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#### 31 October 2017

# QUARTERLY REPORT FOR THE THREE MONTHS ENDING 30 SEPTEMBER 2017

#### **HIGHLIGHTS**

- Release of Reserves Report (JORC Code 2012)
- Release of Valmin Assessment Report for Cokal Coal Projects
- BBM Anak Project Progress Report
- Release of Annual Report
- Annual General Meeting to be held on 29 November 2017

#### **PROJECT STATUS**

#### **INDONESIA**

#### **BBM Project**

BBM's Production IUP (mining licence) covers an area of 14,980 hectares (ha), immediately adjacent to Indomet's Juloi tenement, straddling the Barito River and has multiple seams of high quality metallurgical coal. BBM has all regulatory approvals in place, including:

- Mining License 20 years with two further extensions of 10 years each
- Environmental Approval for a total of 6 million tonnes per annum
- Port Construction Approval
- Forestry Permit to commence mining activity.

As a foreign investment company (PMA), the IUP-OP for BBM has been transferred by the Murung Raya Regency to the Central Government (ESDM Jakarta) as required by recent changes in the mining regulations. Its decree adjustment process has now been completed. The new decree of BBM as "IUP-OP PMA" has been issued and signed by Head of Investment Coordination Board (BKPM) Jakarta on behalf of ESDM Minister, dated 22 September 2017 and will be valid until 29 April 2033.

#### BBM WEST BLOCK Exploration IPPKH Extension

Since the issue of the Borrow to Use Permit – Exploitation (IPPKH-OP) for the Eastern Block of the BBM project, Cokal has proceeded with the application for a Borrow to Use Permit – Exploration for the Western Block of BBM. This area consists of PCI and Anthracite coals close to the Barito River. The application is currently with the Planology Dept. at the Ministry of Environment and Forestry.

#### **TBAR Project**

TBAR's Exploration IUP (No.188.45/204/2012) covers an area of 18,850 hectares (ha), immediately adjacent to the south of BBM's tenement. TBAR's IUP (tenement license) is on the Clean and Clear List (CNC) with over 80% of the lease assigned as either production or limited production forestry

lease, that is, it is available for exploration activity subject to the issuance of an exploration forestry permit. The application of exploration forestry permit was submitted in 2014 and continues to be processed by the Environment and Forestry Ministry of Indonesia.

Following its transfer process from Murung Raya to Provincial Government, Cokal continues its efforts to acquire regulatory approval for the IUP (exploration license) upgrade process application to a Production and Operation IUP (equivalent to a mining license).

#### **BBP Project**

Cokal owns 60% share in Borneo Bara Prima (BBP) project which covers 13,050Ha in Murung Raya Regency, Central Kalimantan.

BBP has been granted an Exploration Forestry Permit (IPPKH), and has been confirmed on the Central Government's Clean and Clear list. The IUP was transferred to the Central Government where it now awaits approval to be upgraded to a mining license (Produksi IUP).

No exploration activity was conducted on BBP during this period.

## **AAK Project**

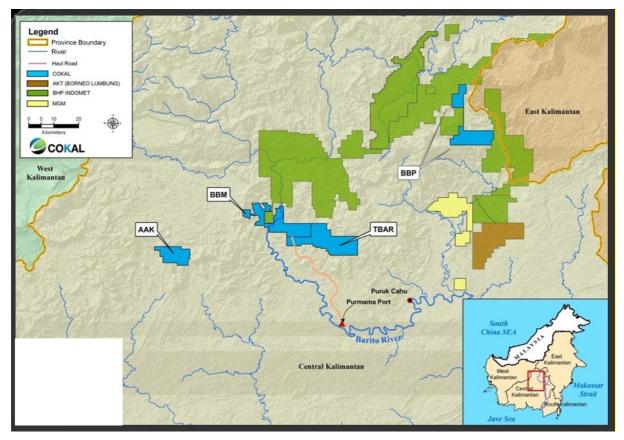
Cokal has a 75% share of Anugerah Alam Katingan (AAK) projects also located in Central, Kalimantan, Indonesia. The AAK project area comprises of 5,000ha.

Applications for the Exploration Forestry Permit (IPPKH) and Clean and Clear Certificates continue to be processed.

Cokal continues to monitor the progress of the regulatory upgrade approvals for AAK.

## Mining tenements held at the end of the quarter and their location

Tenement Name	Location	% Ownership
PT Bumi Barito Mineral (BBM)	Central Kalimantan, Indonesia	60%
PT Borneo Bara Prima (BBP)	Central Kalimantan, Indonesia	60%
PT Tambang Benua Alam Raya (TBAR)	Central Kalimantan, Indonesia	75%
PT Anugerah Alam Katingan (AAK)	Central Kalimantan, Indonesia	75%



Locality Plan of the Central Kalimantan Coal Projects on the Island of Kalimantan
- Cokal's Coal concession areas are shown in blue

#### **DISCLOSURES REQUIRED UNDER ASX LISTING RULE 5.3.3**

#### **GEOLOGICAL ACTIVITY**

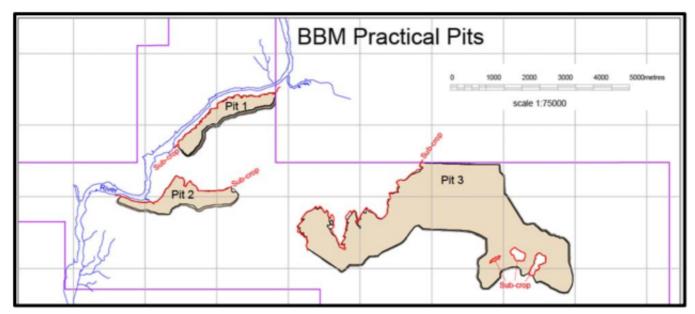
No exploration activity was conducted during the quarter period. Geological and mining staff were occupied with the mine planning and quality control at the BBM Anak mining project.

#### MINING EVALUATION ACTIVITY

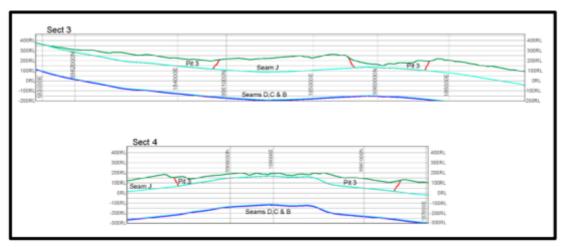
## RESERVES REPORTED FOR BUMI BARITO MINERAL (BBM) PROJECT

On 1st August 2017 Cokal Ltd (ASX:CKA) announced an the release of a Coal Reserve statement for economic open-pit coal in the eastern portion of the Bumi Barito Mineral (BBM) coal project.

The total Reserve estimate 20.2Mt of Run-of-Mine (ROM) comprises 13Million tonnes (Mt) Proved Reserves, and 7.2Mt Probable Coal Reserves in accordance with the 2012 JORC Code (see Tables 1 and 2). A total Marketable Coal Reserve of 16.9Mt (US\$150/t for coking coal and US\$112.50/t for PCI coal) has been confirmed as metallurgical coal from analyses conducted in an Australian laboratory.



Mine Layout Map of Economic Openpits of BBM East Block



Cross Section Through Openpits of BBM East Block

Tables 1, 2, and 3 below demonstrate the sensitivity of the BBM project as a function of coking coal and PCI sale prices. The economic analysis of BBM's Coal Resources indicated that with additional drilling to convert Inferred Resources to Indicated or Measured Resources, there is potential to delineate additional Coal Reserves.

The J Seam Reserves (5.5Mt Proved and 3.2Mt Probable Product coal) is 100% coking coal. In the case of Seams B, C and D, 3.0Mt Proved and 1.1Mt Probable is Coking Coal Reserves, while 2.4Mt Proved and 1.7Mt Probable is PCI Reserves.

Economic Reserves were determined by using the Definitive Feasibility Study which was prepared in 2014 by Resindo, and recently updated to reflect reduced fuel costs and depreciation of the Rupiah in November, 2016 (see ASX Announcement 2<sup>nd</sup> November, 2016).

Geotechnical analysis indicated that the pit slope angles of 75°, with 10m berms at every 45m depth, provided a safety factor of 1.59 which is above the minimum regulatory requirement.

Table 1: BBM Coal Reserves by JORC Category

FOB Coking Coal Sale Price		ROM Co	al	Coking Product			PCI Product			Total Product Coal		
(\$/Product	Proved	Probable	Prov + Prob	Proved	Probable	Prov + Prob	Proved	Probable	Prov + Prob	Proved	Probable	Prov + Prob
tonne)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)	(Mt)
110	7.9	2.7	10.6	4.7	1.3	6	1.8	1	2.8	6.6	2.3	8.9
120	9.8	4.2	14.1	6.2	2.3	8.5	2	1.2	3.3	8.2	3.5	11.7
130	10.4	4.7	15.2	6.6	2.5	9.1	2.2	1.4	3.6	8.7	3.9	12.7
150	13	7.2	20.2	8.5	4.3	12.8	2.4	1.8	4.2	10.9	6	16.9
180	14.7	11.1	25.8	9.8	7	16.8	2.4	2.3	4.7	12.2	9.3	21.5
210	15.2	12.3	27.6	10.2	7.9	18.1	2.5	2.4	4.9	12.7	10.3	23
240	15.9	13.7	29.6	10.6	8.9	19.5	2.6	2.6	5.1	13.2	11.4	24.7

Table 2: BBM Coal Reserves for Coking Coal Product

Coking Coal	Proved Reserves					Probable Reserves				Total Proved + Probable Reserves	
		Proc	duct Coal	(Mt)			Pro	duct Coal	(Mt)		(Mt)
		Se	am		Total		Se	am		Total	All Seams
Sale Price	J	D	С	В	Proved	J	D	С	В	Probable	All Ocallis
\$110.00	2.4	0.9	0.6	0.7	4.6	1	0.1	0.1	0.1	1.3	5.9
\$120.00	3.2	1.2	0.8	0.9	6.1	1.3	0.3	0.4	0.3	2.3	8.4
\$130.00	3.6	1.2	0.9	0.9	6.6	1.4	0.4	0.4	0.3	2.5	9.1
\$150.00	5.5	1.2	0.9	0.9	8.5	3.2	0.4	0.4	0.3	4.3	12.8
\$180.00	6.8	1.2	0.9	0.9	9.8	5.8	0.4	0.5	0.3	7	16.8
\$210.00	7.3	1.2	0.9	0.9	10.3	6.5	0.5	0.5	0.3	7.8	18.1
\$240.00	7.6	1.2	0.9	1	10.7	7.5	0.5	0.5	0.4	8.9	19.6

Table 3: BBM Coal Reserves for PCI Coal Product

PCI Coal	Proved Reserves  Product Coal (Mt)					Probable Reserves  Product Coal (Mt)					Total Proved + Probable Reserves (Mt)
		Se	am		Total		Se	am		Total	All Seams
Sale Price	J	D	С	В	Proved	J	D	С	В	Probable	All Ocallis
\$82.50	0	0.7	0.7	0.5	1.9	0	0.3	0.3	0.4	1	2.9
\$90.00	0	8.0	0.7	0.6	2.1	0	0.4	0.4	0.5	1.3	3.4
\$97.50	0	8.0	0.8	0.6	2.2	0	0.5	0.4	0.5	1.4	3.6
\$112.50	0	0.9	8.0	0.7	2.4	0	0.6	0.5	0.6	1.7	4.1
\$135.00	0	0.9	0.8	0.7	2.4	0	0.8	0.6	0.8	2.2	4.6
\$157.50	0	1	0.8	0.7	2.5	0	0.9	0.7	0.9	2.5	5
\$180.00	0	1	0.9	0.7	2.6	0	0.9	0.7	0.9	2.5	5.1

## **Material Assumptions**

The capital and operating costs used by ASEAMCO in the calculation of the Ore Reserve Estimate were defined in the 2014 Definitive Feasibility Study (DFS) prepared by PT Resindo and the October 2016 update to that study (DFS Update) which adjusted the costs for changes in exchange rates and diesel fuel prices.

The costs in those studies were derived from a combination of quotations from local Indonesian contractors with experience in Indonesian coal mining operations, independent studies by specialist consultants and an owner cost component developed by PT Resindo with input from Cokal.

The DFS included physicals derived from the life-of-mine schedule developed by ASEAMCO. The operating costs in US dollars used to estimate ore reserves were (table 4):

Table 4: Material Assumptions of Economic Mine Openpits of BBM East Block

Item	Unit	Value
Land compensation & clearing	\$/ha	6000
Topsoil Removal	\$/bcm	1.78
Waste Mining (including blasting)	\$/bcm	2.20
Waste Haulage	\$/bcm/km	0.30
Coal Mining	\$/ROMT	1.885
Haul to ROM Stockpile	\$/t.km	0.12
Coal Processing	\$/ROMT	1.65
Haul to Port Stockpile	\$/t.km	0.12
Port coal handling and barge loading	\$/PRODT	1.43
Barging to Kelanis Port	\$/PRODT	7.88
Transfer to sea-going barges	\$/PRODT	1.50
Barging to ship	\$/PRODT	3.98
Rehabilitation, Community Development & Local Gov't	\$/PRODT	0.83
Ship loading	\$/PRODT	2.52
Marketing	\$/PRODT	1.50
General and Administrative	\$/PRODT	3.00

The sale prices were set at USD150/tonne FOB for coking coal and USD112.50/tonne FOB for PCI coal. The coking properties of the marketable reserves were based on testing of a bulk sample at the ALS Riverview laboratory.

#### Criteria Used for the Classification of Ore Reserves

Ore Reserves were estimated only on the Measured and Indicated portions of the Mineral Resource Estimate. The Ore Reserves are reported to a thickness cut-off of 0.3m in line with the reporting of the Mineral Resources.

It was determined that variations in coking coal sale price would have by far the greatest impact on the estimation of Marketable Reserves. Sensitivity analysis over a wide range of sale prices was therefore undertaken in the pit optimization process to assess the impact of this Modifying Factor. These sensitivities ranged from USD110/tonne FOB to USD240/tonne FOB for marketable coking coal and 75% of these prices for marketable PCI coal.

Because of a change to the pit design for Pit 1 compared to the DFS waste will need to be either dumped onto land immediately east of the mining tenement outside the project area or else a road will need to be constructed through this area to allow waste to be dumped back in the project area.

Land compensation will need to be negotiated with the traditional owners for either of these solutions. It is common practice in Indonesia to seek to construct roads across land which is not owned by the mining company and to pay the traditional owners compensation for the use of this land. This is not considered to be a material issue.

Based on guidelines specified in the 2012 JORC code all Measured Resources falling within the practical pit designs have been classified as Proved Ore Reserves and all Indicated Resources falling within the practical pit designs have been classified as Probable Ore Reserves. The Mineral Resources in the report are reported inclusive of Ore Reserves.

#### **Mining Method and Assumptions**

Waste removal is a major cost in open cut coal mining, particularly in this project where, because of the relatively high value of the coal the volume of waste which can be economically removed for each tonne of coal is quite high. To minimise waste haulage cost it is normal practice to dump waste into the previously mined out strip. However, this is only possible when the dip of the pit floor is flat enough to receive waste without geotechnical instability of the dumps. For this deposit, except for limited situations, the floor dips are generally considered to be too steep to allow in-pit dumping. This means that either, a boxcut is developed to the final highwall and mining progresses using a terrace haul-back method, or waste is taken in strips and is dumped in ex-pit dumps.

To minimise operating costs it is proposed that, except where the distance from the seam subcrop to the final highwall is very short, mining will proceed by removal of waste in strips uncovering the coal below with all waste dumped in ex-pit dumps or along strike against the mined out highwall.

The mining losses and dilutions applied to the resource model in the estimation of the Ore Reserves were (table 5):

Table 5: The Mining Losses And Dilutions Applied in The Estimation of The BBM Reserves Evaluation

Parameter	Value
Minimum minable coal thickness	0.3m
Minimum minable parting	0.3m
Mining loss	0.05m
Dilution thickness	0.05m
Waste ash (% adb)	80
Waste density (t/bcm)	2.2

## **Processing Method and Assumptions**

Coal mined from the pits will be delivered via a ROM hopper to a mobile rotary breaker located in the pit as close to the current mining operation as possible which will reduce the haulage distance for the handling of rejects from the rotary breaker.

The overflow from the rotary breaker will be directed to a secondary dry screen which will further reduce the ash content of the product. By the end of Year 2 a coal processing plant based on a jig process will be constructed which will accept the overflow from the secondary dry screen. This method is based on a design using a Batac jig provided by MBE (Germany) with a capacity of 150tph.

The overall plant recovery is estimated at 87%. Coal testing indicates no deleterious elements exist which would have a material impact on the marketability of the coal products.

#### **Cut-off Grades**

The cut-off between coking coal and PCI coal was set at a Volatile Matter content of 15% on an air dried basis.

No other cut-offs are required.

## **Estimation Methodology**

The estimation methodology consisted of:

- Loading the geological model into Minex
- Reviewing the operating costs provided by Cokal, which were backed by recent contractor quotes, and comparing those values with the rates for similar Indonesian operations in ASEAMCO's cost database;
- Assessing the likely loss and dilution which would occur during mining and producing a mining model taking loss and dilution into account;
- Assigning sale values to the Measured and Indicated Resources and setting any Inferred Resources to be mined as waste;
- Running pit optimisation incorporating revenue, cost and geotechnical data to produce a set of nested optimum pits;
- Pit design based on the largest of the nested optimum pits with the logic being that the smaller optimum pits would be used as reporting limits within a mining schedule;
- Assigning resource categories to each seam within the final pit designs and reporting the reserve estimates for those pits:
- Assessing the reserves against the modifying factors and classifying the reserves into Proved and Probable categories.

#### **Material Modifying Factors**

The project has following approvals in place:

Description	Number	Issue Date
Clean and Clear Certificate	26/Bb/03/2013	30 May 2012
Pinjam Pakai – Forestry Use Permit	2112/30/DJB/201 3	12 Aug 2012
Environmental Feasibility Document (ANDAL, RKL and RPL)	188.44/247/2013	12 Apr 2013
IUP Operation & Production (14980 Ha)	188.45/149/2013	30 Apr 2013

The initial production license (IUP Operation and Production) has been issued for a period of 20 years. There are no other known environmental issues that would influence the estimation of reserves within the BBM project area.

This is a greenfields project. Development of this project will require the following infrastructure:

- Mine Area: In-pit crushing, offices, workshop, warehouse, fuel storage, coal preparation plant, explosives magazine, accommodation and camp facilities.
- Purnama Port: This will serve as a coal terminal as well as the main access to and from the mine area.

- Specific items of development include a materials handling system for receiving coal from trucks and loading to barges, landing barge ramp, fuel unloading facility with storage, offices and emergency stockpile area.
- Haul Road: Connecting the Mine Area to Purnama Port over a total distance of 62km and including two substantial bridges over the Osom and Babuat Rivers. This road will support steady-state production haulage for 2Mtpa.
- Kelanis Port: This port will be located downstream on the Barito River where the coal will be transferred from smaller river barges to ocean-going barges. Initially coal will be direct transferred from barge to barge.
- In Phase 2 coal would be transferred via a land-based intermediate stockpile facility which will provide coal supply buffering to the bulk carriers at the offshore loading point. This will mitigate the impact of low river water levels upstream.

#### MINVAL EVALUATION REPORT on COKAL COAL PROJECTS

On 22<sup>nd</sup> August, 2017, Cokal announced the completion of an initial evaluation study based on the Valmin Code for its Four Coal Assets in Central Kalimantan, Indonesia. The Study has been prepared by Tasman Mining Pty Ltd ("Tasman") an Australian company highly experienced in valuations of coal projects throughout the globe in accordance with the Valmin Code as referenced by the ASX. These results have been modeled by Tasman and a Discounted Cash Flow ("DCF") analysis applied to estimate the projects value based on their current status.

In summary, the report has estimated a total value of US\$209million for Cokal's four coal assets (BBM, TBAR, BBP and AAK), giving a value of US\$127million for Cokal's share in each of the projects. The valuation is based on the current consensus long term price for hard coking coal of US\$128/tonne and US\$90/tonne for PCI Coal.

## VALUATION METHODS APPLIED BY TASMAN FOR COKAL ASSETS BBM Project

As Cokal has recently made a decision to develop the BBM coal project and has developed a detailed feasibility study and has estimated reserves in accordance with the JORC Code, Tasman believes the NPV of DCF is an applicable primary valuation method.

### **Cash Flow Model and Sensitivities**

Tasman has developed a cash flow model on the basis of the production and cost assumptions discussed above.

#### **Operating Costs**

Operating costs have been estimated for the two development stages and summarised in the table below. These costs exclude Government and other Royalties.

Description	Production Phase 1	Average LOM
	(US\$/t FOB)	(US\$/t)
Mining Costs	\$23.10/t	\$58.23/t
Coal Transport	\$26.03/t	\$27.43/t
Total – US\$/t FOB	\$49.13/t	\$85.66/t

#### **Capital Expenditure**

Capital expenditure has been estimated for the two development stages and summarised in the table below.

Description	Construction	Construction	Total Capital
	Phase 1	Phase 2	Expenditure
	(US\$M)	(US\$M)	(US\$M)
Exploration	\$5.50	\$9.00	\$14.50
Mine	\$5.98	\$9.50	\$15.48
Loading Port -	\$9.15	\$3.26	\$12.41
Purnama			
Intermediate	\$3.38	\$10.03	\$13.41
Stockpile – Kelanis			
Haul Road & Bridges	\$1.20	\$20.50	\$21.70
Contingency	•	•	
Total	\$35.78	\$26.97	\$62.75

Additionally, sensitivities have been run for the following cases:

- **Coal price** Base Case plus and minus 10%. For consensus pricing one standard deviation is equivalent to approximately US\$20/tonne (or about +/-17% variation);
- **Discount factor** Base Case 10%, low case 12% and high case 8%;
- Operating costs Base Case plus and minus 10%; and
- Capital expenditure Base Case plus and minus 10%.

A summary of the key features of the valuation is included in the table below.

	Units	Current Base Case Valuation		
		30th June 2017		
Years of Production	Years	9 (2018 to 2026)		
Peak Production / Sales	Mtpa	2.1 (2018)		
Total Product Tonnes in Model	Mt	17.5		
Average Strip Ratio	bcm/tonne	22.3		
JORC Reserves	Mt	20.2 Mt ROM, 16.9Mt		
		Marketable July 2017		
Average Coal Price	USD / prod t	US\$122.62/tonne		
Average Cash Costs (incl Royalties)	USD / prod t	US\$94.32/tonne		
Average Margin	USD / prod t	US\$28.30/tonne		
Total Capital Expenditure	M USD	US\$75.6 million		
Total Valuation @ 10% Discount	M USD	US\$186.2 million		
Rate				
Cokal Attributable Value (60%)	M USD	US\$111.7 million		

Based on the sensitivity factors results of the evaluation are included in the table below.

Sensitivity Factor	Base Case NPV	High Case NPV	Low Case NPV	
	(US\$M)	(US\$M)	(US\$M)	
Base Case	\$186M	-	-	
Discount Factor	\$186M	\$202M	\$172M	
(10%, 8%, 12%)	\$ 100 W	φ∠U∠IVI	<b>ΦΙ/ΖΙ</b> ۷Ι	
Coal Price	\$186M	\$284M	\$88M	
(0, +10%, -10%)	Ψ 100IVI	Ψ <b>2</b> 0+IVI	ΨΟΟΙΝΙ	
Operating Costs	\$186M	\$259M	\$114M	
(0, -10%, +10%)	Ψ 100IVI	Ψ <b>2</b> 551 <b>0</b> 1	Ψ11-111	
Capital				
Expenditure	\$186M	\$193M	\$180M	
(0, -10%, +10%)				

## **Comparative Transaction Valuation**

The sale of BHP Billiton's stake in the IndoMet Coal project is considered to be an appropriate transaction as it covers a developing project that is adjacent to Cokal's four project areas. The IndoMet Coal project comprises seven coal contracts of work, which contain both thermal coal and coking coal.

The sale was conducted in two stages, an initial 25% stake was sold to Adaro Energy in 2010 for US\$350 million, and the remaining 75% stake was also sold to Adaro Energy for US\$120 million in 2016.

Tasman makes the following observations for the relevance to valuing Cokal's coal assets:

- The transaction multiple for the 2010 deal was made at a time of historically high coal prices;
  - The total JORC Resources in 2007 may not reflect the resources in 2010. If it is assumed that
    ongoing exploration between 2007 and 2012 resulted in a steady increase in reported
    resources (i.e. approximately 131Mt per year), total resources in 2010 may have been
    approximately 500Mt. The transaction multiple may then be around US\$2.80/tonne, rather
    than US\$11.67/tonne which is extremely high;
- The transaction multiple for the 2016 deal was made at a time of historically low coal prices;
- Tasman believes the reported transaction payment of US\$120 million may not reflect the additional value in an ongoing marketing arrangement for BHP to sell the coal;
- For the purposes of the valuation of Cokal's coal assets, Tasman suggest a median multiple of US\$0.70/tonne resource with a range of +/- 10%. Based on 100% of the reported JORC Resources of 267Mt, the potential value of Cokal's projects based on similar transactions could be:
  - Median value US\$187 million;
  - Low value US\$168 million; and
  - o High value US\$206 million.

#### Other Project Areas

The three other coal projects (i.e. TBAR, AAK and BBP) are considered to be Exploration Projects and no resources have yet been defined. However, exploration in each area has shown promising results with respect to coal quality. Consequently, multiples of Exploration Expenditure has been used as the basis for the evaluation of these projects.

Project	Historical	Forecast
	Expenditure (\$M)	Expenditure (\$M)
BBM (reserves area)	\$43 M	\$8 M
BBM (excluding reserves	\$2.3 M	\$1 M
area)		
TBAR	\$3.4 M	\$5 M
AAK	\$1.7 M	\$0.5 M
BBP	\$7.0 M	\$1 M
Total	\$57.5 M	\$15.5 M

#### **Valuation on Exploration Expenditure Multiple**

Given the levels of historical expenditure to achieve these targets and the expenditure forecast by Cokal to develop to resources and reserves, Tasman has estimated the following Project Expenditure Method (PEM) and resulting values for each of the areas.

The basis for the PEMs includes the following assumptions and potential outcomes:

- BBM Underground Area exploration within the area outside the BBM opencut resource
  area has included surface mapping and drilling. The work has allowed the definition of a
  significant Exploration Target which appears to indicate underground mining potential. Cokal
  has undertaken a scoping study of the area. Further technical work is required to confirm the
  target area's suitability for underground mining;
- TBAR Area exploration within the area has included surface mapping and drilling and the results have defined a significant Exploration Target. It is believed that additional exploration and in-fill drilling is likely to define a resource;
- AAK Area whilst surface mapping has been undertaken, no Exploration target has been defined, however, existing data appears sufficient to warrant further exploration; and
- **BBP Area** exploration within the area has included surface mapping and the results have defined a moderate Exploration Target.

A summary of the PEMs for each area and the resulting valuation that derives from using these multiples is shown in the table below.

Project	PEM (Factor)	Exploration	Estimated Value
		Expenditure (\$M)	(\$M)
BBM	1.5-2	\$2.3M	\$3.4-4.5M
Underground			
TBAR	2-2.5	\$3.4M	\$6.9-8.6M
AAK	1-1.5	\$1.7M	\$1.7-2.5M
BBP	1-1.5	\$7.0M	\$7-10.5M
Total (100% share	)	\$14.4M	\$19.0-26.5M

The PEM factors applied by Tasman are subjective and related to a view on whether the exploration expenditure has resulted in a positive outcome (i.e. Exploration Target or resource estimation). The suggested range of PEMs has been developed to provide low and high range values.

Based on 100% of the reported exploration expenditure and PEM factors developed by Tasman, the potential value based on similar transactions could be:

- Median value US\$22.6 million;
- Low value US\$19.0 million; and
- High value US\$26.5 million.

No premium has been included for control of the coal assets by Cokal.

#### **SUMMARY OF VALUATIONS**

A summary of the Coal Interests held by Cokal is included in the table below. These values represent 100% of the project value of the Central Kalimantan coal projects. The applicable valuation date is 30th June 2017.

Project Cokal		Valuation	Low Value	High Value	Likely
	Share	Method	(US\$m)	(US\$m)	Value
	(%)				(US\$m)
All Cokal	60-75%	Transaction	\$168M	\$206M	\$187M
Coal Assets		Comparabl			
		е			
By Project					
BBM	60%	NPV	\$172M	\$202M	\$186M
BBM	60%	Exploration	\$3M	\$5M	\$4M
Underground		Multiple			
TBAR	75%	Exploration	\$7M	\$9M	\$8M
		Multiple			
AAK	75%	Exploration	\$2M	\$3M	\$2M
		Multiple			
BBP	60%	Exploration	\$7M	\$11M	\$9M
		Multiple			
Total Coal Assets		\$191M	\$223M	\$209M	

A summary of the Coal Interests held by Cokal is included in the table below. These values represent Cokal's equity interests in the Central Kalimantan coal projects.

Project	Cokal Share (%)	Valuation Method	Low Value (US\$m)	High Value (US\$m)	Likely Value (US\$m)				
All Cokal	Assume	Transaction	\$101M	\$124M	\$112M				
Coal Assets	60%	Comparable							
average									
By Project									
BBM	60%	NPV	\$103M	\$121M	\$112M				
BBM	60%	Exploration	\$2M	\$3M	\$2M				
Underground		Multiple							
TBAR	75%	Exploration Multiple	\$5M	\$6M	\$6M				

Coal Asset Value – Cokal Share		\$116M	\$138M	\$127M	
BBP	60%	Exploration Multiple	\$4M	\$6M	\$5M
AAK	75%	Exploration Multiple	\$1M	\$2M	\$2M

The values of Cokal's equity interest in the Coal Assets is considered to lie in a range of US\$116 million to US\$138 million, within which range we have selected a likely value of US\$127 million.

#### **PROJECT DEVELOPMENT**

#### **BBM-Anak Project Progress**

As part of the its strategy to accelerate the commencement of mining operations in the BBM Project, since mid July 2017 Cokal established a small scale coal mining operation, which will produce a high calorific-value PCI coal. Product coal will be sold to the domestic market. The location of the mine is in close proximity to the Barito River requiring a very short haul (around one kilometre) to the stockpile area.





Sealed Haul Road Completed

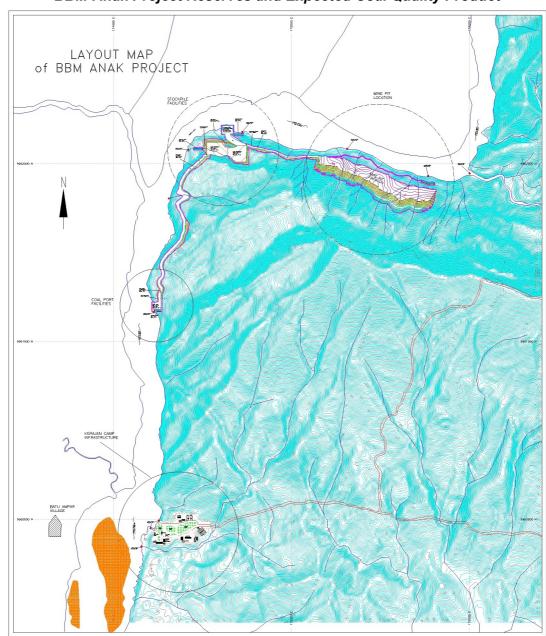
Sealed Stockpile Pad Completed

#### **MINE PLANNING**

The mine plan is based on an open cut mine at a nominal production rate of 10,000 tonne per month over a reserve of around 280,000 tonnes.

Since the coal is exposed on the surface (outcrops), overburden removal can uncover coal very quickly. Based on drilling, mine planning and modelling, Cokal consider that the initial blocks to be mined from B, C and D seams do not require beneficiation for the market quality required. There is no requirement for washing the coal as it is has a very low ash content and is suitable for direct-to-ship product logistics. Indonesian mining contractors have developed specific mining methods to ensure minimal dilution of the coal in order to maintain a low ash product.

## BBM-Anak Project Reserves and Expected Coal Quality Product



PROJECT PHASE	POLYGON	SEAM	THICK	TONNES	WASTE (M3)	S/R	RD	IM	AS	VM	FC	TS	cv	Р	cs
		D	1.35	52,616	699,810		1.32	3.52	1.97	10.99	83.43	0.50	7,811	0.0019	< 1.5
<b>⊢</b>	1	С	1.01	44,503	133,164		1.38	1.49	4.67	6.79	86.92	0.46	8,189	0.0018	< 1.5
PROJECT		В	0.73	27,215	41,887		1.32	2.91	2.10	9.09	85.78	0.55	8,003	0.0058	< 1.5
0 -	SUB-TO	SUB-TOTAL-1		124,334	874,861	7.04	1.34	2.66	2.96	9.07	85.19	0.50	7,988	0.0027	< 1.5
£															
¥		D	1.26	34,017	566,745		1.32	2.88	3.12	9.84	84.13	0.48	7,929	0.0022	< 1.5
2	2A	С	1.31	38,192	72,081		1.38	1.44	4.56	7.04	86.88	0.47	8,219	0.0015	< 1.5
₹		В	0.89	23,706	34,927		1.34	4.58	3.01	12.74	79.57	0.54	7,457	0.0173	< 1.5
88M-ANAK	SUB-TOT	AL-2A	1.15	95,915	673,752	7.02	1.35	2.72	3.66	9.44	84.10	0.49	7,927	0.0057	< 1.5
	COMPOS	ITE MP		220,249	1,548,613	7.03	1.34	2.69	3.27	9.23	84.72	0.49	7,962	0.0040	< 1.5

## General Mine Layout Map of BBM Anak Project

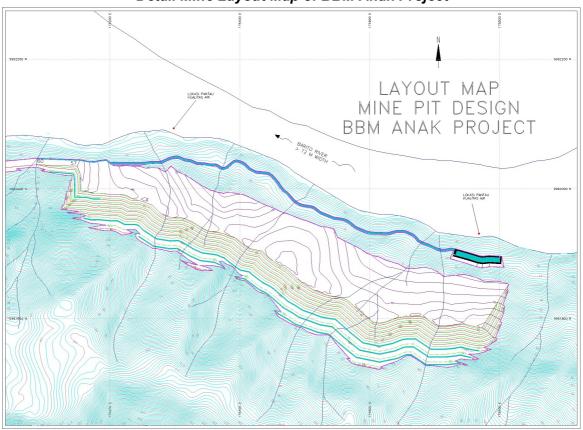
## **CONSTRUCTION**

Between mid-July to mid-August, Cokal constructed a small and simple mine infrastructure located close to the Barito River as part of BBM-Anak Coal Project. The mine is located on the western side

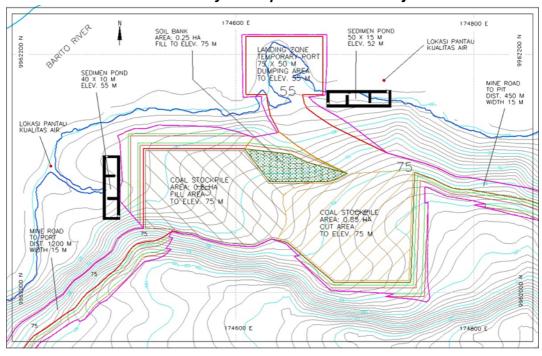
of Pit 2 (BBM Coal Project). A mine haul road (less than one kilometre in length and 10m in width) was constructed, together with a coal stockpile (0.8 hectares with a design capacity of 30,000 tonnes) and temporary coal port for dump truck unloading directly onto barges.

Prior to construction, the Cokal operation team successfully completed local landowners' compensation for a total of 33 hectares of uninhabited land. As well, Cokal negotiated terms for the supply of fuel, for land-clearing contractors and for a small fleet of mining and barging equipment.

## Detail Mine Layout Map of BBM Anak Project



#### Detail Mine Layout Map of BBM Anak Project



## EXPLOITATION IUP RIVER AND CREEK AREA PEMBEBASAN LAHAN LUAS: 33.62 HEKTAR SEBUNUT RIVER BARITO RIVER AREA CAMP PT. BBM JALAN EKSPLORASI EXPLORATION ROAD BATU AMPAR EXPLORATION ROAD PETA LAYOUT AREA PEMBEBASAN LAHAN 33.62 HEKTAR KERAJAN CAME PT. BUMI BARITO MINERAL Kecamatan Sumber Barito - Kabupaten Murung Raya Provinsi Kalimantan Tengah

## Compensated Land Layout Map of BBM Anak Project



OB Removal and coal cleaning at BBM-Anak Project

#### **MINING**

Cokal's operation team commenced mining operations in mid-August 2017. Excavation started from the low-wall of Seam D cropline at Polygon-01 of BBM Anak Project Area and then continued to Seams C and B croplines respectively.

The BBM Anak operation comprises the following fleet of mining equipment:

- one 40 tonne excavator for OB removal
- one 20 tonne excavator for coal getting
- three 20 tonne dump trucks for hauling
- · one small dozer.

This fleet is expected to achieve between 9,000 tonnes to 10,000 tonnes of coal per month.

The coal was barged from the mine to an Intermediate Stockpile (ISP) at Muara Teweh, a distance of about 275 km downstream on Barito River. Cokal has rented a one-hectare stockpile area at the ISP. The barges consist of between 400 tonnes to 500 tonnes capacity of coal. By the end of September, Cokal had barged a total of 6,300 tons of PCI coal from minesite to ISP.

#### **CORPORATE SOCIAL RESPONSIBILITY**

Cokal has continued with the implementation of its Community Development programs. Cokal has undertaken the following programs, which covered health, education, environmental awareness, and community empowerment aspects.

Regarding the health aspect, Cokal has continued to provide medical support to local villages around BBM through providing access to onsite medical staff.

Cokal has also continued its scholarship program with the selection of the new cohort of scholarship holders; Cokal has awarded scholarships to 13 local students from Murung Raya Regency to continue their next level of education at the University of Palangkaraya at in a variety of faculties.

In this quarterly period, Cokal is proud to announce and congratulate two of its scholarship recipients who have completed their Bachelor studies in the Faculty of Medicine. Both graduates are now following their apprenticeship programmes at the local hospital in the Murung Raya Regency. In the future, Cokal plans to recruit these two graduates for providing supportive medical assistance on site, for both employees and for the local community.

As well, in association with the Mining Faculty of the University of Palangkaraya (UNPAR), Cokal has continued its support and contribution which includes regular lecture programs, donation of mining magazines, and other activities to improve the quality and enthusiasm of mining students.

In relation to the environmental awareness programmes, Cokal has provided banners for the Sumber Barito District in relation to forestry protection socialisation programmes. Similar contributions will be provided for nearby villages.

Cooperation with the Borneo Orangutan Survival Foundation (BOSF) continues following their requests for further supervision and training of HSE procedures for BOSF staff. Cokal is preparing the next batch of Safety Awareness and First Aid Training Programme.

COKAL continues its support for the Orangutan Translocation Project, the next batch to be relocated by BOSF scheduled for Q4-2017. As previously, BOSF will use Krajan Site (PT BBM) and its facilities as their 'transit venue' for the orangutans recovery process.

COKAL is also giving consideration to supplying First Aid kits (mainly for the BOSF monitoring station at Betikap and Katingan Protection Forests) and also setting up the BOSF Safety Management System as required.

Following obligations of the BBM Forestry Permit (IPPKH-OP) obtained in August 2015, replanting programs are continuing in relation to the 'critical land rehabilitation project' at an appointed area along the Barito River banks near the BBM project area. These programs will be conducted with community involvement, planting 'productive trees' suggested by locals, and will be supervised and monitored by the relevant Forestry Offices from regency, provincial, and central government levels. Cokal has committed to fulfill both of IPPKH obligations and also sharing benefits from these

programs with its local neighbors.

Cokal is still actively involved in a government program aimed at farmers and school children to stop large scale burning of forests which create at times serious problems with repertory illnesses in young children and senior citizens. Also air travel is considerably disrupted including flight delays and airport closures in Indonesia, Singapore and Malaysia.

Cokal receives considerable support in our efforts from both local government officials, police and military. They consider our efforts to be extremely helpful due to the local governments' lack of resources in this remote region.





Inspection by local authorities with regard to Cokal's programme to reduce forest burning

#### **CORPORATE RELATED MATTERS**

#### **ANNUAL REPORT**

Cokal's Annual Report was released on 29 September 2017 and is available on the Cokal website

#### **ANNUAL GENERAL MEETING**

Cokal Annual General Meeting will be held on Wednesday 29 November at Level 5, 56 Pitt Street, Sydney, NSW, Australia

#### **ENDS**

#### Further enquiries:

Garry Kielenstyn
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#### **About Cokal Limited**

Cokal Limited (ASX:CKA) is an Australian listed company with the objective of becoming a metallurgical coal producer with a global presence. Cokal has interests in four projects in Central Kalimantan, Indonesia, which are considered prospective for metallurgical coal.

#### **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 Study.

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.

#### **Competent Person Statement**

The Total Coal Reserve estimate announced on 1<sup>st</sup> August 2017 is based on information compiled by Robert de Jongh who is a Member of the Australasian Institute of Mining and Metallurgy and an employee of ASEAMCO Pty Ltd. Mr de Jongh is a qualified mining engineer and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking, to qualify as a Competent Person as defined in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves".

The Total Coal Resource estimate was announced on 29 April 2016, titled "Cokal announces updated JORC Resource Statement for Bumi Barito Mineral (BBM) Project". The information in the report relating to Mineral Resources is based on information compiled by Yoga Suryanegara who is a Member of the Australasian Institute of Mining and Metallurgy and a full time employee of Cokal Limited. Mr Suryanegara is a qualified geologist and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking, to qualify as a Competent Person as defined in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves".

The Company confirms that it is not aware of any new information or data that materially affects the information included in the announcement made on 29 April 2016 and that all material assumptions and technical parameters underpinning the estimates in the announcement made on 29 April 2016 continue to apply and have not materially changed.

The information in this report relating to exploration results is based on information compiled by Patrick Hanna who is a fellow of the Australasian Institute of Mining and Metallurgy and is a consultant (through Hanna Consulting Services) to Cokal Limited. Mr Hanna is a qualified geologist and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which they are undertaking, to qualify as Competent Persons as defined in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves".