



CONTACT INFORMATION
Mining Records Curator
Arizona Geological Survey
3550 N. Central Ave, 2nd floor
Phoenix, AZ, 85012
602-771-1601
<http://www.azgs.az.gov>
inquiries@azgs.az.gov

The following file is part of the Cambior Exploration USA Inc. records

ACCESS STATEMENT

These digitized collections are accessible for purposes of education and research. We have indicated what we know about copyright and rights of privacy, publicity, or trademark. Due to the nature of archival collections, we are not always able to identify this information. We are eager to hear from any rights owners, so that we may obtain accurate information. Upon request, we will remove material from public view while we address a rights issue.

CONSTRAINTS STATEMENT

The Arizona Geological Survey does not claim to control all rights for all materials in its collection. These rights include, but are not limited to: copyright, privacy rights, and cultural protection rights. The User hereby assumes all responsibility for obtaining any rights to use the material in excess of "fair use."

The Survey makes no intellectual property claims to the products created by individual authors in the manuscript collections, except when the author deeded those rights to the Survey or when those authors were employed by the State of Arizona and created intellectual products as a function of their official duties. The Survey does maintain property rights to the physical and digital representations of the works.

QUALITY STATEMENT

The Arizona Geological Survey is not responsible for the accuracy of the records, information, or opinions that may be contained in the files. The Survey collects, catalogs, and archives data on mineral properties regardless of its views of the veracity or accuracy of those data.

3 miles from
old McMillan Mine

N

R16 E
T4 N
SECTION 27

INTEREST
IN
QUESTIONS

RIBE
TAN
Section 29

RIGE
TAN
SECTION 2

RIGE
TAN
Section 34

Brushy
a Spring

Page 33
Section 33

RECEIVED
B.L.M. AZ STATE OFFICE
DEC 20 1995

PHOENIX, ARIZONA

~~#1 MAIN VEIN~~

RI GE
T 3 N
SECTION A

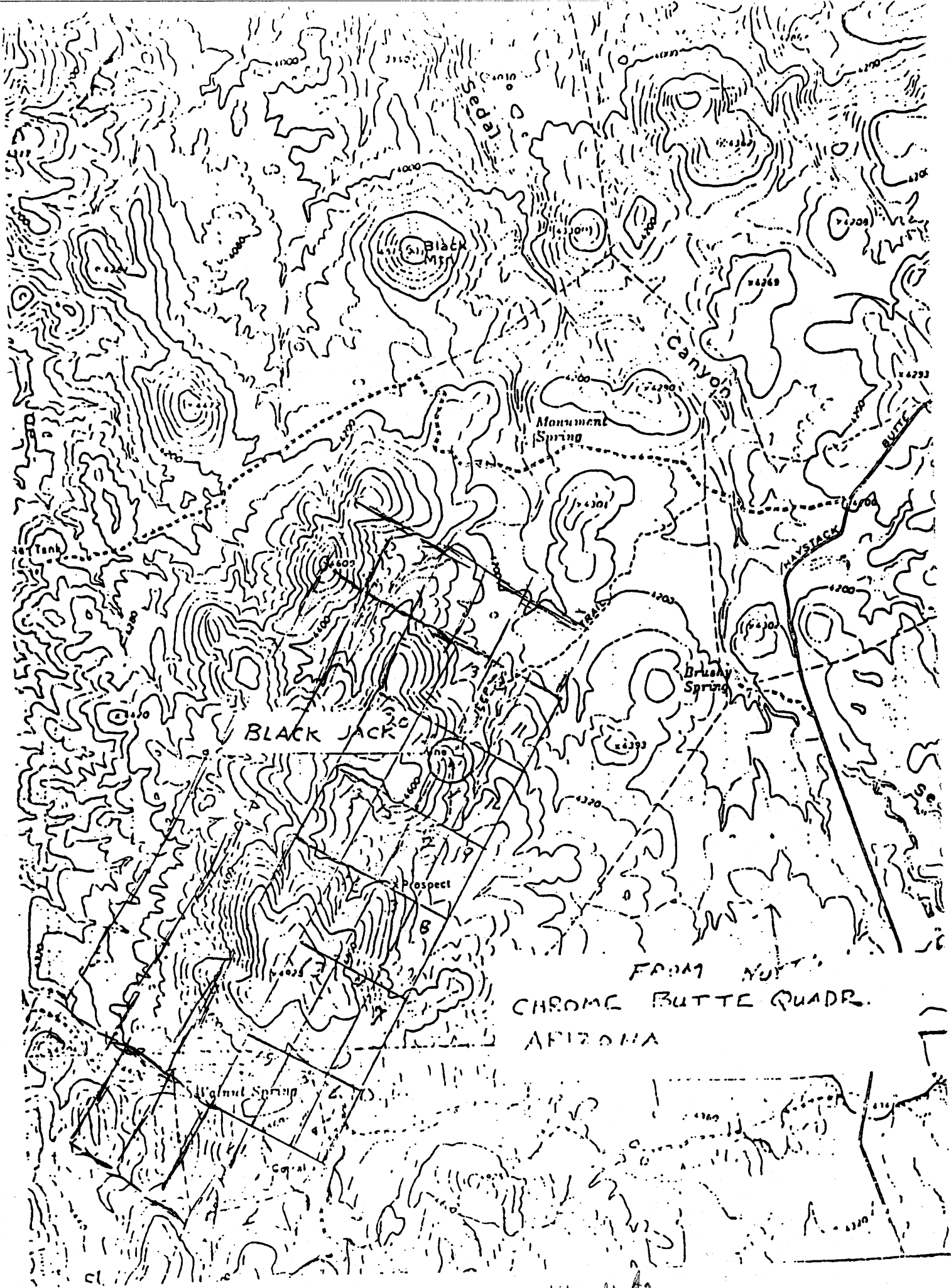
RIG
T3N
SECTION 9

Walnut
Spring

RICE
T3N
SECTION 8

- Location Monument
- Corner and Center Posts

A horizontal line with a small circle at the left end and a vertical tick mark at the right end. The text "2000 feet" is written above the right end of the line.



12 claims around
original block

Very high grade Ag

CAMBIOR USA, INC. NO. 39135

ROCK: ☒

Date: 5/30/93

SOIL: ☐

State: AR

SED.: ☐

County: Gela

Project: Black Jack (R. Amado)

DRILL HOLE NO. _____ FROM _____ TO _____

Loc.: T _____ N; R _____ E; _____ 1/4; S _____

Quad: _____ S Haystack W Route Scale 7.5

RX:

Dump/
Tailings

Outcrop/
Float

Fresh/
Weathered

4'

Outcrop Location: 1/2 exposed over portal

2.5' gtz (#1 site) NO. _____

Sample Description: _____ Rock Type: _____

Rock Mod: _____ Mineral: _____

Oxides: _____ Alteration: _____

Structure: _____ Spl. Width: _____

Qtz vein, off white - pale pink, locally

w/ amg that, 2%+ disseminated nls or bldgs

barite & argentite, to malachite or

silver oxide

strong fric lin - hem

host rx dense nls or diabase

local well devel gtz clast Bx tail

within vein

CAMBIOR USA, INC. NO. 39136

ROCK: ☒

Date: 3/30

SOIL: ☐

State: _____

SED.: ☐

County: _____

Project: Black Jack

DRILL HOLE NO. _____ FROM _____ TO _____

Loc.: T _____ N; R _____ E; _____ W; S _____

Quad: _____ Scale _____

RX:

Dump/
Tailings

Outcrop/
Float

Fresh/
Weathered

6'

Outcrop Location: _____

same site as # 39135

NO. _____

Sample Description: _____ Rock Type: _____

Rock Mod: _____ Mineral: _____

Oxides: _____ Alteration: _____

Structure: _____ Spl. Width: _____

2.5 gtz on 2.5' chlor alt, strong frs

lim-ben diabase

fine carb thin abundant

good evid of 5 to 2' cross

structures on ~30' spacing pattern

main var structure

CAMBIOR USA, INC. NO. 39137

ROCK: ☒

Date: 3/30

SOIL: ☐

State: _____

SED.: ☐

County: _____

Project: Black Jack

DRILL HOLE NO. _____ FROM _____ TO _____

Loc.: T _____ N; R _____ E; _____ 1/4; S _____
S W

Quad: _____ Scale _____

RX:

Dump/
TailingsOutcrop/
FloatFresh/
Weathered6' entrance to
Outcrop Location: portal cut

NO. _____

Sample Description: _____ Rock Type: _____

Rock Mod: _____ Mineral: _____

Oxides: _____ Alteration: _____

Structure: _____ Spl. Width: _____

x structure east side of NW out
30' from portal (#39135, 136)Diabase; siltstone, strong clay-lim-carb
frag devol, discont shattered, partly
bleached core 1-8" gtz v. lts
1-2' envelope of oxio diabase
strong hematite frag & semicr

CAMBIOR USA, INC. NO. 39138

ROCK: ☒ Date: 2/20
 SOIL: ☐ State: Al
 SED.: ☐ County: _____
 Project: Blackjack

DRILL HOLE NO. _____ FROM _____ TO _____
 Loc.: T _____ N; R _____ E; _____ 1/4; S _____
 S W
 Quad: _____ Scale _____

RX: Dump/Tailings Outcrop/Float Fresh/Weathered
1' vuv
 Outcrop Location: upper workings, road pond site NO. _____
#2 vuv

Sample Description: _____ Rock Type: _____
 Rock Mod: _____ Mineral: _____
 Oxides: _____ Alteration: _____
 Structure: _____ Spl. Width: _____

1' vuv zone, light & bleached somewhat alt
diabase with strong fine lin-hem
strong banding text
no vuv sulfides
local strong fine MnOx & green oxide
after argandite??

CAMBIOR USA, INC. NO. 39139

ROCK: ☒

Date: 3/30

SOIL: ☐

State: Az

SED.: ☐

County: Gila

Project: Blackjack

DRILL HOLE NO. _____ FROM _____ TO _____

Loc.: T _____ N; R _____ E; _____ 1/4; S _____
S W

Quad: _____ Scale _____

RX:

Dump/
Tailings

Outcrop/
Float

Fresh/
Weathered

10'
Outcrop Location: x structure Va #2

_____ NO. _____

Sample Description: _____ Rock Type: _____

Rock Mod: _____ Mineral: _____

Oxides: _____ Alteration: _____

Structure: _____ Spl. Width: _____

Database; well oxidized / ~~water~~

strong fine lim-bn, numerous 1/8" lim-calcite-

gtz vults, strong fine MnOx

Samuel Holliday

CONSULTING GEOLOGIST

2601 W. CURTIS ST.
TUCSON, ARIZONA 85705

TELEPHONE 602-792-0652
RESIDENCE 602-888-2247

GEOLOGICAL REPORT BLACK JACK CLAIMS, GILA COUNTY, ARIZONA

Prepared for Thomas E. Hawes
By Samuel Holliday
August 20, 1979

This report covers work done by Dr. William D. Beaton of Montreal, Canada, and myself in the way of confirmation of the report of Dr. William C. Peters of Pincock, Allen and Holt, dated April 5, 1978. Dr. Beaton and I spent two days on the property, August 7 and 8, 1979.

The work consisted of detailed sampling across a vein at four places (shown as localities A, B, C, and D on the map). The samples were submitted to Bondar-Clegg Ltd. of Ottawa, Canada, and the results of analysis are included in this report.

Property and Development:

As stated in Dr. Peters' report, the adit on Black Jack #1 claim, and the upper "powder magazine" adit had been discovered by recent bulldozing. The "powder magazine" adit is labeled location C on the enclosed map. The lower adit on claim #1 is labeled locality B. In addition, since Dr. Peters' visit, the vein system has been exposed in additional places by Mr. Hawes, one of these being locality D.

Geology:

As described by Dr. Peters, there is a main system of silver bearing veins striking N. 45 E with a steep dip to the northwest. The vein system as a whole has a width of about thirty feet, and the individual veins have thicknesses of from one to five feet. An individual vein was sampled in each location, A, B, C, and D.

It will be seen that in addition to substantial silver values, the veins also contain significant amounts of copper. This suggests the possibility that at least some of the mineralization may originally have been in the form of tetrahedrite, with a considerable replacement of copper by silver.

Sampling:

Bedrock samples were taken across a vein in a northwest-southeast direction, the middle sample being of supposed vein material, the other two in each case being country rock within the mineralized zone. In each case a uniform sample was taken along a straight line.

A. Just north of center point of claim #3 (labeled "prospect" on the map. #1 is country rock ten feet away. #2 is to the southeast, #4 to the northwest.

Thicknesses: #2 two feet, #3 10 inches, #4 two feet.

B. Upper "powder magazine" adit, 5 is to the southeast, 7 to the northwest.

Thicknesses: #5, 1.8 ft., #6, 1.2 ft., #7, 2.3 ft.

C. The mouth of the adit on the #1 claim. 8 is to the southeast, 10 to the northwest. #11 is a sample pried from the top of the adit and hand picked.

Thicknesses: #8, 1.3 ft., #9, 1.9 ft., #10, 3 ft.

D. Trench (see map), 1-S to the southeast, 2-S to the northwest.

Thicknesses, all 2 ft.

Geochemistry (values in parts per million

	cu	pb	zn	ag
1-R	38	8	67	0.4
2-R	61	3	74	1.2
3-R	4100	28	71	greater than 100
4-R	89	4	74	1.6
5-R	45	10	116	0.4
6-R	84	36	125	0.2
7-R	47	142	230	0.2
8-R	38	4	72	0.2
9-R	48	54	131	2.2
10-R	82	12	65	1.2
11-R	700	2	61	greater than 100
1-S	52	37	69	0.8
2-S	78	14	67	1.8
3-S	36	36	64	96

<u>Assays</u>	Silver in ounces per ton
3-R	12.9
11-R	14.4
3-S	5.58

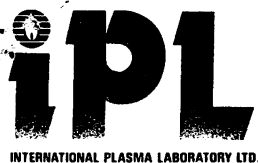
Remarks:

It is not the purpose of this report to suggest any values or feasibility for the property. However, I feel that the present work shows results consistent with the data discussed by Dr. Peters. I also feel that the statements made by Dr. Peters with regard to potential values are corroborated.

August 20, 1979



Samuel Holliday



Blackjack group
Gla Co Az
39135-39139

CERTIFICATE OF ANALYSIS

iPL 93F0701

2036 Columbia Street
Vancouver, B.C.
Canada V5Y 3E1
Phone (604) 879-7878
Fax (604) 879-7898

cc: *MMG*
geschim
owner

Cambior Exploration USA, Inc.

Out: Jun 10, 1993 Project: 304
In: Jun 07, 1993 Shipper: Michael Gustin
PO#: None Given Shipment: -- ID=C013500
Msg: ICP(AqR)30 Cu Assay

Msg:

Document Distribution

1 Cambior Exploration USA, Inc.
230 South Rock Blvd., Suite 23
Reno
NV 89502-2345
USA
ATT: Michael Gustin

EN RT CC IN FX
1 2 2 2 1
DL 3D 5D BT BL
0 0 0 1 0
Ph: 702/856-5189
Fx: 702/856-4549

54 Samples

Raw Storage: --
Pulp Storage: --

0= Rock 0= Soil 0= Core 0=RC Ct 54= Pulp 0=Other
-- 12Mon/Dis --
-- 12Mon/Dis --

[iPL=39:0610:13:55:291]
Mon=Month Dis=Discard
Rtn=Return Arc=Archive

Analytical Summary

##	Code	Met Title	Limit	Limit	Units	Description	Element	##
		hod	Low	High				
01	721P	ICP	Ag	0.1 100	ppm	Ag ICP	Silver	01
02	711P	ICP	Cu	1 20000	ppm	Cu ICP	Copper	02
03	113P	Assay	Cu	0.01 100.0	%	Cu Conventional Assay	Copper	03
04	714P	ICP	Pb	2 20000	ppm	Pb ICP	Lead	04
05	730P	ICP	Zn	1 20000	ppm	Zn ICP	Zinc	05
06	703P	ICP	As	5 10000	ppm	As ICP 5 ppm	Arsenic	06
07	702P	ICP	Sb	5 1000	ppm	Sb ICP	Antimony	07
08	732P	ICP	Hg	3 10000	ppm	Hg ICP	Mercury	08
09	717P	ICP	Mo	1 1000	ppm	Mo ICP	Molybdenum	09
10	747P	ICP	Tl	10 1000	ppm	Tl ICP 10 ppm	Thallium	10
11	705P	ICP	Bi	2 10000	ppm	Bi ICP	Bismuth	11
12	707P	ICP	Cd	0.1 10000	ppm	Cd ICP	Cadmium	12
13	710P	ICP	Co	1 10000	ppm	Co ICP	Cobalt	13
14	718P	ICP	Ni	1 10000	ppm	Ni ICP	Nickel	14
15	704P	ICP	Ba	2 10000	ppm	Ba ICP	Barium	15
16	727P	ICP	W	5 1000	ppm	W ICP	Tungsten	16
17	709P	ICP	Cr	1 10000	ppm	Cr ICP	Chromium	17
18	729P	ICP	V	2 10000	ppm	V ICP	Vanadium	18
19	716P	ICP	Mn	1 10000	ppm	Mn ICP	Manganese	19
20	713P	ICP	La	2 10000	ppm	La ICP	Lanthanum	20
21	723P	ICP	Sr	1 10000	ppm	Sr ICP	Strontium	21
22	731P	ICP	Zr	1 10000	ppm	Zr ICP	Zirconium	22
23	736P	ICP	Sc	1 10000	ppm	Sc ICP	Scandium	23
24	726P	ICP	Ti	0.01 1.00	%	Ti ICP	Titanium	24
25	701P	ICP	Al	0.01 5.00	%	Al ICP	Aluminum	25
26	708P	ICP	Ca	0.01 10.00	%	Ca ICP	Calcium	26
27	712P	ICP	Fe	0.01 5.00	%	Fe ICP	Iron	27
28	715P	ICP	Mg	0.01 10.00	%	Mg ICP	Magnesium	28
29	720P	ICP	K	0.01 10.00	%	K ICP	Potassium	29
30	722P	ICP	Na	0.01 5.00	%	Na ICP	Sodium	30
31	719P	ICP	P	0.01 5.00	%	P ICP	Phosphorus	31

EN=Envelope # RT=Report Style CC=Copies IN=Invoices FX=Fax(1=Yes 0=No)
DL=Download 3D=3-1/2 Disk 5D=5-1/4 Disk BT=BBS Type BL=BBS(1=Yes 0=No)

Totals: 2=Copy 2=Invoice 0=3-1/2 Disk 0=5-1/4 Disk

Approved



iPL 93F0701

**2036 Columbia Street
Vancouver, B.C.
Canada V5Y 3E1
Phone (604) 879-7878
Fax (604) 879-7898**

Project: 304

Section 1 of 2

Sample Name	Type	Ag ppm	Cu ppm	Cu %	Pb ppm	Zn ppm	As ppm	Sb ppm	Hg ppm	Mo ppm	Tl ppm	Bi ppm	Cd ppm	Co ppm	Ni ppm	Ba ppm	W ppm
33255	Pulp	0.5	2731	0.26	12	127	<5	<5	<3	16	<10	<2	2.2	13	29	51	<5
33257	Pulp	0.6	3880	0.37	25	212	<5	<5	<3	33	<10	<2	1.0	15	9	42	<5
33260	Pulp	1.6	6.1%	6.35	174	4234	21	<5	3	48	<10	<2	29.8	261	89	305	<5
33261	Pulp	0.9	4663	0.46	346	664	6	<5	<3	75	<10	<2	5.6	27	23	80	<5
33262	Pulp	2.2	3153	0.29	150	148	<5	<5	<3	39	<10	<2	1.3	22	9	103	<5
33263	Pulp	1.0	3289	0.31	20	293	<5	<5	<3	22	<10	<2	1.4	20	11	134	<5
33264	Pulp	1.2	10571	1.09	20	675	<5	<5	<3	28	<10	<2	2.6	28	36	99	<5
33265	Pulp	0.2	7955	0.79	4	87	10	<5	<3	50	<10	<2	<0.1	9	20	149	<5
33268	Pulp	0.5	2.4%	2.35	85	1654	<5	<5	<3	7	<10	<2	3.9	58	34	152	<5
33272	Pulp	2.1	3154	0.29	96	53	<5	<5	<3	64	<10	<2	<0.1	5	5	63	<5
33273	Pulp	1.9	2998	0.28	65	81	<5	<5	<3	57	<10	<2	<0.1	2	5	27	<5
33274	Pulp	2.4	5754	0.53	55	141	<5	<5	<3	55	<10	<2	1.8	30	11	127	<5
33276	Pulp	1.3	2428	0.23	52	108	<5	<5	<3	60	<10	<2	1.1	11	8	76	<5
33277	Pulp	1.0	4186	0.40	66	114	<5	<5	<3	66	<10	<2	0.6	6	9	50	<5
33278	Pulp	1.7	3236	0.29	61	256	<5	<5	<3	43	<10	<2	0.3	12	8	31	<5
33279	Pulp	2.3	4872	0.46	6	236	<5	<5	<3	7	<10	<2	<0.1	14	11	74	<5
33283	Pulp	0.9	2241	0.21	<2	121	<5	<5	<3	64	<10	<2	<0.1	6	6	100	<5
33286	Pulp	0.5	9135	0.94	13	375	10	<5	<3	25	<10	<2	5.5	11	25	128	<5
33287	Pulp	0.5	2.2%	2.01	21	385	7	<5	<3	89	<10	<2	1.3	68	22	111	<5
33290	Pulp	1.2	2179	0.20	21	205	<5	<5	<3	117	<10	<2	0.2	32	9	71	<5
33291	Pulp	1.4	4499	0.43	10	99	<5	<5	<3	25	<10	<2	0.3	22	9	80	<5
33293	Pulp	2.4	4793	0.45	24	127	<5	<5	<3	13	<10	<2	<0.1	20	10	54	<5
33294	Pulp	1.3	7026	0.71	6	243	<5	<5	<3	27	<10	<2	<0.1	11	11	100	<5
33295	Pulp	4.6	3301	0.43	375	283	<5	<5	<3	53	<10	<2	0.1	12	7	51	<5
39135	Pulp	0.2m	1192	0.21	11	151	<5	<5	<3	3	<10	<2	<0.1	12	32	2008	<5
39136	Pulp	0.1m	1071	0.11	49	294	<5	<5	<3	3	<10	<2	<0.1	42	91	355	<5
39139	Pulp	0.6	238	0.03	14	118	<5	<5	<3	2	<10	<2	<0.1	45	101	118	<5
39141	Pulp	0.2	13%	11.49	170	4379	14	<5	<3	13	19	<2	7.5	74	26	205	8
39142	Pulp	0.7	4091	0.41	123	11633	28	<5	4	30	43	<2	34.5	247	73	417	<5
39143	Pulp	0.3	1112	0.12	211	189	<5	<5	<3	77	<10	<2	0.5	3	7	62	<5
39145	Pulp	0.5	6904	0.77	207	233	<5	<5	<3	27	<10	<2	3.4	56	22	66	<5
39149	Pulp	0.6	4116	0.40	113	3913	7	5	<3	15	<10	<2	5.6	32	33	70	<5
39152	Pulp	0.4	7546	0.78	3	94	12	<5	<3	47	<10	<2	<0.1	8	18	144	<5
39153	Pulp	0.7	1623	0.17	230	260	<5	<5	<3	60	<10	<2	0.2	2	6	62	<5
39155	Pulp	0.4	1293	0.13	103	187	<5	<5	<3	6	<10	<2	0.7	1	3	92	<5
39156	Pulp	1.1	1264	0.13	127	124	<5	<5	<3	38	<10	<2	18.1	3	5	162	<5
39157	Pulp	0.3	788	0.08	200	558	<5	<5	<3	13	<10	<2	12.1	3	17	145	<5
39158	Pulp	4.7	3.7%	3.58	318	138	<5	<5	<3	32	<10	<2	1.3	1	3	83	<5
39160	Pulp	0.5	3631	0.36	43	315	<5	<5	<3	52	<10	<2	2.1	8	7	56	<5

0.1 1 0.01 2 1 5 5 3 1 10 2 0.1 1 1 2 5

100.0	20000	100.00	20000	20000	10000	1000	10000	1000	1000	10000	10000.0	10000	10000	10000	1000
-------	-------	--------	-------	-------	-------	------	-------	------	------	-------	---------	-------	-------	-------	------

--=No Test ReC=ReCheck ins=Insufficient Sample m=Est/1000 %=Est % Max=No Est

--=No Test ReC=ReCheck ins=Insufficient Sample m=Est/1000 %=Est % Max=No Est

CERTIFICATE OF ANALYSIS

iPL 93F0701

2036 Columbia Street
Vancouver, B.C.
Canada V5Y 3E1
Phone (604) 879-7878
Fax (604) 879-7898

Report: 93F0701 R Cambior Exploration USA, Inc.

Project: 304

Page 1 of 2

Section 2 of 2

Sample Name	Cr ppm	V ppm	Mn ppm	La ppm	Sr ppm	Zr ppm	Sc ppm	Ti %	Al %	Ca %	Fe %	Mg %	K %	Na %	P %
33255	69	27	629	26	11	1	3	0.03	1.25	0.94	2.50	0.88	0.33	0.02	0.10
33257	68	16	732	25	32	<1	1	0.01	0.81	0.23	2.33	0.36	0.25	0.03	0.08
33260	90	57	1.2%	25	24	2	8	0.01	2.67	0.52	3.29	2.46	0.49	0.04	0.16
33261	63	15	1574	8	49	<1	1	<0.01	0.88	0.21	1.91	0.48	0.28	0.01	0.05
33262	65	18	2863	11	67	<1	2	0.03	0.83	0.52	2.45	0.33	0.39	0.05	0.11
33263	62	20	1520	19	12	<1	2	0.02	0.99	0.38	2.42	0.52	0.28	0.03	0.11
33264	73	27	1668	23	19	1	3	0.02	1.42	0.36	2.91	1.02	0.34	0.04	0.11
33265	18	18	148	22	77	1	2	0.05	1.36	0.13	1.42	0.42	0.56	0.04	0.02
33268	30	11	2554	18	14	3	1	0.01	0.94	0.18	1.25	0.42	0.21	0.03	0.03
33272	78	7	341	7	53	1	1	<0.01	0.44	0.09	1.11	0.08	0.22	0.01	0.02
33273	68	4	187	4	15	<1	<1	<0.01	0.40	0.07	0.78	0.05	0.16	0.02	0.02
33274	67	16	2178	16	36	<1	2	0.02	0.85	0.29	2.59	0.20	0.41	0.04	0.10
33276	67	13	853	10	41	<1	1	0.01	0.74	0.35	2.07	0.23	0.29	0.03	0.08
33277	80	9	286	6	24	<1	1	<0.01	0.55	0.11	1.29	0.17	0.25	0.02	0.03
33278	116	4	1011	2	8	<1	<1	<0.01	0.23	0.03	0.54	0.10	0.10	0.01	0.01
33279	52	36	334	20	21	1	3	0.11	1.15	0.48	2.88	0.68	0.62	0.03	0.14
33283	69	13	438	15	95	<1	1	0.04	0.69	0.19	1.72	0.26	0.35	0.02	0.09
33286	72	20	5326	33	27	<1	3	0.02	1.76	0.75	2.36	0.53	0.64	0.02	0.10
33287	50	32	5388	28	26	<1	3	0.02	2.68	0.85	3.99	1.00	0.43	0.02	0.15
33290	85	19	903	21	34	<1	2	0.02	1.12	0.25	3.10	0.58	0.43	0.03	0.11
33291	110	19	1552	22	17	1	2	0.03	0.99	0.31	2.77	0.49	0.45	0.04	0.12
33293	67	17	1282	44	11	<1	2	0.02	1.20	0.33	2.88	0.61	0.30	0.03	0.12
33294	130	43	511	24	36	<1	4	0.14	1.29	0.35	3.56	0.66	0.70	0.05	0.14
33295	93	16	950	25	9	1	2	0.03	1.03	0.33	2.27	0.40	0.39	0.03	0.11
39135	143	25	120	<2	67	1	5	<0.01	0.42	0.25	3.38	0.11	0.16	0.01	0.03
39136	91	58	748	4	28	2	10	<0.01	2.39	1.45	7.6%	1.05	0.32	0.03	0.09
39139	68	70	1444	7	45	2	9	0.01	2.60	3.04	7.4%	1.31	0.28	0.08	0.13
39141	63	28	8308	<2	11	<1	2	<0.01	0.26	0.17	0.38	0.09	0.02	0.02	<0.01
39142	108	<2	2.7%	<2	23	<1	<1	<0.01	0.04	0.04	0.40	0.19	0.06	0.02	<0.01
39143	46	24	302	12	85	<1	1	0.01	0.54	0.85	2.26	0.08	0.26	0.03	0.05
39145	124	8	2665	7	23	<1	1	<0.01	0.38	0.94	1.14	0.03	0.22	0.02	0.02
39149	260	7	5859	7	7	<1	1	0.01	0.56	0.16	1.10	0.35	0.13	0.02	0.05
39152	16	16	139	19	68	1	2	0.04	1.20	0.12	1.30	0.38	0.51	0.04	0.02
39153	216	19	315	11	17	<1	<1	<0.01	0.70	0.06	1.48	0.07	0.33	0.04	0.02
39155	104	7	607	18	22	1	1	<0.01	0.83	0.45	0.52	0.08	0.37	0.03	0.18
39156	155	9	4103	18	60	<1	1	0.01	0.44	8.08	1.33	0.11	0.21	0.03	0.03
39157	63	9	1043	13	34	<1	1	<0.01	1.30	2.62	0.90	0.50	0.23	0.03	0.07
39158	111	8	78	17	84	<1	1	0.01	0.75	0.26	0.91	0.09	0.25	0.07	0.06
39160	160	4	590	5	12	<1	1	<0.01	0.55	0.97	0.65	0.18	0.26	0.02	0.03

Minimum Detection 1 2 1 2 1 1 1 0.01 0.01 0.01 0.01 0.01 0.01 0.01 0.01
Maximum Detection 10000 10000 10000 10000 10000 10000 10000 1.00 5.00 10.00 5.00 10.00 10.00 10.00 5.00 5.00
Method ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP
---No Test ReC=ReCheck ins=Insufficient Sample m=Est/1000 %=Est % Max=No Est

CERTIFICATE OF ANALYSIS

iPL 93F0701

2036 Columbia Street
Vancouver, B.C.
Canada V5Y 3E1
Phone (604) 879-7878
Fax (604) 879-7898

Report: 93F0701 R Cambior Exploration USA, Inc.

Project: 304

Page 2 of 2

Section 1 of 2

Sample Name	Type	Ag ppm	Cu ppm	Cu %	Pb ppm	Zn ppm	As ppm	Sb ppm	Hg ppm	Mo ppm	Tl ppm	Bi ppm	Cd ppm	Co ppm	Ni ppm	Ba ppm	W ppm
39162	Pulp	1.1	3143	0.30	76	467	7	<5	<3	111	<10	<2	5.2	106	11	93	<5
39165	Pulp	1.3	8724	0.92	55	3259	17	<5	3	68	<10	<2	12.1	328	90	265	<5
39172	Pulp	2.0	3.1%	2.85	547	335	<5	<5	<3	47	<10	<2	2.0	49	21	223	<5
39179	Pulp	1.0	8245	0.81	27	413	<5	<5	<3	9	<10	<2	6.4	16	12	106	<5
39180	Pulp	3.2	19592	1.85	13	760	<5	<5	<3	23	<10	<2	10.2	15	15	93	<5
39183	Pulp	0.6	3568	0.34	14	248	<5	<5	<3	8	<10	<2	1.6	12	10	88	<5
39186	Pulp	1.1	4437	0.41	97	698	<5	<5	<3	25	<10	<2	1.6	20	27	141	<5
39188	Pulp	1.6	13610	1.33	309	558	<5	<5	<3	33	<10	<2	4.7	19	20	51	<5
39190	Pulp	0.8	3775	0.37	61	119	<5	<5	<3	32	<10	<2	1.7	8	10	78	<5
39191	Pulp	1.5	2795	0.26	52	244	<5	<5	<3	13	<10	<2	3.2	8	9	79	<5
39192	Pulp	0.2	7788	0.80	6	86	11	<5	<3	49	<10	<2	<0.1	9	19	139	<5
39193	Pulp	0.9	3821	0.38	12	172	<5	<5	<3	37	<10	<2	2.2	15	7	60	<5
39194	Pulp	0.8	3551	0.34	6	234	<5	<5	<3	38	<10	<2	2.2	17	13	75	<5
39199	Pulp	1.0	4537	0.43	32	159	<5	<5	<3	14	<10	<2	2.2	12	12	81	<5
39200	Pulp	0.8	3645	0.35	8	141	<5	<5	<3	11	<10	<2	1.0	12	9	62	<5

Minimum Detection
Maximum Detection
Method

0.1	1	0.01	2	1	5	5	3	1	10	2	0.1	1	1	2	5
100.0	20000	100.00	20000	20000	10000	1000	10000	1000	1000	10000	10000.0	10000	10000	10000	1000
ICP	ICP	Assay	ICP	ICP	ICP	ICP	ICP	ICP	ICP	ICP	ICP	ICP	ICP	ICP	ICP

--=No Test ReC=ReCheck ins=Insufficient Sample m=Est/1000 %=Est % Max=No Est

CERTIFICATE OF ANALYSIS
iPL 93F0701

2036 Columbia Street
Vancouver, B.C.
Canada V5Y 3E1
Phone (604) 879-7878
Fax (604) 879-7898

Report: 93F0701 R Cambior Exploration USA, Inc.

Project: 304

Page 2 of 2

Section 2 of 2

Sample Name	Cr ppm	V ppm	Mn ppm	La ppm	Sr ppm	Zr ppm	Sc ppm	Ti %	Al %	Ca %	Fe %	Mg %	K %	Na %	P %
39162	126	7	5085	14	65	<1	1	0.02	0.64	0.06	1.64	0.04	0.20	0.03	0.01
39165	94	32	1.3%	10	41	1	4	0.03	0.97	3.71	2.10	0.51	0.32	0.04	0.10
39172	170	18	3090	12	25	<1	2	<0.01	0.68	0.27	1.98	0.06	0.33	0.01	0.02
39179	122	30	1095	26	16	<1	3	0.04	1.41	0.46	2.97	0.70	0.51	0.05	0.15
39180	188	25	1952	27	15	<1	3	0.03	1.18	0.43	2.73	0.58	0.37	0.05	0.11
39183	144	31	957	23	21	<1	3	0.03	1.44	0.45	2.69	0.72	0.34	0.04	0.12
39186	172	12	1043	14	30	<1	1	<0.01	0.89	0.15	1.46	0.53	0.27	0.01	0.05
39188	141	32	868	14	8	1	2	<0.01	1.04	0.22	1.52	0.52	0.32	0.03	0.06
39190	129	15	588	19	35	1	1	0.01	0.63	0.15	1.86	0.17	0.34	0.02	0.06
39191	150	18	893	16	11	<1	2	0.01	1.02	0.29	2.51	0.45	0.30	0.02	0.09
39192	18	17	137	21	73	1	2	0.04	1.29	0.13	1.38	0.41	0.55	0.03	0.02
39193	130	16	996	21	24	<1	2	0.02	0.71	0.14	1.97	0.28	0.32	0.04	0.05
39194	158	29	1023	16	21	<1	3	0.03	0.97	0.21	2.99	0.41	0.49	0.04	0.09
39199	165	27	954	23	11	<1	2	0.03	1.00	0.33	2.86	0.48	0.48	0.04	0.10
39200	141	30	618	27	11	<1	3	0.05	1.04	0.27	2.75	0.56	0.59	0.04	0.10

Minimum Detection 1 2 1 2 1 1 1 0.01 0.01 0.01 0.01 0.01 0.01 0.01 0.01
Maximum Detection 10000 10000 10000 10000 10000 10000 10000 1.00 5.00 10.00 5.00 10.00 10.00 10.00 5.00 5.00
Method ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP ICP
---No Test ReC=ReCheck ins=Insufficient Sample m=Est/1000 %=Est % Max=No Est

CAMBIOR USA, INC. NO. 39135

ROCK: ☒ Date: 5/30/93
 SOIL: ☐ State: Ar
 SED: ☐ County: Gila
 Project: Black Jack (R. Amole)

DRILL HOLE NO. _____ FROM _____ TO _____
 Loc.: T _____ N; R _____ E; _____ W; S _____
 Quad: S Haystack W Butte Scale 2.5

RX: 4' Dump/Tailings Outcrop/Float Fresh/Weathered

Outcrop Location: 1/4 exposed over partial
2.5' gte (#1 site) NO. _____

Sample Description: _____ Rock Type: _____
 Rock Mod: _____ Mineral: _____
 Oxides: _____ Alteration: _____
 Structure: _____ Spl. Width: _____

Qtz min, offwhite-pale pink, locally
w/ amy, thst, 2%+ dissea and/or blebs
barite + argenticite, to malachite or
silver oxide
strong fine lim-hem
hosted dense major diabase
local well devel gte clast Bx tail
within vein

CAMBIOR USA, INC. NO. 39136

ROCK: ☒ Date: 5/30
 SOIL: ☐ State: _____
 SED: ☐ County: _____
 Project: Black Jack

DRILL HOLE NO. _____ FROM _____ TO _____
 Loc.: T _____ N; R _____ E; _____ W; S _____
 Quad: _____ Scale _____

RX: 6' Dump/Tailings Outcrop/Float Fresh/Weathered

Outcrop Location: _____
same site as # 39135 NO. _____

Sample Description: _____ Rock Type: _____
 Rock Mod: _____ Mineral: _____
 Oxides: _____ Alteration: _____
 Structure: _____ Spl. Width: _____

2.5 gte on 2.5' chlor alt, strong fine
lim-hem diabase
fine carb thm abundant
good and at 5 to 2' cross
structures are ~30' spacing under noddy
rain over structure

CAMBIOR USA, INC. NO. 39137

ROCK: ☒ Date: 2/30
 SOIL: ☐ State: _____
 SED.: ☐ County: _____
 Project: Black Jack

DRILL HOLE NO. _____ FROM _____ TO _____
 Loc.: T _____ N; R _____ E; _____ 1/4; S _____
 Quad: _____ S W Scale _____

RX: Dump/Tailings Outcrop/Float Fresh/Weathered
 6' entrance to

Outcrop Location: portal cut
 _____ NO. _____

Sample Description: _____ Rock Type: _____
 Rock Mod: _____ Mineral: _____
 Oxides: _____ Alteration: _____
 Structure: _____ Spl. Width: _____

x structure east side of vein out
30' from portal (#39135, 138)

Diabase, some, strong clay-lim-carb
free devol, discont shattered, partly
bleached iron r-8" gtz v. lts
1-2' envelope of oxio diabase
strong hematite from a sample

CAMBIOR USA, INC. NO. 39138

ROCK: ☒ Date: 2/30
 SOIL: ☐ State: Az
 SED.: ☐ County: _____
 Project: Black Jack

DRILL HOLE NO. _____ FROM _____ TO _____
 Loc.: T _____ N; R _____ E; _____ 1/4; S _____
 Quad: _____ S W Scale _____

RX: Dump/Tailings Outcrop/Float Fresh/Weathered
 1' vein

Outcrop Location: upper face #2 vein
upper workings, covered portal site NO. _____

Sample Description: _____ Rock Type: _____
 Rock Mod: _____ Mineral: _____
 Oxides: _____ Alteration: _____
 Structure: _____ Spl. Width: _____

1' vein zone, limy + bleached some at
diabase with strong free lim-lens
strong banding text
no vis sulfides
local strong free MnOx + green oxide
after argandite??

COMBIOR USA, INC. NO. 39139

ROCK: ☒ Date: 3/30
SOIL: ☐ State: AZ
SED.: ☐ County: Gila
Project: Blackjack

DRILL HOLE NO. _____ FROM _____ TO _____

Loc.: T _____ N; R _____ E; _____ 1/4; S _____
S _____ W

Quad: _____ Scale _____

RX: _____ Dump/Tailings _____ Outcrop/Float _____ Fresh/Weathered _____

10' Outcrop Location: X structure VA #2

_____ NO. _____

Sample Description: _____ Rock Type: _____

Rock Mod: _____ Mineral: _____

Oxides: _____ Alteration: _____

Structure: _____ Spl. Width: _____

Diorite, well oxidized / water

strong fine lim-ben, numerous 1/8" lim-calcite

qtz veins, strong fine MnOx



(BLACK JACK), CLAIM # 1 MAIN

R16E
T3N
SEC. 4

26° E. of N.
Pitch 13°

