

BUCHANS MINING CO., LTD. DIAMOND DRILL HOLE RECORD

Sheet #1

Location Surface northwest of Rothermere Shaft, Lucky Strike.
 Direction Down; see footnote Dip Vertical; see footnote.
 Started February 26, 1949 Finished April 13, 1949.

COORDINATES
 N 6501.13 E 1745.39
 Elevation 935.30

Hole No. 842
 Depth 1688'

DESCRIPTION

CORE

SLUDGE

General	Section		Core Rec. %	Economic	Sample No.	Oz. Au.	Oz. Ag.	% Cu.	% Pb	% Zn	% Fe	Sludge Sect.	Sample No.	Oz. Au.	Oz. Ag.	% Cu	% Pb	% Zn	% Fe
	From	To																	
0-23 Overburden.																			
23-438 Grey green and dark green, fine grained, amygdular andesite flow and flow breccia. Both quartz and chlorite filled amygdules. Some phenocrysts of feldspar. Some zones of agglomerate.	23	33	70	23-438 Barren except for a few faint flecks of chalcopyrite at 377' and 386', and a few grains of galena in a 1/4 inch barite veinlet at 368'.															
	33	43	95																
	43	56	65																
	56	66	53																
	66	86	90																
	86	96	83																
	96	109	90																
	109	122	95																
	122	146	94																
	146	175	86																
	175	200	95																
	200	210	85																
	210	224	85																
	224	244	65																
	244	262	86																
	262	282	95																
	282	302	85																
	302	322	87																
	322	344	90																
	344	366	83																
	366	406	75																
	406	439	100																
438-469 Dark green to grey-black, chilled, steep angle, diabase-dolerite dyke. Massive.	439	450	100	438-469 Barren.															
	450	460	55																
	460	468	100																
469-476 Dark grey-green andesite agglomerate or flow breccia, with chalcedony filled amygdules. Cut by 6 inch chilled diabase dyke at 473', and an 8 inch chilled diabase dyke at 475' which is almost parallel to core.	468	473	96	469-476 Barren except for some disseminated pyrite in dyke at 473'.															
	473	475	100																
476-571 Massive, fine grained, chilled, diabase-dolerite dyke. Dark grey-green colour. Cuts core at 45° at 476'.	475	485	100	476-571 Barren.															
	485	500	80																
	500	520	100																
	520	532	100																

SIZE OF CORE			
BX	From 23	To 29	
AX	1 1/2" From 29	To 801	
EX	3" From 801	To 1688	
	From	To	

REMARKS Dip -90° at 0'; at 400', dip -87° and direction S 20° E; at 680', dip -86° and direction S 49° E; at 1000', dip -85° and direction S 58° E; at 1250', dip -84° and direction S 26° E; at 1500', dip -81° and direction S 52° E. These tests were made with a Trotter-Pajari testing instrument. The directions are astronomic.

Examined by

Approved by

ORIGINAL SIGNED
BY
GEO. G. THOMAS

Engineer

Manager

BUCHANS MINING CO., LTD.
DIAMOND DRILL HOLE RECORD

Location _____
Direction _____ Dip _____
Started _____ Finished _____

COORDINATES
N _____ E _____
Elevation _____
Hole No. 842
Depth 1638

DESCRIPTION				CORE							SLUDGE								
General	Section		Core Rec. %	Economic	Sample No.	Oz. Au.	Oz. Ag.	% Cu.	% Pb	% Zn	% Fe	Sludge Sect.	Sample No.	Oz. Au.	Oz. Ag.	% Cu	% Pb	% Zn	% Fe
	From	To																	
	532	554	90																
	554	564	100																
	564	573	100																
571-692 Dark grey-green, intermediate- andesite tuff and agglomerate; amygdular fragments with quartz fillings; some quartz veining	573	588	90	571-918 Barren.															
	588	598	100																
	599	608	70																
	608	626	97																
	626	656	85																
	656	682	70																
	682	692	75																
692-737 Dark green, massive, andesite flow. Fine grained. Some chlorite filled amygdules. Cut by diabase dykes at 705-709 and 714-719.	692	702	90																
	702	708	90																
	708	720	27																
	720	729	55																
	729	736	80																
737-766 Dark grey-green, fine grained, diabase-dolerite dyke, cutting at 45° to core. Chilled edges.	736	742	80																
	742	753	90																
	753	767	60																
766-852 Andesite flow and flow breccia; dark grey-green. Some what porphyritic from 766-791; fine grained 791-852.	767	780	75																
	780	790	58																
	790	801	35																
Both calcite and quartz filled amygdules. Cut by chilled diabase dykes from 825-835, 838-839.5, at 843, and from 847-849. The dykes cut the core at angles from 10° to 20°.	801	811	67																
	811	820	75																
	820	826	95																
	826	836	100																
	836	853	85																
852-884 Massive, dark grey, fine grained, diabase dyke with chilled edges.	853	863	100																
	863	874	90																
	874	885	90																
884-905 Dark grey-green, fine grained, andesite agglomerate with chlorite and quartz filled amygdules.	885	890	75																
	890	896	70																
	896	905	40																
905-918 Siliceous, grey, acid- intermediate flow; has small quartz and feldspar phenocrysts. Cut by fine grained diabase dyke from 907-913; lower contact parallel	905	915	92																
	915	919	60																

SIZE OF CORE		REMARKS
From	To	
1 1/4" From	To	
3/4" From	To	
From	To	

Examined by _____
Approved by _____
Engineer
Manager

ORIGINAL SIGNED
BY
GEO. G. THOMAS

BUCHANS MINING CO., LTD.
DIAMOND DRILL HOLE RECORD

Sheet No. 3

Location _____
Direction _____ Dip _____
Started _____ Finished _____

COORDINATES

N _____ E _____
Elevation _____Hole No. 842
Depth 1688

DESCRIPTION

CORE

SLUDGE

General	Section		Core Rec. %	Economic	Sample No.	Oz. Au.	Oz. Ag.	% Cu.	% Pb.	% Zn.	% Fe.	Sludge Sect.	Sample No.	Oz. Au.	Oz. Ag.	% Cu.	% Pb.	% Zn.	% Fe.
	From	To																	
to the core.																			
<u>918-1113</u> Dark grey, massive, fine grained diabase dyke, cut by narrow chilled dyke from 1065-1066. Crushed from 1072-1074. Contact at 1113' is 10°-15° to core.	919	928	75	<u>918-1113</u> Barren.															
	928	941	100																
	941	945	70																
	945	955	60																
	955	963	90																
	963	981	100																
	981	1000	90																
	1000	1016	95																
	1016	1038	95																
	1038	1050	90																
	1050	1061	90																
	1061	1073	100																
	1073	1096	90																
	1096	1115	100																
<u>1113-1116</u> Hard, siliceous, orange-grey tinted, acid-intermediate flow breccia; has 5-10% small phenocrysts of feldspar and quartz.	1115	1117	100	<u>1113-1305</u> Barren.															
<u>1116-1119</u> Grey-green acid-intermediate agglomerate; has siliceous, orange tinted acid-intermediate fragments in a greenish, gritty tuff matrix with some development of chlorite.	1117	1119	80																
<u>1119-1120</u> Dark grey-green, chilled diabase dyke. Broken contacts.	1119	1122	70																
<u>1120-1139</u> Acid-intermediate agglomerate similar to 1116-1119 with orange fragments in a chloritic matrix; fades gradually into olive-green agglomerate and gritty tuff with no orange fragments. Fairly hard.	1122	1124	85																
	1124	1129	68																
	1129	1133	95																
	1133	1137	50																
	1137	1143	65																
<u>1139-1305</u> Olive green and grey-green acid-intermediate agglomerate and gritty tuff. Has small quartz and feldspar grains and some development of yellowish-green chlorite-sericite.	1143	1152	85																
	1152	1158	100																
	1158	1164	70																
	1164	1168	30																
	1168	1172	75																

SIZE OF CORE

REMARKS

From	To
1 1/4" From	To
7/8" From	To
From	To

Examined by _____

Approved by _____

ORIGINAL SIGNED
BY
GEO. G. THOMAS

Engineer

Manager

BUCHANS MINING CO., LTD. DIAMOND DRILL HOLE RECORD

Sheet No. 5

Location _____
 Direction _____ Dip _____
 Started _____ Finished _____

COORDINATES

N _____ E _____
 Elevation _____

Hole No. 842
 Depth 1698'

DESCRIPTION				CORE							SLUDGE								
General	Section		Core Rec. %	Economic	Sample No.	Oz. Au.	Oz. Ag.	% Cu.	% Pb	% Zn	% Fe	Sludge Sect.	Sample No.	Oz. Au.	Oz. Ag.	% Cu	% Pb	% Zn	% Fe
	From	To																	
1488-1526 Bleached and altered, olive-green and grey-green, acid-intermediate agglomerate and coarse tuff. Small quartz and feldspar grains. Some yellowish, sheared gritty tuff between fragments.	1487	1497	100	Sample 1488-1491 Barren.	343116	.01	0.4	N	N	N	2.4	1485-1490 48	N	N	N	N	N	6.8	
				Sample 1491-1492 Twelve inches of coarse grey barite with traces of Pb-Zn and some unreplaced chips of acid-intermediate agglomerate.	7	N	N	N	1.4	1.6	1.3								
	1497	1508	93	Sample 1492-1497 Barren.	8	N	N	N	N	N	1.8	1490-1500 9	N	N	N	N	N	28.2	
				Sample 1497-1502 Barren.	9	N	N	N	N	N	1.5								
Twelve inch grey barite vein at 1491-1492. Somewhat sheared but not schistose from 1488-1502; from 1502-1515 bleached and altered with enlarged 1/8" quartz grains; from 1515-1526 is hard and siliceous	1508	1519	95	1502-1526 Barren.								1500-1505 50	N	N	N	N	N	27.4	
												1505-1510 1	N	N	N	N	N	17.2	
												1510-1515 2	N	N	N	N	N	12.2	
												1515-1520 3	N	N	N	N	N	9.8	
	1519	1529	100									1520-1525 4	N	N	N	N	N	9.2	
1526-1529 Some olive-green acid-intermediate agglomerate with small fragments; not sheared or schistose.				Sample 1526-1529 From 1526-1527.5 traces of 120 disseminated Pb-Zn; from 1527.5-1529 is about 50% replaced by low grade Pb-Zn barite.		N	N	N	1.7	2.0	3.4	1525-1530 5	N	N	N	N	N	11.1	
1529-1542 Grey and grey-green, small chip, acid-intermediate agglomerate. Not sheared. Some silicification 1529-1534. About 10% disseminated barite 1534-1538.5. and about 50% barite replacement from 1538.5-1542.	1529	1540	95	Sample 1529-1534 Traces of disseminated Pb-Zn.	1	N	N	N	1.8	2.0	3.4	1530-1535 6	N	0.2	N	0.2	0.8	7.6	
				Sample 1534-1538.5 Agglomerate with 10% disseminated barite and traces Pb-Zn; at 1534' is 2 inch band of high grade Pb-Zn.	2	N	N	N	1.0	1.7	3.0								
				Sample 1538.5-1542 About 50% replaced by barite with lightly disseminated Pb-Zn mineralization.	3	.01	0.4	N	2.0	3.8	3.8	1535-1540 7	.01	0.4	N	2.2	3.0	5.8	
1542-1544.5 Massive high grade ore.	1540	1547	90	Sample 1542-1544.5 High grade Pb-Zn ore; a little barite matrix.	4	.06	4.8	0.8	16.3	20.6	2.5	1540-1545 8	N	N	N	3.1	5.1	13.3	
1544.5-1545.5 Solid fragment of grey-green, fine grained intermediate-andesite lava; no amygdulæ. Barren.				Sample 1544.5-1547 Fragment of lava 1544.5-1545.5; from 1545.5-1545.8 high grade ore band; from 1545.8-1547 is agglomerate with some lightly disseminated Pb-Zn barite.	5	.04	2.4	0.2	6.8	10.1	3.5	1545-1550 9	.02	0.6	0.2	7.3	9.5	6.2	
1545.5-1545.8 High grade ore band.																			
1545.8-1547 Acid-intermediate and intermediate agglomerate with 4 inches green chert replacement.																			
1547-1552.7 High grade ore with some narrow bands of unreplaced agglomerate and grey grit; a few small fragments of intermediate lava and grey siltstone.	1547	1557	100	Sample 1547-1552.7 High grade Pb-Zn ore with some narrow bands unreplaced agglomerate.	6	.06	15.2	1.6	16.8	21.8	3.2	1550-1555 50	.08	6.8	1.5	15.5	20.6	4.6	
1552.7-1572 Grey-green, sheared, coarse gritty tuff of acid-intermediate lava material; some yellowish-green chlorite development; some grey chert	1557	1568	75	Sample 1552.7-1557 Barren.	7	N	0.2	N	0.6	1.0	2.8	1555-1560 1	.01	0.2	N	1.8	2.0	15.3	
	1568	1574	33	1557-1572 Barren.								1560-1565 2	.02	0.4	N	1.8	2.2	14.0	
												1565-1570 3	N	N	N	0.2	1.0	24.6	
												1570-1575 4	N	N	N	0.2	0.6	7.8	

SIZE OF CORE

From	To
1 1/4" From	To
3/4" From	To
1/2" From	To

REMARKS

The high iron assays are due to iron shavings rubbed by the drill rods from the 801 feet of casing used in the hole.

Examined by

H. S. Maclean
 ORIGINAL SIGNED
 BY
 GEO. G. THOMAS

Engineer

Approved by

Manager

BUCHANS MINING CO., LTD.
DIAMOND DRILL HOLE RECORD

Location _____
 Direction _____ Dip _____
 Started _____ Finished _____

COORDINATES

N _____ E _____
Elevation _____

Hole No. 842
Depth 1688 f

[illegible]

1688: end of hole.

SIZE OF CORE		REMARKS
From	To	
14" From	To	
7" From	To	
From	To	

Examined by H. J. Maclean Engineer

Approved by GEO. G. THOMAS Manager