Cameco Australia Pty Ltd

Exploration Licence EL 3419

BIRRADUK PROJECT – NORTHERN TERRITORY

2001 - 2002 ANNUAL REPORT

CONFIDENTIAL

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SUMMARY

The Birraduk project is a uranium exploration project in northwestern Arnhem Land. The project comprises EL 3419 and is managed by Cameco Australia Pty Ltd (Cameco) under authority from Black Range Minerals NL (Black Range).

During August and September 2001, a helicopter assisted regional outcrop sampling program was completed taking four and a half days to complete. A total of 94 samples were collected from 67 stations.

The work completed by Cameco was done under the terms of a letter agreement with Black Range dated May 21 1999. The agreement provides authorisation for Cameco to act as an agent for exploration activities on this project until a sale agreement is finalised.

An airborne hyperspectral survey was flown over the EL in 2000. Data was received late in 2000 and interpretation did not proceed until 2001. The results of this survey complement outcrop sampling reflectance spectroscopy (PIMA) data acquired during analysis of 2000 and 2001 sampling programs. Several areas have been designated for additional sampling proposed for 2002.

Whole rock geochemistry has defined an anomalous area defined by U, REE and metals along the central NNW fault controlled valley. The gridded metal values on the eastern side of this structure appear to loosely correlate to the interpreted contact of the basement units of Upper Cahill Formation and the overlying Nourlangie Schist. The western portion of the anomaly appears offset by the structure with a sinistral sense of movement. However this contradicts the sense of movement from historical interpretations by Black Range.

The prospectivity of the Birraduk EL is considered relatively low at present. However, the proximity to Jabiluka, the interpreted weak, post-Kombolgie alteration and weakly anomalous geochemistry identified along linear faults within the sandstone, and the inferred presence of favourable basement lithologies upgrade the uranium potential. A small program of additional sampling work is recommended prior to a decision to drill test upgraded targets or relinquish the area.

The Department of Business Industry and Resource Development (DBIRD) have again granted an exemption from relinquishment for the 6th year of exploration on EL 3419. All sixteen blocks have been retained until May 2003.

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INTRODUCTION

The Birraduk project is a uranium exploration project managed by Cameco Australia Pty Ltd (Cameco) working under the authority of an agreement to act as an agent for Black Range Minerals NL (Black Range).

The prime objective of the project is to discover economic uranium mineralisation within a geological environment similar to deposits in the Athabasca basin of Canada and associated with the McArthur basin (Kombolgie sandstone) of the Northern Territory.

The objectives of the work completed by Cameco were to characterise the stratigraphy, structure, alteration and uranium mineralisation potential within the region sampled by the drill core, and from regionally collected outcrop samples. This is to be achieved by evaluating features identified megascopically and by using physical properties, reflectance spectroscopy (PIMA), geochemistry and airborne hyperspectral data.

LOCATION AND ACCESS

The project area is located 40 km northeast of Jabiru and 15 km west-southwest of Nabarlek. Current access to the project area is by helicopter only. A seasonal track from Nabarlek to the Afmeco Mining and Exploration Pty Ltd (Afmex) Myra Falls camp continues through the Mikinj Valley and passes within 3 km of the southeast corner of the Birraduk project area.

Location Map

TENURE

EL 3419 is the only tenement on the Birraduk project. The project is managed by Cameco Australia Pty Ltd working under the authority of an agreement to act as agent for Black Range Minerals NL. Cameco Australia Pty Ltd is in the process of purchasing exploration assets from Black Range Minerals NL, including their 49% interest in EL 3419. Kumagai Gumi Company Limited holds 49% interest in EL 3419, but has not participated in the project since Cameco became operator in 2000. Kun'nanj Aboriginal Corporation holds the remaining 2% carried interest. The project consists of one exploration licence (EL3419) for a total of 53.5 km^2 (16 blocks). The project began as a joint venture between Black Range and Afmex, with Afmex as the operator. In February 1999, Afmex withdrew as a joint venture partner. An exemption from reduction was submitted to the Northern Territory Department of Mines and Energy (NTDME) at the end of year 5 of the exploration licence.

The northern portion of EL 3419 has been classified as a No-Go zone by NLC anthropologists working under direction by the Traditional Owners, and has been excluded from exploration access. This restricted No-Go area accounts for 21.7 km^2 reducing area available to exploration to 31.99 km^2.

Tenement Status Map

Current Land Status

Terms of Exploration by Cameco

The work completed by Cameco was carried out under the terms of a letter agreement between Cameco and Black Range dated May 21 1999. The agreement provides authorisation for Cameco to act as an agent for exploration activities until the asset sale is completed.

GEOLOGICAL SETTING

The entire project area lies within Mamadawerre Sandstone, the lower unit of the Kombolgie Subgroup. The tenement lies centrally on a large sandstone outlier, bounded by spectacular escarpments and falling away to low lying basement rocks. The rugged, castellated sandstone plateau is deeply incised by narrow joint/fault structures and locally by broad fault related valleys.

Drilling to date indicates a thickness of sandstone varying from less than 100 m to approximately 500 m throughout the project area. Basement geology consists of an amphibolitic unit, Upper Cahill Formation and Nourlangie Schist. Oenpelli dolerite, although not intersected in drilling, is interpreted to occur at depth.

Geological Compilation: Black Range Minerals NL

PREVIOUS EXPLORATION

Formal exploration began in 1997 with the drilling of five diamond drill holes by the previous operator, Afmex. A helicopter magnetic and radiometric survey was flown over the entire tenement area. Results were not encouraging for the operator. Significant structural zones, alteration patterns and mineralisation were not identified. An additional four holes were drilled in 1998 with similar results. A decision was made by Afmex to withdraw their participation in the joint venture. The compilation map shows the drill hole locations and interpreted geology.

Drill Hole Collar Location Map - Landsat TM

Drill Hole Collar Locations

Previous Exploration by Cameco

In 1999 four drill holes, KUN-03, KUN-04, KUN-06 and KUN-07 were evaluated by Cameco personnel. These drill holes were geologically logged, sampled and processed for physical property parameters. Samples were geochemically analysed for trace elements and PIMA analysed for clay mineralogy. Results from this evaluation indicated that further work was necessary to understand the uranium potential of the area.

In July 2000, Cameco personnel evaluated the five remaining diamond drill holes, KUN-01, KUN-02, KUN-05, KUN-08 and KUN-09. The drill holes were geologically logged, sampled and processed for physical property parameters.

In November 2000, a helicopter supported, regional outcrop sampling program was completed over the entire exploration license accessible to exploration. A total of 69 samples were collected from 67 sites. Sample sites were designed on a staggered pattern on lines 500 metres apart. In reality, however, an area open for helicopter access within the vicinity of the planned site dictated the sample site location.

The 2000 outcrop sample geochemistry results did not show any strong U mineralisation. An examination of the results displayed a general correlation between U and rare earth elements (REE) and metal (As, Co, Mo, Ni, PbTot, V, Y, Zn) concentrations. Two main areas were shown to contain anomalous geochemistry, which warranted follow up sampling in 2001. These areas are the fault structure along which KUN-007 was drilled shows elevated U, REE, and metals; and the main NNE lineament expressed as valley running through the middle of the property is also an area of anomalous geochemistry with elevated U, RRE, and metals.

An Airborne Multispectral Scanner (AMS) survey totalling 123 km^2 was conducted by DeBeers during July 2000. The survey was designed to map minerals and identify alteration associated with unconformity uranium mineralisation. Data from this survey was not available for the 2000-2001 Annual Report, but has been submitted with this report.

Geophysics – Airborne Multispectral Scanner Survey

During July 2000, a total of 123 km^2 of hyperspectral data at five metre pixel resolution was flown over the Birraduk Project area. The De Beers Airborne Multispectral Scanner (AMS) survey was designed to map minerals and identify alteration associated with unconformity U mineralisation. In particular, it was hoped that this system would identify and map variations in kaolinite, illite, dickite, halloysite, iron and magnesium chlorites and silicification, which may possibly be attributed to alteration.

The survey data was not available for processing and interpretation to be included in the 2001 Annual Report.

CAMECO EXPLORATION WORK - 2001

Exploration work conducted by Cameco during the period 2001 – 2002 consisted of follow-up outcrop sampling of geochemical anomalies derived by previous sampling and reconnaissance and sampling along interpreted fault lineaments. Sampling and ground verification was conducted on a limited number clay targets identified by the AMS hyperspectral survey. Reconnaissance mapping with integration of drilling was also performed.

Assessment expenditure reported to the Birraduk Project for the reporting period of April 2001 to April 2002 totals $63,922.

Summary of 2001 Cameco Exploration Activities

Activity	Duration	Amount	Number of Samples
Anomaly Identification	3 days	17 geochemical anomalies determined	
Outcrop Samples	7 days	64 sites	63 outcrop samples
Fracture Samples	7 days	Collected from outcrop sample sites	31 fracture samples
AMS Hyperspectral data processing and interpretation	12 days	123 km^2	
AMS ground truthing	Half day	3 sites	
Helicopter usage	7 days		

Outcrop Sampling

17 geochemical anomalies were identified from the 2000 outcrop and fracture sampling program. Anomalies were based on mainly U values from whole rock and also partial leach geochemical analytical techniques. Two anomalies were derived from lead isotope anomalism. In total 94 samples consisting of 63 outcrop samples and 31 fracture samples were collected from 64 sites.

Sample Outcrop Location Map

Outcrop Locations and Description

Lithology and Physical Properties

Alteration and Structural Measurements

<u>Pima Results</u>

Minspec PIMA results show that illite is the dominant clay mineral over the project area. Dickite clays occupy a general northeast to southwest trend across the middle of the project, however correlation between stratigraphic location, grain size, silicification and alteration is inconclusive. The location of the kaolinite shows some correlation with interpreted faulting and is most likely due to alteration and fluid flow along such structures.

TSA PIMA results reflect the results derived from the Minspec software with some variations. The sericite group is divided into illite, paragonite and muscovite; with illite and paragonite mixes being dominant. TSA reports halloysite in most cases over the Minspec kaolinite. NH4 Alunite and gypsum is reported by TSA, however there is some doubt over the validity of these results, as the signal to noise ratios are quite low.

Outcrop Samples TSA Analysis (Identified Mineral Species)

Sample Outcrop PIMA TSA Distribution Map

Outcrop Samples Minspec Analysis

Sample Outcrop PIMA Minspec Distribution Map

<u>Geochemical Results</u>

The geochemistry results from 2001 follow-up sampling do not add further to the results derived from previous sampling. Examination of the results displays a general correlation between U and thorium, rare earth elements (RRE) and metals (As, Co, Mo, Ni, PbTot, V, Y, Zn) concentrations. The highest U value sampled remains 3.3ppm (BR00B10052) from year 2000 sampling close to drill hole KUN-007.

The following figures shows gridded data for U, Metals and total RRE. The central anomaly on both figures is located on the eastern edge of the central NNW fault controlled valley.

Uranium Distribution Map

Metals Distribution Map

REE Distribution Map

Geological Compilation: Black Range Minerals NL

Sample BR0C10104, located on the eastern side of the central faulted valley, displays increased values in the RRE (2494.2ppm) mainly due to high levels in the light rare earth fraction; and metals (40ppm). The U content for this sample is anomalous at 1.3ppm (above the 97.5 percentile).

Two main areas show anomalous geochemistry, which warrant follow up work are the main NNW lineament expressed as valley running through the middle of the property and the fault structure along which KUN-007 was drilled shows anomalous geochemistry with elevated U, REE, and metals.

The metals distribution map displays an apparent correlation with the inferred curvilinear contact of the Upper Cahill rocks with the Nourlangie Schist unit and a weaker curvilinear trend at the southern inferred lower Cahill and Upper Cahill contact proximal to drill hole KUN-007. The central anomalous area appears to show some sinistral fault displacement along the inferred NNW fault.

Results from the 2000 sampling program have been included in the data files as results were not available for submission for last years report.

Geochemistry for Outcrop Samples

Geochemistry for Fracture Samples

Outcrop Sample Procedures

Regional outcrop samples were carefully selected to represent regional background signatures for lithological, spectral and geochemical parameters at each location. Geomorphological, geological and radiometric parameters were recorded, and a digital photograph at each site was taken. The samples were systematically processed in the Darwin office. Lithological textures, alteration colours (Munsell), grain-size variations, petrophysical parameters (magnetic susceptibility) were routinely recorded.

Sampling Technique

Samples are routinely halved using a core saw. One half is described (grain-size, Munsell colour, and magnetic susceptibility). The same sample is measured for spectral parameters using the PIMA II spectrometer. These samples are retained within the Cameco storage facility in Darwin. The other half of the sample is used for litho-geochemical analysis. A segment of each sample is also sent to Petrographics International in Saskatchewan Canada for petrographic thin section processing.

Codes for Competency Friability & Grain Size

Codes for Munsell Colours

Reflectance Spectroscopy (PIMA)

Reflectance spectroscopy (PIMA) analysis was completed using the PIMA II short-wave infrared spectrometer on all samples collected. This instrument measures the reflected energy from a sample in the short wave infrared (SWIR) region of the energy spectrum. The sampling area on the rock specimen that is measured is permanently marked. Multiple measurements are occasionally taken, particularly if variations in spectral features are noted. The spectra are converted to an ASCII format and processed using "The Spectral Geologist" (TSG) developed by AusSpec International, and a Cameco in-house software program called Minspec.
TSG is routinely used to process all spectral data. The SWIR spectra, once processed, provide a mineral identification utilising internal software pattern matching algorithms called "The Spectral Assistant" (TSA). The experienced user can collect information on the degree of mineral crystallinity, and chemical composition variations within mineral groups from the spectra. The program also allows the user to create scalars based on spectral features and parameters. This allows for quantifying crystallinity parameters; classifying chlorite species based on Mg and Fe absorption features and a multitude of other features.

The in-house software "Minspec" utilises the PIMA spectra to classify the data into proportions of six clay mineral species (illite, kaolinite, dickite, halloysite, chlorite and dravite). A signal to noise ratio is calculated. Careful, visual attention to detail along with the signal to noise value within each spectra, is required to determine the validity of the classification.

Geochemical Processing

All samples were sent to NTEL in Darwin and Pine Creek, Northern Territory, for multi-element analysis. In total, four separate methods were used to analyse up to 65 elements and four isotopes. Results for Au, B, LOI, Pt and Pd are still outstanding, and will be included in next years report.

G400 Analytical Procedures

G950 Analytical Procedures

Geophysics – Airborne Multispectral Survey (AMS)

AMS Introduction

The De Beers AMS instrument was built by Integrated Spectronics Pty. Ltd (ISPL) in 1996 and is a similar system to the Probe-1 and is an earlier version of the ISPL HYMAP scanner. It is a 96 channel, 3 spectrometer, whiskbroom scanner with a signal to noise ratio greater than 800:1. The scanner measures reflectance from the ground surface, with each spectrometer consisting of 32 channels with an approximate 15 nm spectral resolution; VNIR from 500 to 1000 nm, SWIR1 from 1400 to 1900 nm, and SWIR2 from 2000 to 2450 nm. While most of the geological information is detected by SWIR2 (clays, carbonates, sulphates, etc), the VNIR range can map Fe-oxides and hydroxides, vegetation, and general land cover. Although the most diagnostic spectral features are contained within specific windows or wavelength regions, full VNIR to SWIR spectral sampling is advantageous for properly correcting the data for atmospheric effects.

Gerard Zaluski, Geoscientist completed the AMS data interpretation in Saskatoon at Cameco Corporation Head Office.

Data Collection

As shown in the following figure, data was collected over EL3419 of the Birraduk project on July 11, 2000. The scanner was flown aboard Kevron Aviations's Cessna 404 (VH-AZU). Four alternating south-north and north-south flight lines of data were collected at a ground speed of 140 knots from an altitude of approximately 2800 m, providing a ground resolution of approximately 5.8 m. Relatively constant solar illumination was maintained by collecting the data near midday (between 10:44 a.m. and 11:11 p.m., local time) with cloud cover less than or equal to 1/8.

Birraduk AMS Coverage

AMS Processing

Processing of hyperspectral image data involves several major steps. Within each of these stages, a number of different processing approaches are possible. The spectral processing was all undertaken using ENVI 3.4 on the separate, non-georeferenced images. While this is a more laborious process, it is recommended over the use of endmembers derived from other images unless the lighting, atmospheric conditions, and atmospheric correction are nearly identical (Farrand, personal communication, 2001). Subsequent mosaicking and preparation of the final images was undertaken using ER Mapper 6.1.

Endmember spectra were identified using spectral identification programs in ENVI. The main procedure used was Spectral Feature Fitting™ (SFF). It is a process that compares discrete absorption features of spectra with those of known minerals from a spectral library. This technique works well for minerals with diagnostic, strong absorption features such as clays and carbonates but it may be strongly affected by noise, particularly for spectra with only weak, broad absorption features. A limitation of this technique is that it focuses entirely on absorption features, entirely neglecting the rest of the spectrum.

AMS Results

The processing of AMS airborne hyperspectral scanner data over the Birraduk project using standard hyperspectral processing techniques identified prominent clay patterns within the exposed Kombolgie Sandstone and nearby basement rocks.

Endmember processing identified seven clay and rock types within the project area. The abundances of these endmembers are displayed as greyscale images within the following figures.

The illite endmember is confined to the Kombolgie Sandstone, with highest values at intermediate levels within the exposed sequence, mainly below a more resistant, cliff-forming unit.

Illite MTMF

Dickite is confined to Kombolgie Sandstone outcrops and appears to lie laterally adjacent to illite zones within the same stratigraphic units or underlie illite.

Dickite MTMF

Pyrophyllite abundances are distributed mainly within or adjacent to dickite zones. Minor occurrences are noted in small, scattered outcrops across the plateau. Because of the spatial association of pyrophyllite proximal to (although not in contact with) the Oenpelli Dolerite intrusions in other projects, it is interpreted that Oenpelli intrusions are also present near or below the Birraduk study area.

Pyrophyllite MTMF

Long wavelength muscovite distribution partially overlaps or is gradational with illite, suggesting that these may represent gradational crystallinity variations. However, in some cases these patterns may be due to the inability of the unmixing procedure to properly distinguish these similar spectra in complex mixtures. In general, the strongest muscovite signatures are found in the basal, stratigraphically lowest sandstone units. Lower but significant proportions of muscovite are also identified in exposures of metamorphic basement rocks on ridges south of the sandstone plateau.

Long Wavelength Muscovite MTMF

Kaolinite is widespread in moderate amounts in the sandstone, overlapping illite, muscovite, and dickite zones. Kaolinite appears to be present predominantly in intermediate sandstone levels, in similar units to the dickite and illite. Kaolinite is also observed along basement ridges, particularly in the southeast.

Kaolinite MTMF

The illite2/chlorite endmember is almost entirely confined to basement exposures. It is interpreted to indicate chlorite and muscovite bearing schists. Although the very speckly pattern in the sandstone of the eastern side of the study area is interpreted as noise, small, more coherent patterns are indicated in the west-central region in relatively flat sandstone below a more resistant, cliff-forming sandstone member. This is interpreted as a possible zone of chloritic sandstone alteration.

Illite2/Chlorite MTMF

The second identified basement endmember, basement 2 is more narrowly confined within the basement exposures. This is interpreted as muscovite schist.

Basement 2 MTMF

<u>AMS Conclusions</u>

The Kombolgie Sandstone within EL 3419 is all mapped as the Mamdawerre Sandstone. Analysis of false colour composites suggests that sandstone units with different lithologic characteristics are present. The majority of the outcrop consists of highly dissected and fractured sandstone. Overlying this is a more massive sandstone unit that forms smoother outcrops on some local highs. This latter unit may be identified by its tendency to form steep cliffs.

The very general clay and mineral patterns within a schematic section are shown in the following figure. The lowermost sandstone unit, exposed locally along edges of the escarpment appears to be highly fractured and dissected and is characterized by the muscovite endmember. This is overlain by a dickite bearing sandstone unit which may grade to kaolinite and pyrophyllite (discussed below). This is well exposed along the edges of the escarpment and along many of the gorges. Overlying the dickite-bearing member is an illitic unit containing lesser but significant muscovite and some kaolinite. Stratigraphically higher units are very clay poor, giving no significant clay endmember abundances.

Birraduk Schematic Section.

The origin of the pyrophyllite is unknown, however, based on the other Cameco operated projects, it is interpreted as indicating hydrothermal alteration associated with an underlying Oenpelli Dolerite intrusion. Long wavelength muscovite is identified within the lowermost exposures of the sandstone sequence at the north end of the escarpment. Basement rocks exposed along ridges near the escarpment feature two separate phases, one is interpreted as a muscovite-bearing schist and the other as a muscovite-chlorite schist.

The existence of well-defined clay alteration patterns within the sandstone indicates that the weathering profile in the sandstone is not sufficiently strong to mask the clay patterns in surface outcrops. It is noteworthy that while the sandstone clays exhibit spatially coherent patterns, they do not appear to be controlled dominantly by stratigraphy. A significant control on the patterns is therefore interpreted as aquifer fluid history and/or hydrothermal alteration.

The existence of stratigraphic patterns is also suggested by the clay distributions of the AMS imagery, although this is likely significantly complicated by hydrothermal effects. The former effects are generally identified by laterally continuous patterns of mineral endmembers that appear to be confined to particular lithologic units, giving a layer cake pattern. It should be noted however that these distributions do not necessarily reflect bulk sandstone compositional characteristics. They may be significantly modified during diagenesis and/or alteration events because of the permeability properties of the units.

CONCLUSIONS

With the inclusion of the AMS survey, a much better understanding of the surface clay alteration distribution and patterns can be seen and compared directly with previously collected PIMA samples and drill core. Conclusions drawn from the AMS interpretation and from drilling suggests that clay alteration patterns are largely dependent on stratigraphy, and possibly more importantly grain size, rather than original bulk sandstone chemical compositions. The proposed clay profile can be likened to a layer cake model, based on stratigraphic horizons within the Mamadawerre Sandstone.

Birraduk Schematic Section.

Dickite clays were thought to be relatively widespread and formed the dominant clay in the sandstone package. In dickite clay dominated stratigraphy, the initial high permeability and porosity due to coarse-grained sands and granule rich horizons enabled early silicification and entrapment of dickite within quartz overgrowths. These horizons became impervious, resulting in basinal fluid flow channelling into the finer to medium grained, better-sorted sandstone horizons above and below these silicified horizons into the basal sandstone proximal to the unconformity. The sericitic alteration defined by muscovite and illite in the basal sandstone is more intense and overprints the early silicification and entrapped dickite. Hydrothermal alteration caused by structural disruption and possible emplacement of Oenpellie Dolerite dykes and sills overprint the initial dickite with later stage kaolinite and pyrophyllite respectively.

Gridding of outcrop lithogeochemical results indicates the presence of an anomalous area located within the central portion of the tenement within the NNW broad fault related valley. The interpreted basement lithology map complied by Black Range Minerals indicates a dextral movement along this major structure. From limited mapping along this structure, Cameco geologists have determined a dextral sense of movement from siliceous deformation bands and minor breccias; these small structures may or may not give a sense of movement for the larger structure. If the curvilinear anomalous area defined by the gridded metals map correlates to the basement contacts, this would indicate a sinistral sense of movement as opposed to the direction of movement defined by both Cameco mapping and Black Range interpretation. The data used for the basement and structural interpretation by Black Range is not available, so the validity of the interpretation of the structural movement (possibly based on widely spaced drilling) along this fault may be conjectural.

Gridded Metals and Basement Unit Interpretation

The surface outcrop sampling programs have highlighted several areas of interest, which warrant further investigation. A strong correlation exists between uranium and REE, while the correlation between other metals and uranium is not as well defined. The area between drill holes KUN-001 and KUN-005 along the central fault controlled valley needs further sampling and mapping to further define the co-incident U, REE and metal anomaly.

Although no mineralisation was encountered in the drilling thus far, more work is required to understand the uranium potential of the area. The basement portion was sampled and physical properties were measured. Work completed on the basement portion of historical drill holes suggests the presence of Cahill Group metasedimentary rocks (Myra Falls equivalents), which is a favourable geological environment for uranium deposition similar to Jabiluka.

RECOMMENDATIONS

Due to its proximity to Jabiluka, alteration identified in the sandstone, favourable basement lithologies and exploration to date, additional work on the Birraduk project is recommended. Additional surface outcrop sampling should be completed over favourable areas defined by the AMS survey and historical sample results to define future drill targets.

WORK PROGRAM FOR 2002 - 2003 (6^{th} YEAR)

The work plan for the 6^{th} year of the tenement will include a review of historical sample geochemistry and remote sensing data (airborne hyperspectral, radiometric and magnetic survey data and satellite imagery). This is routinely undertaken and incorporated into the regional compilation that is ongoing by Cameco.

Faults and lineaments with associated anomalous AMS clay alteration patterns will be prospected and sampled with structural observations recorded.

Further surface outcrop sampling should be completed over other areas identified as possessing anomalous alteration and trace element distributions from the 2000 and 2001 sampling work.

Physical property parameters, PIMA and multi-element analysis will be completed on all samples. Selective petrographic samples will be studied with emphasis on defining alteration zonations and/or cells that may be indicative of uranium mineralisation processes.

The estimated budget for the Birraduk project during the 6^{th} year is estimated to be $20,000 to complete the program as planned.

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