

#### **INVESTMENT HIGHLIGHTS**

- Developing a large scale coking coal basin
- Two exceptionally well located coking coal deposits
- Combined Resources of 536.3 Mt
- Amaam North:
- Project F:
  - 9.2 Mt of Reserves, 5.6Mt Proven & 3.6 Mt Probable<sup>F</sup>
  - 72.3 Mt total Resource, 12.6Mt
     Measured<sup>D</sup>, 13.2Mt Indicated<sup>C</sup> &
     46.6Mt Inferred<sup>B</sup>
  - Outstanding exploration upside for resource growth
  - 35km from TIG's owned and operated Beringovsky coal port
  - BFS completed
  - Short timeline to first production from low capital and operating cost mine

#### Amaam:

- Amaam: 464 Mt total Resource comprising 78Mt Indicated<sup>C</sup> & 386Mt Inferred<sup>B</sup>
- 25km from planned port site and only 8 days shipping to China, Korea and Japan
- High vitrinite content (>90%) coking coal with excellent coking properties
- PFS completed on 5Mtpa coking coal mine

#### **BOARD OF DIRECTORS**

Antony Manini Non-executive Chairman

Owen Hegarty Non-executive Director

Craig Wiggill
Non-executive Director

Andrew Gray
Non-executive Director

Tav Morgan Non-executive Director

Tagir Sitdekov Non-executive Director

CHIEF EXECUTIVE OFFICER Craig Parry

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# Tigers Realm Coal delivers initial 9.2Mt Coal Reserve for Amaam North

- Following on from the completion of the Project F
   Bankable Feasibility Study TIG is pleased to report initial
   Coal Reserves for the project
- Initial Reserves<sup>F</sup> of 9.2 Mt at Project F, Amaam North, consisting of 5.6 Mt Proven Reserves and 3.6 Mt Probable Reserves.
- Reserves defined during Bankable Feasibility Study on a low capital and operating cost, open-pit coking coal mine at Project F, Amaam North
- Proven and Probable Reserves estimated from 20.9 Mt of Project F Open Pit Resources which include 7.2 Mt of Measured and 5.1 Mt of Indicated Resources respectively.
- Additional Resources of 51.4 Mt in Project F extension areas require further drilling, currently being undertaken, and evaluation prior to conversion to Reserves.

Tiger's Realm Coal CEO Craig Parry commented:

"We are extremely pleased to announce our initial Coal Reserves at Project F. Less than two years after the commencement of drilling, we have completed the Project F BFS and reported substantive Reserves on only a small part of Project F and the broader Amaam Licence.

"We are focussed on becoming a major coking coal producer from the world-class Bering Basin.

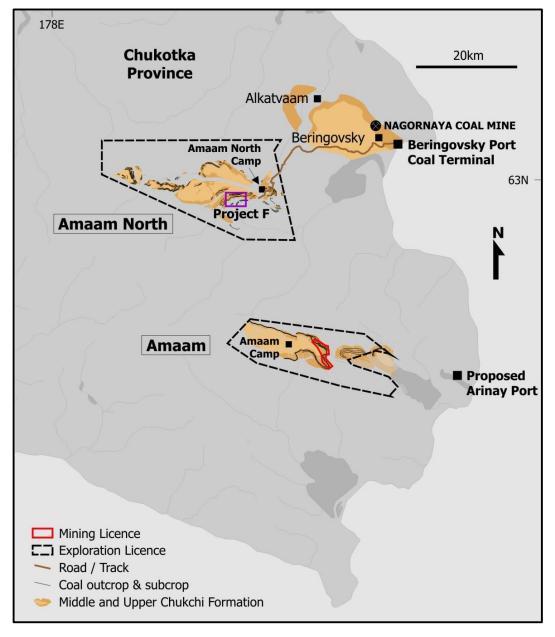
"At Project F, development has commenced and work continues apace on funding. In addition, we continue to delineate additional Coal Resources to support coal production and increase shareholder value."

### **Amaam Coking Coal Project**

Tigers Realm Coal (TIG) owns 80%<sup>A</sup> of the Amaam Coking Coal Project which is located in the Chukotka Province of far eastern Russia. The Amaam Coking Coal Project consists of two tenements: Amaam and Amaam North.

In addition to the Amaam and Project F Resources of 536.3 Mt, other areas of the basin that TIG is exploring contain a Total Exploration Target of 175-695 million tonnes. *Note - The potential quantity and grade of the Exploration Target is conceptual in nature, and there has been insufficient exploration to estimate a Coal Resource, and it is uncertain if further exploration will result in the estimation of a Coal Resource.* 

When combined with the Resources from the two advanced projects, the potential coal contained within the TIG Exploration Licences in the Bering Coking Coal Basin could exceed 1 billion tonnes.



Location map of the Amaam and Amaam North Coking Coal Projects including Project F

#### **Initial Reserve at Amaam North**

Tigers Realm Coal Limited (ASX: TIG) is pleased to report an initial Reserve of 9.2Mt at Project F, part of the highly prospective Amaam North licence in the Chukotka Province of far eastern Russia. Project F is the first of several mines to be designed and scheduled on the Amaam North block. \*The Measured and Indicated Coal Resources are inclusive of those Coal Resources modified to estimate the Reserves.

These Reserves were estimated as part of the Project F Bankable Feasibility Study (BFS) reported to the ASX on 20 November 2014.

Project F comprises three main components:

- The mine site, comprising an open-pit mine, coal handling and processing plant (CHPP) and associated non-process infrastructure (e.g. workshops and warehouses; personnel accommodation; offices; electrical power generation and distribution facilities; water and waste management facilities; and fuel storage);
- The product coal transport chain, comprising a 35-40km all-season road from the Project F mine site to the existing Beringovsky Port facilities. This will be utilised for product coal transport (outgoing), mine site supplies (incoming), as well as for personnel transport; and
- The coal terminal, comprising the port area coal stockpiles, an upgrade to the existing transhipment facilities at the Beringovsky Port and refurbishment of associated services and utilities.

The BFS determined a project with a LOM capital cost (excluding mine closure) of US\$ 133.3 million and average LOM FOB operating costs of US\$ 68.50/t of product. The project is expected to deliver up to 1.1 million tonnes per annum of marketable coal over 10 years.

## Amaam North, Project F Reserve Estimate<sup>F</sup>

#### Project F Coal Resources

The Reserves declared in this statement are based on the Project F July 2013 Coal Resource, with updated JORC classifications in the oxidised zone derived during the 2013/2014 winter drilling season. These Resources are summarised in the table below.

#### Coal Resources for Project F - (100% basis)

Resource Category	Open Pit <sup>1</sup> (Mt)	Underground <sup>2</sup> (Mt)	Total (Mt)
Measured - Coking	7.16	0	7.16
Indicated- Coking	3.29	1.27	4.56
Inferred - Coking	8.69	4.58	13.27
Indicated - Thermal	1.79	0	1.79
Total	20.93	5.85	26.78

Since this time, TIG has drilled extension areas to the east and south west of Project F and updated the Resource estimate. The updated Resources are summarised below.

#### Coal Resources for the Amaam North - Project F (100% basis)

Resource Category	Open Pit <sup>1</sup> (Mt)	Underground <sup>2</sup> (Mt)	Total (Mt)
Measured - Coking	12.6	0	12.6
Indicated- Coking	7.7	3.9	11.5
Inferred - Coking	33.2	9.9	43.1
Indicated - Thermal	1.7	0	1.7
Inferred - Thermal	3.5	0	3.5
Total	58.6	13.7	72.3

#### Project F Mining Inventory

The BFS open pit and mine plan have a ROM coal mining inventory of 14Mt of diluted Coal Resources. These consist of 5.6Mt of Proven Reserves, 3.6Mt of Probable Reserves and 4.8Mt of Inferred resources.

\*It should be noted there is a low level of geological confidence associated with inferred mineral resources and there is no certainty that further exploration work will result in the determination of indicated mineral resources or that the production target itself will be realised.

#### Project F Open Pit Mining Inventory

Coal	ROM Mt	Product Mt / Yield%	JORC Classification	
Thermal Coal	1.9	1.9 / 100%	1.9 Mt in Indicated	
Bypass Coking Coal	3.7	3.7 / 100%	5.6 Mt in Measured	
CURD Food Colding Cool	0.2		1.7 Mt in Indicated	
CHPP Feed Coking Coal	8.3	50.5 4.2 / 51/0	4.2 / 51%	4.8 Mt in Inferred
Total	14.0	9.9 / 71%	14.0	

#### Coal Reserves

Project F ROM Coal Reserves total 9.2Mt, of which 5.6Mt are Proven and 3.6Mt are Probable. Marketable (Product) Coal Reserves total 6.8Mt.

#### Project F ROM Coal Reserves

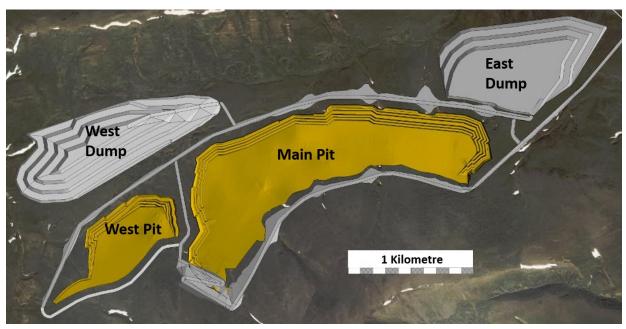
JORC Classification	ROM Coking Coal	ROM Thermal Coal	ROM Total
Proven Reserves	5.6	-	5.6
Probable Reserves	1.7	1.9	3.6
ROM Total	7.3	1.9	9.2

#### **Project F Product Coal Reserves**

JORC Classification	Product Coking Coal	<b>Product Thermal Coal</b>	Product Total
Proven Reserves	3.8	-	3.8
Probable Reserves	1.0	1.9	2.9
Product Total	4.8	1.9	6.7

#### Open Pit Mine Design

Project F comprises two pits, the Main pit and the West pit, as illustrated in the figure below. The Main pit is approximately 2500 metres long, and 320 to 500 metres wide. The West pit is approximately 850 metres long and 300 metres wide. The mine has been scheduled at a mining rate of 1.5Mtpa of ROM coal over 11 years.



Plan View of the Pits and Ex-Pit Dumps

#### **Material Assumptions**

Section 1 to 4 of the JORC Code's Table 1 "Checklist of Assessment and Reporting Criteria" is provided as an attachment to this release. Section 4 details the design criteria and modifying factors for the determination of the Project F Reserves, key criteria includes:

- 1. Commodity prices The open pit design is based on an optimised pit using an undiscounted received coking coal price of US\$ 115/t FOB, and a thermal coal price of US\$ 90/t FOB. Coking coal comprises 81% of product produced over the mine LOM.
- 2. Ore loss and dilution Coal seams of 0.3m and greater and partings less than 0.3m have been aggregated. Based on the dip and mining method, a mining accuracy of 100mm (the combination of dilution and coal loss totals 100mm on each of the seam roof and floor contacts) has been adopted. For Seam 4, where minimisation of dilution has a higher ranking than recovery, the aggregation parameters are coal loss of 75mm and dilution of 25mm. For all other seams, the aggregation parameters are coal loss of 50mm and dilution of 50mm.
- 3. Slope design criteria The high wall is designed so that at the pit base, coal plies and inter-burden are grouped together in an up-to-20 metre bench, with a 15 metre berm where coal meets overburden. Above this, benches are 20 metre high with 70° batters and 15 metre wide berms. An up-to-15 metre bench is constructed in weathered material with a 45° batter to surface. Together, this forms an effective overall high wall angle of 39 49°. The pit has a maximum depth of ~120m and an average depth of 45m.
- 4. Coal handling and preparation plant (CHPP) yield the average CHPP yield for treated coal is 51%. The average project yield when bypass coals are taken into account is 71%.

Further details about Tigers Realm Coal can be found at www.tigersrealmcoal.com For further information, contact:

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#### About Tigers Realm Coal Limited (ASX: TIG)

Tigers Realm Coal Limited ("TIG", "Tigers Realm Coal" or "the Company") is an Australian based resources company. The Company's vision is to build a global coking coal company by rapidly advancing its projects through resource delineation, feasibility studies and mine development to establish profitable operations.

#### **Competent Persons Statement**

The information relating to Exploration Results or Coal Resources at Amaam North is based on information provided by TIG and compiled by Neil Biggs, who is a member of the Australasian Institute of Mining and Metallurgy and who is employed by Resolve Coal Pty Ltd, and 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 JORC Code. Neil Biggs consents to the inclusion in the announcement of the matters based on his information in the form and context which it appears.

The information relating to the Estimation and Reporting of Ore Reserves at Amaam North is based on information provided by TIG and compiled by Peter Balka and Marian Gorman, who are members of the Australasian Institute of Mining and Metallurgy and who have sufficient experience which is relevant to the style of mineralization and type of deposit under consideration and to the activity undertaken to qualify as a Competent Person as defined in the JORC Code. Peter Balka is an employee of TIG and Marian Gorman was an employee of TIG at the time the Reserves were compiled. Peter Balka and Marian Gorman consent to the inclusion in the announcement of the matters based on their information in the form and context which it appears

#### Note A - Tigers Realm Coal's interests in the Amaam Coking Coal Project

Amaam tenement: TIG's current beneficial ownership is 80% of Eastshore Coal Holding Limited ("Eastshore"), a company incorporated in Cyprus which is the sole shareholder of CJSC Northern Pacific Coal Company, a Russian company, which holds the Amaam tenement. Bering Coal Investments Limited, a company incorporated in Cyprus, holds the other 20% of Eastshore. TIG will fund all project expenditure in the Amaam tenement until a bankable feasibility study is completed as agreed by the Eastshore shareholders. After completion of a bankable feasibility study each Eastshore shareholder is required to contribute to further project expenditure on a pro-rata basis. Siberian Tigers International Corporation, a company incorporated in Cyprus, is entitled to receive a royalty of 3% gross sales revenue from coal produced from within the Amaam licence.

Amaam North tenement: TIG has 80% beneficial ownership of Rosmiro Investments Limited ("Rosmiro"), the sole shareholder of Beringpromogul LLC, the Russian company which owns the Amaam North exploration licence. B.S. Chukchi Investments Limited holds the other 20% of Rosmiro. TIG will fund all project expenditure until a bankable feasibility study is completed as agreed by the Rosmiro shareholders. After completion of a bankable feasibility study each Rosmiro shareholder is required to contribute to further project expenditure on a pro-rata basis. Siberian Tigers International Corporation, a company incorporated in Cyprus, is entitled to receive a royalty of 3% gross sales revenue from coal produced from within the Amaam North licence. In the event of TIG's partner not contributing to finance the project capital requirement and diluting its share below 20%, a royalty is payable to the JV partner proportionately to the amount of dilution, up to a maximum of 2%.

#### Note B - Inferred Resources

According to the commentary accompanying the JORC Code an 'Inferred Mineral Resource' is that part of a Mineral Resource for which quantity and grade (or quality) are estimated on the basis of limited geological evidence and sampling. Geological evidence is sufficient to imply but not verify geological and grade (or quality) continuity. It is based on exploration, sampling and testing information gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes. An Inferred Mineral Resource has a lower level of confidence than that applying to an Indicated Mineral Resource and must not be converted to an Ore Reserve. It is reasonably expected that the majority of Inferred Mineral Resources could be upgraded to Indicated Mineral Resources with continued exploration

#### Note C - Indicated Resources

According to the commentary accompanying the JORC Code an 'Indicated Mineral Resource' is that part of a Mineral Resource for which quantity, grade (or quality), densities, shape and physical characteristics are estimated with sufficient confidence to allow the application of Modifying Factors in sufficient detail to support mine planning and evaluation of the economic viability of the deposit. Geological evidence is derived from adequately detailed and reliable exploration, sampling and testing gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes, and is sufficient to assume geological and grade (or quality) continuity between points of observation where data and samples are gathered.

#### Note D - Measured Resources

According to the commentary accompanying the JORC Code a 'Measured Mineral Resource' is that part of a Mineral Resource for which quantity, grade (or quality), densities, shape, and physical characteristics are estimated with confidence sufficient to allow the application of Modifying Factors to support detailed mine planning and final evaluation of the economic viability of the deposit. Geological evidence is derived from detailed and reliable exploration, sampling and testing gathered through appropriate techniques from locations such as outcrops, trenches, pits, workings and drill holes, and is sufficient to confirm geological and grade (or quality) continuity between points of observation where data and samples are gathered. A Measured Mineral Resource has a higher level of confidence than that applying to either an Indicated Mineral Resource or an Inferred Mineral Resource. It may be converted to a Proved Ore Reserve or under certain circumstances to a Probable Ore Reserve.

#### Note E - Exploration Target

According to the commentary accompanying the JORC Code An Exploration Target is a statement or estimate of the exploration potential of a mineral deposit in a defined geological setting where the statement or estimate, quoted as a range of tonnes and a range of grade (or quality), relates to mineralisation for which there has been insufficient exploration to estimate a Mineral Resource. Any such information relating to an Exploration Target must be expressed so that it cannot be misrepresented or misconstrued as an estimate of a Mineral Resource or Ore Reserve. The terms Resource or Reserve must not be used in this context.

#### Note F - Reserves

According to the commentary accompanying the JORC Code a 'Reserve' is the economically mineable part of a Measured and/or Indicated Mineral Resource. It includes diluting materials and allowances for losses, which may occur when the material is mined or extracted and is defined by studies at Pre-Feasibility or Feasibility level as appropriate that include application of Modifying Factors. Such studies demonstrate that, at the time of reporting, extraction could reasonably be justified.

#### **Forward Looking Statements**

This release includes forward looking statements. Often, but not always, forward looking statements can generally be identified by the use of forward looking words such as "may", "will", "expect", "intend", "plan", "estimate", "anticipate", "continue", and "guidance", or other similar words and may include, without limitation statements regarding plans, strategies and objectives of management, anticipated production or construction commencement dates and expected costs or production outputs. Forward looking statements in this release include, but are not limited to, the capital and operating cost estimates and economic analyses from the BFS.

Forward looking statements inherently involve known and unknown risks, uncertainties and other factors that may cause the company's actual results, performance and achievements to differ materially from any future results, performance or achievements. Relevant factors may include, but are not limited to, changes in commodity prices, foreign exchange fluctuations and general economic conditions, increased costs and demand for production inputs, the speculative nature of exploration and project development, including the risks of obtaining necessary licences and permits and diminishing quantities or grades of resources or reserves, political and social risks, changes to the regulatory framework within which the company operates or may in the future operate, environmental conditions including extreme weather conditions, recruitment and retention of personnel, industrial relations issues and litigation.

Forward looking statements are based on the company and its management's good faith assumptions relating to the financial, market, regulatory and other relevant environments that will exist and affect the company's business and operations in the future. The company does not give any assurance that the assumptions on which forward looking statements are based will prove to be correct, or that the company's business or operations will not be affected in any material manner by these or other factors not foreseen or foreseeable by the company or management or beyond the company's control.

Although the company attempts to identify factors that would cause actual actions, events or results to differ materially from those disclosed in forward looking statements, there may be other factors that could cause actual results, performance, achievements or events not to be anticipated, estimated or intended, and many events are beyond the reasonable control of the company. Accordingly, readers are cautioned not to place undue reliance on forward looking statements.

Forward looking statements in this release are given as at the date of issue only. Subject to any continuing obligations under applicable law or any relevant stock exchange listing rules, in providing this information the company does not undertake any obligation to publicly update or revise any of the forward looking statements or to advise of any change in events, conditions or circumstances on which any such statement is based.

# **JORC Table 1 Checklist of Assessment and Reporting Criteria**

## **Section 1 Sampling Techniques and Data**

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul> <li>Nature and quality of sampling (e.g. cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as down hole gamma sondes, or handheld XRF instruments, etc.). These examples should not be taken as limiting the broad meaning of sampling.</li> <li>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</li> <li>Aspects of the determination of mineralisation that are Material to the Public Report.</li> <li>In cases where 'industry standard' work has been done this would be relatively simple (e.g. 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (e.g. submarine nodules) may warrant disclosure of detailed information.</li> </ul>	<ul> <li>HQ core was used to obtain coal samples of seams and plies for raw and proximate analysis.</li> <li>All holes were geophysically logged using down-hole wireline tools. Calibration and quality appear to be in line with industry standards and seam correlation and characteristics are readily discernible.</li> <li>Sampling and sub-sampling of core for analysis provides accurate and reliable adherence to lithological boundaries and provides sufficient information to determine seam and ply quality.</li> <li>LOX sampling has been completed on a 50cm basis, or at ply boundaries. LOX testing has included raw proximate analysis/CSN and further composite analysis for full determination of thermal coal properties.</li> </ul>
Drilling techniques	<ul> <li>Drill type (e.g. core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc.) and details (e.g. core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc.).</li> </ul>	<ul> <li>All coal quality holes were cored (partially or fully) using a HQ3 size barrel, 61.1 millimetres core diameter.</li> </ul>
Drill sample recovery	<ul> <li>Method of recording and assessing core and chip sample recoveries and results assessed.</li> <li>Measures taken to maximise sample recovery and ensure representative nature of the samples.</li> <li>Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material.</li> </ul>	<ul> <li>Drill sample recoveries are assessed both on a linear core measurement and a mass recovery basis (dispatch mass/lab mass/calculated expected mass).</li> <li>A linear/mass recovery cut-off of 95% applies to points of observation.</li> <li>Loss intervals were determined after reconciliation to geophysical logs and lab determined mass recovery.</li> </ul>
Logging	<ul> <li>Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies.</li> </ul>	<ul> <li>Geological logging is available for all drill holes used within the model build and resource estimate. Quality is of a good standard and depths have been reconciled to geophysics.</li> </ul>

Criteria	JORC Code explanation	Commentary
Sub- sampling techniques and sample preparation	<ul> <li>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc.) photography.</li> <li>The total length and percentage of the relevant intersections logged.</li> <li>If core, whether cut or sawn and whether quarter, half or all core taken.</li> <li>If non-core, whether riffled, tube sampled, rotary split, etc. and whether sampled wet or dry.</li> <li>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</li> <li>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</li> <li>Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling.</li> <li>Whether sample sizes are appropriate to the grain size of the material being sampled.</li> </ul>	<ul> <li>Only fully cored holes have been drilled – no open holes have been drilled at Amaam North.</li> <li>The total length of logged drill core is 2262m (30 drill holes)</li> <li>Core is sampled on lithological boundaries as per an accepted generic sampling protocol. Coal seams are not sampled in increments thicker than 1m, and seams are also sampled at any lithological changes or notable differences in coal brightness. Any stone partings in the seam in excess of 5cm are typically sampled separately. Roof, Floor and thicker partings are sampled (typically 20cm) for dilution.</li> </ul>
Quality of assay data and laboratory tests	<ul> <li>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</li> <li>For geophysical tools, spectrometers, handheld XRF instruments, etc., the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc.</li> <li>Nature of quality control procedures adopted (e.g. standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (i.e. lack of bias) and precision have been established.</li> </ul>	<ul> <li>Coal quality testing is carried out within the SGS laboratories in Novokuznetsk under the direct supervision of A &amp; B Mylec. The laboratory has been subjected to independent audit prior to the commencement of work for TIG. Coal quality is checked and collated by A &amp; B Mylec before inclusion in the geological/coal quality models.</li> </ul>
Verification of sampling and assaying	<ul> <li>The verification of significant intersections by either independent or alternative company personnel.</li> <li>The use of twinned holes.</li> <li>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</li> <li>Discuss any adjustment to assay data.</li> </ul>	<ul> <li>The primary method for verification of the sampling intervals is through wireline geophysical logs. Corrected depths are supplied to the laboratories.</li> </ul>
Location of data points	<ul> <li>Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.</li> <li>Specification of the grid system used.</li> </ul>	<ul> <li>The survey equipment used was a GNSSJAVAD Triumph-1. Survey included removal of snow to ground surface, and location of the collar. (UTM60 north – WGS84)</li> <li>Four pairs of 80cm IKONOS stereo imagery were used to create the</li> </ul>

Criteria	JORC Code explanation	Commentary
	Quality and adequacy of topographic control.	2m DTM and 5m contours covering 437 km2 over Ammam North. This is considered adequate for the purposes of reporting resources. Reconciliation of topographic height to surveyed collar height was completed and showed acceptably small offset.
Data spacing and distribution	<ul> <li>Data spacing for reporting of Exploration Results.</li> <li>Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied.</li> <li>Whether sample compositing has been applied.</li> </ul>	<ul> <li>Drill holes within Project F have been drilled at approximately 250m apart along strike and down dip. Given the strong degree of correlation within the drill holes (in the majority of seams and all key economic seams), Resolve are satisfied that the continuity of structure and grade is strongly supported.</li> </ul>
Orientation of data in relation to geological structure	<ul> <li>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</li> <li>If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material.</li> </ul>	<ul> <li>All drill holes are vertically drilled. Dip is generally estimated to be between 8 and 30 degrees and coal is modelled using these apparent dips. Regional structure is determined through cross sectional analysis and appropriate buffers around known faults apply, within which resources are reported within the inferred category.</li> <li>All seam and parting thicknesses referred to are apparent thicknesses.</li> </ul>
Sample security	The measures taken to ensure sample security.	<ul> <li>Resolve has not been present during drilling and cannot provide assurances on sample security. Core photography corresponds to drilling data, and sample masses are verified by the laboratory in Novokuznetsk. Resolve is broadly satisfied that the samples are valid and secure.</li> </ul>
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	<ul> <li>No specific audits or reviews of sampling techniques were undertaken. Sampling techniques are based on procedures established and reviewed following the commencement of exploration on the Amaam Licence.</li> </ul>

#### **Section 2 Reporting of Exploration Results**

(Criteria listed in the preceding section also apply to this section.)

Criteria	JORC Code explanation	Commentary
Mineral	Type, reference name/number, location and ownership including	<ul> <li>LLC Beringpromugol (BPU) is the holder of the Amaam North</li> </ul>
tenement	agreements or material issues with third parties such as joint	Geological Study Licence (Verhne-Alkatvaam Coal Deposit, officially

Criteria	JORC Code explanation	Commentary
and land tenure status	<ul> <li>ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.</li> <li>The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area.</li> </ul>	<ul> <li>named Levoberezhniy license block), number AND01203 TP. The licence was granted in September 2011 for a five year term. The licence is 479 km2, measuring approximately 36 km east-west and 13 km north-south.</li> <li>Royalties of 57 Rubles/tonne are payable to the Russian government on each tonne of coking coal.</li> <li>TIG owns 80% of BPU via a Cyprus based company (Rosmiro), and owns 80% of NPCC via a Cyprus based company (Eastshore).</li> <li>BPU were also granted an easement over the Licence area for surface rights. This can be renewed annually until such time as BPU obtains an Exploration and Extraction licence, and obtains surface rights with longer term leases or purchases the required land.</li> <li>There are no known impediments to obtaining a Mining Licence.</li> </ul>
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	<ul> <li>In 2008 a previous Licence holder completed a bore core exploration program of 4 holes with 2 of these holes in the project F Area.</li> </ul>
Geology	Deposit type, geological setting and style of mineralisation.	<ul> <li>Project F is a multi-seam, shallow to moderate dipping coal deposit located on a limb of anticlinal structure. Coal occurs within the Paleogene Chukchi Formation. The Eocene Lower Chukchi sub- formation is the primary target of exploration and comprises four seam groups of mineable thickness. The average cumulative coal thickness throughout the deposit is estimated to be between 6 to 7m, and drillholes have intersected cumulative coal thicknesses up to 11m.</li> </ul>
Drill hole Information	<ul> <li>A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes:         <ul> <li>easting and northing of the drill hole collar</li> <li>elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar</li> <li>dip and azimuth of the hole</li> <li>down hole length and interception depth</li> <li>hole length.</li> </ul> </li> <li>If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from</li> </ul>	Included in Appendix A, Summary of Project F Drill Holes

Criteria	JORC Code explanation	Commentary
	the understanding of the report, the Competent Person should clearly explain why this is the case.	
Data aggregation methods	<ul> <li>In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated.</li> <li>Where aggregate intercepts incorporate short lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail.</li> <li>The assumptions used for any reporting of metal equivalent values should be clearly stated.</li> </ul>	<ul> <li>In reporting exploration results, Resolve used a minimum ply thickness of 0.3m used to a depth of 150m. For 'potential underground' areas a minimum working section thickness of 1.2m was applied.</li> <li>'Open cut' coal resources were estimated to 150m from topographic surface and 'potential underground' resources were estimated beyond 150m depth from topographic surface. Due to drill hole locations no underground resources were estimated below 350m from the topographic surface.</li> <li>No coal quality limits were applied to the resource estimate.</li> <li>Thermal coal resources were estimated in the oxidised zone from 2m below surface to the base of oxidation.</li> </ul>
Relationship between mineralisatio n widths and intercept lengths	<ul> <li>These relationships are particularly important in the reporting of Exploration Results.</li> <li>If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.</li> <li>If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known').</li> </ul>	Project F has seams, which outcrop in places along the surface to the south, and dipping towards the north at generally less than 25°.
Diagrams	Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported These should include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views.	No new discovery being reported. Reserves are being reported on previously reported Resources.
Balanced reporting	Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results.	This has been addressed.
Other substantive exploration data	Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances.	• In the summer of 2012, 20 trench samples were collected by the Beringpromugol geological team. Coal quality analysis for AL08001 included proximates, swell, sulphur, phosphorous and ultimates. In addition, a selection of carbonisation characteristics were analysed (Gieseler Fluidity; Gray-King Coke Type; Roga Index; and Sapozhnikov Index X and Y) and the petrographic composition was

Criteria	JORC Code explanation	Commentary
		assessed. Two samples had simplified ash composition analysis completed. The 2012 trench samples were evaluated through a similar testing regime, with the exclusion of ultimates analysis and no carbonisation characteristics were assessed. Although four samples were exposed to petrographic composition analysis, no ash composition analysis was completed.  In 2013, coring of 31 holes (which contained coal) was completed and analysis on samples from this program is underway.  All samples are air dried and Apparent Relative Density (ARD) analysis is completed prior to assignment of an appropriate laboratory procedure. Stone samples are assessed for relative density (RD), moisture, ash, total sulphur (TS) and phosphorus. Each Raw Coal ply is assessed for RD, proximate, TS, calorific value (CV) and Crucible Swelling Number (CSN). Working section composites are then generated for further analysis, either through additional Raw Coal procedures, Crushed Coal Washability procedures, or Pretreated (Drop Shatter, Wet Tumble) Coal Washability procedures.  The eight (8) samples from the 2013 program, which have undergone petrographic analysis, have averaged a RoMax of 1.01% (ranging from 0.96 to 1.11%). Vitrinite results from these samples exhibit a wide range, from 33 to 73%, with Total Reactives (vitrinite, liptinite and reactive semifusinite) averaging 72%.  Additional geology data is sourced from a further 40 holes in addition to the 38 holes from 2012/13 drilling season. Of the 40 added in 2013/14, 22 were targeted specifically at LOX drilling, in order to determine the depth of oxidation, and the nature of the weathering profiles. Holes of significance were drilled downdip, and added additional confidence to areas of Project F from which resource tonnes and quality was previously extrapolated.  Appendix B summarises the raw coal quality assessment based on the sample database. The seam averages and WOR average have been weighted on a resource tonnage basis. These differ slightly to the geological Resource estimate, as t

## JORC Code explanation Commentary Criteria The nature and scale of planned further work (eg tests for lateral Further work • TIG intends to complete over 18,000m of drilling on the licence by extensions or depth extensions or large-scale step-out drilling). June 2016, and expects that this work will see the conversion of much of the Exploration Target into resources. • Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive. Completed Drill Hole Middle Chuckhi Formation Known Outcrop Point Lower Chuckhi Formation Koryak Formation Project F Boundary Fault (Interpreted from Land

**Section 3 Estimation and Reporting of Mineral Resources** 

Criteria	JORC Code explanation	Commentary
Database integrity	<ul> <li>Measures taken to ensure that data has not been corrupted by, for example, transcription or keying errors, between its initial collection and its use for Mineral Resource estimation purposes.</li> <li>Data validation procedures used.</li> </ul>	<ul> <li>All coal seam depths and sample numbers have been independently verified and corrected. Any remaining transcription errors may have no bearing on the process of resource estimation.</li> </ul>
Site visits	<ul> <li>Comment on any site visits undertaken by the Competent Person and the outcome of those visits.</li> <li>If no site visits have been undertaken indicate why this is the case.</li> </ul>	• The competent person has undertaken two separate site visits during the project to date, this includes 2 weeks on site during the 2013/14 drilling season which was utilised to validate sample handling, geological data acquisition, drilling methods and data integrity. The findings of this visit determined that although the logistics of working in the Chukotka environment mean that best practise is not attainable for drill core handling and integrity, Resolve are satisfied that the data is collected by competent technical people, the database is in the hands of competent administrators and the overall acquisition of information for modelling is as good as reasonably achievable.
Geological interpretatio n	<ul> <li>Confidence in (or conversely, the uncertainty of) the geological interpretation of the mineral deposit.</li> <li>Nature of the data used and of any assumptions made.</li> <li>The effect, if any, of alternative interpretations on Mineral Resource estimation.</li> <li>The use of geology in guiding and controlling Mineral Resource</li> </ul>	<ul> <li>Resolve consider the interpretation of the geology to be accurate. Precise location, orientation and density of modelled faults requires additional infill drilling to determine, however the geology is tightly controlled in the context of the JORC classification in which it is estimated.</li> <li>Deterioration of the lower (3/2/1) coal seams is well documented</li> </ul>
	<ul><li>estimation.</li><li>The factors affecting continuity both of grade and geology.</li></ul>	within the drill holes. Modelled quality within these seams reflects the deteriorating quality from east to west and appropriate thickness and ash (%) cut-off has been applied.
Dimensions	<ul> <li>The extent and variability of the Mineral Resource expressed as length (along strike or otherwise), plan width, and depth below surface to the upper and lower limits of the Mineral Resource.</li> </ul>	<ul> <li>The coal resources reported extend along strike approximately 3km.</li> <li>Inferred resources are extrapolated to a maximum of approximately 1.2km from the coal sub crop. The coal seams appear to steepen in dip on the north eastern region of the reported resource.</li> </ul>
Estimation and modelling techniques	<ul> <li>The nature and appropriateness of the estimation technique(s) applied and key assumptions, including treatment of extreme grade values, domaining, interpolation parameters and maximum distance of extrapolation from data points. If a computer assisted estimation method was chosen include a description of computer software and parameters used.</li> <li>The availability of check estimates, previous estimates and/or mine production records and whether the Mineral Resource estimate takes</li> </ul>	• The estimation was undertaken using the computer model generated in Minex modelling software. The estimation was also undertaken using Minex software. Seam thickness grids and in situ density grids were limited by resource polygon areas by the software. Resources were limited below the gridded base of weathering surface. 'Thermal' coal was also estimated in the zone below the estimated base of quaternary (2m below topography) and the base of weathering. A minimum seam thickness of 0.3m was applied to the 'open cut'

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Criteria	J	ORC Code explanation	C	ommentary
	•	the average sample spacing and the search employed.	•	resources and 1.2m to potential 'underground' resources. Underground resources were estimated for a working section of Seam 4 only at depth greater than 150m.  All coal plies were included in the resource estimate except Plies 5 and 401 which were too thin for the minimum seam cut off limit.  Approximately 50% of the 'open cut' resources were estimated in areas of extrapolated grids, down dip from drill hole data (0.1-0.5km from drill hole data).  All underground resources are estimated in areas of extrapolated grids, down dip from drill hole data (0.1-1km from drill hole data).  No previous resource estimate or data for reconciliation was available for this project.
Moisture	•	Whether the tonnages are estimated on a dry basis or with natural moisture, and the method of determination of the moisture content.	•	Coal tonnages are estimated using an in situ density, calculated using the Preston-Sanders formula for In-situ RD. The in situ moisture calculations required to provide this figure were performed by A & B Mylec on a sample basis.
Cut-off parameters	•	The basis of the adopted cut-off grade(s) or quality parameters applied.	•	A 50% ash cut-off applies on a seam/ply composite basis. The impact on resources by this cut-off is negligible.
Mining factors or assumptions	•	Assumptions made regarding possible mining methods, minimum mining dimensions and internal (or, if applicable, external) mining dilution. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider potential mining methods, but the assumptions made regarding mining methods and parameters when estimating Mineral Resources may not always be rigorous. Where this is the case, this should be reported with an explanation of the basis of the mining assumptions made.	•	A 30cm seam cut off was used, assuming an in-pit truck shovel operation. Seams below 30cm thickness are not considered practical to mine by this method. Operation is an arctic climate may influence this further in the practical application of mining techniques, however Resolve have not adjusted the thickness cut-off on this basis. Coal quality includes thin coal seam partings and is therefore not indicative of a final product density/tonnage in some cases (individual seams are likely to require no washing)  A 1.2m cut-off has been applied to underground resources. This required the modelling of an underground working section (seam 4).  1.2m is the minimum working height within neighbouring mines and has been implemented in this case. The actual optimal working height of an underground mine within project F may vary from this.

Criteria	JORC Code explanation	Commentary
Metallurgical factors or assumptions	The basis for assumptions or predictions regarding metallurgical amenability. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider potential metallurgical methods, but the assumptions regarding metallurgical treatment processes and parameters made when reporting Mineral Resources may not always be rigorous. Where this is the case, this should be reported with an explanation of the basis of the metallurgical assumptions made.	• N/A
Environmen- tal factors or assumptions	• Assumptions made regarding possible waste and process residue disposal options. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider the potential environmental impacts of the mining and processing operation. While at this stage the determination of potential environmental impacts, particularly for a greenfield project, may not always be well advanced, the status of early consideration of these potential environmental impacts should be reported. Where these aspects have not been considered this should be reported with an explanation of the environmental assumptions made.	<ul> <li>Environmental issues have not been considered when reporting coal resources. Based on available data and an understanding of the deposit region, environmental factors will not impact the likelihood of economic extraction within Project F.</li> </ul>
Bulk density	<ul> <li>Whether assumed or determined. If assumed, the basis for the assumptions. If determined, the method used, whether wet or dry, the frequency of the measurements, the nature, size and representativeness of the samples.</li> <li>The bulk density for bulk material must have been measured by methods that adequately account for void spaces (vugs, porosity, etc.), moisture and differences between rock and alteration zones within the deposit.</li> <li>Discuss assumptions for bulk density estimates used in the evaluation process of the different materials.</li> </ul>	<ul> <li>Both laboratory RD, and Apparent RD (ARD) were determined by SGS. A Preston Sanders equation was then applied using in-situ moisture (calculations provided on a sample basis by AB Mylec). This provides an industry accepted In situ density for reporting of tonnages. In situ RD should reconcile well with ARD. This is the case with these samples.</li> </ul>
Classificatio n	<ul> <li>The basis for the classification of the Mineral Resources into varying confidence categories.</li> <li>Whether appropriate account has been taken of all relevant factors (i.e. relative confidence in tonnage/grade estimations, reliability of input data, confidence in continuity of geology and metal values, quality, quantity and distribution of the data).</li> <li>Whether the result appropriately reflects the Competent Person's view of the deposit.</li> </ul>	<ul> <li>Drill hole data spacing is adequate for measured resources to be reported across the drilled area, in accordance with the current coal guideline (2004) spacing suggestions. Reductions in classification are attributed to either faulting, whereby Resolve do not believe the model is accurate or suitable for detailed mine planning, or extrapolated resources, where Resolve does not have adequate support for Measured, and/or indicated resources.</li> </ul>

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Criteria	JORC Code explanation	Commentary
Audits or reviews	The results of any audits or reviews of Mineral Resource estimates.	<ul> <li>The geological and coal quality models were prepared in detail by McElroy Bryant Geological Services (MBGS). Resolve reviewed the models in accordance with raw drill hole data, coal quality and other supportive elements such as mapping, stereoscopic structural interpretation, aerial imagery and topography, and are satisfied that the model is robust.</li> </ul>
Discussion of relative accuracy/ confidence	<ul> <li>Where appropriate a statement of the relative accuracy and confidence level in the Mineral Resource estimate using an approach or procedure deemed appropriate by the Competent Person. For example, the application of statistical or geostatistical procedures to quantify the relative accuracy of the resource within stated confidence limits, or, if such an approach is not deemed appropriate, a qualitative discussion of the factors that could affect the relative accuracy and confidence of the estimate.</li> <li>The statement should specify whether it relates to global or local estimates, and, if local, state the relevant tonnages, which should be relevant to technical and economic evaluation. Documentation should include assumptions made and the procedures used.</li> </ul>	
	These statements of relative accuracy and confidence of the estimate should be compared with production data, where available.	and grade to coal quality reported within individual JORC classifications.

## **Section 4 Estimation and Reporting of Ore Reserves**

(Criteria listed in section 1, and where relevant in sections 2 and 3, also apply to this section.)

Criteria	JORC Code explanation	Commentary
Mineral Resource estimate for conversion to Ore Reserves	<ul> <li>Description of the Mineral Resource estimate used as a basis for the conversion to an Ore Reserve.</li> <li>Clear statement as to whether the Mineral Resources are reported additional to, or inclusive of, the Ore Reserves.</li> </ul>	<ul> <li>The Coal Resources for Amaam North prepared by Resolve Geo Pty Ltd in August 2013 have been used as the basis of this conversion.</li> <li>The Coal Resources reported are inclusive of the Coal Reserves reported in this document.</li> </ul>
Site visits	<ul> <li>Comment on any site visits undertaken by the Competent Person and the outcome of those visits.</li> <li>If no site visits have been undertaken indicate why this is the case.</li> </ul>	Site visits have been carried out a number of times by the Competent Persons, the most recent of which was in August 2014. Verification of coal outcrop positions, drillhole locations and a review of data gathering practices was carried out. Activities included a review of planned infrastructure locations and haulage routes and existing port facilities.
Study status	<ul> <li>The type and level of study undertaken to enable Mineral Resources to be converted to Ore Reserves.</li> <li>The Code requires that a study to at least Pre-Feasibility Study level has been undertaken to convert Mineral Resources to Ore Reserves. Such studies will have been carried out and will have determined a mine plan that is technically achievable and economically viable, and that material Modifying Factors have been considered.</li> </ul>	<ul> <li>A Feasibility level study has been carried out and completed in November 2014.</li> <li>The Feasibility Study addressed material modifying factors including, but not limited to: tenure &amp; regulatory approvals; stakeholder management and environmental considerations; site conditions; geology; mine planning and operations; coal quality and beneficiation; marketing and sales; transport, port facilities and distribution; infrastructure, utilities and services; personnel; operating and capital costs; and business risks.</li> </ul>
Cut-off parameters	The basis of the cut-off grade(s) or quality parameters applied.	<ul> <li>Reserves are within an open pit designed using FOB coal prices of US\$115/t for coking coal and US\$90/t for thermal coal.</li> <li>The maximum ROM Coal Ash level was set at 55% based on linear yield regressions developed from washability testing.</li> <li>Coal is allocated to two products: Coal 2m from surface to base of oxidation will be sold as a Thermal product. Bypass and washed coal below the line-of-oxidation (LOX) will be blended together to produce a marketable coking coal. Product qualities were benchmarked against other market coals to ensure they fall within acceptable parameters.</li> </ul>

Criteria	JORC Code explanation	Commentary
Mining factors or assumptions	The method and assumptions used as reported in the Pre- Feasibility or Feasibility Study to convert the Mineral Resource to an Ore Reserve (i.e. either by application of appropriate factors by optimisation or by preliminary or detailed design).	<ul> <li>The mining operations commence using the Strip mining method, before moving to the Terrace mining method for second 60% of the LOM.</li> <li>Coal will be selectively mined by ply by a dedicated excavator and dozers.</li> </ul>
	The choice, nature and appropriateness of the selected mining method(s) and other mining parameters including associated design issues such as pre-strip, access, etc.	<ul> <li>The high wall is designed so that at the pit base, coal plies and inter- burden grouped together in an up-to-20 metre bench, with a 15 metre berm where coal meets overburden. Above this, benches are 20 metre high with 70° batters and 15 metre wide berms. An up-to-15</li> </ul>
	The assumptions made regarding geotechnical parameters (eg pit slopes, stope sizes, etc), grade control and pre-production drilling.	metre bench is constructed in weathered material with a 45° batter to surface. Together, this forms an effective overall high wall angle of 39 - 49°. The pit has a maximum depth of ~120m and an average depth of 45m.
		<ul> <li>Benches are a minimum of 50m wide</li> <li>Coal seams of 0.3m and greater have been assumed recoverable, and partings less than 0.3m have been aggregated. Based on the dip and mining method, a mining accuracy of 100mm (the combination of dilution and coal loss totals 100mm on each of the seam roof and floor contacts) has been adopted. For Seam 4, where minimisation of</li> </ul>
	<ul> <li>The major assumptions made and Mineral Resource model used for pit and stope optimisation (if appropriate).</li> <li>The mining dilution factors used.</li> <li>The mining recovery factors used.</li> <li>Any minimum mining widths used.</li> </ul>	dilution has a higher ranking than recovery, the aggregation parameters are coal loss of 75mm and dilution of 25mm. For all other seams, the aggregation parameters are coal loss of 50mm and dilution of 50mm. The maximum ROM Coal Ash level was set at 55% based on linear yield regressions developed from washability testing.  • Inferred Mineral Resources (IMR) make up 4.8MT of the total
	The manner in which Inferred Mineral Resources are utilised in mining studies and the sensitivity of the outcome to their inclusion.	Resources which is 34% of the open pit mining inventory. These IMR are predominantly located down dip of Reserves. The estimate of reserves is not considered to be sensitive to their future conversion to indicated and measured resources.  • The financial outcome of the study if IMR are significantly reduced
		does not impact the reserve estimate.  The Project Base Case encompasses:  The mine site comprising an open pit mine, coal handling and processing plant (CHPP), and associated infrastructure (workshops and warehouses, worker accommodation and offices, electrical generation and distribution facilities,

Criteria	JORC Code explanation	Commentary
	The infrastructure requirements of the selected mining methods.	overburden/waste rock stockpiles, water and waste management facilities, etc);  2. The coal transport chain comprises a 35km road from the mine site to the Beringovsky port for coal transport and mine site supplies; and  3. A TIG owned coal terminal at Beringovsky which requires upgrading to ship the required production coal.
Metallurgical factors or assumptions	<ul> <li>The metallurgical process proposed and the appropriateness of that process to the style of mineralisation.</li> <li>Whether the metallurgical process is well-tested technology or novel in nature.</li> <li>The nature, amount and representativeness of metallurgical test work undertaken,</li> </ul>	<ul> <li>The CHPP flowsheet comprises Dense Medium Cyclones (DMCs), treating coarse material (~60% of plant feed); and a fines circuit beneficiate ng the +125 micron material (~35% of plant feed). Due to likely higher operating and capital costs associated with treatment of the ultra-fines (~5% of plant feed), the process flowsheet sends this fraction to tailings.</li> <li>These are all well tested technologies</li> <li>Metallurgical factors are based on testing of HQ3 cores. Analyses included testing for: Inherent moisture and Ash, CSN/FSI, Ultimate analysis, Gieseler fluidity, Audibert-Arnu dilatometer, Sapozhnikov indices, Petrographic analysis, Ash composition analysis, G index, Roga index, Gray-King Coke Type and Ash fusion analysis (for GKZ compliance). CHPP feed fresh coal was additionally tested for Total Sulphur, Proximate analysis and Calorific value. Bypass coal samples underwent Trace element analysis.</li> <li>Proximate analysis, total sulphur and calorific value, were recalculated for each composite, based upon the preceding raw coal analysis, to reflect the measured inherent moisture and ash obtained by the laboratory tests.</li> <li>Washability and coal yields are derived using two pre-treatment techniques – drop/shatter/wet tumble, and crushing.</li> <li>A&amp;B Mylec reported results on a 'diluted basis', where parameters were recalculated to include coal loss and dilution. Coal loss of 0.075 metres was subtracted from the thickness of each sample and 0.025 metres of dilution was added. Ash has been recalculated for the included dilution. Volatile matter, total sulphur, calorific value and phosphorus in coal, have been recalculated to the new ash level. Other analyses were assumed to not change significantly with the slight increase in ash.</li> </ul>

Criteria	JORC Code explanation	Commentary
	The nature of the metallurgical domaining applied and the corresponding metallurgical recovery factors applied.	<ul> <li>Laboratory analyses were gridded and gridded averages have been used to represent whole-of-resource averages, for these bypass coking composites.</li> <li>As coal from plies 402/401 and plies 22/21 are not included in the present mining plan as bypass coal, these samples have not been included in this assessment.</li> <li>The primary deleterious element present in the deposit is ash, which makes up 17% of the insitu deposit on an air dried basis. Fresh coal</li> </ul>
	Any assumptions or allowances made for deleterious elements.	<ul> <li>Test work indicates that the fresh coal sulphur levels are 0.3% on an air dried basis and phosphorous levels are 0.04% on an air dried basis. These levels are acceptable for a saleable product and require no further treatment. Calcium levels in Ash has been tested as 8.6%. Blending of bypass coal and washed coal is designed to reduce Calcium levels in the coking product.</li> <li>A bulk sample underwent a suite of coking tests at SGS's Novokuznetsk laboratory. Bulk samples were extracted from core</li> </ul>
	<ul> <li>The existence of any bulk sample or pilot scale test work and the degree to which such samples are considered representative of the orebody as a whole.</li> <li>For minerals that are defined by a specification, has the ore reserve estimation been based on the appropriate mineralogy to meet the specifications?</li> </ul>	<ul> <li>locations that had been previously cored and analysed – these locations were chosen on the basis of being representative of the deposit.</li> <li>The fresh coal reserve estimate has been based on producing a semi-hard coking coal. The coal quality specifications from the testwork that support this are the CSN and other plastic properties, ash mineralogy and petrographic properties (using weighted</li> </ul>
		<ul> <li>averages across the deposit). Product coking coal has a CSN of approximately 7, a vitrinite content of approximately 60% and a mean maximum reflectance of 1.00. Coke tests indicate fresh coal will be acceptable in the semi-hard coking coal market.</li> <li>The thermal coal reserve estimation has been based on producing a thermal product with average ash levels (ROM) of 17.5% and a CV level of 5500 kcal/kg NAR, based on detailed modelling and analysis of the initial section of the thermal mining area.</li> </ul>
Environmental	The status of studies of potential environmental impacts of the mining and processing operation.	The environmental baseline studies program for the feasibility study are complete. Information on the physiography, biological and socioeconomic environment of the project area is covered in Environmental studies carried out by VNII-1 (VNII-1, 2014); and

Criteria	JORC Code explanation	Commentary
Infrastructure	<ul> <li>Details of waste rock characterisation and</li> <li>the consideration of potential sites, status of design options considered and, where applicable,</li> <li>the status of approvals for process residue storage and waste dumps should be reported.</li> <li>The existence of appropriate infrastructure:</li> <li>availability of land for plant development, power, water, transportation (particularly for bulk commodities), labour, accommodation; or the ease with which the infrastructure can be provided, or accessed.</li> </ul>	<ul> <li>Golder Associates Environment and Social Component of BFS report (Golder, Jun 2014).</li> <li>Dump material was classified as 'category 3' (cohesion of 50kPa and friction angle of 30°) comprising a mixture of mainly sandstone, mudstone and siltstones. It was characterised as durable, blocky, free draining material.</li> <li>Dumps will be constructed north of the highwall of the main pit.</li> <li>In selecting the current planned dump positions, the impact on underlying coal resources has been considered. Sterilisation drilling has confirmed that coal seams underlying the dump footprint, are below the limit of economical open pit mining of this deposit.</li> <li>Disposal of coarse and fine rejects was analysed with respect to disposing them in the main waste dump. Of three options examined, the most robust and economical option was to co-dispose coarse rejects over the active tiphead together with pit waste. Fine rejects are then dumped separately into custom built sieves in the waste dump, where they consolidate and freeze before being capped.</li> <li>No infrastructure apart from a 60 person accommodation camp is currently present at the mine site. Beringovsky town and port are 35km distant.</li> <li>Project F is situated on unoccupied state-owned land in Russia. There are no known impediments to the construction of the infrastructure required for the project. TIG has short term leases over all the lands required for the project. TIG has short term leases over all the lands required for the project infrastructure, and will be converting these to long term leases during the project's development phase.</li> <li>A ~12km section of the all-season road from pit to port is in place, from Zarachensk to the port. The remaining section has no existing structures. The port is currently existing and operating.</li> </ul>
Costs	<ul> <li>The derivation of, or assumptions made, regarding projected capital costs in the study.</li> </ul>	<ul> <li>Projected Capital costs used in the study are based on consultant reports, vendor quotations and Project Team assessment.</li> <li>Site operating costs were built up from first principles, utilising fuel and other consumable costs derived from supplier quotes. Labour costs were derived from a labour study and local survey.</li> </ul>
	The methodology used to estimate operating costs.	The coking coal reserve price is based on producing a semi-hard coking coal.

Criteria	JORC Code explanation	Commentary
Criteria	Allowances made for the content of deleterious elements.     The derivation of assumptions made of metal or commodity price(s), for the principal minerals and co-products.  The source of exchange rates used in the study.      Derivation of transportation charges.  The basis for forecasting or source of treatment and refining charges, penalties for failure to meet specification, etc.  The allowances made for royalties payable, both Government and private.	<ul> <li>The thermal coal reserve price has been based on producing a thermal product in line with benchmark high ash thermal product, which targets a 5500 CV NAR and 20% ash.</li> <li>No specific allowances have been made for deleterious elements.</li> <li>All capital and operating costs based off the US dollar are given in US\$2014, such as materials and internationally sourced equipment. Capital and operating costs linked directly to the Russian Rouble, such as labour and royalties are Russian currency.</li> <li>The exchange rate applied in the valuation is 42 Roubles per USD.</li> <li>TIG owner transportation costs cover loading and hauling product coal from the pit to the port, stockpile and port management costs and transhipping onto ships via barges. Transport costs are derived from first principles.</li> <li>The majority of sales are expected to be on an FOB basis, to Asian customers in handymax and panamax sized vessels.</li> <li>Allowance has been made for Russia's mineral extraction tax (MET). The current MET rate applicable for the extraction of coking coal is 57 Rubles per tonne of product. The current MET rate applicable for the extraction of thermal coal is 47 Rubles per one tonne of the product.</li> <li>TRC Cyprus Pty Ltd (TRC Cyprus) and Rosmiro Investments Limited (Rosmiro) executed a royalty deed (Chukchi 2% Royalty Agreement) in January 2012 in relation to a royalty payable by Rosmiro to BS Chukchi Investments Limited (Chukchi). No payments are due under the Royalty Agreement by Rosmiro to Chukchi unless Chukchi elects not to fund its 20% interest post bankable feasibility study, pursuant to the terms of the Rosmiro Shareholders' Agreement. In that instance Chukchi relinquishes its shareholding to receive the royalty. The maximum royalty that Chukchi may receive is 2% of gross sales revenue from the sale of coal produced from the area of a licence held by a member of the Rosmiro executed a royalty deed (Siberian Tigers 3% Royalty Agreement) in December 2013 in relation to a royalty payable b</li></ul>
		gross sales revenue from the sale of coal produced from the area of the Amaam North Subsoil Licence. Once royalties are payable they

Criteria	JORC Code explanation	Commentary
		are payable on a quarterly basis and Rosmiro must prepare quarterly sales reports for Siberian Tigers.
Revenue factors	<ul> <li>The derivation of, or assumptions made regarding revenue factors including head grade, metal or commodity price(s) exchange rates, transportation and treatment charges, penalties, net smelter returns, etc.</li> <li>The derivation of assumptions made of metal or commodity price(s), for the principal metals, minerals and co-products.</li> </ul>	<ul> <li>The reserves are based on an open pit, developed using FOB coal prices of \$115/t for coking coal and \$90/t for thermal coal. The average LOM FOB costs are approximately \$70/t</li> </ul>
Market assessment	The demand, supply and stock situation for the particular commodity, consumption trends and factors likely to affect supply and demand into the future.  The demand, supply and stock situation for the particular commodity, consumption trends and factors likely to affect supply and demand into the future.	<ul> <li>In the absence of viable alternative technology, metallurgical coke will remain the dominant reductant used in the production of steel in the period to 2035 and the growing requirement for coke to meet steel demand will continue to support the coking coal market. The Thermal coal market balance is less favourable, with significant oversupply forecast during the next three years. However, Project F's low production costs will allow profitable sales to be made at a price that is competitive in the market (below the production costs of 3/4 of global seaborne thermal coal suppliers).</li> <li>Competitors are all seaborne coking coal suppliers (mainly in Australia, Russia, USA and Canada) as well as Chinese domestic suppliers. Based on analysis of operating costs, project F is expected to be highly competitive (1st quartile of global cash costs). Likely markets for Project F semi-hard coking coal are Japanese, Korean, Taiwanese and Chinese steel mills. This is a market of several</li> </ul>
	A customer and competitor analysis along with the identification of likely market windows for the product.	<ul> <li>hundred million tonnes.</li> <li>Project F semi-hard coking coal prices are based on a -15% differential from the QLD hard coking coal price forecast provided by the leading market analyst Wood Mackenzie.</li> <li>Thermal coal price has been based on international seaborne sales</li> </ul>
	Price and volume forecasts and the basis for these forecasts.	<ul> <li>using Wood Mackenzie's Newcastle high ash price forecast, and TIG estimates of domestic sales into the Russian Far East market.</li> <li>Coal ROM were derived in the bankable feasibility study. Coal product tonnages at port are 0.3 and 0.7Mt for 2015 and 2016, and target 1.1Mt from then onwards.</li> </ul>
	For industrial minerals the customer specification, testing and acceptance requirements prior to a supply contract.	<ul> <li>For coking coal the parameters generally tested per cargo are TM, ash, VM, TS, phosphorus, CSN, maximum fluidity, ash chemistry, Ro Max. For thermal coal the parameters are TM, ash, VM, TS, CV, HGI,</li> </ul>

Criteria	JORC Code explanation	Commentary
		ash chemistry and ash fusion temperatures. An on-site laboratory will be established and operated by an acceptable third party laboratory company meeting required standards for testing of coal
Economic	The inputs to the economic analysis to produce the net present value (NPV) in the study,	<ul> <li>The factors influencing the net present value (NPV) in the study are as follows:</li> <li>FOB Operating Cost of ~ \$70/t</li> <li>Project Capex of \$140M</li> <li>Corporate tax rate of 20%</li> <li>A real discount rate of 10%</li> </ul>
	The source and confidence of these economic inputs including estimated inflation, discount rate, etc.	<ul> <li>State royalty of RR57/t</li> <li>Exchange rate of 42RR:1 USD</li> <li>The NPV ranges and project capital costs are considered</li> </ul>
	NPV ranges and sensitivity to variations in the significant assumptions and inputs.	commercially sensitive and hence are not disclosed. The economic evaluations provide a positive NPV for the base case analysis, which in the view of the Competent Person is comparable with other similar projects.
Social	The status of agreements with key stakeholders and matters leading to social licence to operate.	<ul> <li>Company personnel have managed stakeholder engagement from the preliminary stages of the project's development and maintained contacts with Government representatives, communities and other project-affected stakeholders. The objectives of stakeholder engagement during the project's current phase are to provide sufficient and accessible information to stakeholders in an objective manner to assist in:         <ul> <li>Identifying stakeholder issues and questions;</li> <li>Determining alternatives and enhanced benefits so as to reflect relevant issues in the work plans for the environmental and socio-economic studies;</li> <li>The incorporation of beneficial local knowledge and experience; and</li> <li>Verifying that their issues and concerns have been captured and considered.</li> </ul> </li> <li>There is strong support for the Project at the Federal, Regional and Local Government level and amongst community stakeholders.</li> </ul>
		<ul> <li>A formal agreement on social investment has been signed with the District of Anadyr (Local Government) and the Chukotka Regional Public Organisation Association of Indigenous Minorities of the North,</li> </ul>

Criteria	JORC Code explanation	Commentary				
		Siberia and Far East (NGO).				
Other	<ul> <li>To the extent relevant, the impact of the following on the project and/or on the estimation and classification of the Ore Reserves:</li> <li>Any identified material naturally occurring risks.</li> </ul>	The key risks identified associated with the project are: project delay (>12months), the potential for safety incidents during construction, variations to projected coal quality, potential increases to capital costs, reductions to the planned production rate, potential skills shortages and exposures related to the marketing process or logistics. These are all classified as 3C, (moderate consequence and possible likelihood) according to the project risk register, developed				
	<ul> <li>The status of material legal agreements and marketing arrangements.</li> <li>The status of governmental agreements and approvals critical to the viability of the project, such as mineral tenement status, and government and statutory approvals.</li> </ul>	<ul> <li>by Ernst &amp; Young.</li> <li>There are no marketing agreements in place as of October 2014. Other agreements are covered in sections dealing with royalties, ownership and licencing.</li> <li>The Owner holds the Amaam North Geological Study Licence, number AND01203 TP, granted in September 2011 for a five year term. An Easement covering surface rights was granted in January 2013.</li> </ul>				
	There must be reasonable grounds to expect that all necessary Government approvals will be received within the timeframes anticipated in the Pre-Feasibility or Feasibility study. Highlight and discuss the materiality of any unresolved matter that is dependent on a third party on which extraction of the reserve is contingent.	<ul> <li>A detailed schedule of permit and approvals requirements has been developed, and a Licenced Design Institute for each discipline has been retained to deliver the permit process. Key milestones achieved to date include achievement of the Geological Study Licence, granting of Approval Certificate for Geological Funds, Granting of the Deposit Discovery Certificate by Rosnedra, and application to Rosnedra for the Exploration and Extraction Licence.</li> <li>A delay of up to 6 months in receiving the Construction or Commissioning Permit will not delay first revenue as the mine plan stockpiles coal product until the summer shipping season 2016.</li> </ul>				
Classification	The basis for the classification of the Ore Reserves into varying confidence categories.  Whather the result appropriately reflects the Competent Revenue.	All Measured Resources within the Project F Open Pit have been classified as Proven Resources. All Probable Resources within the Project F Open Pit have been classified as Probable Resources. Additional inferred resources within the pit shell have retained this				
	<ul> <li>Whether the result appropriately reflects the Competent Person's view of the deposit.</li> <li>The proportion of Probable Ore Reserves that have been derived from Measured Mineral Resources (if any).</li> </ul>	<ul> <li>classification.</li> <li>The resultant Resources and Reserves reflect the Competent Person's view of the deposit.</li> </ul>				
Audits or reviews	The results of any audits or reviews of Ore Reserve estimates.	No external audits have been carried out. However, an internal review has been conducted as part of the BFS.				

Criteria	JORC Code explanation	Commentary
Discussion of relative accuracy/ confidence	<ul> <li>Where appropriate a statement of the relative accuracy and confidence level in the Ore Reserve estimate using an approach or procedure deemed appropriate by the Competent Person. For example, the application of statistical or geostatistical procedures to quantify the relative accuracy of the reserve within stated confidence limits, or, if such an approach is not deemed appropriate, a qualitative discussion of the factors which could affect the relative accuracy and confidence of the estimate.</li> <li>The statement should specify whether it relates to global or local estimates, and, if local, state the relevant tonnages, which should be relevant to technical and economic evaluation. Documentation should include assumptions made and the procedures used.</li> <li>Accuracy and confidence discussions should extend to specific discussions of any applied Modifying Factors that may have a material impact on Ore Reserve viability, or for which there are remaining areas of uncertainty at the current study stage.</li> <li>It is recognised that this may not be possible or appropriate in all circumstances. These statements of relative accuracy and confidence of the estimate should be compared with production data, where available.</li> </ul>	<ul> <li>As stated in Section 1, insufficient data points exist to support a geostatistical study within Project F at this time. Resolve suggest that the close spacing of drill holes, coupled with the relative simplicity of the correlations on a broad scale, make such a study of limited use in this environment, where ambiguity is low. However due to the lack of appropriate methods to quantify the relative accuracy in relation to confidence, Resolve have employed a conservative approach, downgrading classification within structural domains where uncertainty is a factor. This downgrading also refers to individual thin seams (seam 33) which displays a poorer correlation and varied appearance/quality within boreholes.</li> <li>A BFS has been completed, the basis for which Resources are converted to Reserves. The study requirements align with a level of accuracy commonly used for Feasibility Studies. Thompson (1993) has been used as a basis to set the scope of works. Capital Cost Estimate Accuracy for this level of detail is in the range of 10-15%.</li> <li>No production data is available for open pit coal mines in the vicinity. Production rates of equipment have been benchmarked against other operations with similar size equipment.</li> </ul>

# Appendix A Summary of Project F Drill Holes

Hole Name	Easting	Northing	RL	Total Depth	Base of Oxidation	Hole Type	Comments
AL13001	589600.98	6983266.03	139.63	58.60	19.96	HQ Core	
AL13002	589237.19	6983215.68	123.76	67.60	13.08	HQ Core	
AL13003	588857.18	6982889.85	126.04	91.20	23.17	HQ Core	
AL13004	588476.97	6982566.26	130.20	91.20	12.06	HQ Core	No coal
AL13005	589429.09	6983386.25	114.50	79.00	13.62	HQ Core	
AL13006	589051.07	6983059.05	121.97	61.00	12.53	HQ Core	
AL13007	588666.15	6982726.94	132.25	87.90	14.27	HQ Core	
AL13008	588317.20	6982749.00	109.66	64.00	11.44	HQ Core	
AL13009	588507.69	6982916.98	111.48	115.20	19.30	HQ Core	
AL13010	588696.56	6983086.04	110.56	109.00	13.88	HQ Core	
AL13011	588881.08	6983241.84	105.39	103.20	10.88	HQ Core	
AL13012	589071.08	6983403.95	102.33	118.30	22.88	HQ Core	
AL13013	589262.08	6983571.22	92.86	127.20	16.12	HQ Core	
AL13014	589593.14	6983500.66	105.12	70.00	16.29	HQ Core	
AL13016	588921.53	6982627.18	157.66	40.00	11.93	HQ Core	no coal
AL13017	589170.10	6982890.84	143.33	58.50	11.43	HQ Core	
AL13018	589572.36	6983011.95	166.19	34.50	25.96	HQ Core	No coal
AL13019	589336.13	6983104.97	143.03	61.10	20.95	HQ Core	
AL13022	588131.40	6982588.38	106.88	91.00	8.80	HQ Core	
AL13023	587966.62	6982452.49	103.81	55.20	7.42	HQ Core	

AL13024	588407.46	6982672.32	121.63	40.00	10.27	HQ Core	
AL13025	587815.05	6982606.72	91.34	85.30	11.37	HQ Core	
AL13026	588153.65	6982944.29	93.64	118.45	19.30	HQ Core	
AL13027	589851.84	6983374.40	133.98	67.30	16.00	HQ Core	
AL13029	590336.56	6983384.80	149.34	73.60	8.85	HQ Core	
AL13031	590818.80	6983264.10	156.39	69.20	24.03	HQ Core	
AL13032	590845.67	6983435.10	139.44	79.50	9.06	HQ Core	No coal
AL13034	590341.07	6983640.70	127.68	121.00	7.24	HQ Core	No coal
AL13036	589890.37	6983717.52	110.37	121.00	16.90	HQ Core	No coal
AL13039	588855.03	6982728.37	140.10	79.20	24.97	HQ Core	
AL13040	589217.35	6982808.24	152.86	37.50	19.41	HQ Core	
AL13041	589386.83	6983050.17	150.96	45.00	24.01	HQ Core	
AL13042	589600.43	6983150.93	152.07	37.50	16.42	HQ Core	
AL13043	588212.34	6982507.72	122.87	36.60	8.96	HQ Core	
AL13044	587967.80	6982772.79	89.19	93.90	6.45	HQ Core	
AL13045	589839.36	6983265.60	144.49	40.20	8.11	HQ Core	
AL13046	590338.07	6983245.57	161.01	82.50	14.75	HQ Core	No coal
AL13047	588974.09	6982571.00	165.67	52.50	22.66	HQ Core	
AL14012	589851.30	6983947.71	84.27	195.30	16.68	Open Hole	
AL14014	591343.87	6983953.71	87.30	120.40	12.89	Open Hole	
AL14016	587639.97	6983162.30	114.32	252.50	15.39	HQ Core	
AL14018	588587.68	6983624.77	117.62	93.10	15.89	HQ Core	no coal
AL14018A	588528.31	6983615.12	116.80	271.00	17.86	HQ Core	
AL14021	589842.94	6983698.34	0.00	211.00	13.41	HQ Core	

AL14021A	589890.81	6983730.13	109.87	222.00	17.37	HQ Core	
AL14022	590347.94	6983300.46	150.32	61.00	11.16	HQ Core	
AL14023	590345.47	6983699.88	124.03	42.80	5.25	HQ Core	no coal
AL14023A	590322.24	6983675.41	125.27	177.60	11.49	HQ Core	
AL14026	590867.98	6983449.46	139.60	160.00	9.32	HQ Core	
AL14026A	590867.98	6983449.46	139.60	145.00	9.64	HQ Core	no coal
AL14066	589590.74	6983151.82	149.10	29.00	14.92	HQ Core	
AL14070	589615.89	6983133.01	157.12	21.20	9.08	HQ Core	
AL14071	589604.98	6983143.53	150.31	25.00	8.50	HQ Core	
AL14076	589065.85	6983040.28	133.17	60.00	11.40	HQ Core	
AL14085	588817.69	6983857.26	99.15	70.00	9.10	HQ Core	
AL14087	587882.63	6983450.68	112.27	50.00	11.80	HQ Core	no coal
ALCORE1	589496.89	6982985.57	162.13	20.00	20.00	HQ Core	no coal
ALCORE2	589463.83	6983022.22	155.56	30.00	19.00	HQ Core	
ALCORE3	589439.52	6983055.78	151.36	35.00	17.70	HQ Core	
ALCORE4	588327.40	6982457.92	136.65	20.00	20.00	HQ Core	no coal
ALCORE5	588296.81	6982485.55	134.74	27.00	14.55	HQ Core	
ALCORE6	588267.59	6982514.34	130.43	37.00	13.00	HQ Core	
ALCORE7	588257.34	6982533.87	127.15	30.00	11.42	HQ Core	
ALCORE8	588281.03	6982501.66	130.16	20.00	20.00	HQ Core	
ALCORE9	589428.94	6983093.62	148.24	30.00	20.13	HQ Core	
ALLOX01	588064.74	6982333.88	116.05	25.00	8.15	HQ Core	
ALLOX02	588417.76	6982660.34	126.57	23.00	12.18	HQ Core	
ALLOX04	589129.14	6982494.89	186.52	36.00	36.00	HQ Core	no coal

ALLOX05	588953.39	6982555.58	172.57	55.00	36.00	HQ Core	
ALLOX06	589255.54	6982590.60	188.86	31.00	31.00	HQ Core	
ALLOX07	589151.35	6982666.74	165.97	37.17	37.00	HQ Core	
ALLOX09	589289.19	6982940.76	143.04	31.00	14.69	HQ Core	
ALLOX10	589624.90	6983116.63	156.42	28.00	10.56	HQ Core	
ALLOX11	589828.81	6983220.80	150.84	22.00	15.77	HQ Core	
ALLOX12	589971.12	6983241.96	153.64	24.00	19.25	HQ Core	no coal
ALLOX13	590128.89	6983265.43	158.71	27.00	25.40	HQ Core	
ALLOX14	590359.42	6983292.04	157.61	27.00	16.57	HQ Core	
ALLOX15	590591.59	6983252.56	153.46	31.00	7.30	HQ Core	no coal