

## **YANREY URANIUM PROJECT DRILLING UPDATE**

***25,000 metre drilling programme underway, camp fully operational and logistics complete***



### **Key Points**

- Air-core drilling underway with Wallis Drilling contracted for the 2024 drilling programme consisting of 251 holes for ~25,000 metres of drilling;
- Commencement of drilling had been delayed to extensive adverse weather conditions in the last few weeks. Thankfully; Cauldron was not subject to stand by costings during this delay. This short delay is not expected to have any meaningful impact on the overall 2024 work programme.
- WSG logging team on-site with fully calibrated downhole geophysical gamma radiation logging and rock formation density measurement equipment;
- Drilling commenced with twin holes over previously logged and assayed diamond drillholes for equipment calibration and target zones validation;
- Cauldron's full CY2024 drilling programme of circa 25,000 metres is designed to:
  - expand and further upgrade the resource confidence of the existing JORC (2012) Mineral Resource Estimate (MRE) of 38.8Mt @ 360 ppm eU<sub>3</sub>O<sub>8</sub> for 30.9 Mlbs of contained uranium oxide (U<sub>3</sub>O<sub>8</sub>) - refer Appendix A for MRE Statement;
  - test the potential to substantially increase uranium mineral resources at new targets as identified in the Exploration Target for Yanrey Uranium Project (released to ASX on 24 January 2024) – refer Appendix B for further details and for Cautionary Statement; and
  - enhance project economics already defined in Scoping Study (released to ASX on 13 December 2023).

- All Programme Of Work (POW) applications approved by DMIRS WA;
- Thalanyji Heritage Survey to enable extension and new target air-core drilling sites completed and the preliminary report has been received by Cauldron, key recommendations are:
  - the archaeological and ethnographic Aboriginal cultural heritage survey of the Project Area is complete;
  - no new ethnographic sites were identified during the assessment;
  - one new Aboriginal cultural heritage site (**CA24-001**) was identified intersecting a drill line and eleven Heritage Restriction Zones were demarcated;
  - cultural heritage site and Heritage Restriction Zones will be marked in the field and avoided during the drilling operations
- Raised blade drill site access clearing concluded, providing Thalanyji-approved drilling equipment mobilisation access tracks, drill-site water sumps and drilling equipment work-site pads;
- Yanrey 10 person field support camp fully fitted-out and operational.
- Cauldron expects to be able to release results progressively and in a timely manner; as the method of sampling via down hole analysis does not require extended laboratory analyses. First results can be expected within two (2) to three (3) weeks; potentially earlier.

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Cauldron Energy Limited (**Cauldron** or the **Company**) (ASX: CXU) is pleased to confirm that following recent rainfall events, drilling and downhole logging activities are underway at Bennet Well.

**Cauldron CEO Jonathan Fisher commented:**

*“After excellent progress was made with heritage surveys, site clearance work to facilitate drilling operations and camp establishment, it has been highly frustrating that the commencement of drilling was delayed due to large rainfall events that have impacted the Pilbara region in recent weeks.*

*I am pleased to report that our drilling, wireline geophysical and field support teams are now fully operational on site with drilling having commenced earlier today which will facilitate the ongoing release of important results over the coming months.*

*As frustrating as the delay has been, it is not expected to impact our overall 2024 drill programme.*

*I look forward to being able to report results progressively (first results anticipated within the next fortnight) which we anticipate will further demonstrate and illustrate the size and grade potential of the Bennet Well Uranium Deposit and the greater Yanrey uranium project as the Company seeks to expand on its existing JORC (2012) Mineral Resource Estimate (MRE) of 38.8Mt @ 360 ppm eU<sub>3</sub>O<sub>8</sub> for 30.9 Mlbs of contained uranium oxide (U<sub>3</sub>O<sub>8</sub>), refer Appendix A for MRE Statement, and test new targets as identified in the Exploration Target for Yanrey Uranium Project (released to ASX on 24 January 2024), – refer Appendix B for further details and for Cautionary Statement*

*Discovering additional uranium pounds at Yanrey is viewed by the CXU Board and management as one of the most value creating activities we can do for the Company and its shareholders and this will be our primary focus over the next few months.*



Below are images of work in progress.



## Project details

The Yanrey Uranium Project is located ~ 100 kms south of the town of Onslow in Western Australia, and ~1,050 kms north of Perth (Figure 1).

The Bennet Well Uranium Deposit, forms part of Cauldron's Yanrey Uranium Project which encompasses a total area of 1,270 km<sup>2</sup>, mineralisation remains open to the north and south, and has the potential to be a much larger mineral resource than currently defined.

For full details of the calendar year 2024 drilling programme and the target area drilling objectives, please refer to Yanrey Uranium Project Exploration Drilling Update (released to ASX on 14 March 2024) and Figure 2 below.

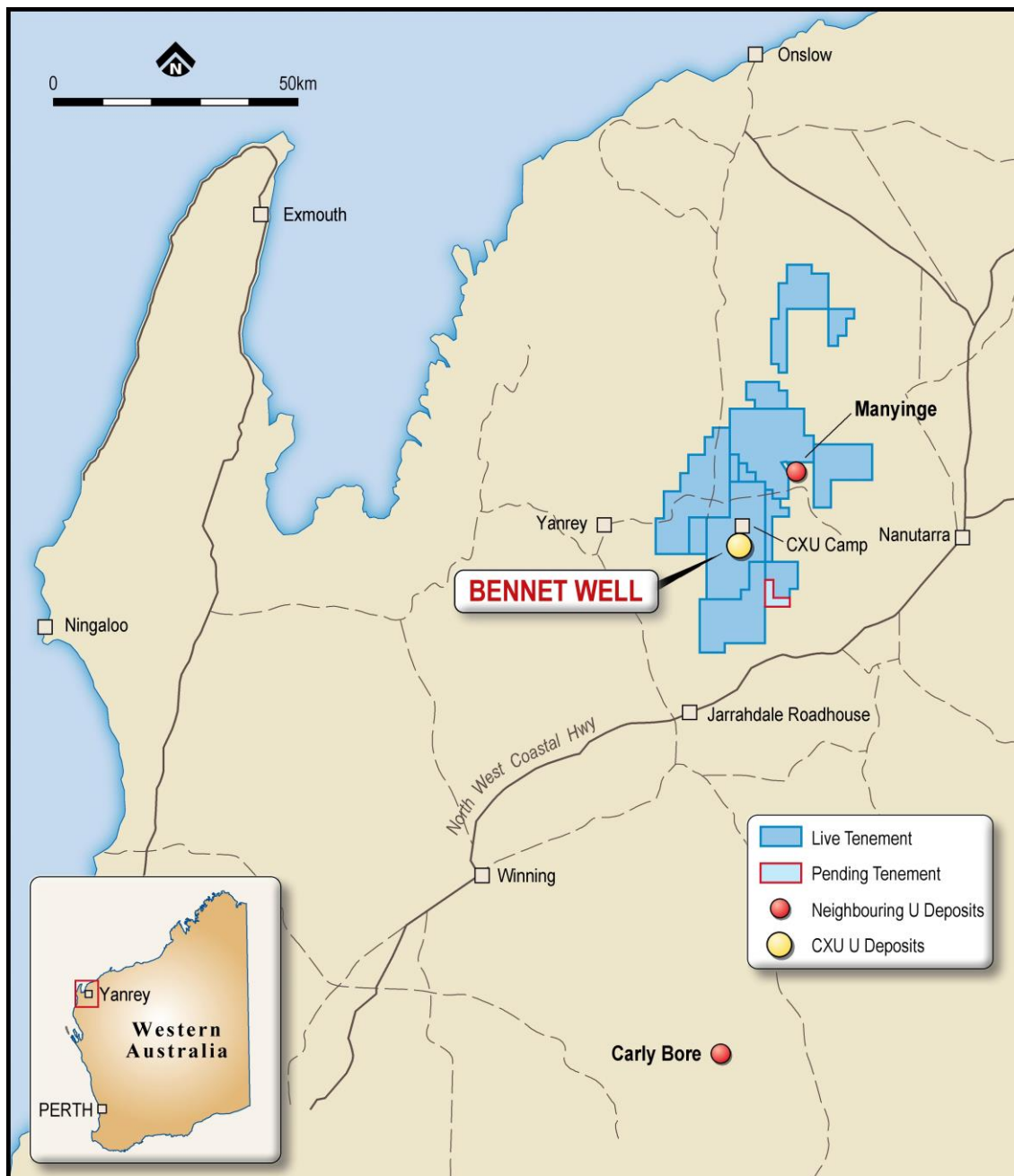
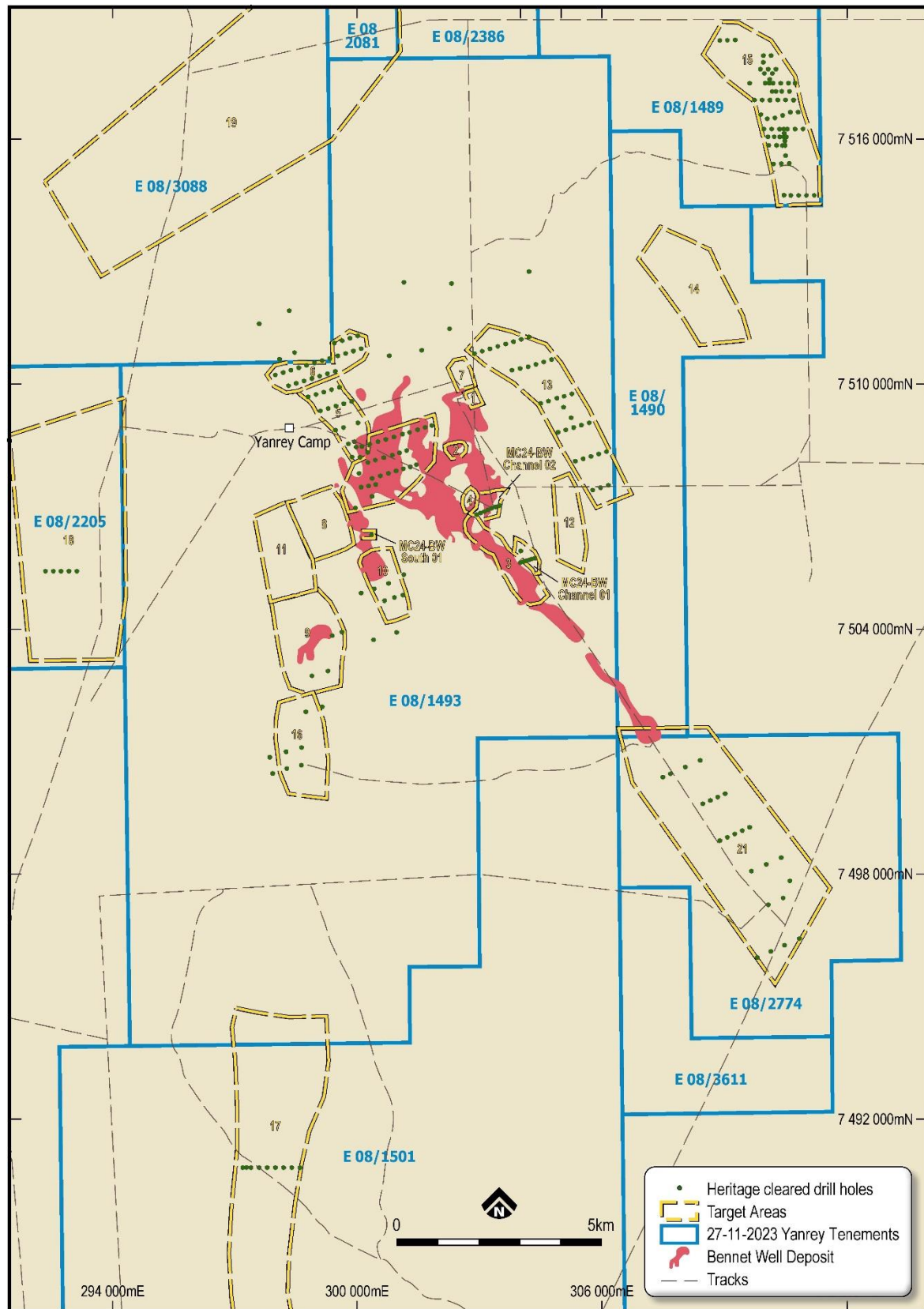


Figure 1: Location of Yanrey Uranium Project



**Figure 2: Location of Bennet Well Uranium Deposit and proposed drill hole locations over new targets, Bennet Well extensions, and Bennet Well infill sites**



Cauldron notes that current WA Labor Government policy presently will not grant mining approvals for uranium mining, and that as such uranium mining will only be possible once that government policy is changed. Cauldron has a reasonable expectation that this will occur based on current public opinion polling and Liberal party policy.

### **Authorisation For Release**

Authorised for release by Mr Jonathan Fisher, Chief Executive Officer of Cauldron Energy Limited.

Yours sincerely,  
CAULDRON ENERGY LIMITED

**End**

**Shareholders and Investors are invited to follow the Company on LinkedIn ([here](#)), X / Twitter through @cxuasx ([here](#)), or sign up to the Mailchimp list through [www.cauldronenergy.com.au](http://www.cauldronenergy.com.au)**

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### **Competent Person Statement**

The information in this report that relates to Mineral Resources for the Bennett Well Deposit is extracted from a report released to the Australian Securities Exchange (ASX) on 17 December 2015 titled "Substantial Increase in Tonnes and Grade Confirms Bennet Well as Globally Significant ISR Project" and available to view at [www.cauldronenergy.com.au](http://www.cauldronenergy.com.au) and for which Competent Persons' consents were obtained. Each Competent Person's consent remains in place for subsequent releases by the Company of the same information in the same form and context, until the consent is withdrawn or replaced by a subsequent report and accompanying consent.

Unless otherwise stated, where reference is made to previous releases of a Mineral Resource Estimate for the Bennet Well Uranium Deposit in this announcement, the Company confirms that is not aware of any new information or data that materially affects the information included in the original ASX announcement released on 17 December 2015 and, in the case of estimates of Mineral Resources, that all material assumptions and technical parameters underpinning the estimates in the original ASX announcement continue to apply and have not materially changed. The Company confirms that the form and context in which the Competent Persons' findings are presented have not been materially modified from the original ASX announcement.

The information in this report that relates to the Exploration Target for the Yanrey Uranium Project is extracted from a report released to the Australian Securities Exchange (ASX) on 24 January 2024 titled "Yanrey Uranium Project Exploration Target" and available to view at [www.cauldronenergy.com.au](http://www.cauldronenergy.com.au) and for which a Competent Person's consent was obtained. The Competent Person's consent remains in place for subsequent releases by the Company of the same information in the same form and context, until the consent is withdrawn or replaced by a subsequent report and accompanying consent. The Company confirms that the form and context in which the Competent Persons' findings are presented have not been materially modified from the original ASX announcement.

### **Forward Looking Statements**

This announcement may include forward-looking statements, based on Cauldron's expectations and beliefs concerning future events. Forward-looking statements are necessarily subject to risks, uncertainties and other factors, many of which are outside the control of Cauldron, which could cause actual results to differ materially from such statements. Cauldron makes no undertaking to subsequently update or revise the forward-looking statements made in this announcement, to reflect the circumstances or events after the date of the announcement.

## Appendix A: Bennet Well Mineral Resource Estimate

A Mineral Resource Estimate (JORC 2012) for the mineralisation at Bennet Well was completed by Ravensgate Mining Industry Consultants (Ravensgate) in 2015 and is based on information compiled by Mr Jess Oram, Executive Director of Cauldron Energy and Mr Stephen Hyland, who was a Principal Consultant of Ravensgate. Mr Oram is a Member of the Australasian Institute of Geoscientists and Mr Hyland is a Fellow of the Australasian Institute of Mining and Metallurgy.

The mineralisation at Bennet Well is a shallow accumulation of uranium hosted in unconsolidated sands close to surface (less than 100 m downhole depth) in Cretaceous sedimentary units of the Ashburton Embayment. The Bennet Well deposit is comprised of four spatially separate deposits; namely Bennet Well East, Bennet Well Central, Bennet Well South and Bennet Well Channel.

The Mineral Resource (JORC 2012) estimate is:

- Inferred Resource: 16.9 Mt at 335 ppm eU<sub>3</sub>O<sub>8</sub> for total contained uranium-oxide of 12.5 Mlb (5,670 t) at 150 ppm cut-off;
- Indicated Resource: 21.9 Mt at 375 ppm eU<sub>3</sub>O<sub>8</sub> for total contained uranium-oxide of 18.1 Mlb (8,230 t) at 150 ppm cut-off;
- total combined Mineral Resource: 38.9 Mt at 360 ppm eU<sub>3</sub>O<sub>8</sub>, for total contained uranium-oxide of 30.9 Mlb (13,990 t) at 150 ppm cut-off.

**Table 1: Mineral Resource (JORC 2012) at various cut-off**

Deposit	Cutoff (ppm eU <sub>3</sub> O <sub>8</sub> )	Deposit Mass (t)	Deposit Grade (ppm eU <sub>3</sub> O <sub>8</sub> )	Mass U <sub>3</sub> O <sub>8</sub> (kg)	Mass U <sub>3</sub> O <sub>8</sub> (lbs)
Bennet Well_Total	125	39,207,000	355	13,920,000	30,700,000
<b>Bennet Well_Total</b>	<b>150</b>	<b>38,871,000</b>	<b>360</b>	<b>13,990,000</b>	<b>30,900,000</b>
Bennet Well_Total	175	36,205,000	375	13,580,000	29,900,000
Bennet Well_Total	200	34,205,000	385	13,170,000	29,000,000
Bennet Well_Total	250	26,484,000	430	11,390,000	25,100,000
Bennet Well_Total	300	19,310,000	490	9,460,000	20,900,000
Bennet Well_Total	400	10,157,000	620	6,300,000	13,900,000
Bennet Well_Total	500	6,494,000	715	4,640,000	10,200,000
Bennet Well_Total	800	1,206,000	1175	1,420,000	3,100,000

Deposit	Cutoff (ppm U <sub>3</sub> O <sub>8</sub> )	Deposit Mass (t)	Deposit Grade (ppm U <sub>3</sub> O <sub>8</sub> )	Mass U <sub>3</sub> O <sub>8</sub> (kg)	Mass U <sub>3</sub> O <sub>8</sub> (lbs)
BenWell_Indicated	125	22,028,000	375	8,260,000	18,200,000
<b>BenWell_Indicated</b>	<b>150</b>	<b>21,939,000</b>	<b>375</b>	<b>8,230,000</b>	<b>18,100,000</b>
BenWell_Indicated	175	21,732,000	380	8,260,000	18,200,000
BenWell_Indicated	200	20,916,000	385	8,050,000	17,800,000
BenWell_Indicated	250	17,404,000	415	7,220,000	15,900,000
BenWell_Indicated	300	13,044,000	465	6,070,000	13,400,000
BenWell_Indicated	400	7,421,000	560	4,160,000	9,200,000
BenWell_Indicated	500	4,496,000	635	2,850,000	6,300,000
BenWell_Indicated	800	353,000	910	320,000	700,000

Deposit	Cutoff (ppm U <sub>3</sub> O <sub>8</sub> )	Deposit Mass (t)	Deposit Grade (ppm U <sub>3</sub> O <sub>8</sub> )	Mass U <sub>3</sub> O <sub>8</sub> (kg)	Mass U <sub>3</sub> O <sub>8</sub> (lbs)
BenWell_Inferred	125	17,179,000	335	5,750,000	12,700,000
<b>BenWell_Inferred</b>	<b>150</b>	<b>16,932,000</b>	<b>335</b>	<b>5,670,000</b>	<b>12,500,000</b>
BenWell_Inferred	175	14,474,000	365	5,280,000	11,600,000
BenWell_Inferred	200	13,288,000	380	5,050,000	11,100,000
BenWell_Inferred	250	9,080,000	455	4,130,000	9,100,000
BenWell_Inferred	300	6,266,000	535	3,350,000	7,400,000
BenWell_Inferred	400	2,736,000	780	2,130,000	4,700,000
BenWell_Inferred	500	1,998,000	900	1,800,000	4,000,000
BenWell_Inferred	800	853,000	1285	1,100,000	2,400,000

**Note 1:** table shows rounded numbers therefore units may not convert nor sum exactly **Note 2:** preferred 150 ppm cut-off shown in bold.

## Appendix B: Exploration Target for Yanrey Uranium Project

**Table 2: Exploration target for Yanrey Uranium Project**

Exploration Target	Tonnage and Grade Range	
	Tonnes (Mt)	Grade (ppm eU <sub>3</sub> O <sub>8</sub> )
Lower	20.4	326
Upper	66.2	464

**Cautionary Statement:**

**The potential quantity and grade of the Exploration Target is conceptual in nature and therefore is an approximation. There has been insufficient exploration to estimate a Mineral Resource in the area considered an exploration target and it is uncertain if further exploration will result in the estimation of a Mineral Resource. The Exploration Target has been prepared and reported in accordance with the 2012 edition of the JORC Code.**

The Exploration Target is based on the current geological understanding of the mineralisation geometry supported by a significant amount of geological and geophysical data, resource estimation modelling and surface mapping, however the Exploration Target does not consider factors related to geological complexity, or metallurgical recovery factors. This estimate provides an assessment of the potential scale of the Yanrey project mineralisation beyond the existing MRE and the work programs needed to convert this estimate to a resource in the future

The Exploration Target for the Yanrey Uranium Project incorporates work programmes conducted in recent years (post 2015) and encapsulates the twenty-two (22) target areas set out in the Exploration Target for Yanrey Uranium Project (released to ASX on 24 January 2024).

Ten (10) of the 22 target areas are planned to be tested with 251 drill holes for approximately 25,800 metres of air-core drilling during 2024.

Successful outcomes from these work programmes will have significant potential to grow the uranium Mineral Resources at Bennet Well and the greater Yanrey Project area, further demonstrating the scale and importance of the Yanrey Project for future uranium mine development studies.

The Company has plans to conduct further drilling programs to progressively target uranium mineralisation in the Target areas identified over the next 3 years with significant drilling planned for calendar year 2024 as outlined herein to expand the MRE and to test the validity of the exploration target (see Table 2 above). Additional mineral resources can be expected to enhance project economics already defined in a Scoping Study.