010

## GEOLOGICAL REPORT <br> BATCH RIVER OOLD MINES LIMITED <br> GROUT OF CLAILS <br> PICREREL TOMNSEIP <br> ROF:T-WESTERN ONTARIO.

## LOCATION OF PROPERTY:

The property oovered by report is omed by Batoh River Gold Mines Linited, 330 Bay 8treet, Torcnto, and oomprises 17 unsurveyod mining olaine regiatered as Pa 9972-6988 inolucive. Hine olaima of group are looated in K.E. coraer of Piokerel Towaship (Lot 1. Conoession V1) and the romainder (8) adjoin to the Baet in unsurreyed territory, in the Patrioia Mining Diviaion, Diatriot of Kenora, Ontario.

MEANS OF ACCB8S:

Provinoial Hithway No. 72 oute aoross the southern portion of the Group about 16 童 1108 southeweat of 810 ux lookout, Ontario.

A direot water route from Sioux Lookout via Abram Lake oould be utilized for trancporting heavy mine machinery.

## ACKNOKLEDGICXITS :

The writer wishes to thank A. R. Johneton, Consulting Geolocist, and J. Lundmark, prospeotor, for able assistanoe in the fiold. Referenoe hes been made to N. Z. Hurrt' $\operatorname{Beport}$ on the Sloux Lookout area (2953).

PRELIEINARY SURVEY NOTES:
(a) Line outtingl

East-Nest base lines were established. The yorth surveyod boundery of Piakerel Townchip wee out out and extended easterly to north-ast oorger of property and uscd as base line.

The seoond Base lime was out lue East from the southewest oorner of the property, wid tied in with surveyed north boundery of mining oladae K.R.L. 24520 and K.R.L. 24530.

Ploket lines at 380 ft. Intervals were turaod off with North or South bearings fros the base lines. These lines wore out out and ohalned.
(b) Mapping:
dotual mapping commenoed August 20th, and was oompletod by the ond of Boptember, 1950.

Wost of rook outoroppinge are looated along eastera boundary of property, where a good oross-seotion of property wae
(o) Topography,

Misfit lake oooupies the oontre of the property.
Rook ridgen in north-oasterly oorner, fise otooply to about 150 foot above normal level.

The weatorn half of group la moetly low lying anad ricges, muckeg, and olay coverod torrain.

TARLE OP FORMATIONS:
LENOZOIC:

## Reoont and Plolstocone:

Boulder olay, sand and gravel.
PRECAKARIAN:

## Intrusives:

Quartz porphyry.

## Sodiments:

Greywake?

## reowatin

Andesite, basalt, pillow leva, rhyolite, diorite, voloanio tuff and agglomorate, feldspar, basalt porphyry, cabbro.

## Ondetormined zones of altorod matorial:

Serioitio, ohyoritio and oarbonatod cohiste.

Quarts porphyry:
A quarts jorphyry dike about SO' in width and atriking M. $70^{\circ} \mathrm{E}$. was found aear south-east oorner of ra 998s. It is maseive Fith light yellowioh weathored surface, and vory coarse-gralned. it containod
many bluish quartz phesiorysts. Mo mineralizetion wan noted or quarte filled oross-fincturing.

## SEDIKENTS:

A granular, dark eodimentary rook was found near south-west ooraer of pa 9979, probably greywaoke.

## KEENATIN:

Greater part of andesite and lavas were fine to mediun Erained and quite massive. Intonsive hearing was rare with oxception along south boundery at lake shore. Very few quarta etringere or veine wore found, and mineralised zones were not common.

Dioritio textured rooks were flow type and were gradational. They are ilkely a phase of the greonatone and not a true diorite.

Voloanio tuff were dark basio types, and inter-bedded with egglomerates, with exception of band of ald tuff nesr couth-west corner of Pa 9879.

## FELLSPAR BASALT PORPITYRY:

A zone sinilar to that desoribed by M.E. Burat in his report, and 'coown looally as "loopard rook", wes found aear noithowest comer of Pa 9986. The prominent "spote" are rounded phenooryste of foldspar, ueually grey to white in oolour, and range in 180 from $\frac{1}{}$ inoh to 2 inohos in diameter in dark green matrix. Zones grade into oosrse grained greenstones.

ALTERED SHFAR ZONES:
Shear zsnes wore typed in the field, and olaseified aoooriligg to form of altoration, al lt vas imposeible to determine origin.

## FAOLTIMG:

 drift sovered.

## STRUCTURE:

Strike of formation is quite oonstant, and does not vary approoiably from y . $60^{\circ} \mathrm{E}$. and dips steoply to north-west botwean $70^{\circ}$ and 850 .

Other than etringer zone desoribed later, very few quartz ocourrenoes were found.

SUMMAKY OH EXPLORATION - 1960 :
Prospeoting was carried on in onnjunotion with mepping
 property duriaf the sumer of 1950 . This represente all of the mork done on the property to date. A winor mount of stripping and oross trenchini was donc to expose and extead disoovory neer north-west coraer if Pa 9079.

ECNONIE GEOLOCY:

## Siorth-west oomaer of Pa 9979:

An iaterestiag querte strincer sone was found near northwest onraer of Clais pa 0979. It ia oonvonlently leoated about forty feet south of hifhway, and oout one hundred and thirty feet south of wisfit Lake. It is on Ploket Ljo \# 10 at 0 plus 1400s This 1 ine is 330 Ceet east of Townihip Line.

At isupvery point, the zone has laom width of fietesa foet. Irrecular querte velas and atriacers from $l^{\prime \prime}$ to $6^{\prime \prime}$ in width ancle morose bed of cold tuff, bounded on each side by dark basio ohorty rook whioh mey be a rhyoilte.

Neat faoe of zone outorop is about $60 \%$ quarta with inolusiocs of acicerite, altered turf, and porphyritio material. The inolusions gre ar. uiar tivine it a breooiated appearance. There may be a oross fault at thia poiat, but outorop dips atecply, and overburdon is deep. Some fine peoks of ryrite was noted in alteretirin and quartz.

Nine seotinas were channel sampled at disoovery pilnt aoross a wiath of 22.0 reot. L theng loot sootion aseeyod 0.10 oz/au/ton; other seotiona ytided low fold values from traco to 0.0408 .

Followinf oxamination of surface ghowing, Mr. A. R. Joiaston, Consultint Geolozist, reoomended 1,000 foet of diamond drillinf.

Subsequently, four shallow holee ( 1,014 feet) were drilled alone strike to southmeat of disoovery point. Zone was intersected at two horizons ( $B-1, B-4$ ) below urfece exposure, and two holes ( $8-2, B-3$ ) wore drilled at 100 foot lntervals to the south-west.
 of 65 feet for core length of 25.7 fset. It oonsisted of numeroue quartz atriciors in a hichly elterad tuff. Mineralization was falriy woll distributed, mostly pyrite and a littlo tourmeline. Assey returne were afelifiblo. Depth of hole -224.6 ject.
E.D.H. fBoti Interseotion of sone st vertiond depth of
 esey retuma were 0.05 and $0.04 \mathrm{oz} / \mathrm{au} / \mathrm{ton}$ aorose widths of $1.8^{\circ}$ and $2.0^{\prime}$ respeotively. Depth of hole $=274.0$ fest.
D.D.H. \#B-2: Zone intersected for core length of 9.8 feet. This hole located 100 feet south-west of B-1 and B-4. Assay returns were low. The best being 0.04 from two potions of $2.0^{\prime}$ and 2.0'. Depth of hole -261.0 feet.
D.D.B. \#B-3: Located 100 feet south-west of B-2. Zone was not out in this hole, It had likely terminated between b-2 and B-3. Depth of hole -264.0 feet.

RECOMMENDATIONS:
Crose-sootional diamond drilling in northern half of group to cover drift ooverod sections, is suecosted as eseossmont work.

Two deep holes on reverse bearings from southeast corner of Pa 9986, on oh drilled to depth of 1,250 fast at dip of $-45^{\circ}$. The bearing of those holes should be $\mathrm{Ki} .30^{\circ}$ Fest, and $\mathrm{S} .30^{\circ}$ East, to out formation at right angles. This drilling would cover a horizontal distance of approximately 2,000 feat. Interesting geological data would be complied, and posalbilitios of intersenting a gold bearing zone are excellent. This area is on strike of major shear zone known to exist on adjoining Realmont property, and persistent grano-diorite dike extending through from lowland and extended last season by drilling on the vilibone and Eacledund properties.

MAPS:
Two sets of geological plans ( 100 scale) accompany this
Report.

J. D. Williamson.

BAtch R

Grosed en 5-2"pty vems
Hoot daetto a opphandic lava
light grean to buff e fo s bolaura



Sava gramped 2 somewhat libe guin old gishan. lavend
90 old pphar. lave (From 30 ft m der Nall not le basic lawa $s$ wall not uncovered.
$\angle 0 c A T .0 N$
$M$ adiog 15 y
Sionx fookent Nighlway on s.side of raad


$$
\begin{aligned}
& \text { EミE ADCOMPANYING } \\
& \text { MEP( } \text { IS IDENTIFIED AS } \\
& 52 F /(6 N E-0037-A \mid, \# 1,2
\end{aligned}
$$ CHANNEL IN THE FOHOWING SEQUENCE ( $x$ )



For Additional Information See Maps: 52F/16 NE-003z-A1 \# 2


