



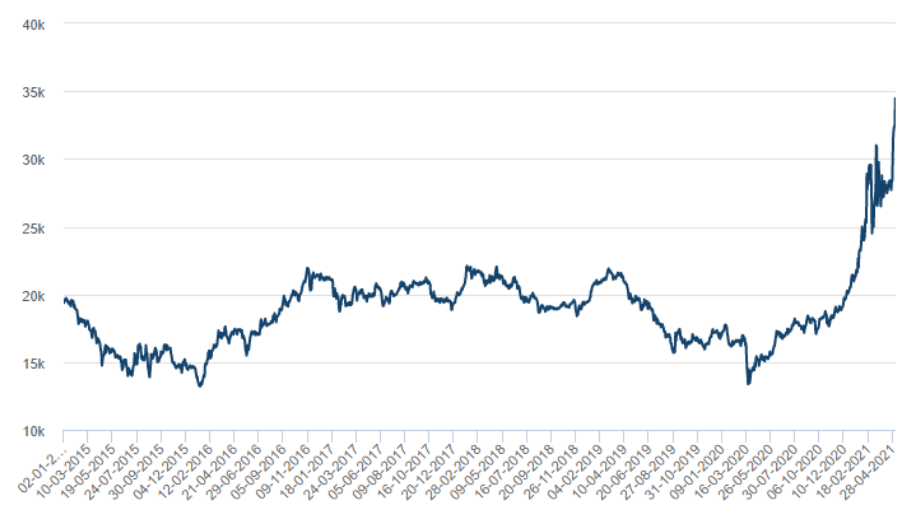
Initial Exploration Target for Alluvial Placer Hosted Tin Defined at the Manono Lithium and Tin Project

Highlights

- An initial Exploration Target for placer tin demonstrates the significant potential for a possible standalone alluvial tin mining operation at Manono
- All prospects remain open and under-explored with considerable potential for discovering additional deeper tin bearing palaeochannels
- Additional laterite hosted tin deposits identified for further work
- Potential to convert some, or all of, the Exploration Target into a JORC 2012 compliant Mineral Resource Estimate with a combination of geophysical investigations, validation drilling and bulk sampling to commence during the dry season
- Confirmation that the historical tin mine at Manono produced approximately 180,000 tonnes of tin over a 60 year mine life worth over US\$5.4 billion at today's tin price*
- A significant recent rise in global tin prices to over US\$30,000 per tonne* representing an increase in price of >50% from the start of 2021 and supports the Company's plans to evaluate the possibility of developing and adding value from the alluvial tin potential at Manono

* Data valid as at the 14th May 2021. LME Tin Official Prices, US\$ Per Tonne

LME TIN HISTORICAL PRICE GRAPH



AVZ Minerals Limited

Level 2, 8 Colin Street
West Perth, WA 6005
Australia

T: + 61 8 6117 9397

F: + 61 8 6118 2106

E: admin@avzminerals.com.au

W: www.avzminerals.com.au

ABN 81 125 176 703

Directors

Non-Executive Chairman: John Clarke

Managing Director: Nigel Ferguson

Technical Director: Graeme Johnston

Non-Executive Director: Rhett Brans

Non-Executive Director: Peter Huljich

Market Cap

\$465M

ASX Code: AVZ

For personal use only

AVZ Minerals Limited (ASX: AVZ, “the Company” or “AVZ”) is pleased to announce its initial Exploration Target defining the potential for alluvial hosted tin resources at its Manono Project. This statement is based on an independent review of historical exploration records produced by Zairetain, the previous operators of the historical mining operations at the Manono Lithium and Tin Project (“Manono Project”) in the Democratic Republic of Congo.

The review was conducted by independent geological and mining consultants, Behre Dolbear International Limited (Behre Dolbear), based in the United Kingdom.

The Exploration Target shown below, is in addition to the existing JORC 2012 compliant hard rock tin and tantalum Mineral Resource Estimates (MRE) of **125 million tonnes @ 175ppm Sn and 26ppm Ta (low grade tin domain) and 275 million tonnes @ 962ppm Sn and 38ppm Ta (high grade tin domain) at a 0.5% Li₂O cut off** published in the 21st April 2020 DFS study and which is excluded from these new figures.

AVZ’s Managing Director, Mr Nigel Ferguson, said: “We have been aware that historical exploration work had been conducted on the extensive alluvial tin resources to the north of the main hard rock pegmatite orebodies in the latter years of the historical mine’s operation by the previous mine operator, Zairetain. The obvious first step in determining the success or otherwise of this work was to conduct a full review of all available information. Subsequently, we contracted Behre Dolbear in the UK to carry out this study due to their previous geological investigations in this area and I am pleased to present their results here.”

“There is compelling evidence to suggest that significant alluvial tin placer resources exist in the floodplains along the banks of the current and palaeodrainages of the Likushi River. With a strengthening tin price this could represent a significant geological resource worth pursuing (Table 1 below).”

“Zairetain also exploited and evaluated the potential of laterite hosted eluvial tin deposits in the Kitotolo Sector. Presently, there is insufficient confidence in the data to determine an Exploration Target, but research investigation has provided sufficient information to guide future exploration programs targeting these styles of mineralisation.”

“Table 1 below gives an indication of the possible scale of the Exploration Target in the Likushi Flats which has the potential to provide further cashflow to the project, if future exploration defines a Mineral Resource Estimate worthy of a mining feasibility study and future mining operations.”

Table 1. Placer tin exploration target volume and grade ranges

Likushi Flats Exploration Target Statement	
Cubic metres contained cassiterite:	25Mm ³ - 75Mm ³
Diluted* Grade Range (g/m ³):	75g/m ³ - 180g/m ³

* If all overburden on top of mineralised gravels is processed rather than stockpiled

The potential quantity and grade of the exploration target is conceptual in nature and there has been insufficient additional exploration to determine a Mineral Resource Estimate as at the date of this announcement and whilst additional exploration is planned, it is uncertain if this will result in the generation of a Mineral Resource Estimate.

EXPLORATION TARGET

INTRODUCTION

Since discovery of cassiterite at Manono in 1910, a significant amount of eluvial, weathered pegmatite and laterite hosted cassiterite has been produced from Manono. However, depletion of eluvial and soft pegmatite resources; falling grades; and dropping global Sn prices, saw all production from Manono cease by 1983.

Between 1939 and 1943, Zairetain (operators of the Manono Operation), completed detailed exploration evaluating the alluvial and laterite hosted cassiterite potential of areas proximal to Manono and along the Likushi River alluvial plain. Work completed by Zairetain comprised in house as well as independent studies that resulted in the definition of several alluvial and laterite cassiterite blocks/mineral inventories.

To date no modern or systematic exploration or evaluation has been completed to test or validate Zairetain's existing and previously identified laterite and alluvial hosted cassiterite inventories.

Behre Dolbear provided an independent summary and review of all work completed by Zairetain and an opinion on the project's potential to host cassiterite and coltan mineralisation, with recommendations on appropriate exploration programmes required to possibly define a Mineral Resource Estimate. Accordingly, this report has been prepared using the guidelines as set out in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resource and Ore Reserves (the "JORC Code").

SUMMARY

Behre Dolbear have sourced, reviewed, and compiled as much of the available (and relevant) Zairetain data as possible. The outcomes of this review (as detailed in this report) show that there is sufficient evidence to support both the lateritic eluvial and Likushi alluvial areas (as defined by Zairetain) to host near surface cassiterite mineralisation. Pitting and drilling completed by Zairetain has defined a series of contiguous shallow (<20m from surface) mineralized basal gravel zones throughout the Likushi Alluvial Plain, that are blanketed by recent overburden that is devoid of mineralisation.

Although the Zairetain dataset in terms of quality and detail was lacking in certain areas (e.g. lack of pitting/drilling data over Lateritic eluvial material); the history of production, geological setting and level of detail in terms of location of pitting/drillholes and supporting detail (overburden & gravel thicknesses, depth to bedrock, concentrate grades) over Likushi alluvial Blocks F1, F2, F4 and F5 were considered sufficient to support definition of an Exploration Target over the project (Figure 1). The following were taken into consideration:

- That Manono was a consistent producer of cassiterite for over 60 years, producing over 180,000t cassiterite being primarily sourced from eluvial, lateritic and hard rock pegmatite sources. Significant additional hard rock tin (and Lithium) Mineral Resources have been defined by AVZ to date.
- Apart from Zairetain providing coltan grades on a per block basis, insufficient information relating to coltan distribution in both lateritic and alluvial inventories could be sourced. Accordingly, coltan is excluded from the Exploration Target.
- The lateritic eluvial inventories located along and to the immediate north of the Manono Sector pegmatites appear to be obscured/covered by workings/dumps and do not appear to be laterally extensive. They therefore do not represent suitable targets and are therefore excluded from the Exploration Target.
- The remaining lateritic eluvials located immediately north (and up to 1km) from the Kitotolo Sector pegmatites represent an obvious target to host near surface cassiterite mineralisation. However, the lack of detailed drilling/pitting/cassiterite grade data and apparent hardness of the mineralized material reduces its amenability to low impact and cost mining and processing. Accordingly, the lateritic eluvial inventories are excluded from the Exploration Target, but further validation and test work is recommended once hard rock mining and processing capacity is available at Manono.
- Although Zairetain's Block F5's inventories estimates are based on no actual/available data, the Block's location and geological setting with respect to Blocks F4 and F1 strongly support that similar style and tenor of cassiterite mineralisation should be present.

- Insufficient data was available to support Zairetain's Block F3 cassiterite inventories, so has accordingly been excluded from the Exploration Target.
- Independent study by OCP Alluvials in 1982 confirming the potential for the Likushi Alluvial project (Blocks F1 and F5) to be exploited using a dredging system with recommendations to progress the project to Feasibility Study level.
- Overburden and gravel thicknesses vary between 3m and 6m and 3m and 5m respectively, and these ranges were used to define the Exploration Target.
- Gravel cassiterite concentrate grades ranged from 170 to 470g/m³, and these were used to define the Exploration Target.
- An area of 14km² defined by Blocks F1, F2, F4 and F5 was used to define the Exploration Target area.

EXPLORATION TARGET STATEMENT

Taking the above considerations into account, and based on work completed to date, Behre Dolbear has defined an Exploration Target over the Likushi Alluvial Plain area of **25Mm³ – 75Mm³ grading (diluted) 75g/m³ – 180g/m³ cassiterite concentrate**. The Exploration Target covers an area of ~14km² and has been defined by Blocks F1, F2, F4 and F5 (Figure 10).

Note: That the potential quantity (volume) and grade (cassiterite concentrate grade) of the Exploration Target is conceptual in nature and the Exploration Target should be assessed in conjunction with the supporting information in this report and in Appendix 1. There has been insufficient exploration to estimate a Mineral Resource and it is uncertain if further exploration will result in the estimation of a Mineral Resource.

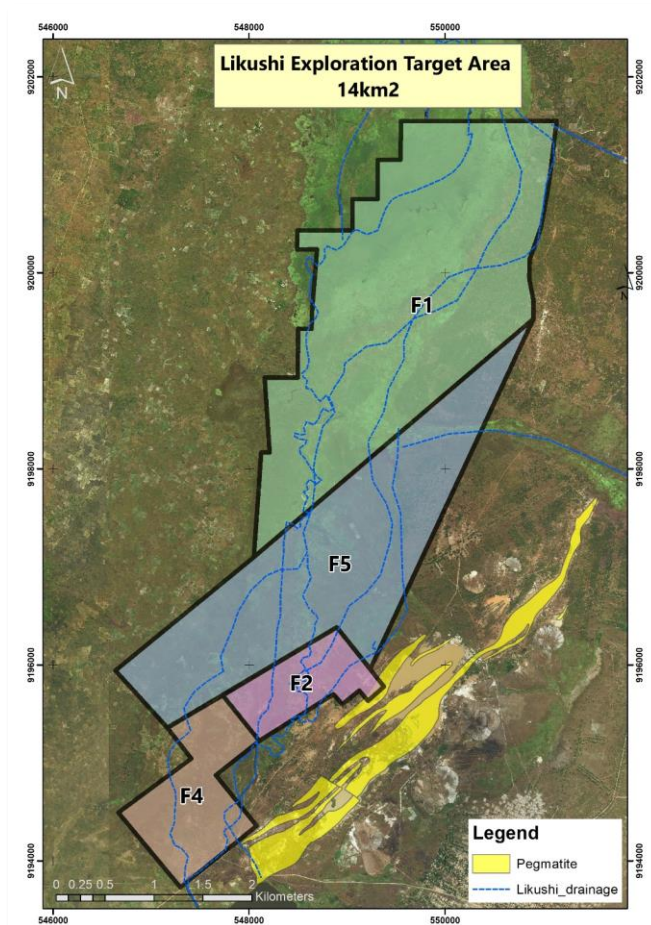


Figure 1. Likushi Alluvial Plain Exploration Target

SOURCES OF INFORMATION AND REPORTING UNITS

Documentation of Zairetain's historical work is housed in the archives at the Royal Museum for Central Africa in Tervuren, near Brussels in Belgium. Behre Dolbear visited the Royal Museum in 2011, where Zairetain's various reports and maps were sourced and copied. All documentation was in French with all available maps and reports being individually photographed. The data comprises ~ 2000 images totalling 7.6Gb.

Key tables and texts were extracted and translated with relevant maps and plans being located through georeferencing and incorporated into 2D and 3D software platforms. AVZ also provided relevant licence/tenement details as well as regional and project geology and recently acquired topographical data.

All grades reported by Zairetain (and in this report) were expressed as grams of cassiterite concentrate per cubic meter (g/m^3).

EXPLORATION AND PRODUCTION HISTORY

Alluvial cassiterite was first discovered in Manono in 1910 along the east bank of the Likushi River and this was followed by systematic prospecting until 1920. This work defined the Manono Mining Area and Géomines, the original developer, was granted a mining licence with production of cassiterite commencing in 1919. The weathered pegmatites were discovered in 1925 during an exploration programme originally focusing on the overlying and proximal eluvial cassiterite deposits. During the period 1936 – 1942, Zairetain completed extensive exploration through pitting and drilling of the laterite and alluvial (Likushi Flat) cassiterite bearing zones, however apart from some production from lateritic material, the alluvial material was never exploited.

Exploitation of the eluvial and colluvial cassiterite near to and above the source pegmatites as well as exploration efforts continued periodically until 1960, resulting in deepening of existing excavations and new drilling activity at Roche Dure. Between 1948 and 1949 a study of the hard-rock pegmatite was initiated. Forty-two vertical drill holes, totalling 2,200m were completed at Roche Dure. Based on the results of this drilling, a hard-rock open pit tin mine operated between 1951 to 1956. Apart from minor exploration work carried out on the old mine dumps, aimed at determining remnant cassiterite and spodumene grades, little prospecting took place after 1960 until 1980. Work completed by AVZ since 2017 has focused on developing the hard rock or pegmatite hosted lithium, tin, and tantalum mineral resources of the Kitotolo-Manono pegmatites.

During the period 1919 and 1980, Manono produced an estimated 180,000t of cassiterite from 100Mm^3 of eluvial, lateritic and weathered pegmatite material, containing an average grade of $1,850\text{g}/\text{m}^3$ cassiterite. Production peaked following demand during WW2 and until 1955. However, following political instability, reduction in easy extractable (eluvial and soft weathered pegmatite) material and drop in global tin prices, production fell sharply until the mine and operation's closure in 1983 (Figure 2).

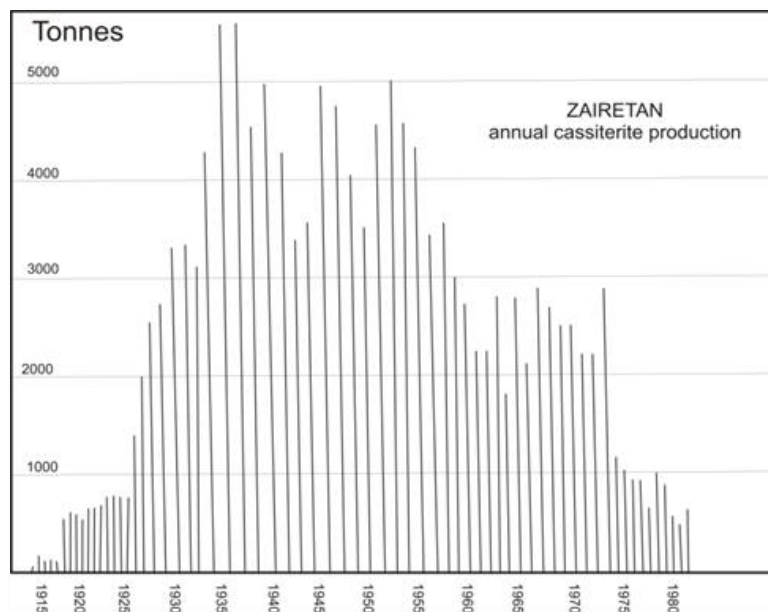


Figure 2. Manono historical cassiterite production (Source: Zairetain Reports)

PROJECT GEOLOGY

The Manono project lies within the Mid-Proterozoic Kibaran Belt - an intracratonic domain that stretches for over 1,000km through Katanga and into southwest Uganda. The belt has a predominantly SW-NE strike and is truncated by the N-S to NNW-SSE trending Western (African) Rift system. The Kibaran Belt is comprised of a sedimentary and volcanic sequence that has been folded, metamorphosed and intruded by at least three separate phases of granite intrusions. The latest granite phase (900 to 950Ma) is assigned to the Katangan cycle and is associated with widespread vein and pegmatite mineralisation containing tin, tungsten, tantalum, niobium, lithium and beryllium.

Pegmatites of this type – Lithium-Caesium-Tantalum (“LCT” type) occur as clusters and are widespread throughout the Kibaran Belt. In the DRC, the Katanga Tin Belt stretches over 500km from near Kolwezi in the southwest to Kalemie in the northeast comprising of numerous occurrences and deposits of which the Manono - Kitotolo deposit is the largest. The Manono Project pegmatites are hosted by a series of mica schists and by amphibolite in some locations. The pegmatites, with a combined strike length of some 13km are exposed in two main sectors: Manono Sector in the northeast, and the Kitotolo Sector in the southwest (Figure 3).

The region has undergone intensive tropical weathering resulting in the development of deep and irregular saprolite profiles of up to 80m. This includes the development of an upper 5 – 10m thick, variably lateritised, profile that is cassiterite (and coltan) bearing. These eluvial placers are developed along the northern margins of the Kitotolo pegmatite and were the focus of historical (and current small scale) mining by Zairetain.

The Likushi River forms a natural boundary between the (south-westerly) Kitotolo and (north-easterly) Manono pegmatites, where the Likushi Dam was established to provide process water for historical operations. The alluvial plain extends for at least 15km to the north with the Likushi River being constrained to a relatively well-defined NNE - SSW trending linear channel up to 2.5km wide. Since discovery of alluvial cassiterite here in 1910, the Likushi alluvial flats represents an obvious target to host alluvial placer style heavy mineral/cassiterite mineralisation. Work completed by Zairetain defined several cassiterite bearing gravels located along an area of 10km x 1.5km downstream of the Likushi Dam.

Work completed by Zairetain suggest that the Likushi River’s course has been structurally controlled and has possibly (in part) captured an older/palaeo south westerly flowing drainage, resulting in possible reworking, and upgrading of cassiterite bearing gravels defined within the Likushi Alluvial flat. In addition, this would suggest that there may be potential for additional alluvial resources over areas to the NW of Kitotolo and west of the Likushi River.

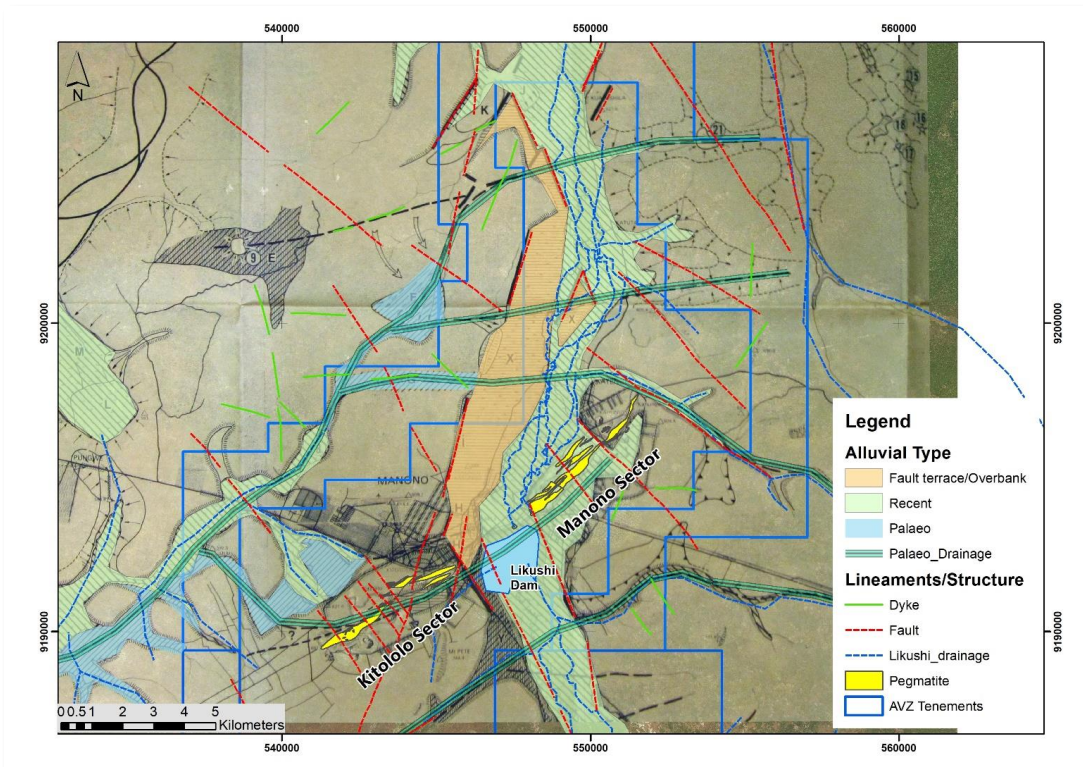


Figure 3. Geological and alluvial setting of the Likushi River and Alluvial Plain (Source Zairetain Records)

LIKUSHI ALLUVIAL CASSITERITE AND COLTAN INVENTORY

Following a detailed pitting and drilling programme that included some minor trenching, Zairetain defined “Proven, Probable and Sub Economic” cassiterite and coltan inventories totalling some 125Mm³ of material covering an area of approximately 17km² over the Likushi Alluvial Plain (Table 2 & Figure 4). The area was defined by five separate inventory blocks, each being classified according to proximity to the existing mining operations as well as confidence in the distribution and tenor of cassiterite mineralisation. Overall (diluted) grades of less than 125g/m³ cassiterite concentrate were considered “Sub Economic” by Zairetain.

The most detailed work was carried out over Blocks F2 and F4 that were proximal or closest to the “source” of cassiterite, where drilling was carried out on a 100m x 25m grid. The remainder of the blocks (F1, F3, F5) were covered by 100m – 800m spaced lines with 50m - 100m drilling/pitting spacing. In most cases, cassiterite mineralisation was located within a shallow (<20m depth from surface) relatively well-defined basal gravel horizon that was covered by an overburden comprising a sandy/clay rich unit that was generally devoid of cassiterite.

- **Bedrock**

Although some pits were not completed to bedrock due to water ingress, most pits were dug to bedrock that was comprised primarily of mica schists and some granites.

- **Basal Gravel**

The basal gravels range in thickness from 0.5m to 8m (averaging ~4m) and show a progressive thinning to the north (more distal), with cassiterite concentrate grades dropping accordingly (Table 2). The gravels appear medium to well sorted, with a majority of the material >5mm in size with rounded pebbles up to 15cm being recorded. Most pebbles are made up of quartz and quartzite, with cassiterite recovered being relatively coarse with 80% material being +100 mesh (>150µm).

The general lack of pegmatite “source” rocks, and the well sorted nature of the gravel suggests that there must have been some reworking of this gravel unit, or that it represents some form of palaeochannel. This has important implications for targeting additional alluvial material and is discussed later in this report.

- **Overburden/Sandy Clay**

The upper overburden or sandy unit attains thicknesses of up to 7m, averaging ~4.5m over all of the declared inventory blocks (Table 2). The unit is made of a heterogenous mixture of sands, with fine gravels towards the base and increasing in clay content towards the surface. No cassiterite or coltan mineralisation was reported from this unit and it was considered devoid of mineralisation.

TABLE 2 ZAIRETAIN LIKUSHI ALLUVIAL CASSITERITE & COLTAN INVENTORY (1983)*

Likushi Flats Historical Alluvial Cassiterite & Coltan Inventory											
Block Name	Line No's	Surface Area (km ²)	Overburden		Mineralised Gravel						
			Thickness (m)	Volume (Mm ³)	Thickness (m)	Volume (Mm ³)	Grade Cassiterite Conc (g/m ³)	Contained Cassiterite (t)	Overall (diluted) Grade Cassiterite Conc (g/m ³)	Grade Coltan Conc (g/m ³)	Contained Coltan (t)
F1	7 - 18	6.81	3.04	20.7	3.93	26.7	303	8,100	171	8	214
F2	Nw - Oi	0.56	5.88	3.3	3.15	1.8	469	821	164	8	14
F3	3-Jun	3.19	2.28	7.3	2.14	6.8	114	777	55	3	20
F4	Ls - Nv	1.33	6.27	8.3	5.62	7.5	170	1,268	80	4	30
F5		5	4.5	22.5	4.4	22	350	7,700	173	9	198
Totals/Averages		16.88	4.39	62.1	3.85	64.7		18,666	129		476

* Non-JORC historical estimates (1983) by Zairetain were summarized and detailed for the Likushi Alluvial and Lateritic cassiterite inventory estimations. The historical inventories are not reported in accordance with the JORC Code and a Competent Person has not done sufficient work to classify the historical estimates as mineral resources in accordance with the JORC Code. It is uncertain that following evaluation and further exploration work that the historical estimates will be able to be reported as Mineral Resources in accordance with the JORC Code.

Zairetain plans showing drilling and pitting, as well as tables containing downhole grades and lithologies over Blocks F1, F2 and F4 were sourced and compiled. However, there is an absence of data over Blocks F5 and F3, and this information

was assumed to be lost by Zairetain. For Block F5, cassiterite concentrate grades and overburden/gravel thickness were therefore interpolated between Block F2 and F1, with the inventory being categorised as Probable by Zairetain (Figure 3 and Table 2). Zairetain defined two high confidence inventory blocks or “Proven” blocks, being Block F1 and F2, representing approximately 50% of the total stated inventory, and further details regarding these are provided below:

1. BLOCK F1

Block F1 was evaluated by 249 pits completed at 50m spacing along 12 (7 – 18) lines at an initial 800m spacing, however line spacing was reduced to 100m in places as part of a presumed infill programme (Figure 4 and Figure 5). Note that only cassiterite grade information was provided at this level of data, with coltan grades only being provided on summary statements (Table 3). The results show that both the overburden and mineralised gravel show relatively consistent average thicknesses of ~3m and 4m respectively. However, several deeper (palaeo?) channels were observed reaching 8m in thickness (Line 10). Cassiterite concentrate grades remain relatively constant throughout the gravel, averaging 303g/m³. Including dilution from overburden, total volumes of ~47.4 Mm³ of material (overburden plus mineralised gravels combined) with an overall diluted cassiterite concentrate grade of 171g/m³ was determined by Zairetain.

Gravel thickness plus individual cassiterite concentrate grade data was used to generate grade x thickness plots for each of the lines defining Block F1. Results of this exercise show a gradual drop in gravel thickness and grades to the north whilst a ~ 2.5km high grade N-S trending zone appears to trend N-S and potentially open to the N. A section drawn across Line 10 shows the discrete channelised nature of the gravel, with a deeper up to 8m, (western margin not defined) incised channel at the extreme western end (Figure 6).

It is apparent that not all of Zairetain’s lines were extended to test the entire width of the plain, however it is assumed that the presence of the active Likushi channel and associated swamp/marshes would have prevented access in many places, Line 10 included (Figure 4, 5 and 6).

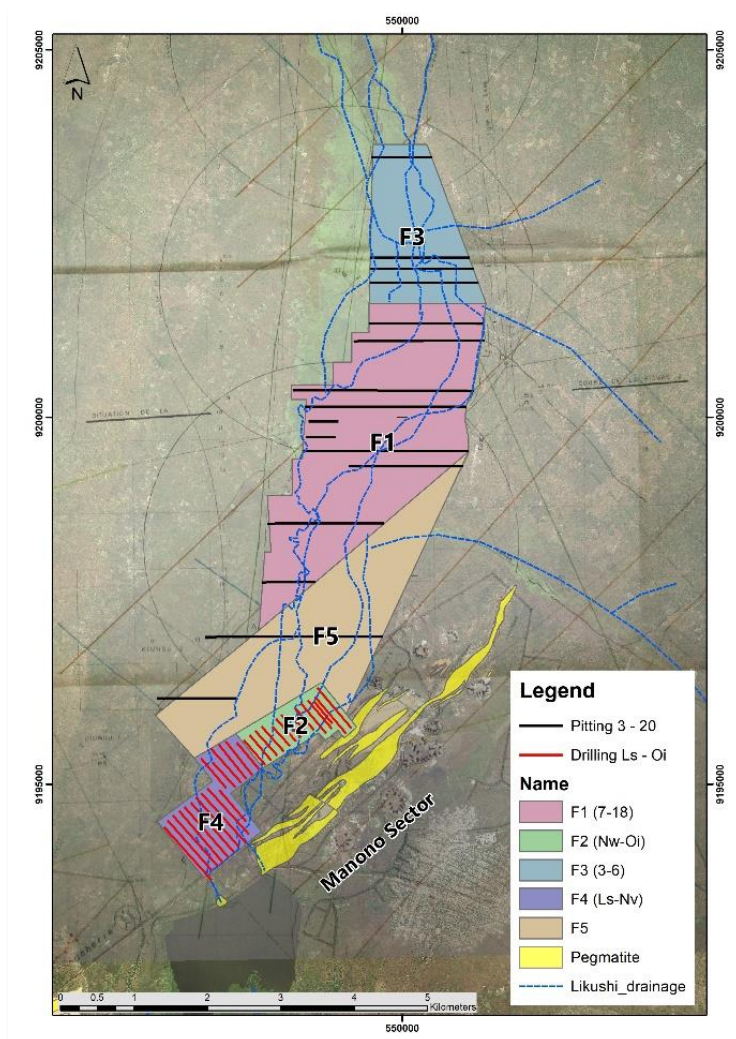


Figure 4. Likushi Alluvial Inventory Blocks, showing pitting and drilling lines

TABLE 3

BLOCK F1 ZAIRETAIN PITTING DETAILS AND INVENTORY DETERMINATIONS (1983)*

BLOCK F1 - Summarised Pitting Results										
Line	Line Length (m)	No of pits	Area of influence (m ²)	Overburden		Mineralised Gravel				Overall (diluted) Grade
				Thickness (m)	Volume (m ³)	Thickness (m)	Volume (m ³)	Grade Concentrate (g/m ³)	Contained Cassiterite (t)	Grade Concentrate (g/m ³)
7	1,600	39	560,000	2.86	1,601,600	2.76	1,545,600	213	329	105
8	1,800	42	810,000	2.99	2,421,900	2.50	2,025,000	249	504	113
9	2,400	50	1,080,000	3.13	3,380,400	2.80	3,024,000	243	735	115
10	1,800	38	810,000	3.13	2,535,300	1.99	1,611,900	285	459	111
10a	500	10	100,000	3.27	327,000	7.15	715,000	245	175	168
11	400	8	80,000	3.31	264,800	7.64	611,200	275	168	192
12	400	8	80,000	3.14	251,200	5.76	460,800	338	156	219
13	500	10	100,000	3.10	310,000	5.72	572,000	224	128	145
14	500	1	10,000	3.20	32,000	3.50	35,000	500	18	261
15	1,400	14	1,120,000	3.04	3,404,800	5.98	6,697,600	293	1962	194
16	800	8	640,000	2.95	1,888,000	5.39	3,449,600	400	1380	259
17	1,650	11	742,500	3.09	2,294,325	4.28	3,177,900	323	1026	188
18	1,500	10	675,000	2.90	1,957,500	4.14	2,794,500	378	1056	222
TOTALS/AVERAGE		249	6,807,500	3.04	20,668,825	3.93	26,720,100	303	8,097	171

* Non-JORC historical estimates (1983) by Zairetain were summarized and detailed for the Likushi Alluvial and lateritic cassiterite inventory estimations. The historical inventories are not reported in accordance with the JORC Code and a Competent Person has not done sufficient work to classify the historical estimates as mineral resources in accordance with the JORC Code. It is uncertain that following evaluation and further exploration work that the historical estimates will be able to be reported as Mineral Resources in accordance with the JORC Code.

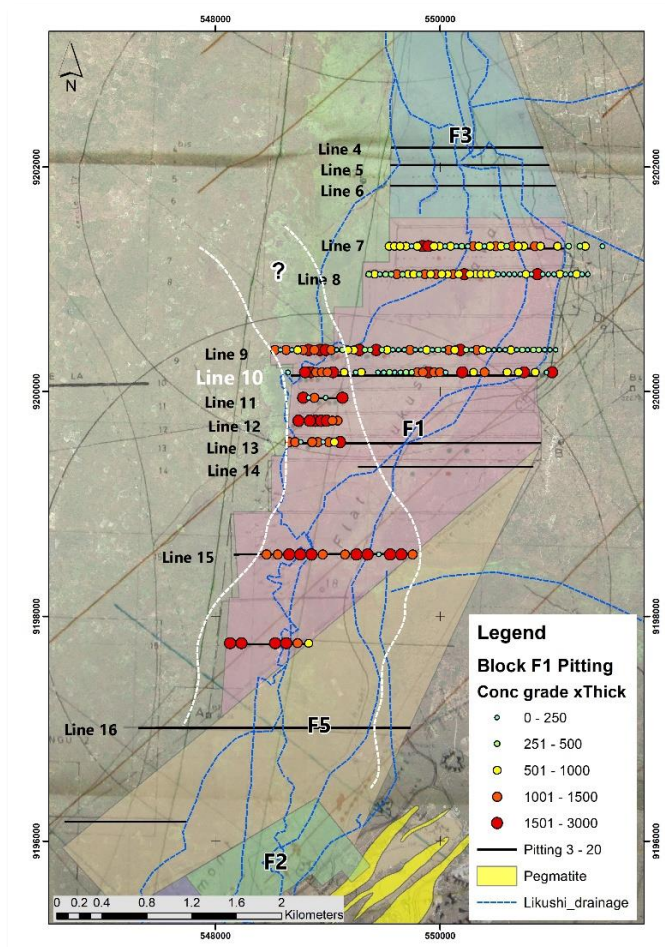


Figure 5. Block 1 Cassiterite concentrate grade / Gravel thickness plot

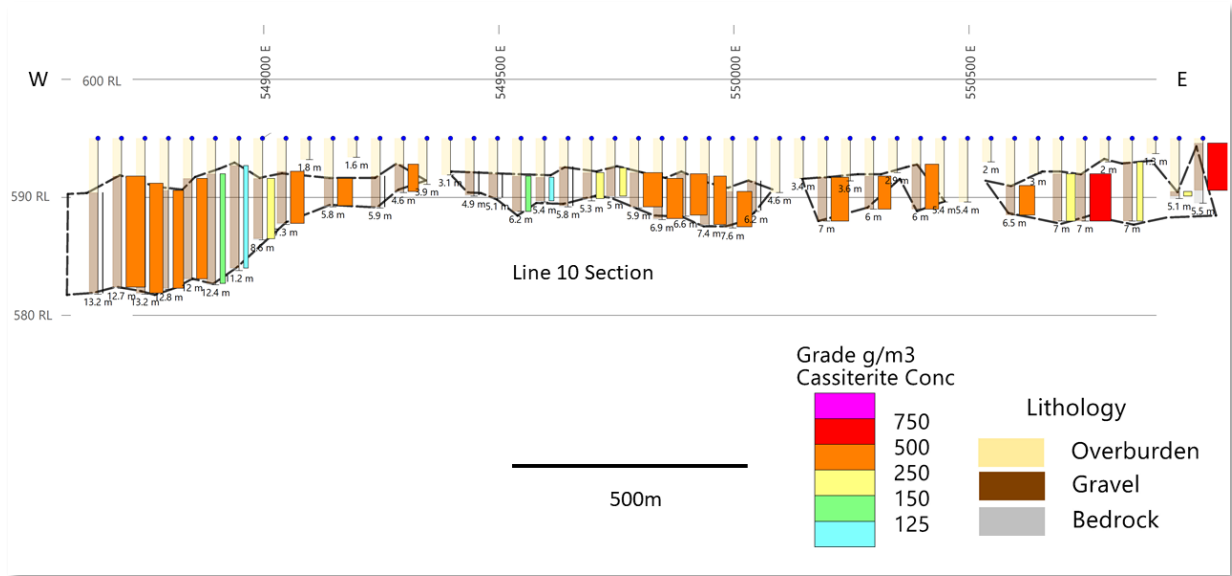


Figure 6. Line 10 Section

2. BLOCKS F2 AND F4

Zairetain completed detailed drilling on a NW-SE orientated grid with 100m x 25m spacing over a continuous zone covering a strike length of 2.9km and area of 2km². The drilling area comprises both Blocks F2 and F4 that were divided into two by Zairetain based on their average grade profiles (Zairetain using a 125 g/m³ as a cut off). The drilling method was unknown. Zairetain plans provided individual drillhole locations with gravel thickness and cassiterite grade information only, with the base of gravels being assumed to be close to or near bedrock. It is important to note the location of several sub cropping and outcropping pegmatites where Zairetain completed some trenching to determine their lateral extents (Figure 7).

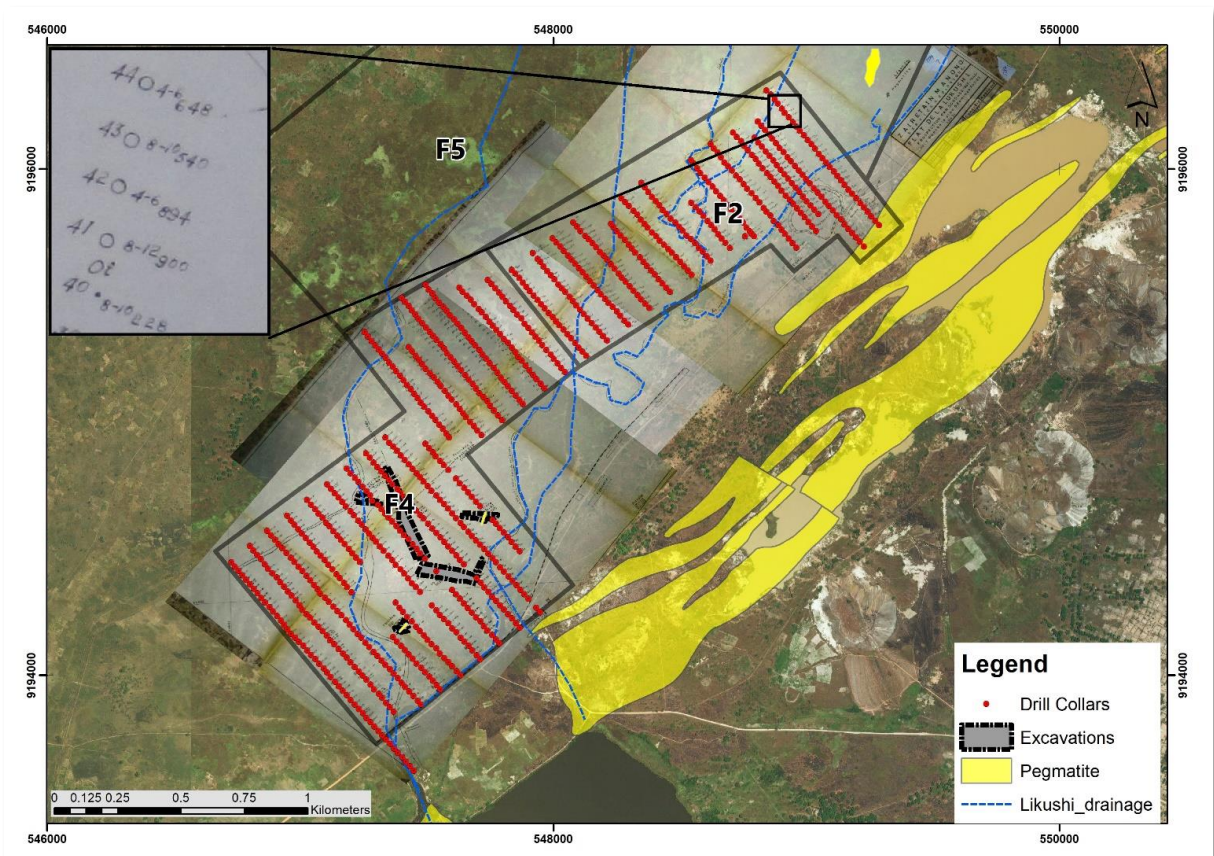


Figure 7. Drilling completed over Blocks F2 & F4, with inset showing drilling information captured.

Average overburden and gravel thicknesses over Block F2 and Block F4 averaged ~ 5m and ~4m and gravel grades averaged 469g/m³ and 170g/m³ respectively. Zairetain defined Block F2 as “Proven” declaring a total volume of 5.1Mm³ of material at an overall (diluted) grade of 164g/m³ cassiterite concentrate.

Grade intervals were contoured, and a grade x thickness plot was generated. This shows a relatively well defined, consistent, sinuous mineralized gravel zone containing a well-defined thicker, low grade zone to the west (Figure 7). The high grades encountered along the eastern parts of Block F2 may well be attributable to material shedding off the Manono Sector pegmatites and dumps located immediately to the east. Drilling has clearly not closed off the extent of the gravel distribution/mineralisation to the north and north east (Block F5) (Figure 8).

3. BLOCKS F3 AND F5

Block F3 is located at the northern most and distal part of the Zairetain Cassiterite blocks, and the grades as well as gravel thicknesses reflect this (average gravel thickness and grades of 2.1m and 114 g/m³ respectively). Accordingly, Zairetain declared Block F3 as “Sub economic”. Block F5 as mentioned previously appears to either had no work carried out over it, or that any results generated have since been lost. Based on the open-ended trends seen on both adjoining blocks to the north (F1) and south (F2), it must be assumed that similar style of gravel hosted mineralisation and associated overburden development must exist throughout most parts of Block F5. Zairetain declared Block F5 Inventories as “Probable”, and interpolated grades and thicknesses generated from Block F4 and F2, resulting an estimated total volume of 44.5Mm³ grading with an overall (diluted grade) of 173 g/m³ cassiterite concentrate.

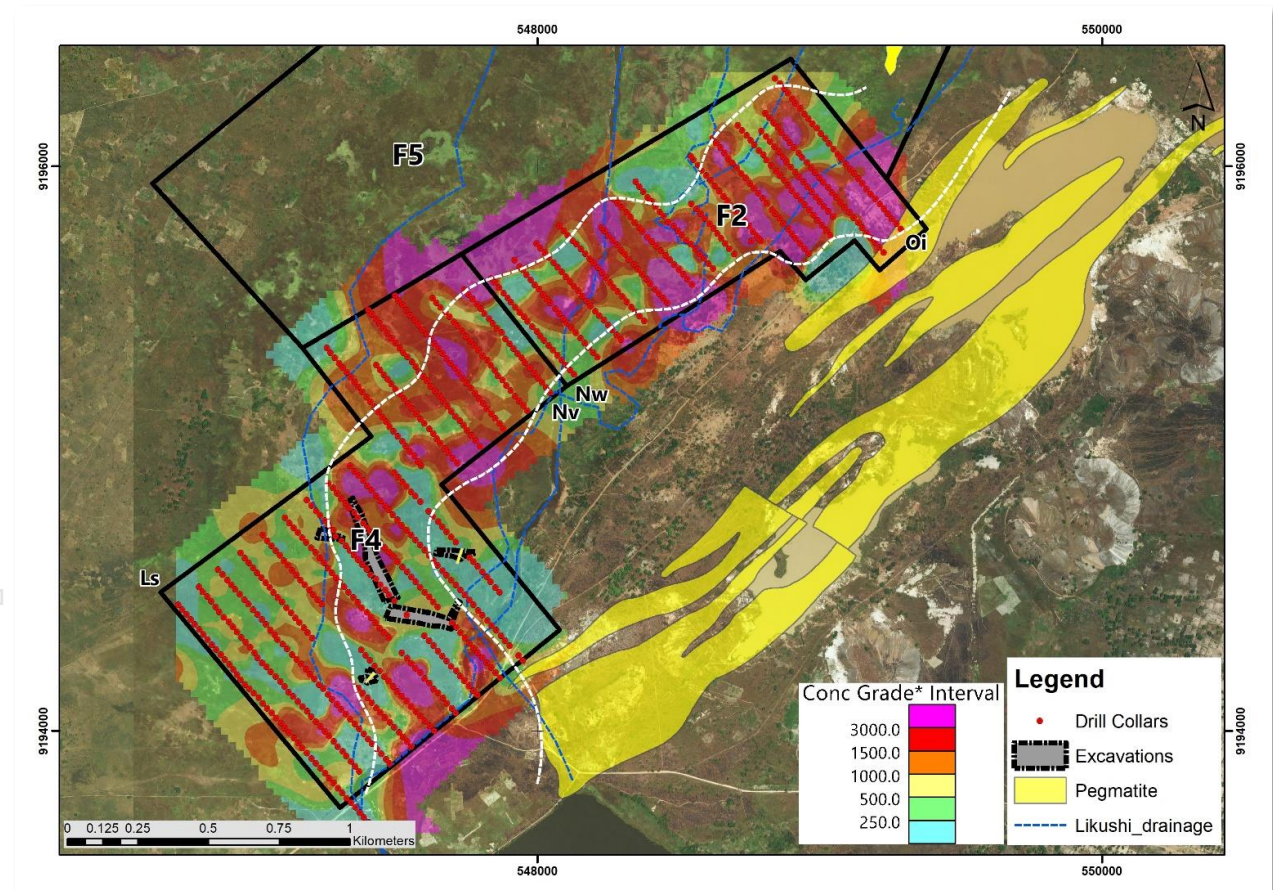


Figure 8. Block F2 and F4 grade x thickness contour plot

OCP ALLUVIAL SERVICES STUDY, 1982

In 1982 Zaïretain / Geomines commissioned OCP Alluvial Services (OCP) to review all available data and assess the potential for extracting cassiterite from the Likushi Alluvial Plain using a bucket/dredge system. OCP reviewed all the available data and confirmed that the project was economically viable. Key findings of the study were:

- A mineral inventory comprising 87Mm³ (Block F1 and F5) of alluvium containing 17,000t cassiterite at a diluted grade of 200g/m³*

*** Non-JORC historical estimates (1982) by OCP were summarized and detailed for the Likushi Alluvial Block F1 and F5 estimations. The historical inventories are not reported in accordance with the JORC Code and a Competent Person has not done sufficient work to classify the historical estimates as mineral resources in accordance with the JORC Code. It is uncertain that following evaluation and further exploration work that the historical estimates will be able to be reported as Mineral Resources in accordance with the JORC Code.**

- The Likushi Flat is amenable to exploitation by a bucket ladder dredge, with onboard gravity plant capable of producing a +50% cassiterite concentrate
- Optimum dredge capacity estimated at 4Mm³/year with initial annual production estimated at 1000t cassiterite/year for a Life of Mine of 15 – 20 years
- Capital Cost for the project estimated at US\$10 Million, with annual operating costs of US\$1.6 Million/year. Payback of capital was estimated to be 2.5 years with an IRR of 29%
- OCP recommended that the project be “vigorously” pursued and that Zaïretain / Geomines initiate a Feasibility Study

Despite the positive findings and recommendations made by OCP to Zaïretain / Geomines, it is apparent that falling global tin prices combined with a lack of investment resulted in the closure of the operation later in 1982/1983 ensuring that the alluvial potential of the project would never be realized before the mine closure.

Note: At the time of the review by OCP the tin price was trading at c.\$11,000/t

Ref: (<https://tradingeconomics.com/commodity/tin>)

ZAIRETAIN ALLUVIAL AND ELUVIAL LATERITE EVALUATION

During 1939 -1942, Zaïretain completed a detailed exploration programme focusing on evaluation of alluvial and laterite hosted cassiterite potential. Pitting was used as a primary tool for evaluation over both types of material, however drilling was introduced later in 1941 where it was used specifically to test alluvial material. Zaïretain reported all cassiterite and coltan grades as grams concentrate per cubic meter (g/m³). Details of coltan concentrate grades were not reported frequently and were only reported in Zaïretain’s summary statement inventory tables. Sample preparation methodology is not known, but sample concentrates were assumed to be generated through simple gravity concentration/panning. This method would introduce potential loss of fines, but also represents a realistic and conservative estimate of “recovered” amounts of cassiterite. The culmination of this work resulted in Zaïretain declaring “Proven, Probable and Sub Economic” alluvial and lateritic cassiterite (and coltan) inventories, whose details form the focus of the exploration target report (Figure 9).

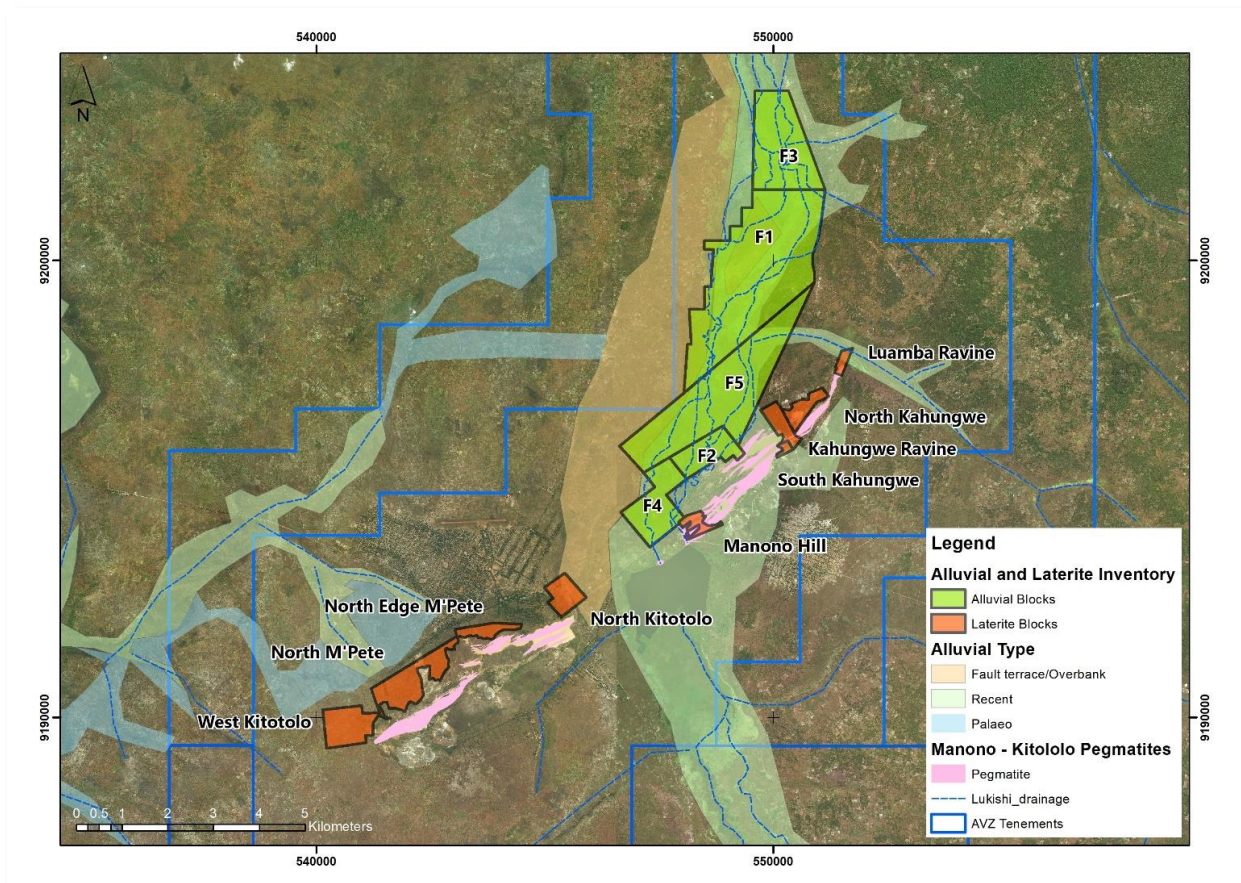


Figure 9. Zaïretain declared alluvial and laterite hosted cassiterite inventory blocks

LATERITIC ELUVIAL CASSITERITE AND COLTAN INVENTORY

A significant amount of cassiterite was recovered from extensive shallow lateritic material that was developed immediately north of the Kitotolo Pit (now known as the T’Pete pit) where historical production achieved average grades of 1,500 g/m³. Existing pit faces are extensive and expose the mineralised lateritic eluvium material that attains thicknesses of up to 10m. Here, the lateritic eluvium extends at least 1km to the north and was investigated by Zaïretain via a detailed (25m x 100m) grid pitting and drilling programme.

Other than a detailed mineral inventory statement made by Zaïretain dated 1983 (Table 4), specific details or plans showing pitting locations, laterite thicknesses and associated cassiterite/coltan concentrate grades or lithology data over any of the laterite resource blocks could not be located.

The lateritic horizon appears better developed over the Kitotolo sector, whereas the Manono sector laterite development appears obscured by dumps/workings and appears to be not as extensively developed, probably due to impact of the NE trending Likushi drainage to the immediate north (Figure 8). Based on a report by Paspatis (1981), most of the remaining lateritic material is well cemented and indurated, suggesting that additional crushing would be required to liberate cassiterite and coltan prior to gravity separation.

TABLE 4 ZAÏRETAÏN LATERITIC ELUVIAL CASSITERITE & COLTAN INVENTORY (1983)*

Historical Lateritic Cassiterite & Coltan Inventory					
Block Name	Mineralised Laterite				
	Volume (m ³)	Grade Cassiterite Conc (g/m ³)	Contained Cassiterite (t)	Grade Coltan Conc (g/m ³)	Contained Coltan (t)
North M' Pete	8,178,000	769	6,289	39	319
North Edge M'Pete	1,400,000	464	650	21	29
North Kitotolo	4,080,000	530	2,162	27	110
West Kitotolo	7,970,000	251	2,000	13	104
Manono Hill	994,000	784	779	40	40
Kahungwe Ravine	408,000	946	386	no data	0
North Kahungwe	232,000	345	80	17	4
South Kahungwe	49,000	367	18	24	1
Luamba Ravine	1,100,000	327	360	16	18
Totals/Averages	24,411,000	531	12,724		625

* Non-JORC historical estimates (1983) by Zaïretain were summarized and detailed for the Likushi Alluvial and lateritic cassiterite inventory estimations. The historical inventories are not reported in accordance with the JORC Code and a Competent Person has not done sufficient work to classify the historical estimates as mineral resources in accordance with the JORC Code. It is uncertain that following evaluation and further exploration work that the historical estimates will be able to be reported as Mineral Resources in accordance with the JORC Code without confirmatory exploration / evaluation.

EXPLORATION POTENTIAL

In addition to the existing defined inventory blocks defined by Zaïretain, there is evidence to suggest that additional alluvial mineralisation could be discovered over areas proximal to the existing Likushi Alluvial Plain. Zaïretain geologists suggested that the current alluvial plain occupied by the Likushi River was controlled by later stage (relative to emplacement of pegmatites) brittle tectonics/faulting which resulted in deviation (from N to NE flowing) and possible capture by the Likushi of an existing south westerly flowing drainage system (Figure 10). This would have resulted in the reworking in part of preexisting alluvial/sediments by the Likushi and this theory is supported through the identification of relatively mature (well rounded) cassiterite bearing gravels that suggest either some form of reworking has occurred or that they represent an older drainage or palaeo drainage.

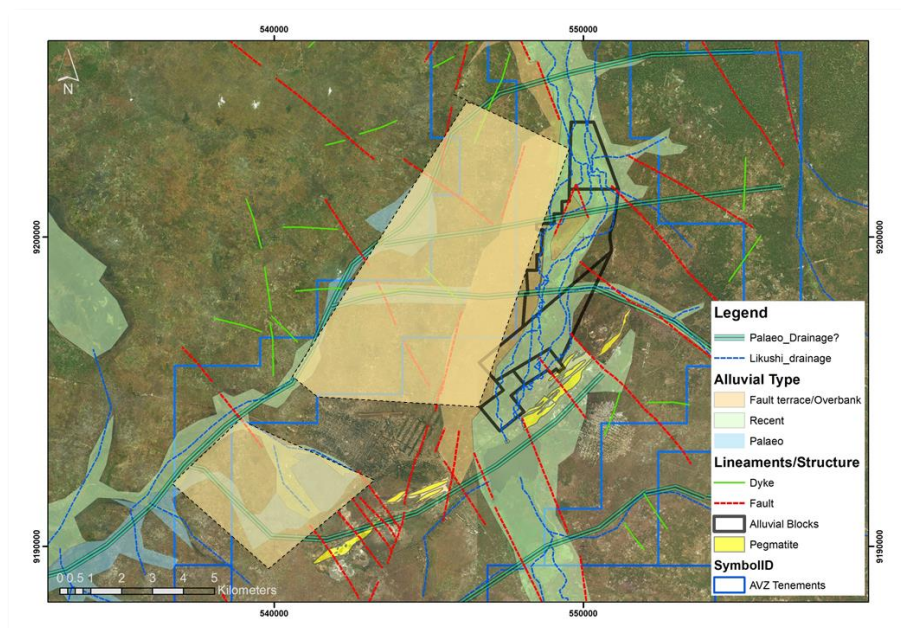


Figure 10. Exploration Potential at Manono

This implies that areas to the immediate west of the existing Likushi Alluvial Plain as well as areas to the NW of Kitotolo Sector represent potential targets to host near surface alluvial bearing material. To test this rather large potential area, it is recommended that a ground Electrical Resistivity Tomography (ERT) survey be carried out in order to define overburden thicknesses, depth to bedrock and identify potential gravel channels. The method can also be used to support and further refine the existing channel and gravel morphologies defined to date by Zairetain and indeed support the necessary validation work that is required over the project.

PROPOSED EXPLORATION PROGRAMME AND SCHEDULE

To confirm the volumes and grades defined in the Exploration Target, a validation drilling, sampling, metallurgical test work and ground geophysical (ERT or similar) programme will need to be undertaken. The positive outcome of this exercise will enable (part of) the Exploration Target area/s to be converted into a Mineral Resource Estimate, compliant with the JORC Code. This would then enable Dathcom to proceed immediately with a Preliminary Economic Assessment (PEA) or Scoping Study.

It is proposed that the work programme be carried out during the dry season to facilitate easier execution of the ground geophysical programme. Areas prone to inundation, that are mapped using ERT or similar, can then be drilled or bulk sampled at the optimal part of the dry season.

The following work programme is currently under due consideration to achieve these objectives:

DRILLING AND BULK SAMPLING

Due to the anticipated unconsolidated and wet nature of the overburden and gravels being evaluated, it is recommended that appropriate drilling (RC/Auger) or bulk sampling methods (excavator) are used to ensure suitable recoveries in order to source representative samples.

The following key variables will need to be determined as part of this work:

- Validation of thickness and nature of the lithologies defined to date by Zairetain: ie Overburden, Gravel and Bedrock
- Lateral and vertical continuity of these lithologies across the blocks defined by Zairetain to date
- Complete full analytical analyses including mineralogy over all mineralised lithologies, specifically to determine cassiterite and coltan content
- Generate heavy mineral concentrates in order to compare and validate Zairetain cassiterite concentrate grades
- Collection of representative density data over all lithologies. Generate samples for process/metallurgical test work

It is recommended that this work is initiated over Block F4 and F2 due to its anticipated higher cassiterite grade/gravel thickness profiles, inherent data density as well as proximity to infrastructure and the pegmatitic host rocks. It is recommended that validation drilling should be completed on a 250m line spacing, with drillholes/sample points at 100m spacing. This equates to ~120 holes for 1,200m (average depth estimated at 10m). This density will also extend/close off mineralisation trends identified to the north and north east.

A similar scale and density drilling validation programme can then be implemented over Blocks F1 and F5, following completion of, and being guided by, results of the ground geophysical programme. Based on the positive results and validation of this work, a JORC Compliant Mineral Resource Estimate/s can then be determined taking into consideration all Reasonable Prospects for Eventual Economic Extraction (RPEEE).

GROUND GEOPHYSICS

It is recommended that the use of ERT or similar geophysical techniques can be used to better define key variables such as overburden thicknesses and importantly depth to bedrock. Using existing channel profiles generated from Zairetain's work as a "benchmark", ERT could be used as an extremely useful tool to validate existing channels profiles as well as to better delineate channel/bedrock topography over areas with no/poor data density, such as Block F5 and new areas requiring investigation.

This release was authorised by Nigel Ferguson, Managing Director of AVZ Minerals Limited.

For further information, visit www.avzminerals.com.au or contact:

Mr. Jan de Jager or Mr. Ben Cohen
Joint Company Secretary
AVZ Minerals Limited
Phone: +61 8 6117 9397
Email: admin@avzminerals.com.au

Media Enquiries:
Mr. Peter Harris
Peter Harris & Associates
Phone: +61 (0) 412 124 833



Competent Person's Statement

The information in this document that relates to the definition of an Exploration Target over the Manono Project is based on information compiled and reviewed by Mr Mike Venter, a Fellow of the Society of Economic Geologists (SEG), a Member of the Geological Society of South Africa (GSSA) and is a registered professional with the South African Council for Natural and Scientific Professions (SACNASP). Mr Venter is an Associate Consulting Geologist with Behre Dolbear (an independent Consulting company). Mr Venter has sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity being undertaken to qualify as a Competent Person as defined in the 2012 Edition of the JORC Code. Mr Venter consents to the inclusion in this report of the matters based on this information in the form and context in which it appears.

On behalf of:

BEHRE DOLBEAR INTERNATIONAL LTD

A handwritten signature in black ink, appearing to read 'Mike Venter', is written over a light grey rectangular background.

Mike Venter (BSc.Hons), Pr.Sci.Nat., FSEG, MGSSA
Associate Consulting Geologist – Behre Dolbear

JORC TABLE 1

Section 1 Sampling Techniques and Data (Criteria in this section apply to all succeeding sections.)

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul style="list-style-type: none"> Nature and quality of sampling (e.g. cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as down hole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling. Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used. Aspects of the determination of mineralisation that are Material to the Public Report. In cases where 'industry standard' work has been done this would be relatively simple (e.g. 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (e.g. submarine nodules) may warrant disclosure of detailed information. 	<p>Zairetain's exploration work completed during the period 1939 – 1943 comprised of pitting and drilling. Pits were dug down to bedrock where possible.</p> <p>Sample preparation methodology is not known but was assumed to be generated from simple gravity concentration/panning. This method would introduce potential loss of fines, but also represents a realistic estimate of "recovered" grade of cassiterite.</p> <p>Additional sampling methods and information were not stated by Zairetain, or records could not be sourced from the archives, or were destroyed.</p>
Drilling techniques	<ul style="list-style-type: none"> Drill type (e.g. core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (e.g. core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc). 	<p>Drilling techniques were not stated by Zairetain, or records could not be sourced from the archives, or were destroyed. It is assumed that pitting was completed using manual labour.</p>
Drill sample recovery	<ul style="list-style-type: none"> Method of recording and assessing core and chip sample recoveries and results assessed. Measures taken to maximise sample recovery and ensure representative nature of the samples. Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material. 	<p>Drilling recoveries were not stated by Zairetain, or records could not be sourced from the archives, or were destroyed.</p> <p>Sample preparation methodology is not known but was assumed to be generated from simple gravity concentration/panning. This method would introduce potential loss of fines, but also represents a realistic estimate of "recovered" grade of cassiterite.</p>

Criteria	JORC Code explanation	Commentary
Logging	<ul style="list-style-type: none"> • Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies. • Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography. • The total length and percentage of the relevant intersections logged. 	<p>Zairetain's records show that all pits were logged primarily describing key lithologies, such as Overburden, Gravel and Bedrock and whether excessive water was intersected during the pitting programme. Drilling plans sourced showed the logging of gravel intersections and their cassiterite concentrate grades as well as where no or negative results were recorded. Pitting provided information on overburden and gravel thickness and nature of the bedrock.</p>
Sub-sampling techniques and sample preparation	<ul style="list-style-type: none"> • If core, whether cut or sawn and whether quarter, half or all core taken. • If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry. • For all sample types, the nature, quality and appropriateness of the sample preparation technique. • Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples. • Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling. • Whether sample sizes are appropriate to the grain size of the material being sampled. 	<p>Detailed sample preparation methods were not stated by Zairetain, or records could not be sourced from the archives, or were destroyed. Individual samples were taken for washing/panning and a heavy mineral/cassiterite concentrate produced that was then recorded against a depth/gravel interval. No QAQC methods were known to be employed at the time (1939 – 1943). With a majority of the samples being drawn from pits, it is assumed that the samples taken would have been of sufficient size to be representative.</p>
Quality of assay data and laboratory tests	<ul style="list-style-type: none"> • The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total. • For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc. • Nature of quality control procedures adopted (e.g. standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (i.e. lack of bias) and precision have been established. 	<p>Zairetain conducted no chemical/assay/laboratory tests and all grades reported are as grams cassiterite concentrate per cubic meter.</p>
Verification of sampling and assaying	<ul style="list-style-type: none"> • The verification of significant intersections by either independent or alternative company personnel. • The use of twinned holes. • Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols. • Discuss any adjustment to assay data. 	<p>Behre Dolbear has not adjusted any assay data. Historical data such as drillhole collars and pit collars were digitised off georeferenced plans. Due to the quality of plans (they were not scanned, but photographed), there may be error of up to 50m in certain areas. In the Competent Persons opinion, these errors are not considered material to definition of the Exploration Target given the area being contemplated (14km²)</p>

Criteria	JORC Code explanation	Commentary
Location of data points	<ul style="list-style-type: none"> Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation. Specification of the grid system used. Quality and adequacy of topographic control. 	<p>Zairetain historical data such as drillhole collars and pit collars were digitised off plans that had been georeferenced, using WGS84 UTM 35S. Due to the quality of plans (they were not scanned, but photographed), there may be error of up to 50m in certain areas. In the Competent Person's opinion, these errors are not considered material to definition of the Exploration Target.</p> <p>No topographic control appears to have been used by Zairetain, with most of the project area is represented by an alluvial plain that is inherently flat. However, some mapped features that still exist today have been identified using the partial DTM generated by Dathcom. It is recommended that a suitable resolution DTM be captured for future work where required.</p>
Data spacing and distribution	<ul style="list-style-type: none"> Data spacing for reporting of Exploration Results. Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied. 	<p>No Exploration Results are being reported. An Exploration Target has been defined whose definition has been guided by historical work completed by Zairetain that comprised of drilling and pitting:</p> <p>Block F2 and F4: Zairetain completed drilling on a 100m x 25m spaced NW-SE orientated lines.</p> <p>Block F1 and F3: Zairetain completed pitting on initial 200m x 50m spaced E-W lines, with some infill to 100m x 50m.</p>
Orientation of data in relation to geological structure	<ul style="list-style-type: none"> Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type. If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material. 	<p>As the target is a shallow, relatively flat lying alluvial cassiterite/heavy mineral placer, all drilling was completed vertically, terminating on bedrock.</p>
Sample security	<ul style="list-style-type: none"> The measures taken to ensure sample security. 	<p>Sample security and chain of custody were not stated by Zairetain, or records could not be sourced from the archives, or were destroyed.</p>
Audits or reviews	<ul style="list-style-type: none"> The results of any audits or reviews of sampling techniques and data. 	<p>Zairetain's documentation is supported by detailed plans and documentation that have been reviewed by the Competent Person. In addition, the alluvial cassiterite potential for the area defined in the Exploration Target (Block F1 and F5) was also subject to an independent review completed by OCP Alluvial Services Ltd in 1982, with details summarised in the full Behre Dolbear report.</p>

Section 2 Reporting of Exploration Results

(Criteria listed in the previous section also apply to this section.)

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	<ul style="list-style-type: none"> • <i>Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.</i> • <i>The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area.</i> 	<p>The Manono licence was awarded as Research Permit PR13359, issued on the 28th December 2016 to La Congolaise d'Exploitation Miniere SA (Cominiere). It is valid for 5 years. On the 2nd February 2017, AVZ formed a joint-venture (JV) with Cominiere and Dathomir Mining Resources SARL (Dathomir) to become the majority partner and project operator in a JV aiming to explore and develop the pegmatites contained within PR 13359. Ownership of the Manono Lithium Project is AVZ 60%, Cominiere 30% and Dathomir 10%. All indigenous title is cleared and there are no other known historical or environmentally sensitive areas.</p>
Exploration done by other parties	<ul style="list-style-type: none"> • <i>Acknowledgment and appraisal of exploration by other parties.</i> 	<p>Alluvial cassiterite was first discovered in Manono in 1910 along the east bank of the Likushi River and this was followed by systematic prospecting until 1920. This work defined the Manono Mining Area and Géomines, the original developer, was granted a mining licence with production commencing in 1919. The weathered cassiterite bearing pegmatites were discovered in 1925 during an exploration programme originally focusing on the overlying and proximal eluvial cassiterite deposits.</p> <p>During the period 1936 – 1942, Zaïretain completed extensive exploration through pitting and drilling of the laterite and alluvial (Likushi Flat) cassiterite bearing zones, however apart from some production from lateritic material, the alluvial material was never exploited.</p> <p>Exploration continued periodically until 1960 with both the deepening of existing excavations and new drilling activity at Roche Dure. Between 1948 and 1949 a study of the hard-rock pegmatite was initiated. Forty-two vertical drill holes, totalling 2,202 m were completed at Roche Dure. Based on the results of this drilling, a hard-rock open pit tin mine operated between 1951 to 1956. Except for some exploration work carried out on the old mine dumps, aimed at determining cassiterite and spodumene grades, little prospecting took place after 1960 and since then no exploration has taken place since 1980.</p>

Criteria	JORC Code explanation	Commentary
<p>Geology</p>	<ul style="list-style-type: none"> • <i>Deposit type, geological setting and style of mineralisation.</i> 	<p>The Manono project lies within the mid-Proterozoic Kibaran Belt - an intracratonic domain that stretches for over 1,000 km through Katanga and into southwest Uganda. The belt has a predominantly SW-NE strike and is truncated by the N-S to NNW-SSE trending Western Rift system. The Kibaran Belt is comprised of a sedimentary and volcanic sequence that has been folded, metamorphosed and intruded by at least three separate phases of granite. The latest granite phase (900 to 950 million years ago) is assigned to the Katangan cycle and is associated with widespread vein and pegmatite mineralisation containing tin, tungsten, tantalum, niobium, lithium and beryllium.</p> <p>The region has undergone intensive tropical weathering resulting in the development of deep and irregular weathering profiles of up to 80m. This includes the development of an upper 5 – 10m thick variably lateritised profile that is cassiterite (and coltan) bearing. These eluvial placers are developed along the northern margins of the Kitotolo pegmatite and were the focus of historical (and current small scale) mining by Zairetain.</p> <p>The Likushi River forms a natural boundary between the Kitotolo and Manono pegmatites, where the Likushi Dam was established to provide process water for historical operations. The alluvial plain extends for at least 15km to the north with the Likushi River being constrained to a relatively well-defined linear channel of up to 2.5km wide. Since discovery of alluvial cassiterite here in 1910, the Likushi alluvial flats represents an obvious target to host autochthonous alluvial placer hosted heavy minerals/cassiterite. Work completed by Zairetain (and elaborated on later), cassiterite bearing gravels were located along an area of 10km x 1.5km downstream of the Likushi Dam.</p> <p>Work completed by Zairetain suggest that the Likushi River is structurally controlled and has in part captured an older/palaeo SW flowing drainage, resulting in possible reworking, and upgrading of cassiterite bearing gravels defined within the Likushi Alluvial flat. In addition, this would suggest that there may be potential for additional alluvial resources over areas to the NW of Kitotolo and west of the Likushi River.</p>

Criteria	JORC Code explanation	Commentary
Drill hole Information	<ul style="list-style-type: none"> • A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes: <ul style="list-style-type: none"> ○ easting and northing of the drill hole collar ○ elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar ○ dip and azimuth of the hole ○ down hole length and interception depth ○ hole length. • If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case. 	No Exploration results are being reported. An Exploration Target has been defined over the Likushi Alluvial Plain and is inherently conceptual by nature. The Competent Person has relied on historical drilling and pitting results generated from work completed by Zairetain between 1939 and 1941. The collars of the pits and drilling were located on plans that were subsequently digitised and georeferenced. Examples of maps used are shown as shaded backdrops in Figure 6. Detailed pitting information was located for Line 10 (Block F1), whose data is represented in Figure 5 as a section. This pitting and drill information was used, in conjunction with Zairetain stated Mineral Inventory Statements of 1983, and OCP Alluvial Services findings (1982), to inform the Exploration Statement.
Data aggregation methods	<ul style="list-style-type: none"> • In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (e.g. cutting of high grades) and cut-off grades are usually Material and should be stated. • Where aggregate intercepts incorporate short lengths of high-grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail. • The assumptions used for any reporting of metal equivalent values should be clearly stated. 	<ul style="list-style-type: none"> • Zairetain utilized a diluted 125 g/m³ "cut off" to delineate Sub economic areas from higher grade areas. This cut off is not material to the Exploration Target and was not considered as part of the definition of the Exploration Target. It is a historical figure. • No equivalent values are used or reported.
Relationship between mineralisation widths and intercept lengths	<ul style="list-style-type: none"> • These relationships are particularly important in the reporting of Exploration Results. • If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported. • If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (e.g. 'down hole length, true width not known'). 	No Exploration Results are being reported. Zairetain records provide information on gravel thicknesses to which a cassiterite concentrate grade is assigned. The vertical drilling and pitting methods used by Zairetain were considered suitable.
Diagrams	<ul style="list-style-type: none"> • Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported These should include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views. 	No discovery is being reported, an Exploration Target has been defined. Appropriate plans reflecting Zairetain's historical drilling and pitting, allocation of inventory blocks as well as regional drainage interpretations are provided in the Report.
Balanced reporting	<ul style="list-style-type: none"> • Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results. 	The Exploration Target has been declared using a range of overburden and gravel thicknesses as well as cassiterite concentrate grades that reflect the upper and lower parameters that define the Exploration Target.

Criteria	JORC Code explanation	Commentary
Other substantive exploration data	<ul style="list-style-type: none"> Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances. 	No other exploration data is available.
Further work	<ul style="list-style-type: none"> The nature and scale of planned further work (e.g. tests for lateral extensions or depth extensions or large-scale step-out drilling). Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive. 	<p>In order to validate the volumes and grades defined in the Exploration Target, a validation drilling, sampling, metallurgical test work programme as well as ground ERT survey will be required. Other geophysical techniques may also be employed if considered suitable. The positive outcome of this exercise will enable (part/s of) the Exploration Target area/s to be converted into a Mineral Resource Estimate, compliant with the JORC Code.</p> <p>Details as well as plans showing areas of possible extensions and focus of follow up work is provided in Figures 9 and 10.</p>