

28 May 2009

**ASX RELEASE**

General Manager,  
The Company Announcements Office  
Australian Stock Exchange Limited  
Electronic Lodgement System

Dear Sir,

**Arcturus EPC 1221 – Resource Statement**

Bandanna Energy Ltd (Bandanna – ASX code “BND”) is pleased to announce an update to the Resources in EPC 1221 (“Arcturus Project”) estimated in accordance with the JORC Code. Gordon Saul\*, Principal Geologist of Resolve Geo Pty Ltd, consultants to Bandanna Energy Limited, has provided the attached Resource Statement.

EPC 1221 is 100% owned by Springsure Creek Coal Pty Ltd, a wholly owned subsidiary of Bandanna Energy Limited.

**Summary of Resources**

- **An inaugural Indicated Resource of 54 Mt has been delineated.**
- **Inferred Resource at Arcturus has decreased from 138 Mt to 99 Mt, due to reclassification of some previously Inferred Resource to Indicated classification.**
- **Combined Inferred and Indicated Resource has increased from 138 Mt to 154 Mt.**

A total coal Resource of 154 Mt is reported, which comprises 54 Mt of Indicated Resource and 99 Mt of Inferred Resource. This represents a significant upgrading of the reported Resource from the previously reported 138 Mt of Inferred Resource. The upgrading of the reported Resource follows a recent exploration program.

Coupled with the coal quality exploration results released to the ASX earlier today the Company is encouraged that Arcturus may host a moderate-energy, low-ash thermal coal deposit at depths compatible with open-cut methods.

In addition to on-going exploration activity and further analyses of core hole data Bandanna Energy is investigating marketability, financing and other key economic factors as a prelude to formally evaluating the potential for mine development.

Yours faithfully,

**BANDANNA ENERGY LIMITED**

A handwritten signature in black ink, appearing to read 'R. Shaw'.

**Dr Ray Shaw**

*Managing Director*

**\*Statement of Compliance**

The information compiled in this report and the attached Covering Letter dated 28 May 2009 from Bandanna Energy Limited, including any relating to resources, is based on information compiled by Gordon Saul, who is a member of the Australian Institute of Geoscientists and who is employed by Resolve Geo Pty Ltd. Gordon Saul has sufficient experience which is relevant to the style of mineralization and types of deposit under consideration and to the activity he is undertaking to qualify as a Competent Person as defined in the 2004 edition of the "Australian Code for reporting of Exploration Results, Mineral Resources and Ore Reserves". Gordon Saul consents to the inclusion in this report of the matters based on his information and in the form and context in which it appears. Resolve Geo Pty Ltd is a shareholder in Bandanna Energy Limited.



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Arcturus Coal Resource

EPC 1221

Project commissioned by Springsure Creek  
Coal Pty Ltd, a wholly owned subsidiary of  
Bandanna Coal Pty Ltd

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BSc (Hons) MAIG  
Principal Geologist

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## Disclaimer

Whilst every effort has been made to ensure the accuracy of this report, Resolve Geo accepts no liability for any errors or omissions.

Resolve Geo is a shareholder of Bandanna Coal Pty Ltd.

## **Executive Summary**

Resolve Geo Pty Ltd has been commissioned by Springsure Creek Coal Pty Ltd to report a resource estimate in accordance with the JORC code for the Arcturus coal deposit, which lies within the exploration permit for coal EPC1221.

This report summarizes the methodology and results of the coal resource estimate as at 26<sup>th</sup> May 2009 and incorporates all exploration undertaken up until the 21<sup>st</sup> of May 2009.

Springsure Creek Coal Pty Ltd owns EPC 1221 Arcturus, which covers part of the Permian Bowen Basin. It is located 35 km SE of Emerald, and 22 km E of Springsure (Figure 1), about 15 km west of the Rolleston – Blackwater rail line.

The Arcturus coal deposit lies within the NW trending Denison Trough, which lies along the western margin of the Bowen Basin, and comprises coal seams within the Bandanna Formation.

The Upper Permian Bandanna Formation is a direct correlative to the Rangal Coal Measures, situated immediately to the east. Conformably overlain by the Triassic Rewan Formation, the Bandanna Formation contains up to 6 coal seams within the area.

The overlying Rewan Formation is absent over much of the area, which is generally characterized by a thin (1-18m) covering of Tertiary unconsolidated sands and clays in the reported resource domain.

The lease is dominated by a broad north trending syncline, with an anticlinal structure in the eastern portion of the lease. Up to 52 km of Bandanna Formation subcrop is contained in the ca. 430 Km<sup>2</sup> area of EPC1221.

A detailed and comprehensive literature search was carried out over EPC 1221.

The various data sources include:

- Petroleum company reports
- Coal exploration company reports
- Department of Minerals and Energy records
- Department of Primary Industries - Water Resource records

Work by the Queensland Department on Mines and Energy in the early 1970's has defined an open cut resource, with 28 holes intersecting shallow Bandanna Formation coal seams.

Additional drilling was completed by various petroleum and coal companies over the lease area resulting in a total number of 46 historical exploration and petroleum holes, including 5 cored or partly cored holes have been completed within EPC1221.

Excellent seismic data exist throughout the easternmost prospective area of the tenement, acquired as part of the historical gas exploration over the Arcturus Anticline. Limited seismic coverage exists within the EPC outside of this area. The current seismic coverage demonstrates stratigraphic continuity through the reported resource area.

Hole spacing of the historical holes is irregular, with the majority of the core holes and chip holes concentrated in the eastern area within EPC 1221 (Figure 2). The resource estimate presented here identifies a resource within this eastern area.

Springsure Creek Coal Pty Ltd has recently completed drilling programs entailing 21 chip, 11 Line of Oxidation and 11 core holes. Raw coal quality data for 7 of the 11 core holes has been received and utilized for this resource estimate. All completed holes are located within the primary resource target in the south eastern extent of the lease. See Figure 2 for locations of historical and recent holes.

The core holes have been fully sampled and analyzed for proximate analysis, relative density, phosphorous and hardgrove grindability (HGI). 9 of the completed quality holes are also being washability analyzed, 5 of which have completed analysis.

Of the 5 historical holes with coal quality only 3 are in the area of interest, these are detailed in Table 3.

The deposit has been structurally modeled using all available data, with the exception of those holes that were excluded due to lack of geophysical logging or replaced with more recent holes. Refer to Table 5 for a list of excluded holes (highlighted in Yellow). Modeling was completed using the software Mapinfo Encom Discover.

Partings of less than 30cm have been included within seams when the parting interval is less than the coal interval gained by including the parting. Density values for calculations have been adjusted accordingly.

A 0.5m coal thickness limit has been applied, where seams are less than 0.5m in thickness they have been reported to waste with the exception of the Pollux Rider Seam.

The Pollux Rider Seam has been included in the calculations where it occurs within 2m of the Pollux Seam and is greater than 20cm in thickness. Occurrences of the Pollux Rider seam of less than 20cm in thickness or more than 2m from the Pollux seam have been reported to waste.

**Table 1: Average Seam Thicknesses in Resource Area**

<b>Seam Code</b>	<b>Seam Name</b>	<b>Average Thickness (m)</b>
A3	Aries 3	0.64
CA	Castor	1.18
PR	Pollux Rider	0.42
POL	Pollux	2.27
POLU	Pollux Upper	1.13
POLL	Pollux Lower	1.53
O1	Orion 1	1.05
O1U	Orion 1 Upper	0.99
O1L	Orion 1 Lower	0.51
O2	Orion 2	1.14

Drill Holes that can be classified as valid points of observation for determination of the resource status can be summarized as follows

- Full seam interval was cored
- >95% recovery of the seam
- The hole is geophysically logged
- Raw proximate analysis completed or substantially completed

Resource polygons were drawn around the points of observation based on the JORC categories and the resource were then calculated from the geological model. See Figures 3 & 4.

The coal resources are stated as indicated status where the points of observation are no more than 1000m apart. Indicated resources have been extrapolated a maximum of 500m beyond a point of observation. A minimum of 3 adjacent points of observation were required to define an indicated resource area.

The coal resources are stated as inferred status where the points of observation are no more than 2000m apart. Indicated resources have been extrapolated a maximum of 1000m beyond a point of observation.

For the purposes of the resource estimate weighted average relative densities values have been used for each of the seams using all available quality data.

The relative density values have been recalculated from the laboratory data using the Preston Saunders formula to increase the accuracy of the insitu tonnage calculation.

The average dip of the seams within the resource area of the deposit is between 2 and 3 degrees.

Resolve Geo has estimated a total resource within the target area in EPC1221 totaling 153MT of high volatile, low rank bituminous coal.

Of this total resource 54MT are in the Indicated category and 99MT are in the Inferred category.

This statement replaces a previous statement, issued in June of 2008, reporting a 138Mt inferred resource.

**Table 2: Arcturus, EPC 1221 JORC Resource Estimate Totals**

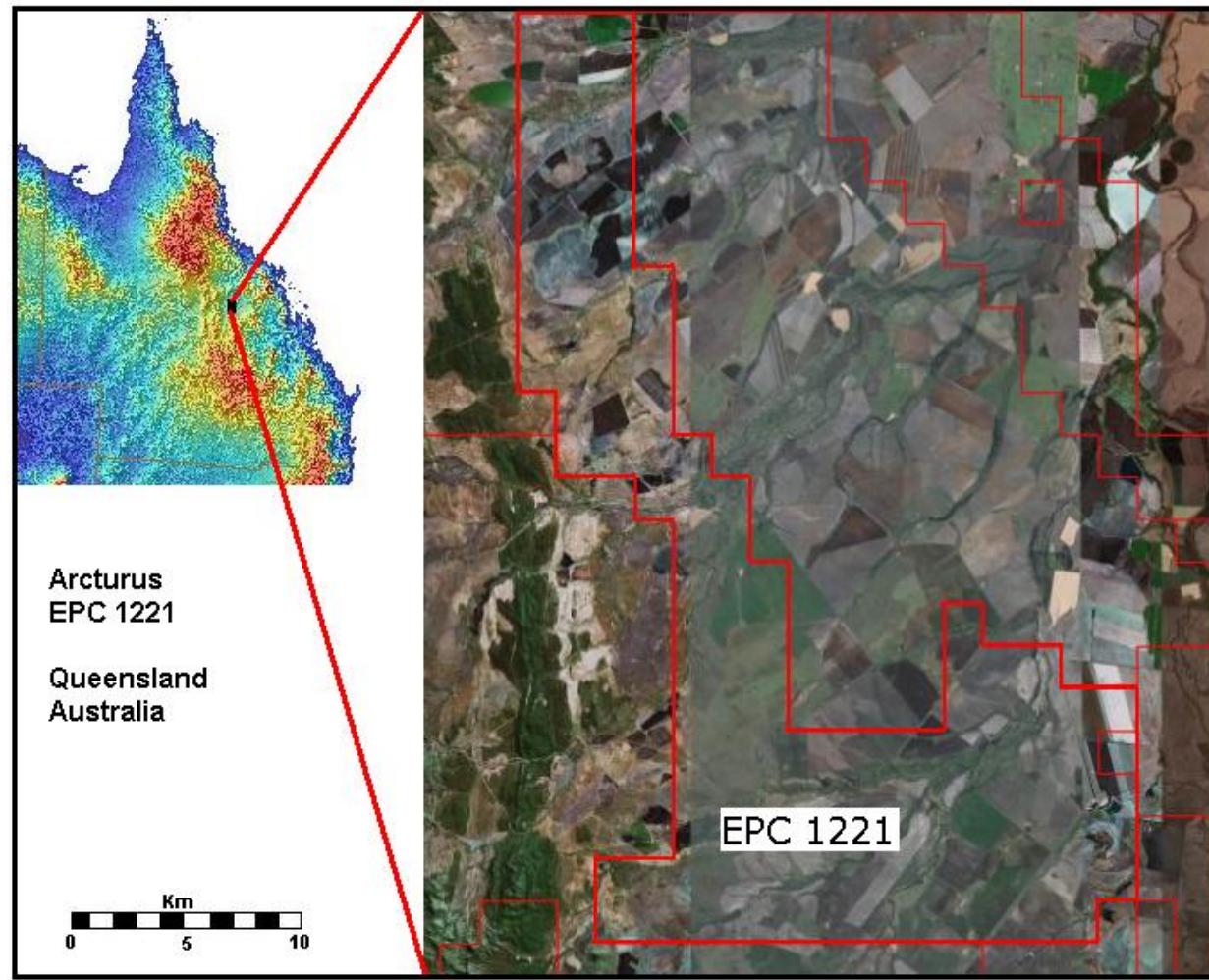
Seam	Status	Mean Seam Thickness	Area (km <sup>2</sup> )	Coal Volume (Cu.m)*10 <sup>6</sup>	Coal Density (Insitu)	Total Coal (MT)
ARS	Inferred	0.65	4.58	2.98	1.52	4.53
ARS	Indicated	0.56	0.79	0.44	1.52	0.67
CAS	Inferred	1.10	6.66	7.33	1.46	10.70
CAS	Indicated	1.31	3.11	4.07	1.46	5.95
PR	Inferred	0.40	8.69	3.48	1.39	4.83
PR	Indicated	0.46	4.72	2.17	1.39	3.02
POL	Inferred	2.22	12.82	28.46	1.37	38.99
POL	Indicated	2.39	5.56	13.29	1.37	18.21
O1U	Inferred	0.95	7.18	6.82	1.37	9.35
O1U	Indicated	1.32	0.65	0.86	1.37	1.18
O1L	Inferred	0.49	7.18	3.52	1.36	4.78
O1L	Indicated	0.64	0.65	0.42	1.36	0.57
O1	Inferred	0.80	5.64	4.51	1.37	6.18
O1	Indicated	2.37	4.91	11.64	1.37	15.94
O2	Inferred	1.12	12.82	14.36	1.37	19.67
O2	Indicated	1.18	5.56	6.56	1.37	8.99
Total	Inferred			71.45		99.03
Total	Indicated			39.45		54.52
Total	All Seams (Inf & Ind)			110.90		153.54

**Table 3: Historical Bore Hole Coal Quality, Arcturus, EPC 1221**

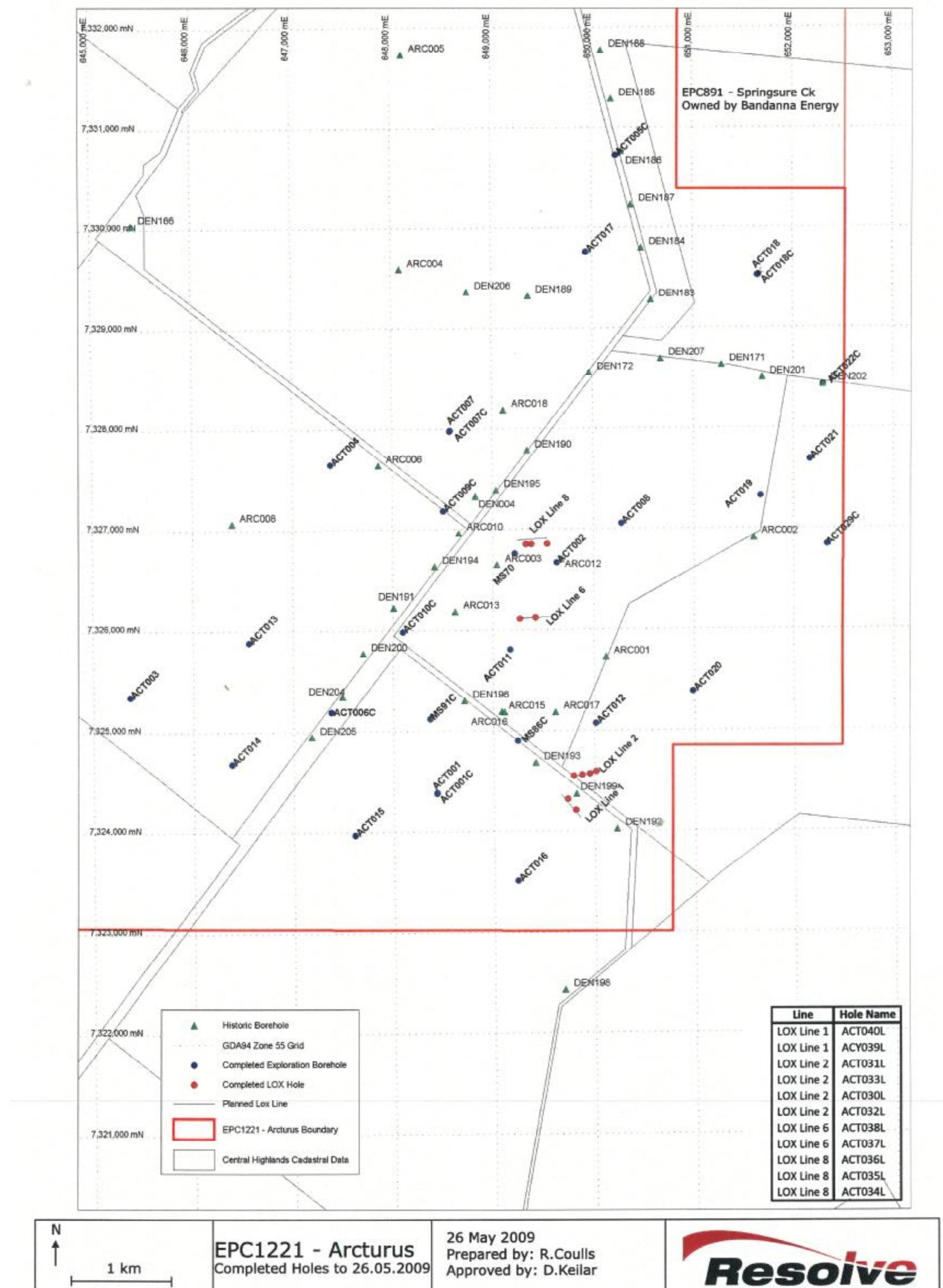
Hole Number	Thickness (m)	Moisture % (adb)	Ash % (adb)	Specific Energy Mj/Kg (adb)	Specific Energy Mj/Kg (daf)	Vitrinite Reflectance Ro max (%)
NS4	0.78	9.9	15.7	23.69	31.83	
NS4	1.50	10.7	9.0	26.06	32.44	0.51
NS171	1.58	9.5	20.2	21.65	30.78	
NS172	1.22	11.1	11.7	24.87	32.20	

Adb = air dried basis, Daf = dry, ash free basis

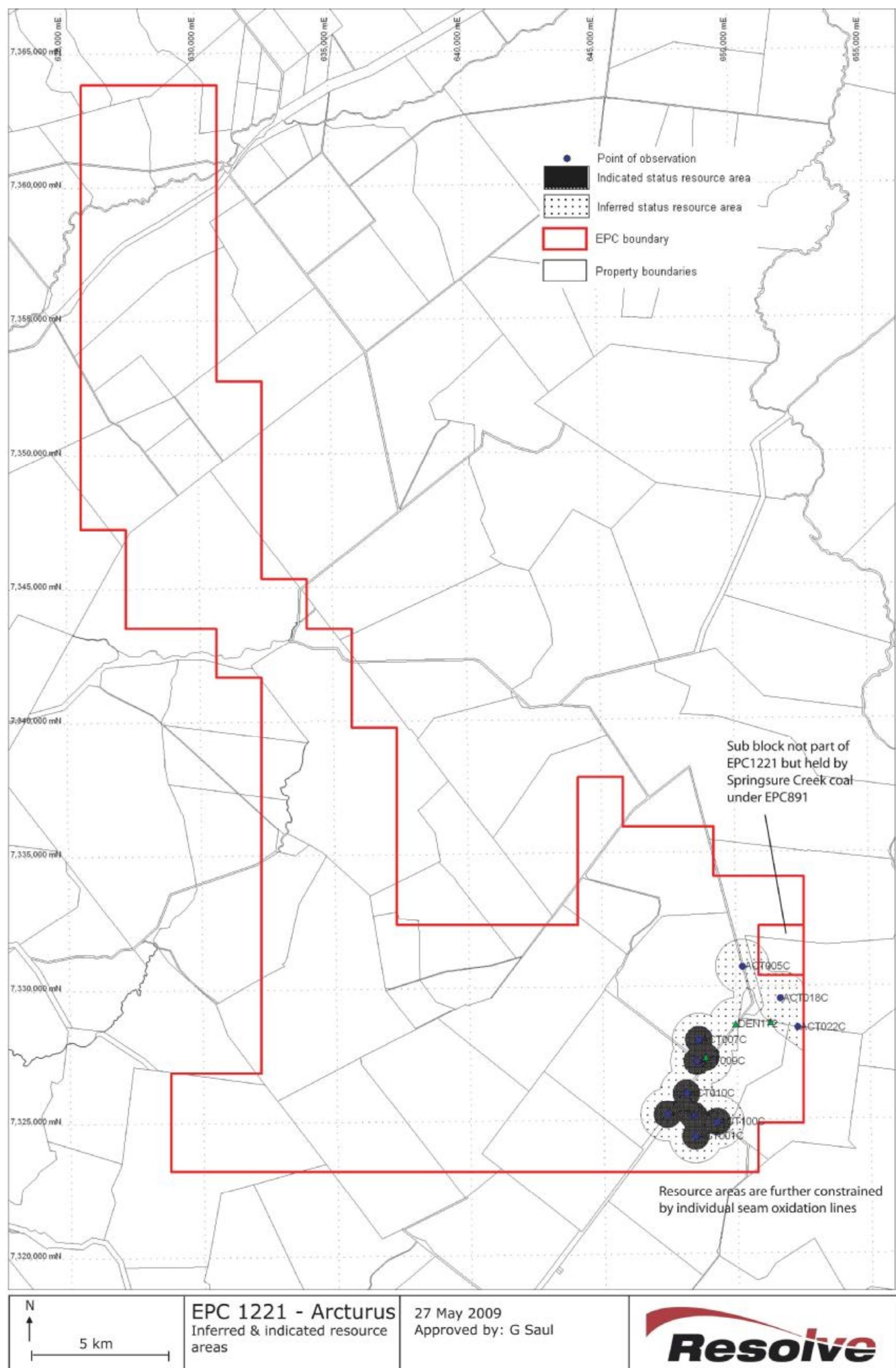
**Figure 1: Location map**



**Figure 2: Drill hole locations plan**

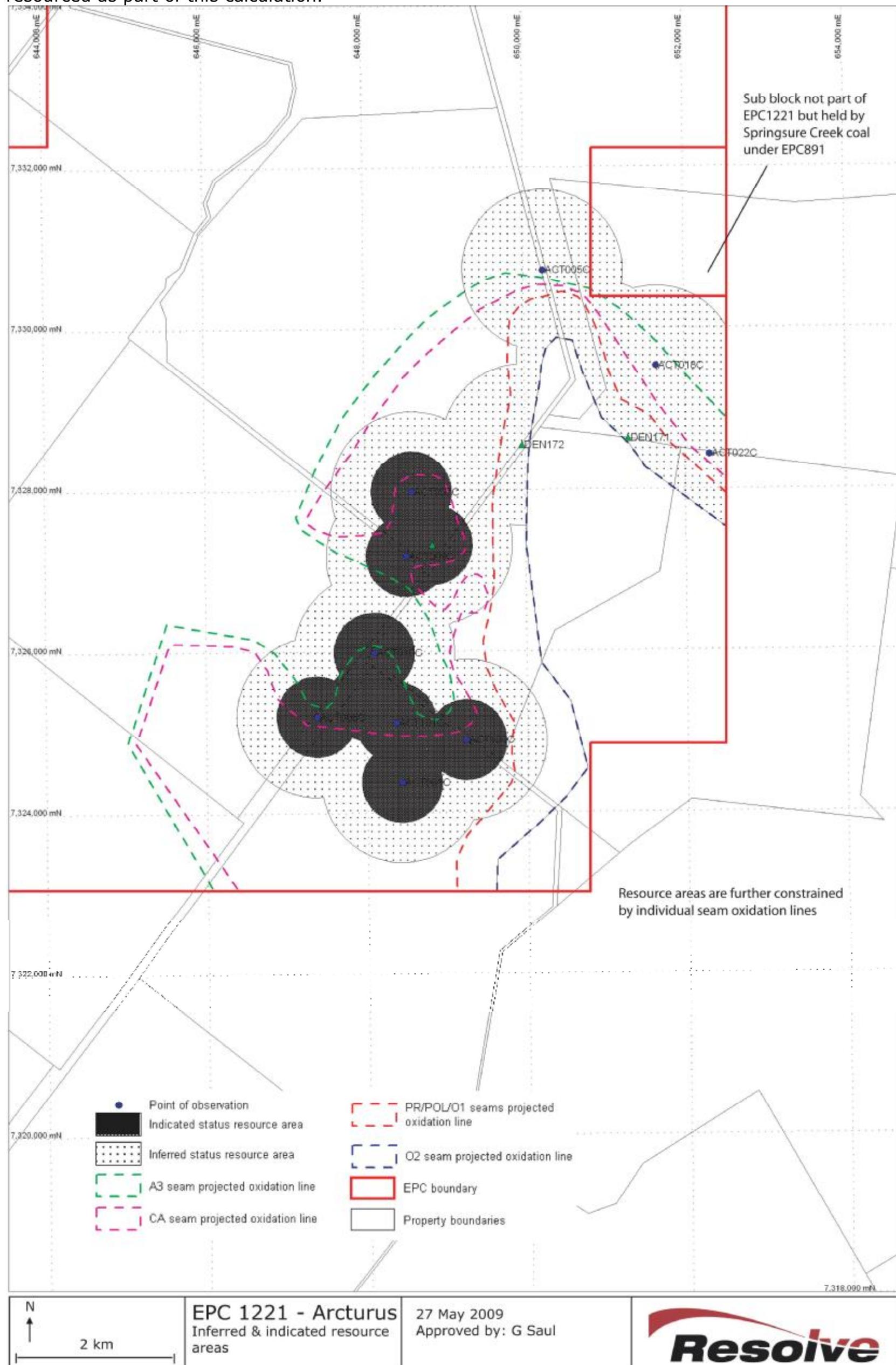


**Figure 3: Point of Observation locations and domain distribution for EPC 1221**



**Figure 4: Detail of Resource Area, Arcturus EPC 1221.**

The dashed lines are the individual seams full seam fresh lines of oxidation to which each seam has been clipped for the purposes of the resource estimation. Only the fresh coal component of each seam is being reported. The Polygons in the image have been clipped to the lower most seam (Orion 2) that is being resourced as part of this calculation.



Signed



Date: 28<sup>th</sup> May, 2009

Gordon Saul

JORC Statement

The information compiled in this report and attached covering letter dated 28 May 2009 relating to resources is based on information compiled by Gordon Saul, who is a member of the Australian Institute of Geoscientists and who is employed by Resolve Geo Pty Ltd. Gordon has sufficient experience which is relevant to the style of mineralization and type of deposit under consideration and to the activity he is undertaking to qualify as a Competent Person as defined in the 2004 edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves". Gordon Saul consents to the inclusion in the report of the matters based on his information in the form and context in which it appears. Resolve Geo Pty Ltd is a shareholder in Bandanna Energy Limited.