920.5-925	
751.5-762	9.9/10.5	741-745		925-930	
762-772	98%	745-749	SPLIT	930-935	
772-782	100%	749-753.5	SPLIT	935-939.5	
782-792	97%	753.5-758		939.5-946	* 846-850 Mod-str. bl. Pebble, Sdg. Qsteak XBx at. 849-850'
792-802	98%	758-763		946-950	
802-812	105%	763-768		950-956	
812-820	100%	768-772		956-959.7	
820-830	100%	772-777		959.7-965	
830-840	100%	777-782		965-970	865-956 ~~Bk~~-Mod BL, Local Wk Sericite Alt. Wk Fine Qsulfide Vning
840-850	93%	782-787	CUT	970-974.5	
850-860	101%	787-792	CUT	974.5-980.5	
860-870	99%	792-797		980.5-984.5	
870-880.5	100%	797-802	CUT	984.5-988.5	
880.5-890.5	100%	802-807		988.5-992	* 956-959.7 Mod-Str BL, Mod silicification FGT, Pebble Stained Wk Qsulfide Vns.
890.5-900.5	97%	807-812		992-996	
900.5-910.5	100%	812-816		996-1000	
910.5-920.5	100%	816-820		1000-1005	
920.5-925	96%	820-825	SPLIT	1005-1010	
925-932	6.6/7	825-830	SPLIT	1010-1015	959.7-970 Lithic Lapilli Tuff Angular to Semi Round Clast, Matrix Silica replaced.
932-939.5	7/7.5	830-835	SPLIT	1015-1020	
939.5-950	100%	835-840		1020-1025	
950-956	103%	840-845		1025-1030	
956-966	101%	845-850		1030 = T.D.	
966-974.5	8.2/8.5	850-855			970-974.5 Green Clay Alt Lithic Lapilli Tuff
974.5-980.5	1.3/6'	855-860			
980.5-984.5	.7/4'	860-865			
984.5-992	7.6/8'	865-870			
992-1000	97%	870-875			* 974.5-984.5 (Rubble) Intensely XBx w/ Fine Dis. Sulfides
1000-1010	92%	875-880.5			
1010-1020	96%	880.5-885.5			
1020-1030 = T.D.	104%	885.5-890.5			• 984.5 Contact b/ Dozer Tuff
		890.5-895.5			
		895.5-900.5			984.5-1030 T.D.: Wk BL Wk Fine Qsulfide Vning. Dozer Fine Gr. Tuff.
		900.5-905.5			
		905.5-910.5			

SEP 14 1990

NEVADA GSI, INC.

GEOCHEMICAL ANALYSIS REPORT

September 11, 1990

CUST. CODE: LOA
PROJECT: URBD
P.O. #: XXXX
LOT ID: 8289

GEOLOGIST: NATE BREWER
COPIES TO: KEN TULLAR
COMPANY: LAC MINERALS
ANALYSIS: FIRE ASSAY FOR GOLD AND SILVER, WITH AN A.A. FINISH.
FIRE ASSAY FOR GOLD WITH AN A.A. FINISH (CHECKS).

	SAMPLE I.D.			Au o/t	Ag o/t	Checks Au o/t
1.	RL-107	0	5	0.004	-0.10	-
2.	RL-107	5	10	0.002	-0.10	-
3.	RL-107	10	15	0.001	-0.10	-
4.	RL-107	15	20	0.001	-0.10	-
5.	RL-107	20	25	0.001	-0.10	-
6.	RL-107	25	30	0.002	-0.10	-
7.	RL-107	30	35	0.002	-0.10	-
8.	RL-107	35	40	0.005	-0.10	-
9.	RL-107	40	45	0.002	-0.10	-
10.	RL-107	45	50	0.004	-0.10	-
11.	RL-107	50	55	0.003	-0.10	-
12.	RL-107	55	60	0.004	-0.10	-
13.	RL-107	60	65	0.002	-0.10	-
14.	RL-107	65	70	0.001	-0.10	-
15.	RL-107	70	75	-0.001	-0.10	-
16.	RL-107	75	80	0.001	-0.10	-
17.	RL-107	80	85	0.001	-0.10	-
18.	RL-107	85	90	0.001	-0.10	-
19.	RL-107	90	95	0.002	-0.10	-
20.	RL-107	95	100	0.002	-0.10	-
21.	RL-107	100	105	0.001	0.18	-
22.	RL-107	105	110	-0.001	-0.10	-
23.	RL-107	110	115	0.001	-0.10	-
24.	RL-107	115	120	0.002	-0.10	-
25.	RL-107	120	125	0.002	-0.10	-

1498 Kleppe Lane • Sparks, Nevada 89431 • (702)359-6600 • FAX: (702)359-6605

	SAMPLE I.D.			Au o/t	Ag o/t
34.	RL-109C	162	167	0.001	-0.10
35.	RL-109C	167	172	0.004	-0.10
36.	RL-109C	172	177	0.002	-0.10
37.	RL-109C	177	182	0.008	-0.10
38.	RL-109C	182	187	-0.001	-0.10
39.	RL-109C	187	192	-0.001	-0.10
40.	RL-109C	192	197	-0.001	-0.10
41.	RL-109C	197	202	0.002	-0.10
42.	M-32			0.042	-0.10
43.	RL-109C	202	207	-0.001	-0.10
44.	RL-109C	207	212	0.002	0.11
45.	RL-109C	212	217	0.003	-0.10
46.	RL-109C	217	222	0.002	-0.10
47.	RL-109C	222	227	0.002	-0.10
48.	RL-109C	227	232	0.005	0.13
49.	RL-109C	232	237	-0.001	-0.10
50.	RL-109C	237	242	-0.001	-0.10
51.	RL-109C	242	247	-0.001	0.10
52.	RL-109C	247	252	-0.001	-0.10
53.	RL-109C	252	257	-0.001	-0.10
54.	RL-109C	257	262	-0.001	0.12
55.	RL-109C	262	267	-0.001	-0.10
56.	RL-109C	267	272	0.001	-0.10
57.	RL-109C	272	277	-0.001	-0.10
58.	RL-109C	277	282	-0.001	-0.10
59.	RL-109C	282	287	-0.001	-0.10
60.	RL-109C	816	821	-0.001	-0.10
61.	RL-109C	821	826	0.005	0.16
62.	M-33			0.031	0.15
63.	RL-109C	826	831	0.009	0.11
64.	RL-109C	831	836	-0.001	-0.10
65.	RL-109C	836	840	0.002	0.10
66.	RL-109C	840	845	0.002	0.59
67.	RL-109C	845	850	-0.001	0.71
68.	RL-109C	850	855.5	-0.001	0.29
69.	RL-109C	855	861	-0.001	-0.10
70.	RL-109C	861	866	-0.001	-0.10
71.	RL-109C	866	870	-0.001	-0.10
72.	RL-109C	870	874.7	-0.001	-0.10
73.	RL-110C	555	560	-0.001	-0.10
74.	RL-110C	560	565	-0.001	-0.10
75.	RL-110C	565	570	-0.001	-0.10
76.	RL-110C	570	575	-0.001	-0.10
77.	RL-110C	575	580	-0.001	0.16
78.	RL-110C	580	585	-0.001	-0.10
79.	RL-107C	552	557	-0.001	-0.10
80.	RL-107C	557	562	0.001	-0.10
81.	RL-107C	562	567	0.007	-0.10

LAC MINERAL
LOT ID # 8289

	SAMPLE I.D.	Au o/t	Ag o/t	CHECKS Au o/t	
26.	RL-107 125 130	0.002	-0.10	-	
27.	RL-107 130 135	0.002	-0.10	-	
28.	RL-107 135 140	-0.001	-0.10	-	
29.	RL-107 140 145	-0.001	-0.10	-	
30.	RL-107 145 150	0.001	-0.10	-	
31.	RL-107 150 155	0.002	-0.10	-	
32.	RL-107 155 160	0.001	0.17	-	
33.	RL-107 160 165	0.002	-0.10	-	
34.	RL-107 165 170	0.001	-0.10	-	
35.	RL-107 170 175	-0.001	-0.10	-	
36.	RL-107 175 180	0.001	0.15	-	
37.	RL-107 180 185	-0.001	-0.10	-	
38.	RL-107 185 190	-0.001	-0.10	-	
39.	RL-107 190 195	-0.001	-0.10	-	
40.	RL-107 195 200	-0.001	-0.10	-	
41.	RL-107 200 205	-0.001	-0.10	-	
42.	RL-107 205 210	-0.001	-0.10	-	
43.	RL-107 210 215	-0.001	-0.10	-	
44.	RL-107 215 220	-0.001	0.32	-	
45.	RL-107 220 225	-0.001	-0.10	-	
46.	RL-107 225 230	-0.001	-0.10	-	
47.	RL-107 230 235	-0.001	-0.10	-	
48.	RL-107 235 240	-0.001	0.12	-	
49.	RL-107 240 245	-0.001	0.10	-	
50.	RL-107 245 250	-0.001	-0.10	-	
51.	RL-107 250 255	-0.001	-0.10	-	
52.	RL-107 255 260	-0.001	0.18	-	
53.	RL-107 260 265	-0.001	-0.10	-	
54.	RL-107 265 270	0.002	-0.10	-	
55.	RL-107 270 275	0.006	0.26	-	
56.	RL-107 275 280	0.016	0.21	-	
57.	RL-107 280 285	0.001	0.18	-	
58.	RL-107 285 290	0.002	-0.10	-	
59.	RL-107 290 295	0.001	-0.10	-	
60.	RL-107 295 300	0.004	-0.10	-	
61.	RL-107 300 305	0.006	-0.10	-	$\bar{x}$
62.	RL-107 305 310	0.110	-0.10	0.174	0.142
63.	RL-107 310 315	0.002	-0.10	-	
64.	RL-107 315 320	0.031	-0.10	-	15'/.058
65.	RL-107 320 325	0.001	-0.10	-	
66.	RL-107 325 330	-0.001	-0.10	-	
67.	RL-107 330 335	-0.001	-0.10	-	
68.	RL-107 335 340	-0.001	-0.10	-	
69.	RL-107 340 345	-0.001	-0.10	-	
70.	RL-107 345 350	0.030	-0.10	-	

LAC MINERAL
LOT ID # 8289

	SAMPLE I.D.	Au o/t	Ag o/t	Au o/t
71.	RL-107 350 355	-0.001	-0.10	-
72.	RL-107 355 360	-0.001	-0.10	-
73.	RL-107 360 365	-0.001	-0.10	-
74.	RL-107 365 370	-0.001	-0.10	-
75.	RL-107 370 375	-0.001	-0.10	-
76.	RL-107 375 380	-0.001	0.16	-
77.	RL-107 380 385	-0.001	-0.10	-
78.	RL-107 385 390	-0.001	-0.10	-
79.	RL-107 390 395	0.003	0.21	-
80.	RL-107 395 400	0.020	-0.10	-
81.	RL-107 400 405	0.015	0.15	-
82.	RL-107 405 410	0.001	0.10	-
83.	RL-107 410 415	0.165	0.42	0.135
84.	RL-107 415 420	0.035	0.14	-
85.	RL-107 420 425	0.001	0.11	-
86.	RL-107 425 430	0.007	-0.10	-
87.	RL-107 430 435	0.001	-0.10	-
88.	RL-107 435 440	-0.001	-0.10	-
89.	RL-107 440 445	0.001	0.12	-
90.	RL-107 445 450	-0.001	-0.10	-
91.	RL-107 450 455	-0.001	-0.10	-
92.	RL-107 455 460	-0.001	-0.10	-
93.	RL-107 460 465	-0.001	-0.10	-

25' @ 0.044
$\bar{x}$
0.150

THIS REPORT REVIEWED AND APPROVED BY:

Richard A. Grondin

RICHARD GRONDIN, LABORATORY DIRECTOR

	SAMPLE I.D.			Au o/t	Ag o/t
82.	M-34			0.040	-0.10
83.	RL-107C	567	572	-0.001	0.10
84.	RL-107C	572	577	-0.001	-0.10
85.	RL-107C	577	582	-0.001	-0.10
86.	RL-107C	582	587	-0.001	-0.10
87.	RL-107C	587	592	-0.001	-0.10
88.	RL-107C	592	597	0.007	-0.10
89.	RL-107C	601	605	0.002	-0.10
90.	RL-107C	605	610.5	0.005	-0.10
91.	RL-107C	610.5	615	0.005	-0.10
92.	RL-107C	615	619	0.002	0.13
93.	RL-107C	619	623	0.006	0.21
94.	RL-107C	623	627	0.001	-0.10
95.	RL-107C	627	632	0.002	-0.10
96.	RL-107C	632	637	0.001	-0.10
97.	RL-107C	597	561	-0.001	-0.10
98.	M-35			0.280	0.15

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This report reviewed and approved by:

Richard A. Grondin

Richard Grondin, Laboratory Director

	SAMPLE I.D.				Au o/t	Ag o/t
35.	RL-111	661	666		0.002	0.15
36.	RL-111	666	671		0.001	0.10
37.	RL-111	671	676		0.004	-0.10
38.	RL-111	676	681		0.003	-0.10
39.	RL-111	681	686		0.003	-0.10
40.	RL-111	686	691		0.003	0.16
41.	RL-111	691	696		0.003	-0.10
42.		M-82			0.048	0.10
43.	RL-111	552	557		-0.001	0.15
44.	RL-107	637	642		0.001	0.23
45.	RL-107	642	647		-0.001	0.20
46.	RL-107	647	652		-0.001	-0.10
47.	RL-107	652	657		-0.001	0.24
48.	RL-107	662	667	A	0.004	-0.10
49.	RL-107	662	667	B	0.005	-0.10
50.	RL-107	667	672		0.016	0.20
51.	RL-107	672	678		0.004	0.10
52.	RL-107	678	682		0.025	-0.10
53.	RL-107	682	687		0.006	0.17
54.	RL-107	687	692		0.002	0.13
55.	RL-107	692	697		0.001	-0.10
56.	RL-107	697	702		0.003	-0.10
57.	RL-107	702	707		0.001	-0.10
58.	RL-107	707	712		0.001	-0.10
59.	RL-107	712	717		0.003	-0.10
60.	RL-107	717	722		-0.001	-0.10
61.	RL-107	722	727		-0.001	-0.10
62.		M-83			0.101	0.13
63.	RL-107	727	732		-0.001	-0.10
64.	RL-107	732	737		-0.001	-0.10
65.	RL-107	737	741		0.001	-0.10
66.	RL-107	741	745		-0.001	-0.10
67.	RL-107	745	749		0.002	-0.10
68.	RL-107	749	753.5		0.003	0.10
69.	RL-107	753.5	758		0.005	0.11
70.	RL-107	758	763		0.002	0.10
71.	RL-107	763	768		0.003	-0.10
72.	RL-107	768	772		0.003	0.35
73.	RL-107	772	777		0.005	0.69
74.	RL-107	777	782		0.023	1.30
75.	RL-107	782	787		0.006	1.16
76.	RL-107	787	792		0.006	1.00
77.	RL-107	792	797		0.007	0.60
78.	RL-107	797	802		0.001	-0.10
79.	RL-107	802	807		0.002	0.12
80.	RL-107	807	812		0.008	0.24
81.	RL-107	812	816		0.006	0.12
82.		M-84			0.016	0.29

LAC MINERALS
LOT I.D. #: 8503

	SAMPLE I.D.			Au o/t	Ag o/t
83.	RL-107	816	820	0.006	0.19
84.	RL-107	820	825	0.007	0.35
85.	RL-107	825	830	0.003	0.14
86.	RL-107	830	835	-0.001	0.20
87.	RL-107	835	840	0.003	0.18
88.	RL-107	840	845	0.025	-0.10
89.	RL-107	845	850	0.005	0.19
90.	RL-107	850	855	0.014	0.19
91.	RL-107	855	860	0.009	0.34
92.	RL-107	860	865	0.005	-0.10
93.	RL-109	874.7	879.5	0.005	-0.10
94.	RL-109	879.5	884	-0.001	-0.10
95.	RL-109	884	889	0.008	0.24
96.	RL-109	889	894	0.063	0.35
97.	RL-109	894	898.8	0.027	0.10
98.	RL-109	898.8	902.5	0.017	0.20
99.	RL-109	902.5	906.5	0.077	0.30
100.	RL-109	906.5	912	0.023	0.24
101.	RL-109	912	916.5	-0.001	0.27
102.		M-86		0.077	0.23
103.	RL-109	916.5	921	0.067	0.23
104.	RL-109	921	925.5	0.023	0.24
105.	RL-109	925.5	931	0.001	-0.10
106.	RL-109	931	936	0.007	0.17
107.	RL-109	936	940	0.042	0.17
108.	RL-109	940	944	0.163	0.44
109.	RL-109	944	948	0.023	0.41
110.	RL-109	948	953.2	0.008	0.24
111.	RL-109	953	957	0.036	0.27
112.	RL-109	957	962	0.026	0.31
113.	RL-109	962	967	0.033	0.34
114.		M-88		0.054	0.29

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This report reviewed and approved by:

Richard A. Crandin

Richard Crandin, Laboratory Dir...

LAC MINERALS
LOT ID # 8408

	SAMPLE I.D			Au o/t	Ag o/t	Checks Au o/t
74	RL-109C	717	722	-0.001	-0.10	-
75	RL-109C	722	727	-0.001	-0.10	-
76	RL-107C	956	959.7	0.001	-0.10	-
77	RL-107C	959.7	965	0.004	-0.10	-
78	RL-107C	965	970	0.002	-0.10	-
79	RL-107C	970	974.5	0.001	-0.10	-
80	RL-107C	974.5	980.5	0.003	-0.10	-
81	RL-107C	980.5	984.5	0.003	-0.10	-
82	M-90			0.098	-0.10	-

THIS REPORT REVIEWED AND APPROVED BY:

Richard A. Grondin

RICHARD GRONDIN, LABORATORY DIRECTOR

NEVADA GSI, INC.

GEOCHEMICAL ANALYSIS REPORT

September 20, 1990

CUST. CODE: LOA
PROJECT: URBD
P.O. #: XXXX
LOT ID: 8371

GEOLOGIST: NATE BREWER
COPIES TO: KEN TULLAR
COMPANY: LAC MINERALS
ANALYSIS: FIRE ASSAY FOR GOLD AND SILVER, WITH AN A.A. FINISH.

	SAMPLE I.D.		Au o/t	Ag o/t
1.	RL-107C 865	870	0.002	-0.10
2.	RL-107C M-69		0.020	-0.10
3.	RL-107C 870	875	0.002	-0.10
4.	RL-107C 875	880.5	0.001	0.16
5.	RL-107C 880.5	885.5	0.001	0.13
6.	RL-107C 885.5	890.5	-0.001	-0.10
7.	RL-107C 890.5	895.5	0.003	0.20
8.	RL-107C 895.5	900.5	0.003	0.30
9.	RL-107C 900.5	905.5	0.006	-0.10
10.	RL-107C 905.5	910.5	0.013	-0.10
11.	RL-107C 910.5	915.5	0.002	-0.10
12.	RL-107C 915.5	920.5	0.001	0.14
13.	RL-107C 920.5	925	0.005	0.14
14.	RL-107C 925	930	0.003	0.15
15.	RL-107C 930	935	0.009	0.20
16.	RL-107C 935	939.5	0.008	0.13
17.	RL-107C 939.5	946	0.009	-0.10
18.	RL-107C 946	950	0.007	-0.10
19.	RL-107C 950	956	-0.001	-0.10
gap 20.	RL-107C 984.5	988.5	-0.001	-0.10
21.	RL-107C 988.5	992	-0.001	-0.10
22.	RL-107C M-70		0.100	-0.10
23.	RL-107C 992	996	-0.001	0.11
24.	RL-107C 996	1000	-0.001	-0.10
25.	RL-107C 1000	1005	0.002	0.13

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	SAMPLE I.D.		Au o/t	Ag o/t
26.	RL-107C 1005	1010	-0.001	0.14
27.	RL-107C 1010	1015	0.006	0.11
28.	RL-107C 1015	1020	0.001	0.29
29.	RL-107C 1020	1025	0.001	-0.10
30.	RL-107C 1025	1030	0.002	0.14

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THIS REPORT REVIEWED AND APPROVED BY:

Richard A Grondin

RICHARD GRONDIN, LABORATORY DIRECTOR

CMW 12/90

RL-107 Summary

465-678 LBT / RBU

- 465-503 dk grey fgt, ~fresh
- 503-515 tuff bxa ~fresh
- 515-533 amgdular text, ~fresh
- 533-605 v. wk bleach to fresh fgt
- 605-627 mod bleach fgt, mod vnlts, rubbly w/ alt Dr Q at 612-619
- 627-664 wk bleach (blue-green fgt), v wk to no vnlts.
- 664-678 mod bleach (lt green) wk vnlts
- ~~678~~ -

678-682 fault zone / bx'd fgt clasts in qtz ± kaol

682-750 fgt & lithic-poor flt (LBT/RBU?) green grey wk to mod bleach, v wk vnlts.

750-763 fault zone silic, bx'd fgt

763-835 fgt (LBT/RBU) mod bleach, (blue-green) wk vnlts

835-860 fault zone / (~~[illegible]~~) brecciated m-str bleach / arg bx'd fgt (LBT/RBU)

860-959 Alt'd fgt (LBT/RBU)

- 860-933 m-str bleach; arg to 895, mottled fgt, w-m vnlts
- 933-944 Bx'd, fault? zone, yellow-green clasts fgt (70%) in grey silica matrix
- 944-959 : wk bleach lt grey fgt, w-m vnlts

959-970.5 : Mixed 70% clast bxa (primary or 2ndary?) No veining. Clasts fgt - 70%, grey silica matrix

RL-107

970.5 - 974.5 Green epiclastic

974.5 - 984.5 Fault zone / Bx'd (SRF)
grey silic fgt in dk gray qtz + sulf matrix

984.5 - 1030 T.D. Dozer fgt, wk vnlts,
mod bleach