Exploration Summary
ELA 26478 Western Creek

Ten_Num	Cover	Company	reports	Commodity	Granted	Ceased	Exp Method	Comments	Priority	Rep No.
AP 3169	60%	Tanganyika	1	unknown	19710330	19720929	desktop study compilation radiometric/magnetic anoms.	not much info.dont know what source of anoms. is	3	CR1972-0052
AP 3171	adjacant	Tanganyika	1	base/precious metals	19710530	19720830	unknown	"not prospective for base/precious metals, but is for U"	2	CR 1973-0005
EL 10100	adjacent	Anglo Gold	1	unknown (Au?)	20020415	20040206	desktop study/structural targets identified	Targetted the Lander Rock Beds	1	CR2003-0147
EL 10248	adjacent	Gutnick Resources	2	Au (witwatersrand)	20020201	20030723	desktop/data compilation/stream seds./rockchips	combined report 24ELs no indication of work on and EL basis	1	CR2003-0062, CR2004-0166
EL 1317	45%	Yuendumu/ ANZECO/Central Pacifi	2	U/W	19780419	19800419	unknown	"potential exists for U and scheelite mineralisation"	3	CR1979-0103,CR1978-0109
EL 1449	adjacent	Otter	2	unknown	19770401	19780930	unknown	Located 2 anomalies, 1 granite related, 1 related to mica schist	1	CR1978-0181, CR1978-0041
EL 2500	30%	CRA	1	unknown	19810306	19800305	unknown	worth a look	3	CR1982-0168
EL 2602	10%	unknown	1	unknown	19820327	19830326	unknown	"small pegmatite deposits"	1	CR1982-0256
EL 5986	50%	Stockdale	1	diamonds	19880701	19890628	loam/stream/barrage	combined rpt 5 ELs.unknown which ELs the work was done on	3	CR1989-0625
EL 749	50%	AMDEL/Tanyika	4	Au /base metals/	19721107	19731106	groundwater geochem&unknown	"prospective for diamonds and "Yeelerie-style U"	3	CR1974-0019,CR1973-0005,CR1973-0153,CR1973-0068
EL 8367	15%	North Flinders Mines/Normandy	7	Au/base metals	19940420	19990125	rockchip/lag/VAC/bedrock geochem/costean	worth a look	3	CR1995-0369,CR1996-0189,CR1997-0407,CR1998-0303,CR1999-0109,CR1999-0184,CR1997-0172
EL 8420	60%	Poseidon/Normandy/Exodus	5	Au	19941101	19980821	Airborne radiometrics/RAB/soils/VAC/regional gravity/aeromag./	looking for structurally controlled Au in Lander Rock beds (look@ gechem)	3	CR1995-0847,CR1997-0303,CR1997-0120,CR1997-0764,CR1998-0770
EL 8549	5%	Nth Flinders/Normandy	7	Au	19940520	19990125	lag/VAC/stream seds./rockchips/RAB/BLEG	No anomalous values found	2	CR1995-0453,CR1997-0342,CR1999-0199
EL 8719	15%	Centrex/Corporate development	8	Au	19940715	20000714	rockchips/soils/geol/geophys interp.	worth a look	3	CR1996-0606,CR1999-0396,CR1995-0794,CR1998-0552,CR1998-0689,CR1998-0418,CR2000-0376
EL 9561	adjacent	Normandy/NFM/Newmont	4	Au	19990429	20020311	ground mag./AC	Fix this one too	2	CR2000-0062, CR2001-0083, CR2001-0235, CR2002-0143

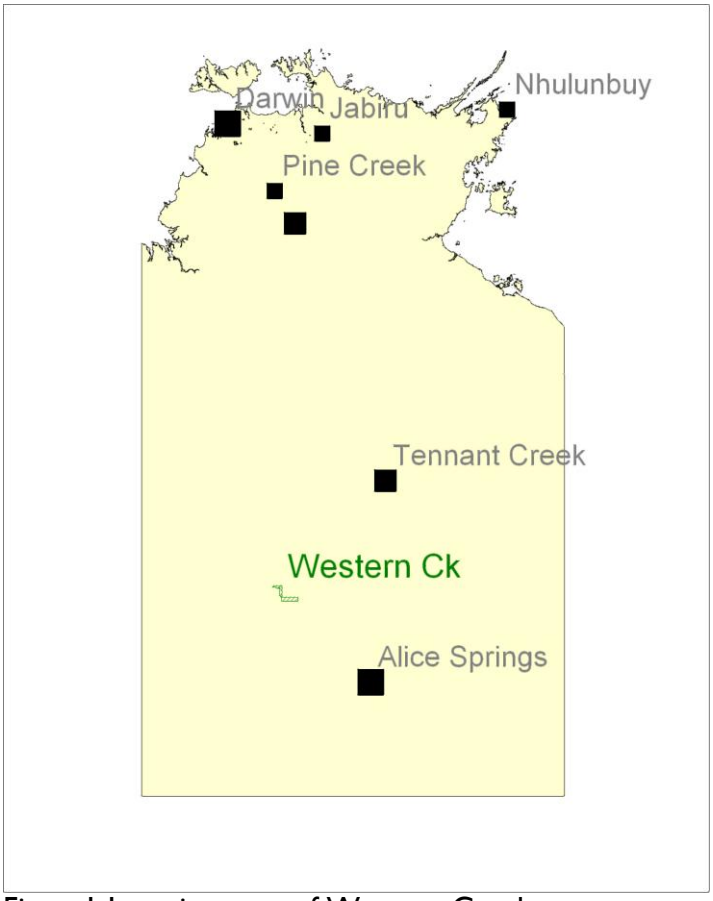

Figure1 Location map of Western Creek

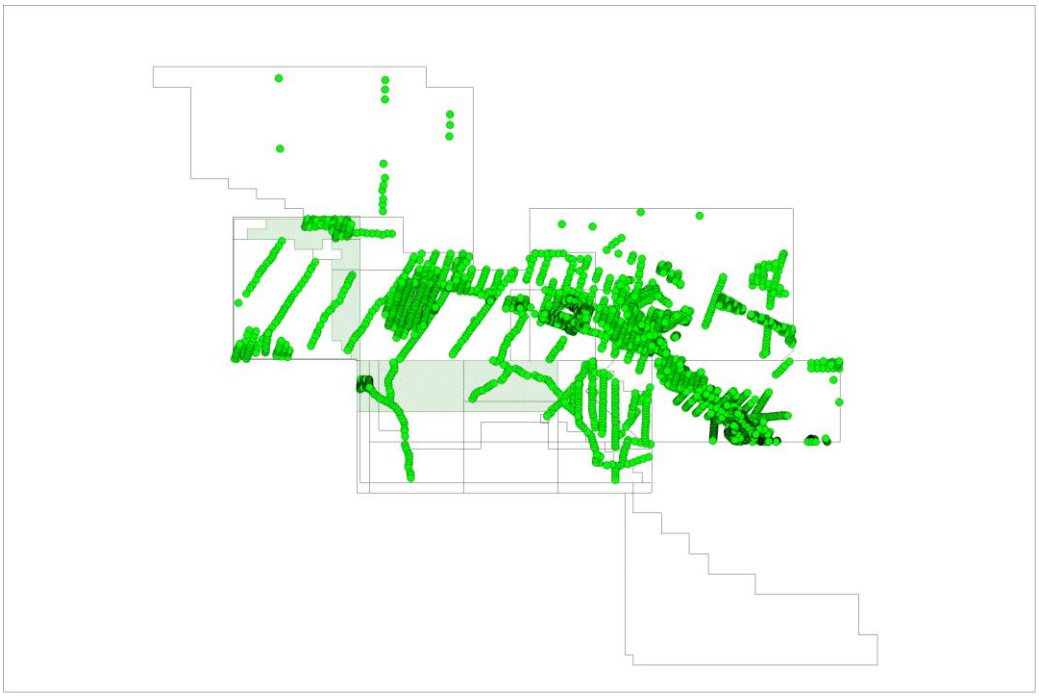

Figure 2 EL26478, historical tenements overlain on Western Creek along with all open file drillhole collars.

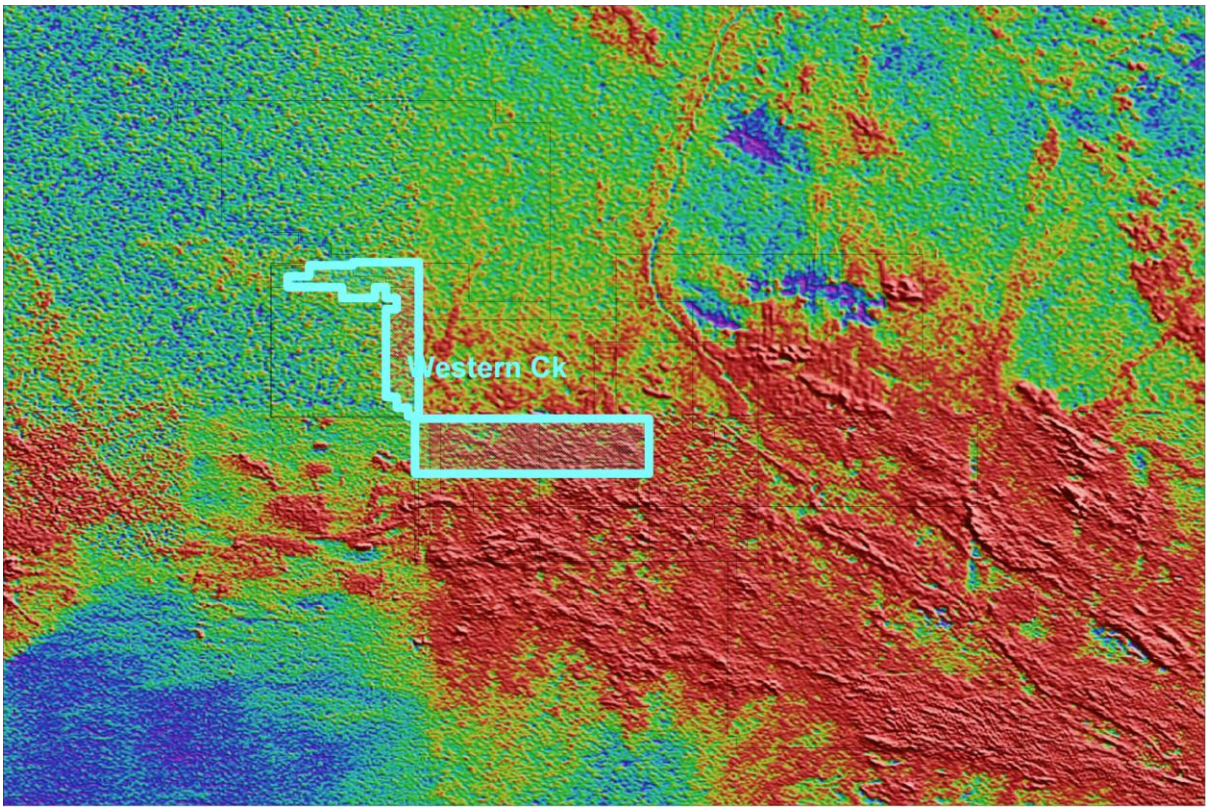

Figure 3 EL26478 radiometrics U image,

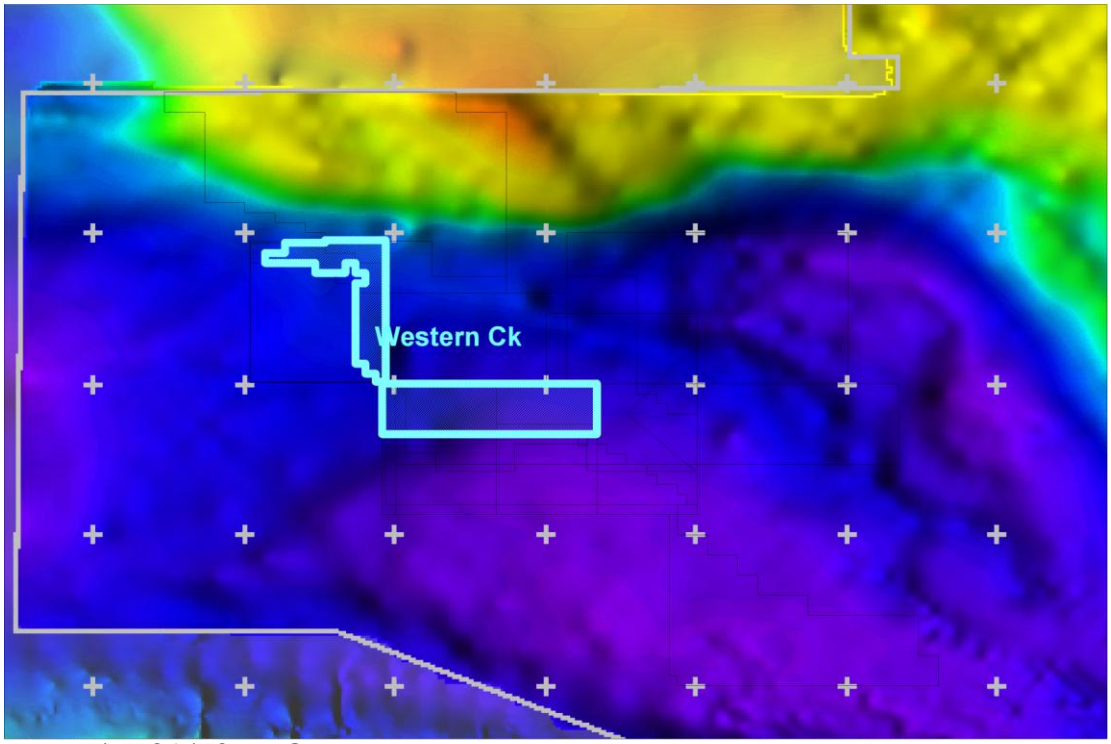

Figure 4 EL26478 on Gravity

PREVIOUS WORK

AP 3169, Tanganyika/ Tanneco

CR 1972-0052, Tanganyika/Tanneco carried out field mapping and created a hand drawn regolith and geology interpretation map that was used during the application process for the tenement.

AP 3171 Tanganyika/ Tanneco report

CR 1973-0005 Tanneco provided a considerable amount of information directly relating to exploration for uranium. They targetted many radioactive anomalies found in geophysical images. Below were the main findings;

- Most of the granites and gneiss throughout the area were not highly radioactive. Average Scintillometer count was 250c.p.m.
- Anomalous amounts of uranium, recording 940c.p.m. were observed along shears such as a major shear which is parallel to the Lander Valley.
- Calcrete outcrops were tested for U mineralisation and appeared to be un-mineralised. Mineralisation was suggested to be possibly found at depth and that the surface calcrete may have been a zone of leaching rather than precipitation.
- A quote from their report stated that a number of uranium mineralised shears exist within the area. A rock sample collected from a locality (not labelled) giving 610c.p.m. of uranium assayed 660ppm uranium (approx 1.3 lbs./LT). A sample from the Reward Mine assayed almost 1lb/LT. Within the Blue Bush Bore-White Tree Bore shear, several readings of over 200-300c.p.m. were obtained with a maximum of 900 c.p.m. of uranium. Tanganyika had suggested the area was prospective for secondary uranium deposition.

EL 1317 ANZECO, Central Pacific, Yuendemu

CR 1979-0103, CR 1978-0109; ANZECO explored for uranium and tungsten. They began by obtaining rock samples that had previously been collected (Bureau of Mineral Resources collection) in the area and had petrographic descriptions done along with XRF analyses. The most notable assay returned was sample 3129 with 2900ppm U and 240ppm Th (Shown in figure 5 below). The company summarized that 'although the rocks contain a generally anomalous amount of uranium, there is little evidence to indicate that concentration by magmatic process to ore grade has occurred. High thorium values indicate that much of the uranium may be contained in resistant minerals, although brannerite was identified at one site.' They also went on to observe that uranium is mobile in the secondary environment and has accumulated in small quantities in minor calcrete development.' ANZECO did not feel that economic tonnage or grade was indicated. ANZECO also identified U minerals such as uranyl phosphate in bassetite and brannerite. They carried out some stream sampling and U levels assayed from those samples taken, ranged between 4 and 26ppm.

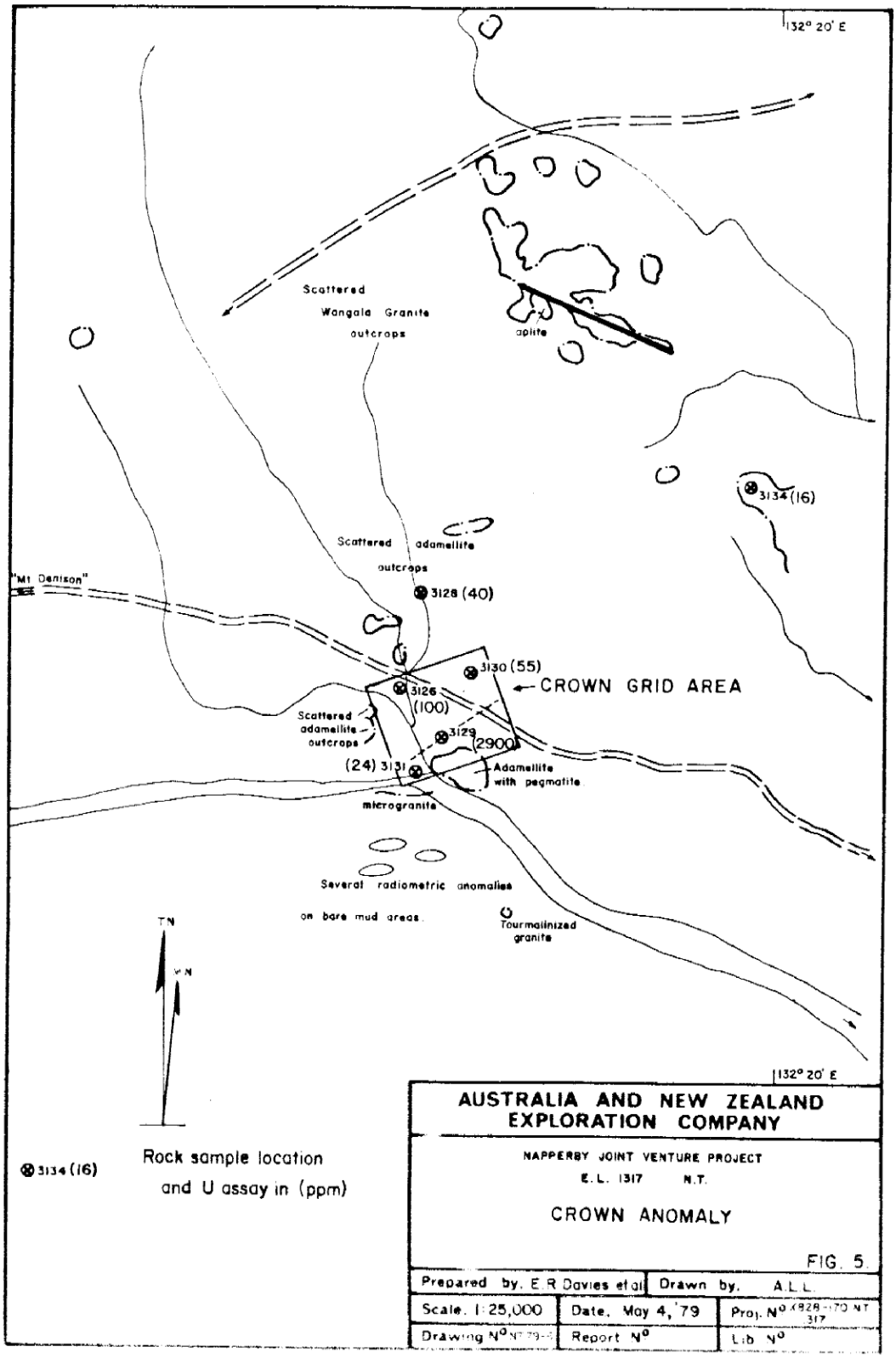

Figure 5 from Cr1979-0103 showing location of U anomalies

EL 2500 CRA

CR 1982-0168 CRA had reported anomalous Au values but later had determined them to be analytical error. Stream sediments were sampled and the minus 80 fractions were assayed. Sn values ranging up to 85ppm in sediment and gravel were determined to be related to low grade accumulations of cassiterite in pediment from lower Proterozoic granite gneiss.
Assays were also done for U, and found to range from 10-46ppm with higher amounts associated with granites. The 46ppm U was found in gravels made up of pegmatitic qtz, feldspar, mica, quartz pebbles, feldspar pebbles and minor ironstones. CPS recorded at that location with a scintollometer was 210/200. This was sample 812480 found at the location marked below (Fig 6)

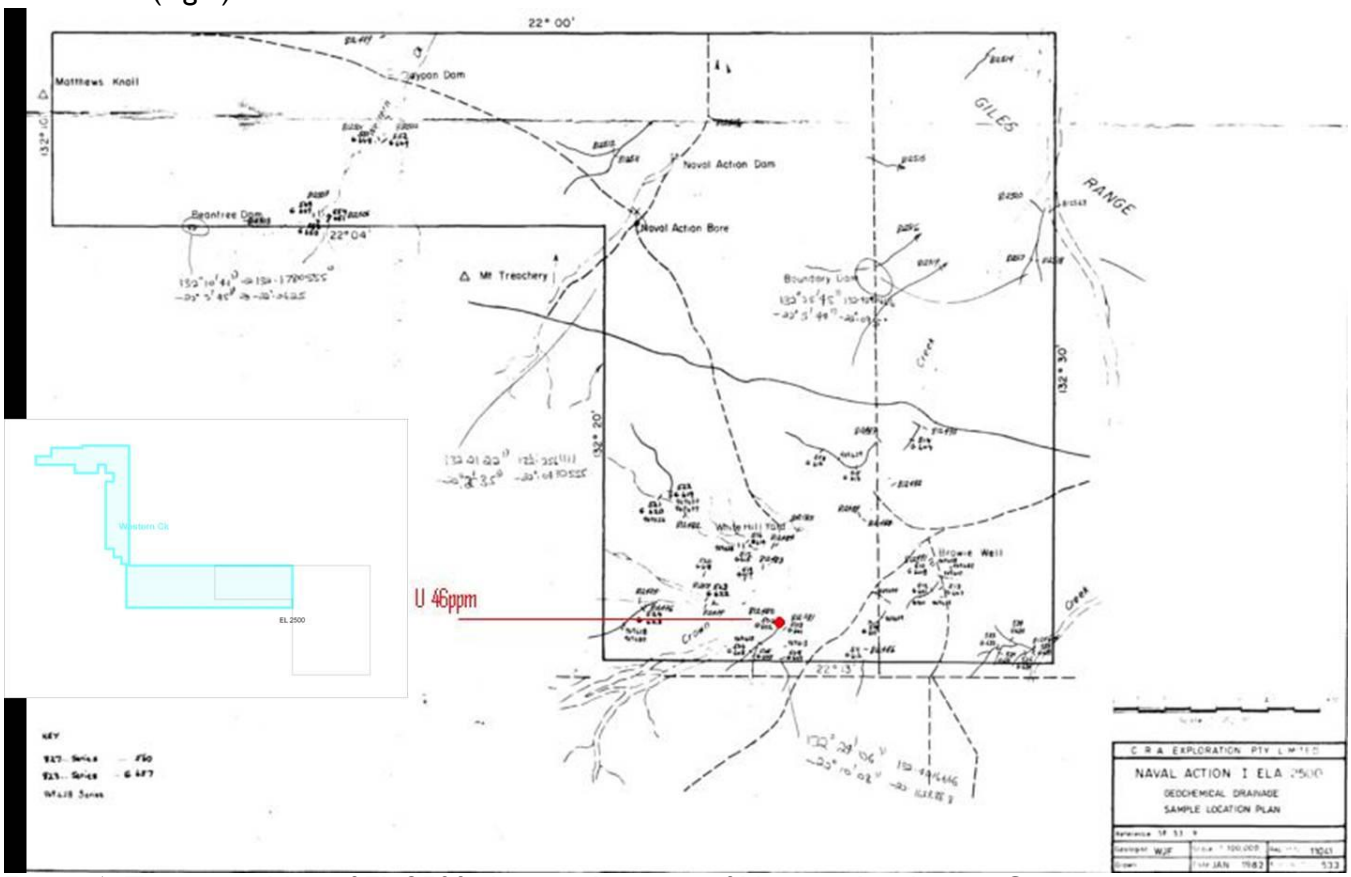

Figure 6, Tenement Map of EL 2500 showing location of U anomaly adjacent Crown Creek. Inset Map shows EL2500 with regard to Toro Tenement 'Western Creek'.

EL 5986 Stockdale

CR1989-0625 Stockdale primarily sought kimberlite or lamproite indicators for diamonds. Nothing was found and the ground was relinquished. Report is combined with other tenements covering map sheets: Denison, Anningie, Conical Hill, Barrow and Crawford. Uranium was not assayed for.

EL 749 Tanganyika

CR 1974-0019, CR 1973-0005, CR 1973-0153, CR 1973-0068(and EL 767, reports CR 1974-0019); Tanganyika explored for gold and base metals. Analysis on samples indicated the ground to be predominantly oxidised. Levels of uranium were generally higher than typical averages for sediments. Higher uranium values were found to be within proximity to outcropping limestone or calcrete.
The author suggests 2 methods of U transport; 1: on clay particles as it eroded from the parent rock and transported. 2: in solution. Author then suggests searching for redox interfaces in channel deposits or roll-fronts.
Bore water U content had been analysed and ranging from <5ppm and up to 650ppm.

EL 8367, Nth Flinders/Normandy

CR 1995-0369, CR 1997-0407, CR 1999-0184, CR 1996-0189, CR 1998-0303, 1999-0109, CR 1997-0172; North Flinders Mines targeted the Lander Rock Beds; shear hosted deposits related to splays, dilatant jogs and bends, granite hosted mineralisation in anticlinal folds, greisen/skarn, replacement and pegmatitic settings, and unconformity related Au-Pt-Pd-U associated with Vaughn Springs Quartzite.
Exploration methods included stream sediment sampling and vacuum drilling. Groundwater assay from 18 mile bore showed uranium levels of118.8 ug/l. The water was also assayed for gold with no significant anomaly. A trend in As values of water bore samples and Au bleg samples occurs parallel to the Lander Fault.
RAB drilling was undertaken with no intersection of bedrock at depths of >60m cover.
Normandy completed comprehensive exploration program including a regolith landform and structural interpretation map, rock chip sampling, petrology, lag sampling, water sampling, vacuum and RAB drilling, reprocessing airborne magnetic data, aerial photography and a photo-geological study. The best sample results were shown to come from haematitic and chloritic alteration zone in an area known as 'Smoking Gun Fault' which yielded 3m @ 144ppbAu and 33ppm As. However, overall results were said to be disappointing.

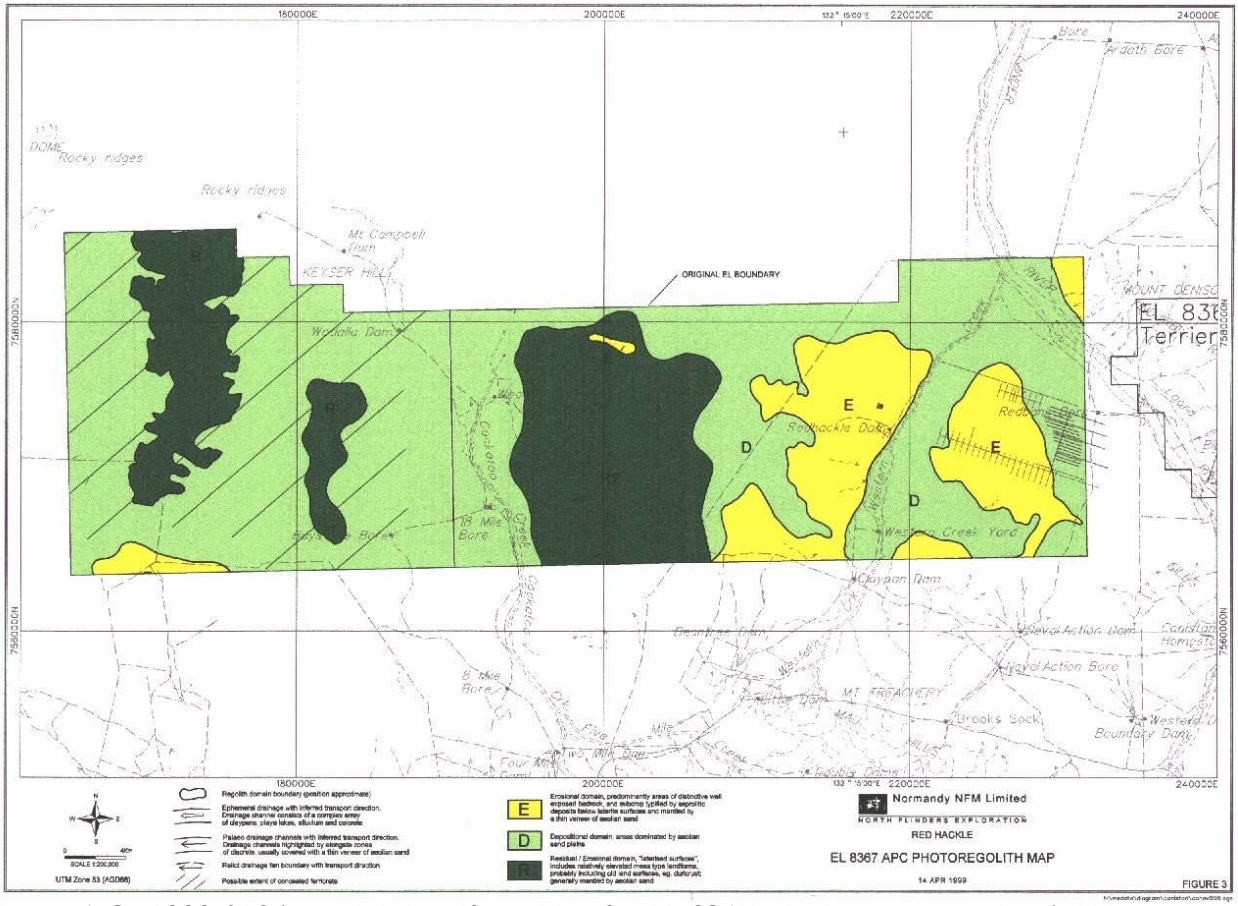

Figure 6 Cr 1999-0184 regolith Landform Map for EL 8367 which intersects Toro's Western Creek tenement

EL 8420 Poseidon, Normandy, Exodus

CR 1995-0847, CR 1997-0303, CR 1997-0120, CR 1997-0764, CR 1998-0770; PosGold (Poseidon Gold) were exploring for Gold. The ground has been described by them as follows;

'The tenement is dominated by the Wangala Granite which is coarse porphyritic granite with aligned feldspars. Mapped outcrop to the North of the granite consists of Lander Rock Beds, (Schistose pelitic metasediments and quartzo-feldspathic gneiss) Wickstead Creek Beds (Calc-silicate rock, marble, gneiss and schist) and Mt Stafford Beds (spotted and layered cordierite hornfels)'.This geology represents cover of the southern portion of Toro's Western Creek tenement.

Magnetic surveys were flown and soil sampling was undertaken. Uranium was not assayed for. Nothing was found. RAB drilling was carried out along with vacuum drilling. The only anomaly found was Arsenic. Molybdenum was assayed around 4-10ppm which was suggested as associated with the under-stoping granites. Deepest hole drilled was RAB 65m deep with average depths between 10-40m. Vacuum drillholes were less than 15m depth.

Normandy Gold explored for gold following a merger with PosGold and carried out a gravity survey. The following year, soil, RAB and vacuum drilling were carried out with no anomalous results. U was not assayed for.
Exodus took up a JV with Normandy Gold in 1997 upper amphibolite metamorphism of the outcrop or undercover rocks indicated to them that the area was un-prospective. In their final report it stated the tenement was not prospective for economic gold mineralisation.

EL 8549, North Flinders Mining, Normandy Gold

CR 1995-0453, CR 1997-0342, CR 1999-0199; North Flinders Mines were exploring for gold. Lag and vacuum drill sampling, photo-geological interpretations and field mapping were carried out. Samples returned values below detection limits. Their final report showed no anomalous results.

EL 8719 Centrex /Corporate Development

CR 1996-0606, CR 1999-0396, CR 1995-0794, CR 1998-0552, CR 1998-0689, CR 1998-0418, CR 2000-0376; A private prospector, Mr John Benger was exploring for gold deposit similar to that of the Granites, Dead Bullock Soak or the Tanami Mines. The title was transferred to Corporate Developments and then to Centrex. No samples were assayed for uranium. Random rock samples were assayed for Ag, Cu, Zn, As Bi, Pb and Au. Airborne magnetics and Radiometrics were carried out.

EL 9561 Normandy Gold/ NFM

CR2000-0062, CR2001-0083, CR2001-0235, CR2002-0143; Exploration activities proposed during the project area during 1999 could not be completed as the Central Land Council had not completed the necessary ground clearances in time for the 1999 field season. Exploration work included reconnaissance sampling programs, ground magnetic surveys and Aircore drilling. Results from infill lag sampling at Silver Fox revealed numerous (69) elevated (>0.7 ppb) Au values, with peak values in the range of 2.2-11.3 ppb. These defined a coherent anomaly, which is coincident with peaks from the initial lag sampling. Arsenic results were more subtle, with 8 samples being elevated (>57 ppm), the 4 peak values (103 -239 ppm) not being coincident with the Au anomaly. Anomalous results were received from sampling at Silver Fox, where a mineralized quartz vein returned 10.5 ppb Au. Rock chips elsewhere on the lease were not anomalous, with a peak value of 2 ppb near the southern margin of EL9561.All results from drilling returned gold values below detection limit, within a maximum of 110 ppm arsenic and 3 ppm bismuth. Based on exploration results EL8473 was surrendered and portions of EL 9560 and EL9561 selected for relinquishment. Work carried out on the relinquished portion of the licence included ground magnetic surveys and aircore drilling. The ground magnetic survey was conducted to provide more detailed magnetic to select area for drilling. Drilling intersected a sequence of transported overburden material to the depth of 60m. The area has been tested by surface sampling programs, ground magnetic survey and aircore drilling. Results were disappointing and did not encourage further investigation.

EL 1449 Otter Exploration, 1977-178

CR 1978-0181and CR 1978-0041; Otter had tenure within the Giles Range which they had considered prospective for Ranger-type uranium mineralisation. Exploration methods employed consisted of an airborne detector system for radiation and review of published data available at that time. Maximum counts were deemed the same as the variations of the background. The tenement was then recommended for relinquishment.

EL 10100 Anglo Gold, 2001-2003

CR 2003-0147 is an annual report outlining the exploration as part of a joint venture with Adelaide Exploration Ltd, following Anglo Gold's withdrawal from the tenure. The aim was to locate an economic gold deposit. The licence was located on aboriginal land represented by the CLC. Clearances had not been obtained during the reporting period so no exploration was undertaken.

EL 2602 Jays Exploration, 2000-2001

CR 1982-0256. This report summarizes methods by Jays in exploring for tin and tantalite. They primarily targeted alluvial mineralisation but also examined pegmatites. Rock chip samples were collected. Tantalite and wolframite were indicated but not of economic value as at the current metal price.

EL 10248, Gutnick Resources NL, 2001-2003

CR 2004-0166. Gutnick resources were exploring for gold and base metals of a similar style to that of Witwatersrand in South Africa. 510 stream sediment samples were collected for analysis by bleg and icp at Amdel laboratories. (These samples were from all of the licenses held by Gutnick withind their 'Rand Project Area') 'Reconnaissance rock chip sampling conducted during the stream sediment program returned several anomalous gold and silver values with maxima of 25ppb and 5ppm respectively. Maximum values for other metals include 350ppm arsenic, 1000ppm copper, 32ppm bismuth and 16.5ppm antimony.' (Reproduced from report CR 2004-0166).

GEOLOGICAL SETTING

Western Creek is located within the Arunta Region of the Northern Territory. 'The geology of this region consists of

- Mountain ranges; hills and ridges; sand plains with dune fields; alluvial plains with salt lakes.
- Palaeoproterozoic sediments and volcanics metamorphosed to schist, quartzite, gneiss, amphibolite, marble, and felsic and mafic granulite; overlain unconformably by Neoproterozoic sediments.
- Palaeoproterozoic and Mesoproterozoic felsic to mafic volcanics and intrusive's; minor ultramafic intrusive's.' (GA_Aus_GeologicalRegions_2_5m)

'The Arunta region has undergone multiple deformations, at least 3 defined and metamorphism of granulite facies from around 1800Ma to the most recent during the Carboniferous 350Ma.(See table below) The style of deformation and metamorphism is similar to other Proterozoic orogens with anti-clockwise P-T paths and little uplift. Other Australian examples of this type of terrane are the Olary Block and the Mt Isa Inlier, both of which contain economic mineralisation. Extension and faulting in the region was followed by sedimentation to Amadeus, Ngalia, Wiso and Georgina basins'.[1]
The Toro tenements are located between the Ngalia Basin, to the South and the Wiso Basin to the North. This area within the Arunta Region is termed the Aileron Province.
'Stratigraphic units in the region are Weldon Metamorphics, Lander Rock Formation (Beds), Reynolds Range Group, Napperby Gneiss, Anmatjira Orthogneiss, Harverson Granite and Mt Airy Orthogneiss.
The Reynolds Range group of sediments are intruded by the mylonitised and anhydrous, Napperby Gneiss and lie unconformably above 1820Ma granites'.[2]
Read and Cartwright[2] suggest that fluid movement throughout the shear zones of this region is attributed to meteoric rather than magmatic fluids. This may be of some importance to mobilisation of uranium.

Age	Regional Event	Tectonic Cycle
≥ 1880 Ma	Deposition of Lander Assemblage	
1880 Ma	Yuendumu Tectonic Event *(equivalent to Barramundi Orogeny ?)*	First Tectonic Cycle *(prograde metamorphism)*
1860 - 1820 Ma	Stafford Tectonic Event	
1820 - 1780 Ma	Deposition of Reynolds Assemblage	
1780 - 1760 Ma	Weldon Tectonic Event (Anmatjira - Reynolds Range) Hardy Tectonic Event (Mt. Doreen - Yuendumu) *(equivalent to Strangways Orogeny ?)*	Second Tectonic Cycle *(retrograde metamorphism)*
≥ 1635 Ma	Warbudali Tectonic Event (Mt. Doreen - Yuendumu) *(equivalent to Chewings Orogeny ?)*	
850 Ma	Deposition of Vaughan Springs Quartzite	
400 - 300 Ma	Alice Springs Orogeny	

Figure 5; Geological History of the Northern Arunta Inlier. Taken from report CR 1995-0369

References:

1 Dirks, P. Wilson, C. 1990. The geological evolution of the Reynolds Range, central Australia: evidence for three distinct structural-metamorphic cycles. **Journal of Structural Geology** pp651-665

2 Read, C. Cartwright, I. 2000. Meteoric fluid infiltration in the middle crust during shearing: examples from the Arunta Inlier, central Australia. **Journal of Geochemical Exploration** pp 333-337