Occurrence Details

Occurrence Number: 105G 051
Occurrence Name: Chow
Occurrence Type: Hard-rock
Status: Prospect
Date printed: 8/6/2025 1:46:01 AM

General Information

Secondary Commodities: copper, gold, lead, zinc
Aliases: Play
Deposit Type(s): Volcanogenic Sulphide - type not determined
Location(s): 61°50'28" N - -131°29'27" W
NTS Mapsheet(s): 105G14
Location Comments: .5 Kilometres
Hand Samples Available: No
Last Reviewed:

Capsule

Work History

Staked as Kay cl 1-6 (Y16398) in Sep/66 by Kerr Addison Mines Ltd following regional geochemical surveys. Restaked as Palo cl 1-40 (Y73482) in Jun/73 by A. Harmon and as Gay cl (Y83797) in Oct/74 by A. Carlos.
Restaked as Gem cl 1-17 (YA156) in Jul/76 by A. Carlos and optioned to Yukon Revenue Mines Ltd which added BB cl 1-68 (YA889), Water cl 1-20 (YA11763), Lake cl 1-17 (YA11283) and Jade cl 1-12 (YA11800) in Sep/76-Jan/77 and performed mapping and soil sampling in 1976 and 1977 and drilled four holes totaling 400 m in 1977. The property was transferred in Dec/80 to Harjay Exploration Ltd.
Fringe staking between Nov/76 and Oct/77 included Polo cl (YA11972) by Welcome North Mines Ltd and Jim cl (YA12042) by P.S. White to the southwest; Iskut cl (YA12834) by Iskut Silver Mines Ltd to the northwest; Wit cl (YA12026) by E. Wedekind to the south; and My cl 1-4 (YA12212) by Marge Enterprises Ltd.
In June/94 Cominco Ltd staked Fret cl 1-51 (YB50023) north of the occurrence and carried out ground geophysics, soil sampling and geological mapping later in the summer. In Jul/97 Cominco optioned the Fret claims to Pacific Bay Minerals Ltd which carried out geological mapping and grid soil sampling later in the year. Pacific Bay dropped the option the following year.
Restaked within Play cl 1-64 (YB59231) in Mar/95 by Expatriate Resources Ltd. The claim group was staked in a northwest direction, with the northeast corner of the claim block adjoining the southwest corner of the Fret claims. In Aug/95 Expatriate staked Play cl 77-88 (YB60923) on the western end of their original claim block. In 1995 Expatriate carried out preliminary soil sampling, prospecting and geological mapping.
Expatriate staked Play cl 89-139 (YB76998) in Feb/96 and contracted Aerodata Inc to fly a helicopter-borne EM/magnetic geophysical survey over the Play and adjoining Ref claims (Minfile Occurrence #105G 099, combined claim groups were called Power Play property).
In Jun/96 the company staked Play cl 148-176 (YB89386) to cover open ground between the Play claims and Comincoċs Fret claims. During the 1996 field season Expatriate carried out soil sampling, prospecting, geological mapping, ground HLEM and total field magnetic surveys over selected portions of the Play claims. In 1997 the company carried out additional geological mapping, prospecting and soil sampling programs, hand trenched various showings and drilled 6 diamond drill holes (662 m).
In 2002 Expatriate re-evaluated data obtained from the airborne geophysical program flown in 1996 and carried out geological mapping, rock sampling and soil sampling programs in order to fill in data gaps and verify results obtained in previous exploration programs.
In Dec/2004 shareholders of Expatriate¿s non- Finlayson District exploration properties were transferred to a new company, Pacific Resources Ltd. Upon completion of the re-organization Expatriate changed its name to Yukon Zinc Corporation. Yukon Zincċs focus will be the development of company¿s Wolverine Deposit (Minfile Occurrence #105G 072) and its large surrounding claim holdings including the Play claims (this occurrence).

Capsule Geology

The area surrounding the occurrence is covered by deep deposits of overburden. Scattered outcrops can be found on ridge tops and some deeply incised drainages. Murphy et al. (2001) of the Yukon Geological Survey have completed preliminary mapping in the area, however changes are expected in future updates as more detailed mapping is completed.
Based on geological work by Cominco, Expatriate and the Yukon Geological Survey, the occurrence area is underlain by undifferentiated layered rocks which Murphy called unit CMCu. Murphy described the unit as Upper Devonian to Pennsylvanian in age, and consisting of undifferentiated layered rocks lying in the hanging wall of Money Creek Thrust. The unit contains some unit Pcl rocks (Pennsylvanian in age), and includes intermediate to felsic metavolcanic rocks, carbonate, and dark chert, greywacke and phyllite. This unit is unconformably overlain to the north by Late Pennsylvanian clastic rocks and Early Permian Campbell Range basalt.
Geological work reported by Cominco and Expatriate notes that the Campbell Range succession consists of massive basalt overlying a sequence of variably composed cherts, some possibly exhalative in origin, mixed with minor clastic sedimentary rocks and narrow basaltic horizons. The contact between the Campbell Range succession and the underlying layered metamorphic rocks is obscured by deep overburden which early drilling indicated ranged from 10 - 20 m. Early geological mapping suggested that the meta-basalts belonged to the Slide Mountain Terrane however, recent work by Murphy and Piercey (1999) suggests that this contact is depositional in nature and that the entire package, including Campbell Range belt meta-basalts, represents a transitional island arc/continental arc to marginal basin/ocean (back-arc?) basin environment and together constitute Yukon-Tanana Terrane.
The original occurrence consisted of geochemical anomalies associated with sulphide-bearing quartzite, phyllite and carbonaceous phyllite with minor breccia and quartz veining. Later pyritic siderite veinlets and breccia fillings carrying minor amounts of galena, sphalerite and chalcopyrite were found as float near a small diorite body in an area underlain by carbonaceous phyllite, chlorite schist, and marble.
Yukon Revenue located a copper-zinc anomaly over a strongly leached area from which selected specimens of phyllite assayed up to 2.2% Zn and 0.5% Pb. Drilling intersected schists and phyllites of varying composition including: calcareous schist, carbonaceous schist, quartz-sericite schist, `greenish grey tuffaceous rock¿, and skarn. Mineralization was scarce with the best results obtained from pyritic schist containing traces of galena, chalcopyrite and sphalerite which returned 0.54% Zn, 0.1% Pb and 0.03% Cu over 1.5 m.
Comincoċs soil sampling work on the Fret claims returned several weak Cu geochemical anomalies, thought to reflect a mafic/ultramafic volcanic association. The airborne and ground geophysics programs outlined several EM conductors and small magnetic highs none of which were coincident. The EM conductors are thought to be structural or related to carbonaceous sediments. The magnetic highs are thought to reflect mafic intrusions. Follow-up soil sampling completed by Pacific Bay outlined scattered Zn and Cu anomalies primarily localized near the southern claim boundary and coincident to a shallow magnetic-EM anomaly.
The1995 soil sampling program carried out by Expatriate on the Play claims identified two anomalies; a) East and b) West. The East anomaly measures approximately 2 300 X 800 m and returned moderate to strongly anomalous response for Cu, Mo, Sb, and Ag. Arsenic and Au response is elevated in a 600 X 200 m area near the northern edge of the grid which is underlain by felsic/intermediate metavolcanics. The West anomaly measures approximately 1 400 x 700 m and returned moderate to strongly anomalous response for Mo, Sb, Ag and Zn.
The 1996 mapping program identified five styles of mineralization on the Play and adjoining Ref claims; 1) 3 cm thick bands of massive pyrite with trace amounts of chalcopyrite, sphalerite and galena hosted by quartz-sericite+/-chlorite schist (east), 2) ferricrete breccia boulders (1.5 x 1.0 x 0.3 m) within graphitic phyllite (west), 3) yellow to brown leached and pitted fragments anomalous in Pb, Ag and Au ((west), 4) pyrite and arsenopyrite-bearing felsic metavolcanic rocks in the northeastern area of the property (500 ppb Au, 1705 ppm As), and 5) sphalerite-galena-chalcopyrite mineralization associated with quartz-carbonate veins and sweats located at various areas around the property.
The 1996 Aerodat survey identified six ¿first priority¿ targets and six `secondary objective¿ targets. The priority targets consisted of conductors with magnetic associations while the

secondary targets represented conductors without. No differentiation was possible between the response from very conductive, flat lying to gently dipping sediments and massive sulphide bodies.
Expatriate¿s 1997 exploration program was focused on identifying and evaluating targets with the best economic potential. The company examined the original Minfile occurrence (showing `E¿) and noted that it is underlain by graphitic schist, muscovite-chlorite schist and interbedded siltstone and mudstone. No substantial work was carried out on it.
Approximately 1 200 m west of the original occurrence is showing `D¿. This area was formerly staked as the Gem claims and is the site of Yukon Revenue¿s 1977 drilling program. Expatriate reported sulphide mineralization consisting of 3 cm thick bands of massive pyrite with traces of chalcopyrite, sphalerite, and galena in muscovite-chlorite±quartz schist. The company drilled two diamond drill holes to test the showing and the strongest multi-element soil anomaly in the area. The holes intersected graphitic schist containing up to 7 cm wide bands of fine grained pyrite. According to Becker (1998), both holes returned several samples which exceeded the 1% detection limit for phosphorous.
At showing `B¿, located 4.2 km west of the occurrence, the company reported pitted limonite fragments within muscovite-chlorite+/-quartz schist. Soil sampling returned anomalous values for Cu, As and Mo in this area. The company attempted to test the showing with five hand trenches but permafrost prevented them from reaching bedrock. A single drill hole was drilled to test the down dip extension of the surface mineralization however similar mineralization was not intersected.
Showing `C¿ discovered in 1995 is located approximately 5 km northwest of the occurrence location. It consists of a 10 cm thick lens of red and black manganiferous limonite-cemented breccia containing silicified graphitic phyllite fragments. The showing was trenched in 1997 and tested with a single hole. The entire hole was split and assayed but samples returned only slightly anomalous base metal values. Drilling conditions were difficult and core recovery averaged 52% across the entire hole.
Showing `I¿ is located approximately 1 km northwest of the original Minfile occurrence and consists of three sets of quartz veins within quartz-carbonate-muscovite altered metadiorite. Two drill holes were drilled to test the gold content of the veins. Both holes returned broad intervals of anomalous gold with the best intersection returning 1.0 g/t Au over 1.04 m. Other known vein style gold mineralization occurrences were given cursory examinations.
The re-evaluation of the geophysical data was undertaken to correlate geophysical anomalies to known geological units , mineralization and geological structures. The company also checked for any anomalies that might have been missed in the original evaluation of data. Soil and rock sampling confirmed results obtained in previous years.

References

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EXPATRIATE RESOURCES LTD, Apr/97. Assessment Report #093570 by A. Bergert.

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Work History

Date	Work Type	Comment
12/31/2002	Geochemistry	
12/31/2002	Geochemistry	
12/31/2002	Airborne Geophysics	Also magnetic survey. Company hired consultant to re-evaluate data from 1996 airborne survey.
12/31/1997	Drilling	Six holes, 662 m. Diamond drilling carried out by Expatriate.
12/31/1997	Geochemistry	Soil sampling carried out by Pacific Bay on Fret claims.
12/31/1996	Geology	
12/31/1996	Ground Geophysics	Also HLEM and gravity surveys.
12/31/1996	Other	
12/31/1995	Geology	
12/31/1995	Geochemistry	
12/31/1995	Other	
12/31/1994	Geology	
12/31/1994	Geochemistry	
12/31/1994	Ground Geophysics	Also HLEM and gravity surveys.
12/31/1977	Drilling	Four holes, 400 m.
12/31/1977	Geology	
12/31/1977	Geochemistry	
12/31/1976	Geology	
12/31/1976	Geochemistry	
12/31/1966	Geochemistry	
12/13/1994	Airborne Geophysics	Also magnetic survey. Regional survey.

Assessment Reports that overlap occurrence

Report Number	Year	Title	Worktypes	Holes Drilled	Meters Drilled
094384	2002	Geological, Geochemical and Prospecting Report Undertaken on the Play and Ref Properties	Soil - Geochemistry, Bedrock Mapping - Geology, Prospecting - Other		
094300	2002	2002 Geophysical Report for the Play and Ref Claims in the Watson lake Mining District Yukon Territory, Canada	Data Compilation - Pre-existing Data, Process/Interpret - Pre-existing Data		
093845	1997	Geological and Geochemical Report on the Fret Property Fret 1-51 Claims	Soil - Geochemistry, Bedrock Mapping - Geology		
093785	1997	Assessment Report Describing Geological Mapping, Prospecting, Soil Geochemistry, Hand Trenching and Diamond Drilling	Diamond - Drilling, Soil - Geochemistry, Bedrock Mapping - Geology, Prospecting - Other, Hand - Trenching	6	662
093570	1996	Assessment Report Describing Geochemical, Geophysical and Claim Surveys on the Power Play Property	Electromagnetic - Airborne Geophysics, Magnetic - Airborne Geophysics, Soil - Geochemistry, EM - Ground Geophysics, Magnetics - Ground Geophysics		
093655	1996	Report on a Combined Helicopter-Borne Electromagnetic and Magnetic Survey, Goal Net, Hat Trick, League, Offside, Power Play, Shutout and Slapshot Properties	Electromagnetic - Airborne Geophysics, Magnetic - Airborne Geophysics		
093488	1995	Assessment Report Describing Prospecting and Geochemical Surveys on the Play Property	Rock - Geochemistry, Soil - Geochemistry, Bedrock Mapping - Geology, Prospecting - Other		
093345	1994	1994 Assessment Report Fret and Dot Properties Soil Geochemistry, Geological Mapping, Linecutting and Ground Geophysics (HLEM, Mag and Gravity)	Rock - Geochemistry, Soil - Geochemistry, Bedrock Mapping - Geology, EM - Ground Geophysics, Gravity Survey - Ground Geophysics, Magnetics - Ground Geophysics, Line Cutting - Other		

Related References

Number	Title	Page(s)	Reference Type	Document Type
ARMC008919	Sketch map of Kay Nos. 1-6 M.C.'s - Watson Lake M.D		Property File Collection	Geoscience Map (General)
ARMC016585	Geochemical map - 105G/13 - Weasel Lake		Property File Collection	Geochemical Map
ARMC016595	Geochemical results map - 105G/13 - Weasel Lake		Property File Collection	Geochemical Map
ARMC016593	Geochemical sample stations map - 105G/13 - Weasel Lake		Property File Collection	Geochemical Map
ARMC016594	Geology map - 105G/13 - Weasel Lake		Property File Collection	Geoscience Map (Geological - Bedrock)

ARMC018656	Field map of 105G/13 and 105G/14 with notations		Property File Collection	Geoscience Map (General)
ARMC014112	Field sheet - 105G/14 - Slate Rapids showing geochem locations and results		Property File Collection	Geochemical Map
ARMC014117	Field sheet of Slate Rapids showing geochemistry overlay on geology		Property File Collection	Geochemical Map
ARMC014113	Field sheet of Slate Rapids with field notations		Property File Collection	Geochemical Map