

# QUARTERLY ACTIVITIES REPORT

FOR QUARTER ENDED 30 September 2014

## HIGHLIGHTS

### EXPLORATION

- 2014 drilling campaign commenced at Tin Camp Creek Uranium Project in the Alligator Rivers Uranium Province, Northern Territory.
- Drilling undertaken on three separate target areas - North East Myra, Orion South and Mintaka during the September quarter.
- In total, 25 drill holes for a total of 4425 meters were completed at the Tin Camp Creek Project in the quarter.
- High grade uranium intersected at North East Myra and Mintaka including:  
**3m @ 1489ppm U3O8 from 60m**, from North East Myra hole OBR14-111.  
**2m @ 1005ppm U3O8 from 93m**, from North East Myra hole OBR14-108.  
**5m @ 723ppm U3O8 from 38m**, from Mintaka hole OBR14-120.  
**1m @ 1356ppm U3O8 from 86m**, from Mintaka hole OBR14-122.
- New exploration licence, Mamadawerre East (EL27251), granted within the Company's wider Alligator Rivers project area.

### CORPORATE

- Alligator completed a circa \$4m capital raising to fund ongoing exploration.
- Capital raising comprised:
  - Strategic share Placement to sophisticated investors of 30,750,000 shares at \$0.04 per share that raised \$1.23m; and
  - A non-renounceable Rights Issue of 1 new share for every 3.5 shares held at \$0.04 per share that raised approx \$2.7m (including placement of Rights Issue shortfall).
- Terms agreed for a Farm-in agreement with Cameco Australia Pty Ltd for Cameco's Beatrice Uranium Project, located immediately south of the Tin Camp Creek Project.
- Company maintains a solid cash position, of \$4.4m at 30 September 2014
- The Company received an R&D Offset payment from the ATO in relation to the 2013 financial year amounting to \$558k during the quarter.

**Alligator Energy**

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ASX Code: AGE

**Number of Shares:**

304M Ordinary Shares  
11M Unlisted Options

**Board of Directors:**

Mr John Main  
(Chairman)

Mr Robert Sowerby  
(CEO, Director)

Mr Paul Dickson  
(Non Exec. Director)

Mr Peter McIntyre  
(Non Exec. Director)

Mr Andrew Vigar  
(Non Exec. Director)

## EXPLORATION ACTIVITIES

During the September 2014 quarter, Alligator commenced its 2014 drilling campaign at its core asset, the Tin Camp Creek Uranium Project in the Alligator Rivers Uranium Province, in the Northern Territory. Consistent with the Company's strategy of targeting the discovery of new, large scale uranium deposits, of >100Mlb U<sub>3</sub>O<sub>8</sub>, Alligator plans to drill test five priority target areas in this field season, each of which is considered to have favourable geological, geochemical and spatial characteristics for hosting large uranium deposits.

### 2014 Drilling Campaign

In August (ASX announcement, 11 August 2014) Alligator announced that it had commenced its 2014 drilling campaign at the Tin Camp Creek Uranium Project. Priority targets for drilling in the 2014 field season were identified as the Orion North, North East Myra, Mintaka, Orion South and Orion East prospects.

These targets were selected on the basis of having favourable host rocks, structure and known presence of strong uranium and/or pathfinder element anomalism. The targets were further refined and prioritized utilising the results of the air-borne SAM/MMR geophysical survey completed in July.

During the quarter Alligator reported results from drilling at the Orion North, North East Myra and Mintaka prospects. In total, 25 drill holes for a total of 4425 meters were completed in the September 2014 quarter.

Subsequent to the quarter (ASX announcement, 21 October 2014), the Company reported that three initial drill holes had been completed at Orion South, with one hole intersecting intense chlorite alteration at the unconformity, and that drilling was nearing completion at Orion East. Also, a further two Diamond drill holes have been completed at Mintaka to test a prominent Transient Field Electromagnetic (TFEM) anomaly.

#### Orion North

On 22 August the Company reported its first results from the 2014 drilling campaign, at the Orion North prospect. Six RC holes were completed in two traverse lines across the target and intersected chlorite altered schists associated with the SAM/MMR geophysical target zones. Anomalous but sub-economic uranium concentrations were intersected within these altered zones.

#### North East Myra

Eight RC Percussion drill holes were completed at the North East Myra prospect (ASX Announcement, 2 September, 2014); approximately 2km along strike of Orion North, and radiometric anomalism was detected in four of these holes.

Strong radiometric responses were intersected in drill holes OBR14-108 (maximum 5000cps from 93-94metres) and OBR14-111 (7878cps from 61-62metres) over narrow intervals. Anomalism was associated with the interpreted continuation of SAM/MMR anomalies. The results provided further encouragement of the presence of uranium mineralisation and anomalism over a significant strike length and that current targeting techniques are effective.

Subsequent to the quarter, Alligator announced the assay results from the drilling completed at North East Myra and the Orion North targets (ASX announcement, 8 October 2014).

The laboratory assay results confirmed the presence of high grade uranium mineralisation at North East Myra, with best intersections of;

- **3m @ 1489ppm U<sub>3</sub>O<sub>8</sub> from 60m**, from hole OBR14-111, located on the eastern most drill line
- **2m @ 1005ppm U<sub>3</sub>O<sub>8</sub> from 93m**, from hole OBR14-108, ~500m west and along strike from OBR14-111.

These two intersections are hosted in altered schists and are interpreted to be linked by a mineralised structure. Further potential exists to the northeast and along strike of existing drilling.

Anomalous uranium mineralisation (>200-1000 ppm U<sub>3</sub>O<sub>8</sub>) was also intersected over narrow intervals in four additional drill holes in the Orion North-North East Myra areas. The presence of high grade uranium mineralisation at North East Myra is encouraging. The Company will plan for further work at this target, but no follow up work is currently planned for the Orion North target.

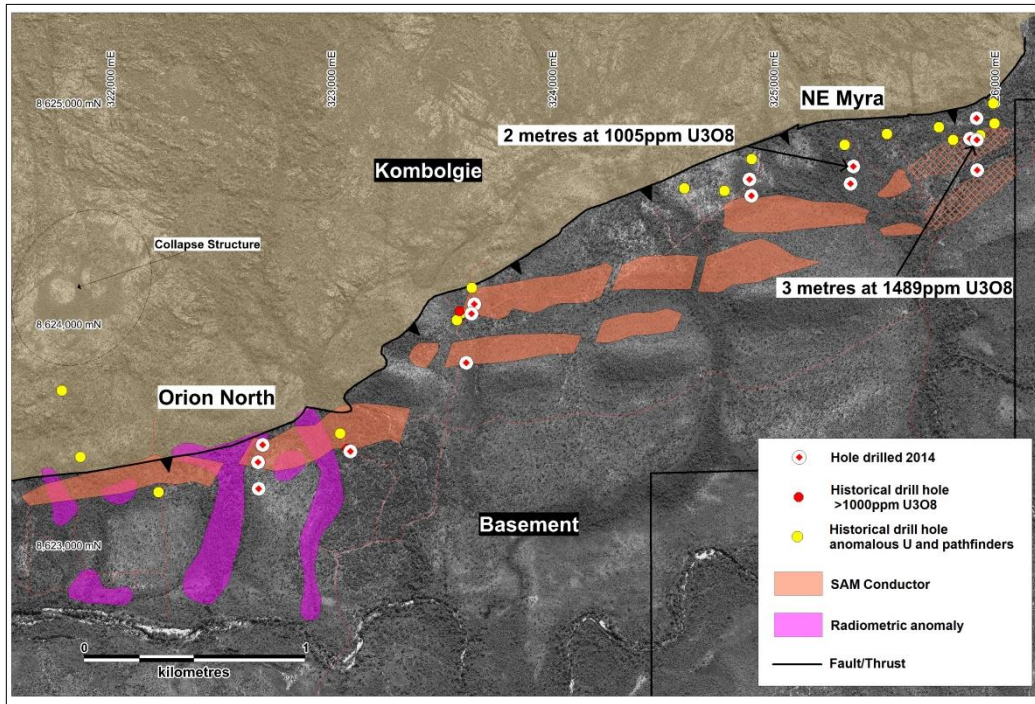


**Figure 1: Location map showing completed drilling at Orion North and NE Myra**

## Mintaka

Nine RC Percussion drill holes were completed at the Mintaka prospect (ASX announcement, 17 September, 2014) for a total of 1,538 metres. Radiometric anomalism was detected in six of these holes. Strong radiometric responses were intersected in drill holes OBR14-120 (maximum 9250 counts per second from 38-39 metres) and OBR14-122 (maximum 3910 counts per second from 86-87 metres).

Anomalism was closely associated with the peak of SAM/MMR anomalies. The radiometric anomalism was primarily associated with strongly chlorite altered dolerite. Drilling defined a north-west trending and south-east dipping zone of alteration and radiometric anomalism. Radiometric anomalism was detected in strongly altered Cahill formation lithologies underlying the dolerite in hole OBR14-122. This indicated that the zone of alteration and radiometric anomalism may extend into prospective basement lithologies to the north-east of this drilling.

Subsequent to the quarter, Alligator announced the laboratory assay results from the drilling at Mintaka, which returned intersections of high grade uranium mineralisation (ASX announcement, 21 October) including included:

- **5m @ 723ppm U3O8 from 38m, from hole OBR14-120, including 1m @ 2299ppm U3O8, north of historical drilling at the Mintaka prospect.**
- **1m @ 1356ppm U3O8 from 86m, from OBR14-122, ~125m north of OBR14-120.**

The Mintaka area is considered prospective for further drilling and subsequent to the quarter a further two Diamond drill holes were completed at the target to test a prominent Transient Field Electromagnetic (TFEM) anomaly.

Drilling at Mintaka has defined uranium mineralisation and anomalism in a broad area, over a strike length of approximately 2km. The focus of ongoing exploration at Mintaka will be the definition of the main zone of structural dislocation focusing uranium mineralisation in this area, which is considered key to the discovery of a significant uranium deposit in the area.

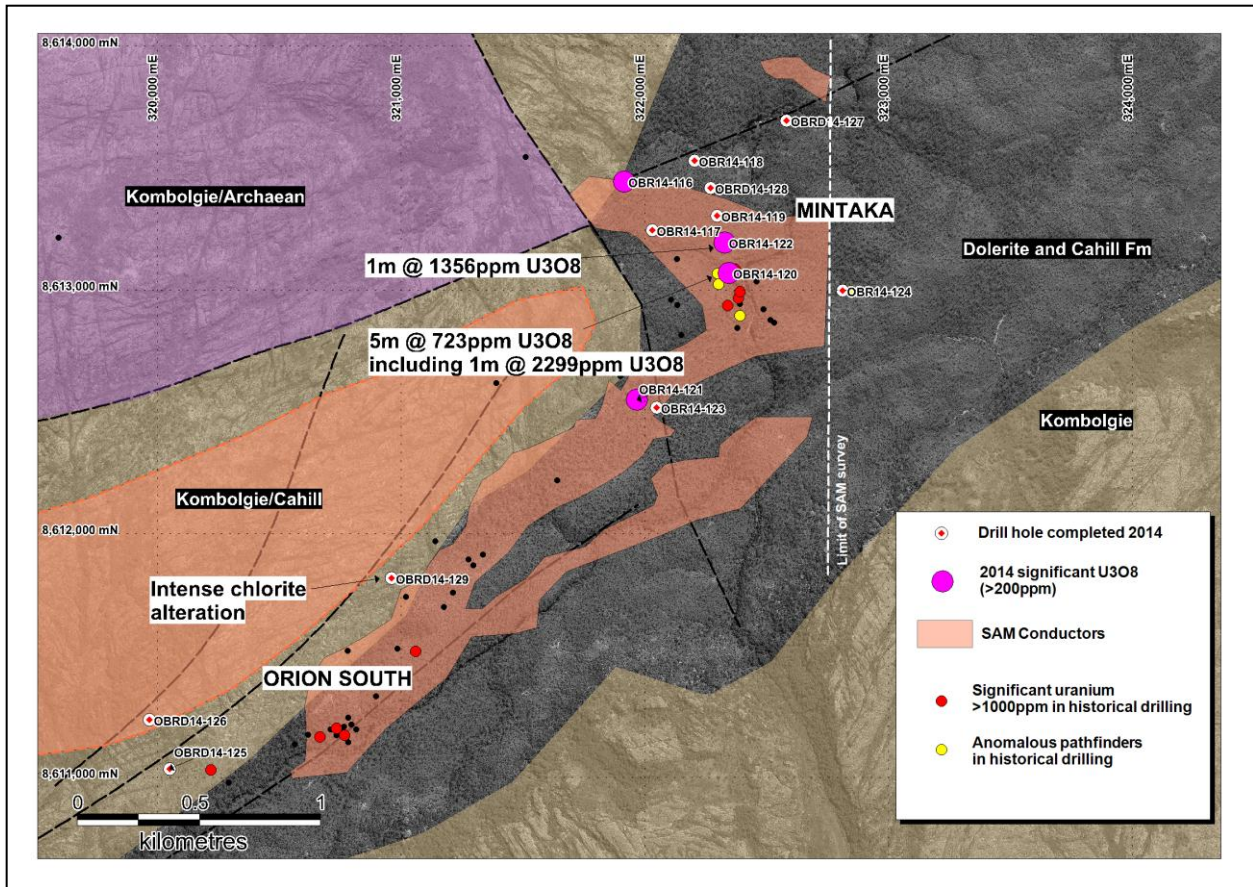


**Figure 2: Location map showing completed drilling at Mintaka**

## Successful Geophysical Survey undertaken

In July (ASX announcements, 9 and 25 July 2014), Alligator conducted an air-borne SAM/MMR Geophysical Survey over the Tin Camp Creek project area.

The survey covered a significant part of the sandstone covered areas of the project, including the primary target areas of Mintaka, Orion North, Orion East, Northeast Myra and South Orion. It was designed to identify conductive rock units (low resistivity) in the target basement rocks that may be associated with unconformity uranium style mineralisation.

The drilling results have indicated that the survey technique has been successful in identifying basement conductive units underlying the Komolgie Sandstone. Existing targets have been more clearly defined and a number of previously unknown basement features have been identified which warrant further investigation.

Alligator, in conjunction with survey company, GAP Geophysics, applied a configuration designed to maximize the signal response from basement rocks underlying the Komolgie Sandstone prevalent in the project area.

While further interpretation of the data is ongoing, Alligator considers that the application of this geophysical technique and the results achieved provide a significant new impetus to the Company's exploration in the area.

The ability to target through the sandstone has previously presented a significant challenge for explorers in the Alligator Rivers Uranium Province, and exploration has historically been limited in the area as a result. The results from Alligator's 2014 drilling campaign have served to validate the Company's targeting methodology utilizing the SAM/MMR Geophysical Survey data.

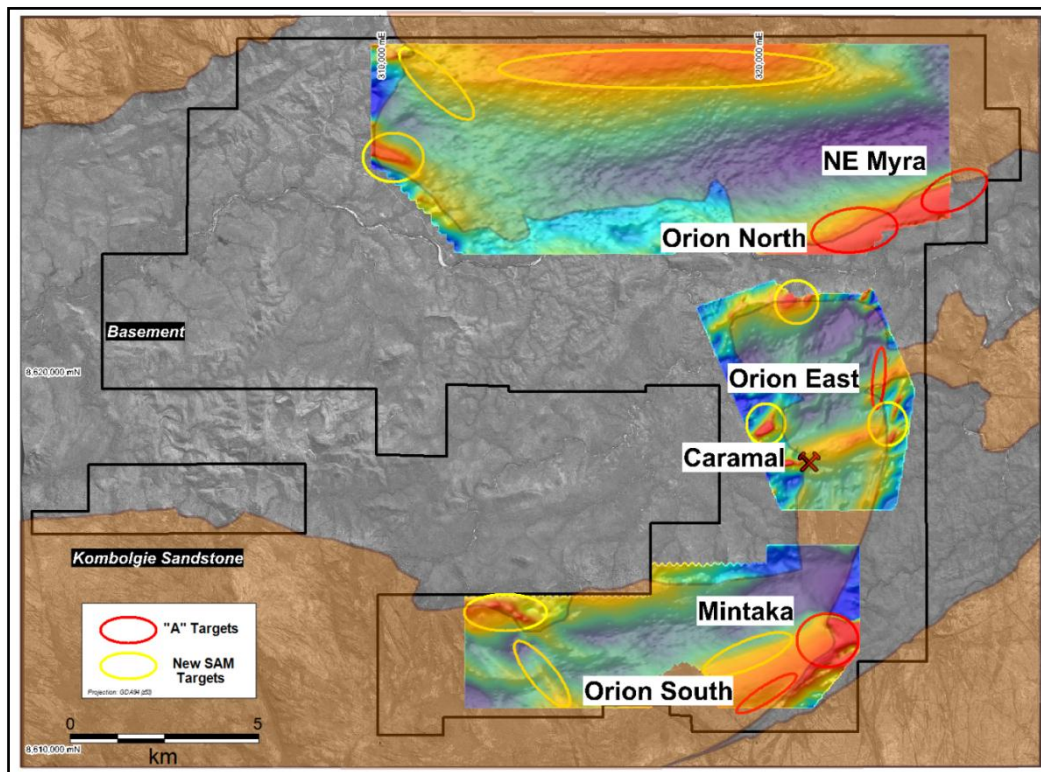


**Figure 3: Tin Camp Creek Project - Prospect Location and SAM Survey Areas**

## Farm-in agreement with Cameco for Beatrice Project

In September Alligator announced an in principle agreement with Cameco Australia Pty Ltd (Cameco) to farm-in to Cameco's Beatrice Project in the Alligator Rivers Uranium Province (ASX announcement, 3 September 2014).

The Beatrice Project (ELs24291 and 26796 and ELAs 26793, 26794, 26795) is 100% owned by Cameco. It covers an area of 481km<sup>2</sup> and is located immediately south of the Tin Camp Creek Project area.

Alligator considers the project to be highly prospective for unconformity style uranium mineralisation. It forms a contiguous land holding with the Tin Camp Creek project area, and will allow Alligator to pursue prospective structures and mineralised trends identified by exploration at Tin Camp Creek.

The project area contains known uranium occurrences and has a best historic drill intersection of 7m @ 2.8% U<sub>3</sub>O<sub>8</sub>, at the Beatrice prospect (Queensland Mines Ltd in 1971).

Key terms of the proposed Farm-in and Joint Venture are provided in the ASX announcement of 3 September.

A final agreement is being prepared and execution of the final agreement is subject to the renewal of ELs24291 and 26796 by the Northern Territory Department of Mines and Energy. The parties are committed to completing a final agreement expeditiously.

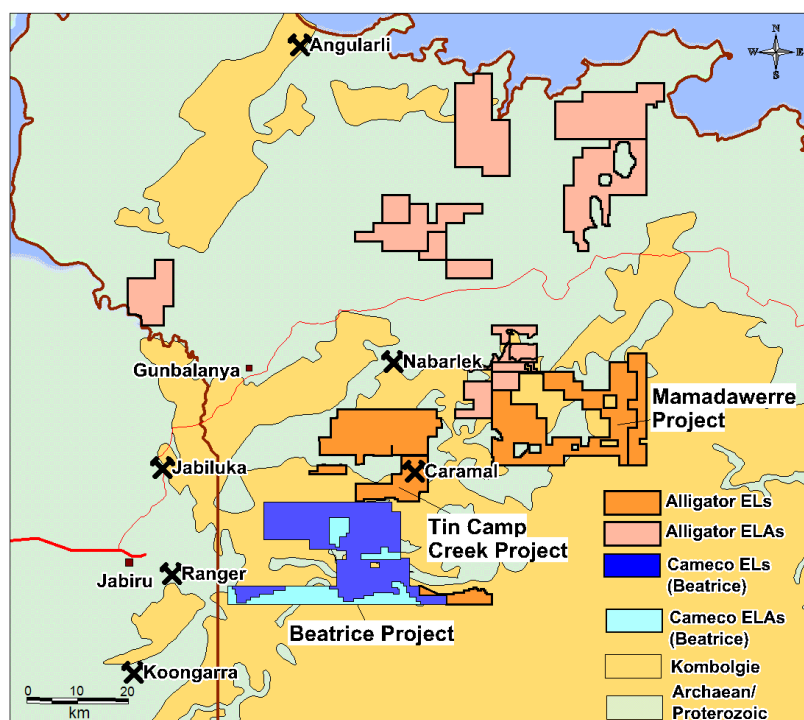


**Figure 4: Beatrice Project Regional Location**

## New tenement granted – Mamadawerre East (EL27251)

In August the Company was granted a new exploration licence, Mamadawerre East (EL27251), within its wider Alligator Rivers project area (ASX announcement, 21 August).

The licence covers an area of 62km<sup>2</sup> and is held 100% by Northern Prospector Pty Ltd (a 100% owned subsidiary of Alligator Energy Ltd). It adjoins the Mamadawerre JV project (EL24992), which is a joint venture between Cameco Australia Pty Ltd (Cameco) and Alligator whereby Alligator may earn up to 90% of the Mamadawerre JV project.

An initial field inspection of the new licence was undertaken in August and focused on the prominent north-west trending Steptoe Fault which continues onto the adjoining Mamadawerre JV area. Uranium mineralisation was identified at surface. Radiometric anomalism was identified over a strike length of approximately 400 metres. Six rock chip samples were submitted for laboratory analysis.

In September (ASX announcement, 17 September 2014), a helicopter-supported reconnaissance surface sampling and auger sampling survey was conducted over the entire Mamadawerre project area, including the EL24992 (Cameco JV) and EL27251 (100% AGE). Results from this field work will be reported in due course.

The grant of EL27251 followed the successful negotiation of an Exploration Agreement with the Northern Land Council, the representative body for the Traditional owners of the Land. The new licence was granted for a period of six years.

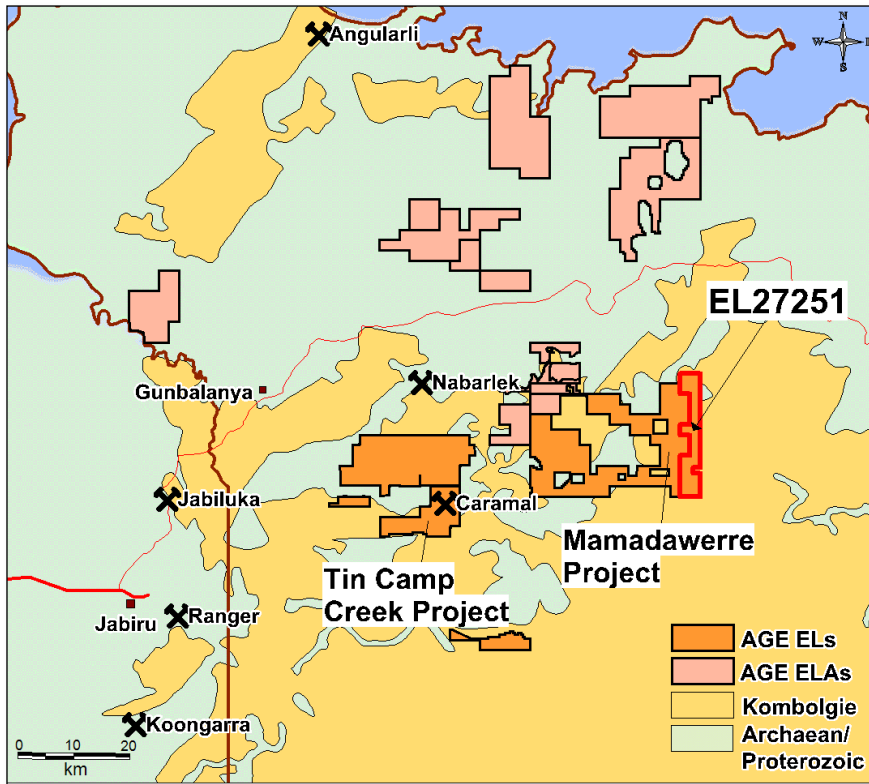


**Figure 5. Tenure status in the Alligator Rivers Uranium Province. Newly granted EL27251 highlighted by red boundary.**

## CORPORATE ACTIVITIES

### Capital Raising

In July (ASX announcement, 29 July 2014), Alligator announced a capital raising for approximately \$4 million, to drive the next phase of its uranium exploration strategy at its project area in the Northern Territory.

#### The capital raising comprised:

- A strategic share Placement of 30,750,000 shares, approximately 15% of total Alligator shares currently on issue, to raise \$1.23M (before costs) to sophisticated investors at \$0.04 per share; and
- A non-renounceable Rights Issue to raise up to approx \$2.7M (before costs) at \$0.04 per share, on the basis of 1 new share for every 3.5 shares currently held.

The price of the Placement and Rights Issue represented a discount of 13% on the VWAP for the 10 business days up to 24 July 2014. The Rights Issue was fully underwritten by Taylor Collison.

#### Use of Funds

The funds raised will be used to underpin ongoing exploration activities at the Tin Camp Creek Uranium Project including:

- Undertaking the drilling of five priority targets at Tin Camp Creek in H2, 2014;
- Assess new targets identified by recent geophysical surveys at the project;
- Investigate and advance business development opportunities, and provide working capital to the Company.

#### Placement

The placement was successfully completed on 1 August 2014 (prior to the Record Date for the Rights Issue). Participants in the Placement were also entitled to participate in the Rights Issue on the basis of these shares. The Placement shares rank equally in all respects with Alligator's existing shares.

## Rights Issue

Approximately 67,574,625 new shares were offered under the Rights Issue. It closed on 28 August 2014 and was successful in raising a total of \$2,702,985. The components of the capital raising are detailed below.

Acceptances of Entitlements under the Rights Issue were received for a total of 35,941,587 new shares which raised \$1,437,664.

In addition, a number of shareholders who accepted their full Entitlement also applied for additional shares under the offer. All applications for additional shares were honored, and this resulted in the issue of 6,104,760 additional shares which raised a further \$244,190.

The total amount raised under the Rights Issue (\$1,681,854 via the issue of 42,046,347 new shares) gave rise to a Rights Issue shortfall of \$1,021,131, representing 25,528,278 new shares. In accordance with the terms of the underwriting arrangements (refer details in the Offer document dated 5 August 2014), Taylor Collison and its sub-underwriters subscribed for the full shortfall amount (ASX announcement, 10 September, 2014).

The Company's largest shareholder Macallum Group Ltd (MGL) participated in the sub-underwriting by taking up a further 7,260,000 new shares. This maintained MGL's percentage holding in the Company at 18.36%, the same level as it held prior to the capital raise. The Company would like to thank MGL and Taylor Collison for their continued support. Shares issued pursuant to the Rights Issue rank equally with all shares on issue.

## Cash at Bank

The Company has maintained a sound cash position and as at 30 September 2014, had cash reserves of \$4.4million.

## Research and development

The company has continued the R&D program during the quarter. The focus of this work is to develop innovative techniques to explore for concealed Unconformity Uranium Deposits. An extended trial of Pb isotope sampling and analysis has been undertaken over the TCC project area. The techniques being trialed were derived from research work undertaken as part of Stage 1 of Alligator's Collaboration Research Project with the CSIRO.

The company has also undertaken an innovative application of the SAM/TFMMR geophysical technique during the quarter. The configuration used has shown promise in identifying alteration associated with uranium mineralization.

The Northern Territory Geological Survey (NTGS) also agreed to co-funding up to a total of \$147,000 for drilling and a Sub Audio Magnetics geophysical survey at the Tin Camp Creek project area. The co-funding arrangement is part of the NTGS Collaborations Program which provides co-funding assistance to successful applicants for selected exploration drilling and geophysical acquisition projects for exploration in new areas and demonstrating innovation. During the quarter the Company received a co-funding payment of \$35k

The Company also received a R&D Offset payment from the ATO in relation to the 2013 financial year amounting to \$558k.

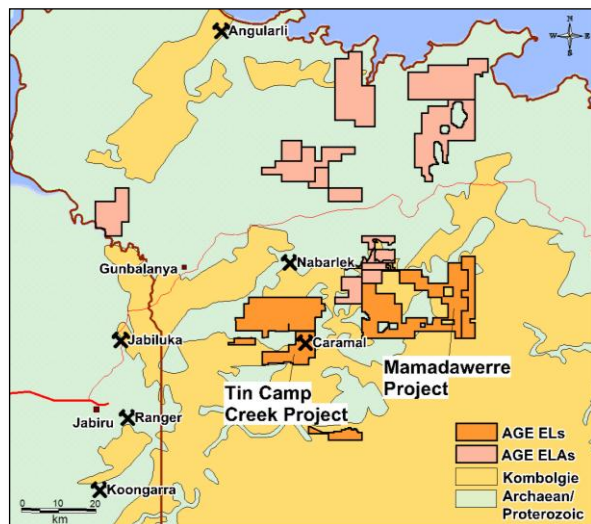
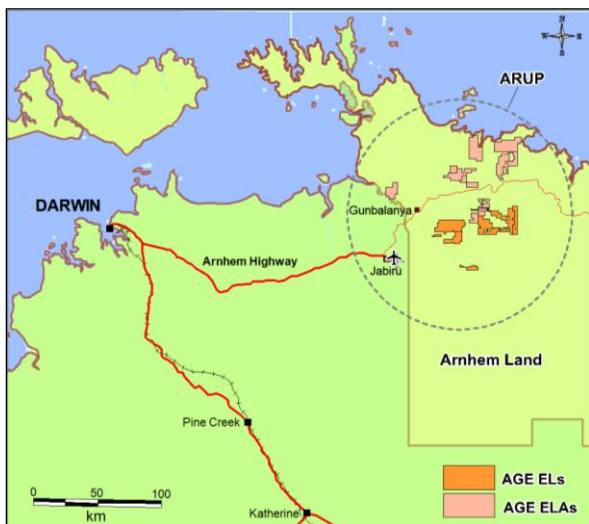
## Competent Persons Statement

Information in this report is based on current and historic Exploration Results compiled by Mr Rob Sowerby who is a Member of the Australasian Institute of Geoscientists. Mr Sowerby is CEO and Director of Alligator Energy Ltd, and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity he is undertaking to qualify as a Competent Person as defined in the 2012 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Mr Sowerby consents to the inclusion in this release of the matters based on his information in the form and context in which it appears.

## About Alligator Energy

Alligator Energy Ltd is an Australian, ASX listed, exploration company with uranium exploration tenements in the world class Alligator Rivers Uranium Province in Arnhem Land, Northern Territory. The Alligator Rivers Uranium Province hosts nearly 1 billion pounds of high grade uranium resources and past production, including the Ranger Mine and Jabiluka. The company's flagship project is the Tin Camp Creek Project. Since listing in February 2011, the company has completed in excess of 15,000m of drilling, defined a maiden high grade, JORC compliant resource at Caramal (6.5Mlb U3O8 at 3100ppm U3O8) and discovered new mineralization at Mintaka and Orion East. High Grade mineralization also occurs at the historic South Horn and Gorrunghar prospect which remain only partially tested.

The company has in excess of 1000km<sup>2</sup> of Exploration Licence applications and is also in Joint Venture with Cameco Australia Pty Ltd for the Mamadawerre Project, also within the Alligator Rivers Uranium Province



## Project Location Diagrams

### FOR FURTHER INFORMATION, PLEASE CONTACT

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Energy**