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Company Announcements Office Australian Stock Exchange Limited Exchange Centre Level 4, 20 Bridge Street Sydney NSW 2000

Via electronic lodgement

Dear Sir/Madam,

15 May 2009

Please find the following announcement for immediate release to the market. This announcement is made on behalf of the Bigrlyi Joint Venture partners being Energy Metals Limited with 53.7%, Valhalla Uranium Limited (a subsidiary of Paladin Energy Limited) with 42.1% and Southern Cross Exploration NL with 4.2%.

Yours faithfully,

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LINDSAY DUDFIELD **Executive Director.**

15 May 2009

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Via electronic lodgment

<u>Infill Drilling lifts Bigrlyi Resource Confidence</u> 45% of Uranium Resource now Indicated Category

Energy Metals, as manager of the Bigrlyi Joint Venture (BJV), is pleased to announce the results of a recently completed resource estimate for the Bigrlyi Uranium and Vanadium Project in the Northern Territory. This resource estimate incorporates the results from an infill drilling program (83 holes) approved by the BJV and completed in December 2008.

Indicated and Inferred Resources at 500ppm U₃O₈ cut off

Resource Category	Tonnes (Millions)	U ₃ O ₈ (ppm)	V ₂ O ₅ (ppm)	U ₃ O ₈ (t)	V ₂ O ₅ (t)	U ₃ O ₈ (MIb)	V ₂ O ₅ (MIb)
Indicated	2.74	1,530	2,300	4,190	6,310	9.2	13.9
Inferred	4.53	1,140	2,470	5,150	11,200	11.4	24.7

Tonnes are metric (2204.62 pounds); figures may not total due to round-off errors

The resources were estimated using ordinary kriging by Hellman & Schofield Pty Ltd ("H&S"). At a cut-off grade of 500ppm U_3O_8 the Bigrlyi resource totals 20.6 million pounds (Mlb) of U_3O_8 and 38.6 Mlb of V_2O_5 . Significantly 45% of the contained uranium metal (or 4.19 Kt U_3O_8) now reports to the Indicated Resource category, compared with 39% in the previous (March 2008) resource estimate.

Interpretation of the infill drilling has resulted in greater confidence in the geological model with the mineralised zones now more tightly constrained, reducing both tonnes and contained metal reporting to the Inferred Resource category compared with the March 2008 estimate.

Importantly the Bigrlyi mineralisation remains open at depth and along strike, with excellent potential to further increase the resource base. A drilling program designed to (a) test extensions to current mineralised zones, and (b) convert more resource to the Indicated category, will commence in the September 2009 quarter, subject to BJV partner approval.

LINDSAY DUDFIELD **Executive Director**.



Resource Estimation & Methodology

-Of personal use only

The resource estimates were jointly compiled by Energy Metals and H&S. Energy Metals completed digital data compilation, validation, QA/QC and sample quality assessment and geological interpretations. H&S completed independent resource estimates, as well as providing advice on modelling methods, geostatistics and wireframe modelling of the mineralisation domains. At the 500ppm U_3O_8 cut-off grade H&S reports 38% of the resource tonnage and 45% of the contained uranium metal (or 4.19 Kt U_3O_8) to the Indicated Resource category. A tabulation of Indicated and Inferred Resources is provided in Table 1 (below).

TABLE 1 - SUMMARY OF RESOURCES

Indicated Resources

Cut Off (ppm U ₃ O ₈)	Tonnes (Millions)	U ₃ O ₈ (ppm)	V ₂ O ₅ (ppm)	U ₃ O ₈ (t)	V ₂ O ₅ (t)
500	2.74	1,530	2,300	4,190	6,310
1000	1.60	2,110	2,850	3,360	4,540

Inferred Resources

Cut Off (ppm U ₃ O ₈)	Tonnes (Millions)	U ₃ O ₈ (ppm)	V ₂ O ₅ (ppm)	U ₃ O ₈ (t)	V ₂ O ₅ (t)
500	4.53	1,140	2,470	5,150	11,200
1000	1.71	1,860	3,890	3,190	6,670

Tonnes are metric (2204.62 pounds), figures may not total due to round-off errors.

The resource estimates are based on the interpretation of 459 historic drill holes (222 percussion and 237 pre-collared diamond holes) and 399 holes (311 percussion and 88 pre-collared diamond holes) drilled by Energy Metals between October 2006 and December 2008. Drill holes are spaced at between 20-50m along strike in the main resource areas of Anomalies 15, 4 and 2. This increases to a nominal 100m at Anomaly 3 and 200-400m in peripheral areas. Assays were derived from predominantly chemical methods (XRF) in all holes drilled by Energy Metals, and re-assayed historic diamond holes. Calibrated radiometric assay methods were used in historic percussion holes.

Wire frame models were digitized on north-south cross sections using an approximate $100 \mathrm{ppm} \ (U_3 O_8)$ and an approximate $500 \mathrm{ppm} \ (V_2 O_5)$ boundary to model multiple mineralised lenses outcropping at surface. The lenses generally occur within mineralised horizons within the Mt Eclipse Sandstone. The two major horizons are located at the contacts of the Units B and C and Units C and D. Additional horizons at Anomalies 4 and 15 are seen within Units D and B. The mineralised lenses are generally narrow (true width 2-5m) and strike east-west. Dips of the mineralised lenses are sub vertical and predominantly dip south at 70-88 degrees. The modeled block dimensions are 15m along strike, 15m down dip and 2m width. These have been chosen to best reflect the geometry of the mineralisation.

The information in this report relating to mineral resources is based on information compiled by Nick Burn BSc(Hons), MAIG., and Arnold van der Heyden BSc, MAusIMM. Mr Burn and Mr van der Heyden have more than five years relevant experience in estimation of mineral resources and the mineral commodity uranium.

Mr Burn is a full time employee of Energy Metals Limited and takes responsibility for the quality of the data and geological interpretations provided to H & S. Mr van der Heyden is a full time employee of H & S and takes responsibility for the resource estimation.

Mr Burn and Mr van der Heyden have sufficient experience relevant to the assessment of this style of mineralisation to qualify as a Competent Person as defined in the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves – The JORC Code". Each of the above named consents to the inclusion of the information in the report in the form and context in which it appears.