SALVA

Mining Consultants



Golden Energy and Resource Ltd

PT Kuansing Inti Makmur Concession (KIM)

Independent Qualified Persons Report

October 2016

Golden Energy and Resource Ltd

PT Kuansing Inti Makmur Concession

Independent Qualified Persons Report

Salva Mining Pty Ltd

Level 17, 300 Adelaide Street, Brisbane, QLD 4000, Australia
Email: info@salva.com.au
Website: www.salvamining.com.au

Phone: +61 (0) 407 771 528

25 October 2016

Effective Date: 31 August 2016

Independent Expert Person:



Manish Garg
BEng (Hons), Master of Applied Finance
MAusIMM, MAICD
Director – Consulting / Partner, Salva Mining

Table of Contents

Executive Summary **12**

1 Introduction **18**

1.1 Scope 18

1.2 Data Sources 18

1.3 Site Visit 18

1.4 Disclaimer and Warranty 19

1.5 Independent Competent Person and Expert Statement 20

1.6 Statement of Independence 20

2 Project Description **21**

2.1 Property Description and Access 21

2.2 Tenure 22

2.2.1 Tenure Status 22

2.3 KIM Directly Owned Production Operation IUP 23

2.4 KIM Indirectly Owned Production Operation IUP 23

3 Geology and Resources **25**

3.1 Coal Resource 25

3.1.1 Resource Classification 25

3.2 Statement of Coal Resources 25

4 Coal Reserves **27**

4.1 Estimation Methodology 27

4.2 Modifying Factors 27

4.3 Reserves Classification 28

4.4 Statement of Coal Reserves 29

5 Life of Mine Scheduling **30**

5.1 Other Mineable Coal Inside Pit Design 30

5.2 Mine Schedule 33

5.3 Mining Operations 34

5.3.1 Top Soil Removal 34

5.3.2 Drilling and Blasting 34

5.3.3 Waste Excavation 35

5.3.4 Coal Mining 36
5.3.5 Dewatering 36
6 Coal Handling and Coal Logistics 37
6.1 Coal Logistics 37
6.2 Haulage on Public Roads 38
7 Environment and Community Relations 40
7.1 Environmental Aspects 40
7.1.1 Water Run-off from site 40
7.1.2 Noise and Dust 40
7.1.3 Rehabilitation 40
7.2 Social Aspects 41
7.2.1 Economy 41
7.2.2 Health 41
8 Valuation 42
8.1 Valuation Approaches 42
8.2 Valuation Approach for Assessing the KIM Project 42
9 Economic Parameters 43
9.1 Royalty and Local Government Fees 43
9.2 Inflation Outlook 43
9.3 Corporate Income Tax 44
9.4 Depreciation and Amortisation 44
9.5 Working Capital 44
9.6 Carried Forward Tax Losses 44
9.7 Value Added Tax 45
9.8 Weightage Average Cost of Capital (WACC) 45
10 Market Analysis and Coal Prices 47
10.1 Global Outlook 47
10.1.1 Domestic Demand 47
10.1.2 Domestic Demand Forecast 48
10.2 Indonesian Coal Supply 49
10.3 Coal Price Used for Project Assessment 50

11 Capital Cost 53

11.1 Basis of Estimation 53

11.1.1 Project Currency and Foreign Exchange 53

11.1.2 Duties and Taxes 54

11.2 Land Acquisition 54

11.3 Haul Road Construction 54

11.4 Mine Reclamation 54

11.5 Exclusions 54

11.6 Capital Phasing 54

12 Operating Cost 56

12.1 Method of Estimation 56

12.2 Items included in the Operating Cost Estimates 56

12.3 Contractor Costs 57

12.4 Owner Costs 58

12.5 VAT 58

12.6 Royalties and Government Costs 58

12.7 Overall Operating Cost 59

13 Financial Analysis & Project Valuation 60

13.1 Modelling Methodology & Considerations 60

13.2 Base or Preferred Case 60

13.2.1 Preferred Case Results 62

13.2.2 Sensitivity Analysis 63

13.3 Valuation Range 64

13.4 Second Valuation Approach – Market Comparable Transaction Method 65

14 Valuation Summary 67

14.1 Previous Valuation 67

15 Risk Factors & Opportunities 68

15.1 Risk Factors 68

15.1.1 Resources And Reserves 68

15.1.2 Geotechnical Risk 68

15.1.3 Coal Price Risk 68

15.1.4 Impact on Weather on Production 69

15.1.5 Mining Approvals, Tenure and Permits 69
15.1.6 Land Acquisition 69
15.1.7 Environmental and Social Risks 69
15.1.8 Operational and Mine Safety 70
15.1.9 Operating and Capital Costs Estimates 70
15.1.10 Political and Regulatory Risk 70
15.1.11 Coal Haulage on Public Road 71
15.2 Opportunities 71
16 References 72
Appendix A – CVs 73
Appendix B: SGX Mainboard Appendix 7.5 74
Appendix C: Resource & Reserve Report 75

List of Figures

Figure 2:1 IUP Boundary and Location of Individual Coal Blocks 21
Figure 4:1 Relationships between Mineral Resources & Ore Reserves 28
Figure 5:1 Inferred Coal Resources inside Pit Shell- KIM East Seam S300U..... 31
Figure 5:2 Inferred Coal Resources inside Pit Shell- KIM West Seam S300U..... 32
Figure 5:3 LOM Production Schedule 34
Figure 5:4 Waste Excavations over Life of Mine (M bcm/annum)..... 35
Figure 5:5 Coal Mining at KIM East Block..... 36
Figure 5:6 Waste Mining at KIM East Pit..... 36
Figure 6:1 Coal Stockpile..... 37
Figure 6:2 Coal Logistics – Current & Additional Options..... 38
Figure 6:3 Current and Proposed Coal Logistics..... 39
Figure 10:1 Indonesian Domestic Coal Demand (Mt) 48
Figure 10:2 Recent Trend in coal production and Exports from Indonesia 50
Figure 10:3 Domestic Coal Sales Prices ($/t)..... 52
Figure 13:1 Cash Streams – Base Case..... 62
Figure 13:2 Discounted Cash Flow Profile – Base Case..... 63
Figure 13:3 Key Project Sensitivities..... 63

List of Tables

Table 2:1 KIM Concession Details 22
Table 3:1 Coal Resources, KIM Project as at 31 August 2016 26
Table 4:1 Modifying & Mine Optimisation Factors 27
Table 4:2 Coal Reserves, KIM Project as at 31 August 2016 29
Table 5:1 Salva Mining LOM Schedule, Inferred Resource Tonnes in Pit Shell ... 33
Table 8:1 Typical Valuation Methods 42
Table 8:1 Indonesian Coal Royalty Rates 43
Table 9:2 Corporate Tax Rates 44
Table 9:3 WACC (After Tax) 45
Table 9:4 WACC for Indonesian Coal Mining Companies 46
Table 10:1 Project Indonesian Domestic Demand 49
Table 10:2 Contracted Price - KIM Coal 50
Table 10:3 Contracted Price in US$ 51
Table 11:1 Capital Cost (Real Terms) 53
Table 11:2 Capital Cost Phasing (US $M, Real Terms) 55
Table 12:1 Contractor Unit Rates (Real Terms) 57
Table 12:2 Owner Unit Costs (Real Terms) 58
Table 12:3 Average Unit Operating Cost (Real Terms) over Life of Mine 59
Table 13:1 Base Case – Key Input Parameters 60
Table 13:2 Base Case – Financial Model 61
Table 13:3 Base Case – Financial Outputs & Valuation 62
Table 13:4 Project NPV Sensitivity 63
Table 13:5 Valuation Range 64
Table 13:6 Valuation Range - $/t Reserve 65
Table 13:7 Market Comparable Tarnsaction, Indonesian Coal Mines 66
Table 14:1 Valuation Summary 67
Table 14:2 Valuation - Comparison with Previous Estimate 67

Key Abbreviations

°C	degrees Celsius
$ or USD	United States Dollar
adb	Air dried basis, a basis on which coal quality is measured
AMSL	Above Mean Sea Level
AMDAL	Analisis Mengenai Dampak Lingkungan Hidup- Environmental Impact Assessment (EIA), which contains three sections, the ANDAL, the RKL and the RPL
ANDAL	Analisis Dampak Lingkungan Hidup, component of the AMDAL that reports the significant environmental impacts of the proposed mining activity
Anticline	An anticline is a fold that is convex, with older layers closer to the centre or core
ar	As received basis
AS	Australian Standards
ASR	Average stripping ratio
AusIMM	Australian Institute of Mining and Metallurgy
Batter	Slope of Advancing Mine Strip
bcm	bank cubic meter
cc	Cubic Centimeter
BD	bulk density
CCoW	Coal Contract of Work
CHPP	Coal Handling and Processing Plant
CV	Calorific value
Capex	Capital Expenditure
Mineral Resource	A 'Mineral Resource' is a concentration or occurrence of solid material of economic interest in or on the Earth's crust in such form, grade (or quality), and quantity that there are reasonable prospects for eventual economic extraction. The location, quantity, grade (or quality), continuity and other geological characteristics of a Mineral Resource are known, estimated or interpreted from specific geological evidence and knowledge, including sampling. Mineral Resources are sub-divided, in order of increasing geological confidence, into Inferred, Indicated and Measured categories.
Coal Reserve	A 'Coal 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. The reference point at which Reserves are defined, usually the point where the Coal is delivered to the processing plant, must be stated. It is important that, in all situations where the reference point is different, such as for a saleable product, a clarifying statement is included to ensure that the reader is fully informed as to what is being reported.

DCF	Discounted cash flow
DGMC	Directorate General of Minerals and Coal within the Ministry of Energy and Mineral Resources
FC	Fixed Carbon
gar	gross as received, a basis on which coal quality is measured
GCV	Gross Heating Value - The amount of heat produced by its complete combustion of its unit quantity. It is usually expressed in kcal/kg unit.
GEAR	Golden Energy and Resource Limited
GEMS	PT Golden Energy Mines Tbk
gm	Gram
h	hour
ha	Hectare(s)
HGI	Hardgrove Grindability Index, an index on which grindability of coal is measured
IM	Inherent Moisture
IPPKH	'Izin Pinjam Pakai Kawasan Hutan' which translates to a borrow to use permit in a production forest
IRR	Internal Rate of Return
IUP	'Izin Usaha Pertambangan' which translates to 'Mining Business Licence'
JORC	2012 Edition of the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves, Australian Institute of Geoscientists and Mineral Council of Australia
k	thousand
kcal/kg	Unit of energy (kilocalorie) per kilogram
kg	kilogram
km	Kilometers(s)
km2	Square kilometre(s)
kt	kilo tonne (one thousand tonne)
kV kilovolt	kV kilovolt
L	Litre
m	Meter
mm	millimetre(s)
lcm	loose cubic metre
LOM	Life of Mine
lcm	lcm loose cubic metre
M	Million
Mbcm	Million bank cubic metres
Mbcmpa	Million bank cubic metres per annum
MEMR	Ministry of Energy and Mineral Resources within the central government
m RL	metres reduced level
m^3	cubic metre

m/s	metres per second
Mt	Millions of tonnes
Mtpa	Millions of tonnes per annum
MW	Megawatt
NAR	Net as received
NPV	Net present value
NTA	Net tangible assets
Opex	operating expenditure
PKP2B	'Perjanjian Kerjasama Pengusahaan Pertambangan Batubara' – same as CCoW
RD	Relative density
RKL	'Rencana Pengelolaan Lingkungan' - environmental management plan
ROM	Run of Mine
RKL	Relative Level - survey reference for height of landforms above a datum level
RPL	'Rencana Pemantauan Lingkungan' - environmental monitoring plan
Salva	Salva Mining Pty Ltd.
SE	Specific Energy
SMGC	PT SMGC Consultants
SR	Strip ratio (of waste to ROM coal) expressed as bcm per tonne
t	Tonne
tkm	Tonne kilometer
tph	Tonnes per hour
tpa	Tonnes per annum
TM	Total Moisture (%)
TS	Total Sulphur (%)
GEAR	Golden Energy and Resource Limited
VALMIN	2015 Edition of the Code for the Technical Assessment and Valuation of Mineral and Petroleum Assets and Securities for Independent Expert Reports
VM	VM Volatile Matter (%)
WACC	Weighted Average Cost of Capital

Executive Summary

Introduction

Golden Energy and Resource Limited ("GEAR" or "Client") has engaged Salva Mining Pty Ltd ("Salva Mining") to prepare a mineral asset valuation and an Independent Qualified Persons Report ("Report") of the Kuansing Inti Makmur concession ("KIM Project" or "KIM") located in the Bungo Regency of Jambi Province, Indonesia.

The Qualified Persons Report is to be presented to Golden Energy and Resources Ltd shareholders as part of continuous disclosure requirements of the company. The independent valuation has been prepared in accordance with the Code for the Technical Assessment and Valuation of Mineral and Petroleum Assets and Securities for Independent Expert Reports (VALMIN Code 2015).

The KIM concession is beneficially owned and controlled by GEMS. The tenure for the KIM Project is covered by 8 Izin Usaha Pertambangan Produksi ("IUP Production") and covers a 2,610 ha area of coal concession. The KIM project consists of following 2 coal Pits:

- KIM East Pit ("KIM East Pit" or "KIM East"); and
- KIM West Pit ("KIM West Pit" or "KIM West").

Conventional open-pit coal mining operations were commenced in the KIM East Pit in 2007 and the KIM West Pit in 2010.

Coal Resources

An independent estimate of Coal Resources within the KIM Concession was prepared by Salva Mining. Coal Resources have been estimated, classified and reported according to the JORC Code (2012) and the Australian Guidelines for Estimating and Reporting of Inventory Coal, Coal Resources and Coal Reserves (2003) as at 31 August 2016. The Coal Resources are detailed in Tables below.

Coal Resources, KIM Project, 31 August 2016

Coal Resources (Mt)										
Pit	Measured	Ash% adb	CV adb kcal/kg	Indicated	Ash% adb	CV adb kcal/kg	Inferred	Ash% adb	CV adb kcal/kg	Total
KIM East	56	18.1	5,279	36	18.85	5,183	75	18.73	5,192	167
KIM West	58	16.72	5,445	23	17.51	5,340	10	15.73	5,228	91
Total	**114**			**59**			**85**			**258**

Mineral Resources are reported inclusive of the Mineral Reserves
(*Note: individual totals may differ due to rounding*)

Coal Reserves

An independent estimate of the Reserves within the KIM concession was prepared by Salva Mining. These Reserves have been estimated, classified and reported according to the JORC Code (2012). Salva Mining prepared the Coal Reserve estimate as at 31 August 2016 on the basis for the Coal Reserve estimate as at that date after application of appropriate modifying factors determined during the mine optimisation studies.

Coal Reserves, KIM Project, 31 August 2016

Pit	Reserve (Mt)			RD adb t/m3	TM arb %	IM adb %	Ash adb %	CV arb Kcal/kg	TS adb %
	Proved	Probable	Total						
KIM West	24.6	7.6	32.2	1.40	22.58	11.85	16.62	4,980	1.14
KIM East	18.6	6.5	25.0	1.41	24.94	12.11	18.43	4,828	1.32
Total	**43.2**	**14.1**	**57.2**						

(*Note: individual totals may differ due to rounding*)

Life of Mine Schedule

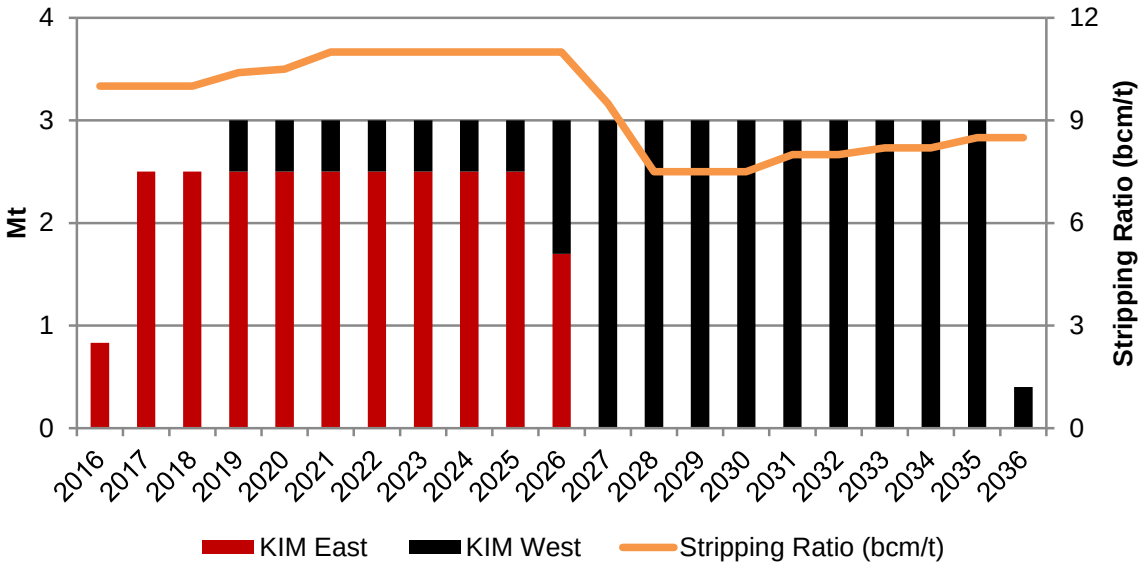
The KIM Mine is an operating mine since 2007 (KIM East pit commenced production in 2007 while the KIM West pit started in 2010). The KIM Mine is operated as single mining operation; even though the production from the KIM West pit has been temporarily suspended while the KIM East pit is operating as part of normal operation control. It is planned to resume production from the KIM West pit by end of 2018.

The Modifying Factors used are based on actual operations at the KIM Mine which were independently verified by the Salva Mining's subject specialist during the site visit.

Therefore it is considered valid to use Modifying Factors from the operating KIM Mine to satisfy clause 29 of the JORC Code. While JORC 2012 is not explicit with reference to operating mines, the guidance given in ASX FAQ no. 9 is considered relevant in this regard. Further, Salva Mining has carried out independent life of Mine (LOM) Study to develop the mining schedule and its economic evaluation of the Mine.

As per Salva Mining's preliminary production schedule, the minable tonnes over life of mine are expected to be 57.2 Mt requiring waste mining of 541 Mbcm. The LOM stripping ratio is expected to be 9.5 bcm/t of coal mined. During initial years of operations, the production from KIM pits will be approximately 2.5 Mtpa, with peak production of 3 Mtpa from year 4 onwards once the dedicated haulage road is completed.

LOM Production Schedule-KIM East and KIM West



Logistics

The coal from the KIM Mine is currently being sold to domestic customers. The mine to end user supply chain involves hauling of coal to the ROM stockpile, followed by transportation using public roads to the domestic customers.

The Jambi provincial government in conjunction with regency governments from Jambi's major coal producing regions has agreed on a suspension of coal trucks using public roads, starting from 31 December 2012 (*Jambi Province Regulation No 13 Year 2012*).

However, the Jambi Province Regulation No 13 Year 2012 does stipulate some conditions on which the hauling of coal through public roads may be permitted. This is further clarified in "Governor Jambi Regulation No 18 Year 2013 (Implementation Rules to the Jambi Province Regulation No 13 Year 2012), where under Article 3, paragraph 1 and 2, laid out conditions on which the Governor may allow limited utilisation of special public roads for coal hauling purposes and. The Article 6, paragraph 1 and 2 of the Jambi Province Regulation number 13, year 2012, stipulates that "*in the event Special Road (dedicated haul road) is yet to develop or still unavailable to be utilised then hauling may be allowed through specific public road*".

Presently, GEAR have developed plans to build a new haul road which will connect the KIM Mine to an existing special road. This new haul road will connect the KIM Mine to Port Nilau via the Lontar Papyras Pulp and Paper Plant ("LPPP"). This 65 km dedicated connecting road is expected to be completed in 36 months. This will enable coal to be hauled on a special road to LPPP, a power plant at Ombilin and potential exports via the Nilau Port.

Although the interpretation of this regulation is somewhat ambiguous, Salva Mining is in opinion that the government is likely to continue to allow coal haulage by public road where a coal company is developing its own dedicated haul road.

Capital and Operating Cost

The overall estimated capital cost for the project (including land compensation for life of mine and contingency) is shown below.

Capital Cost (Real Terms)

Particulars	Direct Cost ($M)	Contingency ($M)	Total Cost ($M)
Land Compensation	13.5	2.0	15.5
Haul Road Construction	19.5	2.9	22.4
Total Project Capital	**33.0**	**5.0**	**38.0**

Salva Mining estimated total operating costs for mining and other activities including coal hauling, barging and port handling charges. At this level of study these estimates are considered reasonable. The cost components are given in Table below.

Average Unit Operating Cost (Real Terms) over Life of Mine

Cost Item	$/t
Land Clearing	$0.01
Topsoil Removal	$0.03
Waste Mining	$13.24
Waste Overhaul	$1.55
Coal Mining	$0.70
Haul to ROM Stockpile	$0.37
ROM Coal Handling	$0.30
Haul to Customer	$16.43
Mine Closure	$0.04
Environmental and Rehabilitation	$0.05
Salary and Wages	$0.25
Medical & Community Development	$0.05
Corporate Overheads	$0.25
Local Government Fees	$0.25
VAT	$3.23
Contingency	$1.84
Operating Cost Excl. Royalty	**$38.59**
Royalty	$2.31
Operating Cost incl. Royalty	**$40.90**

The unit operating costs are reasonable when compared to industry standards by Salva Mining.

Price Outlook

Domestic demand for thermal coal in Indonesia has grown rapidly since 2010, at a CAGR of 9.73% (2010-2015 primarily driven by strong demand from the power sector. The thermal coal estimated consumption for 2016 is expected as 92 Mt. Very recently the new Indonesian President has announced an additional 35GW of power generation capacity will be developed, over and above the Fast Track -1 and 2 programs, which together have and will add around 25GW. While the composition of the 35GW is still unknown in terms of fuel sources, it is expected that a significant proportion will be based on coal. The domestic demand for thermal coal is largely driven by government energy policy which laid out plans to boost domestic coal consumption by coal fired power station in country.

On supply side, Indonesian supply has grown considerably, from 351 Mt in 2010 to 480 Mt in 2014 before falling it to 450 Mt in 2015. growing at a compound annual growth rate (CAGR) of 5.1%.

The sales price assumptions used in this study are based on domestic coal prices received for the KIM Mine in the current market. Salva Mining has reviewed the actual purchase orders and sales contracts for coal sales for the past two years. The sales' contracts and purchase orders specified a coal at a range of prices from 600,000 IDR to 650,000 IDR per tonne at a base CV of 4,900 kcal/kg on a gross as received basis. These sales' contracts are linked with the fuel index in Indonesia (which is a proxy for petrol and diesel prices in Indonesia). While the current contracts are linked with the Fuel Index in Indonesia, Salva Mining has adopted a conservative approach for assessing domestic coal prices outlook for this project. The domestic coal price forecast has been assumed to stay flat in real terms (US $46.2/t) over the life of mine.

Other Economic factors

Salva Mining has applied appropriate economic and other factors including VAT, corporate tax, depreciation etc. Discount rate used for determination of discounted cash flow and valuation was determined as 10.5% WACC (after tax).

Project Valuation and Range

In Salva Mining's opinion, it is appropriate to use the discounted cash flow (DCF) method to determine the value of the project as the KIM Project is an operating mine undergoing expansion. The valuation model for the KIM Project was developed in Microsoft Excel. Valuation has been derived from analysis of cash flows calculated for the project over the life of mine. The valuation was designed so that input parameters could be varied to investigate different scenarios to determine an estimated valuation range.

A base case valuation along with low and high case was developed using the assumptions discussed in this report. Following assumptions were applied for development of low and high scenario:

- Low Case: While the KIM Mine complies with the logistics regulations, the mine could be shut if permission to haul coal haulage on public road is not allowed and management decision not to construct special road.

- High Case: Price increases by 5% while operating cost decreases by 3%.

Salva Mining's opinion of the technical value and the corresponding project value (on 100% basis) as at 31 August 2016 is shown in Table below. The valuation range accounts for high and low cases and the sensitivity.

Valuation Summary

Item	Market Value (US $M)		
	Lower	Preferred	Upper
Net Present Value , 100% of Project Basis	0.0	**64.7**	141.0

1 Introduction

Golden Energy and Resources Limited (“GEAR” or “Client”) has engaged Salva Mining Pty Ltd (“Salva Mining”) to prepare a mineral asset valuation and an Independent Qualified Persons Report (“Report”) of the Kuansing Inti Makmur concession (“KIM Project” or “KIM”) located in the Bungo Regency of Jambi Province, Indonesia. PT Golden Energy Mines Tbk (“GEMS”) has the rights to explore and mine the KIM Project through its subsidiary company, PT Kuansing Inti Makmur (“PT KIM”).

The Qualified Persons Report is to be presented to Golden Energy and Resources Ltd. shareholders as part of continuous disclosure requirements of the company. The Qualified Persons Report is intended to comply with Section 5 of SGX-ST Listing Rules Practice Note 6.3. The independent valuation has been prepared in accordance with the Code for the Technical Assessment and Valuation of Mineral and Petroleum Assets and Securities for Independent Expert Reports (VALMIN Code 2015).

The KIM concession is beneficially owned and controlled by PT Golden Energy Mines Tbk (GEMS). The effective date of valuation is as on the 31 August 2016, the date on which the Resource and Reserves that support this valuation were estimated.

1.1 Scope

Golden Energy and Resources Limited has requested that Salva Mining prepare a mineral asset valuation and an Independent Qualified Persons Report (“Report”) for the KIM coal concession (“KIM Project” or “KIM”) located in the Bungo Regency of Jambi Province, Indonesia. This report covers the mineral asset valuation of the KIM coal concession only and is not a valuation of the entire holding company.

1.2 Data Sources

This review is based on the information provided by GEAR and GEMS, the technical reports of previous consultants and current owners, Pt Golden Energy Mines Tbk (“GEMS”), as well as other published and unpublished data relevant to the project area.

Salva Mining has carried out, to a limited extent, its own independent assessment of the quality of the geological and mining data. Salva Mining relied on an Independent legal firm “LasutLay and Pane Advocates”, a legal specialist that has carried out independent enquiry regarding the status of agreements, royalties or concession standing pertaining to the assets.

In developing our assumptions for this Statement, Salva Mining has relied upon information provided by the company and information available in the public domain. Key sources are outlined in this Report and all data included in the preparation of this Report has been detailed in the references section of this report. Salva Mining has accepted all information supplied to it in good faith.

1.3 Site Visit

Mr. Sonik Suri, Senior Consultant conducted the site visit to the KIM Mine from 28 September to 29 September 2016. Mr. Manish Garg, Director – Advisory / Partner conducted the visit to GEAR offices in Jakarta from 25 September 2016 to 30 September 2016 to review technical studies and commercial information.

1.4 Disclaimer and Warranty

This Report was commissioned by GEAR on a fee-for-service basis according to Salva Mining's schedule of rates. Salva Mining's fee is not contingent on the outcome of its valuation or the success or failure for the transaction for which the report was prepared. None of Salva Mining's partners (including Mr. Garg), directors, substantial shareholders and their associates have (or had) a pecuniary or beneficial interest in/or association with any of the GEAR, GEMS or their directors, substantial shareholders, subsidiaries, associated companies, advisors and their associates prior to or during the preparation of this report.

Salva Mining's partners (including Mr. Garg), directors, substantial shareholders and their associates are independent of GEAR, its directors, substantial shareholders, advisers and their associates.

A draft version of this Report was provided to the directors of GEAR for comment in respect of omissions and factual accuracy. As recommended in Section 39 of the VALMIN Code, GEAR has provided Salva Mining with an indemnity under which Salva Mining is to be compensated for any liability and/or any additional work or expenditure, which:

- Results from Salva Mining's reliance on information provided by GEAR and/or their Independent consultants that is materially inaccurate or incomplete, or
- Relates to any consequential extension of workload through queries, questions or public hearings arising from this report.

This report may contain or refer to forward-looking information based on current expectations, including, but not limited to timing of mineral Resource estimates, future exploration or project development programs and the impact of these events on the GEAR.

Forward-looking information is subject to significant risks and uncertainties, as actual results may differ materially from forecasted results. Forward-looking information is provided as of the date hereof and Salva Mining assumes no responsibility to update or revise them to reflect new events or circumstances.

The conclusions expressed in this report are as on the 31 August 2016, the date on which the Coal Resources and Reserves that support this valuation were estimated. The valuation is only appropriate for this date and may change in time in response to variations in economic, market, legal or political factors, in addition to ongoing exploration results. All monetary values outlined in this report are expressed in US dollars ($) unless otherwise stated. Salva Mining services exclude any commentary on the fairness or reasonableness of any consideration in relation to this acquisition.

1.5 Independent Competent Person and Expert Statement

The independent valuation has been prepared in accordance with the Code for the Technical Assessment and Valuation of Mineral and Petroleum Assets and Securities for Independent Expert Reports (VALMIN Code). This Mineral asset techno-commercial assessment and valuation in this report was prepared by, or under the supervision of Manish Garg (B.Eng. (Minerals Engineering), MAppFinance, MAusIMM, MAICD).

Mr. Manish Garg, Director – Consulting / Partner and a full time employee of Salva Mining has sufficient assessment and valuation experience, which is relevant to the activity that he is undertaking to qualify as an Expert as defined in the 2015 Edition of the "Code for the Technical Assessment and Valuation of Mineral and Petroleum Assets and Securities for Independent Expert Reports" (VALMIN Code 2015).

This report was prepared on behalf of Salva Mining by the signatory to this report, assisted by the subject specialists' competent persons whose qualifications and experience are set out in Appendix A of this report.



Mr. Manish Garg
Director – Consulting / Partner
Salva Mining Pty Ltd.

1.6 Statement of Independence

This Report was commissioned by GEAR on a fee-for-service basis according to Salva Mining's schedule of rates. Salva Mining's fee is not contingent on the outcome of its valuation or the success or failure for the transaction for which the report was prepared. The above mentioned person(s) have no interest whatsoever in the mining assets reviewed and will gain no reward for the provision of this techno-commercial assessment.

Salva Mining's partners (including Mr. Garg), directors, substantial shareholders and their associates are independent of GEAR, its directors, substantial shareholders, advisers and their associates.

None of Salva Mining's partners (including Mr. Garg), directors, substantial shareholders and their associates have (or had) a pecuniary or beneficial interest in/or association with any of the GEAR, or their directors, substantial shareholders, subsidiaries, associated companies, advisors and their associates prior to or during the preparation of this report.

2 Project Description

2.1 Property Description and Access

The KIM Project is located in the Bungo Regency of Jambi Province on Sumatra Island, Indonesia. KIM concession is located nearly equidistant from the Padang coast on the west (250 km) and the Jambi coast on the east (300 km)

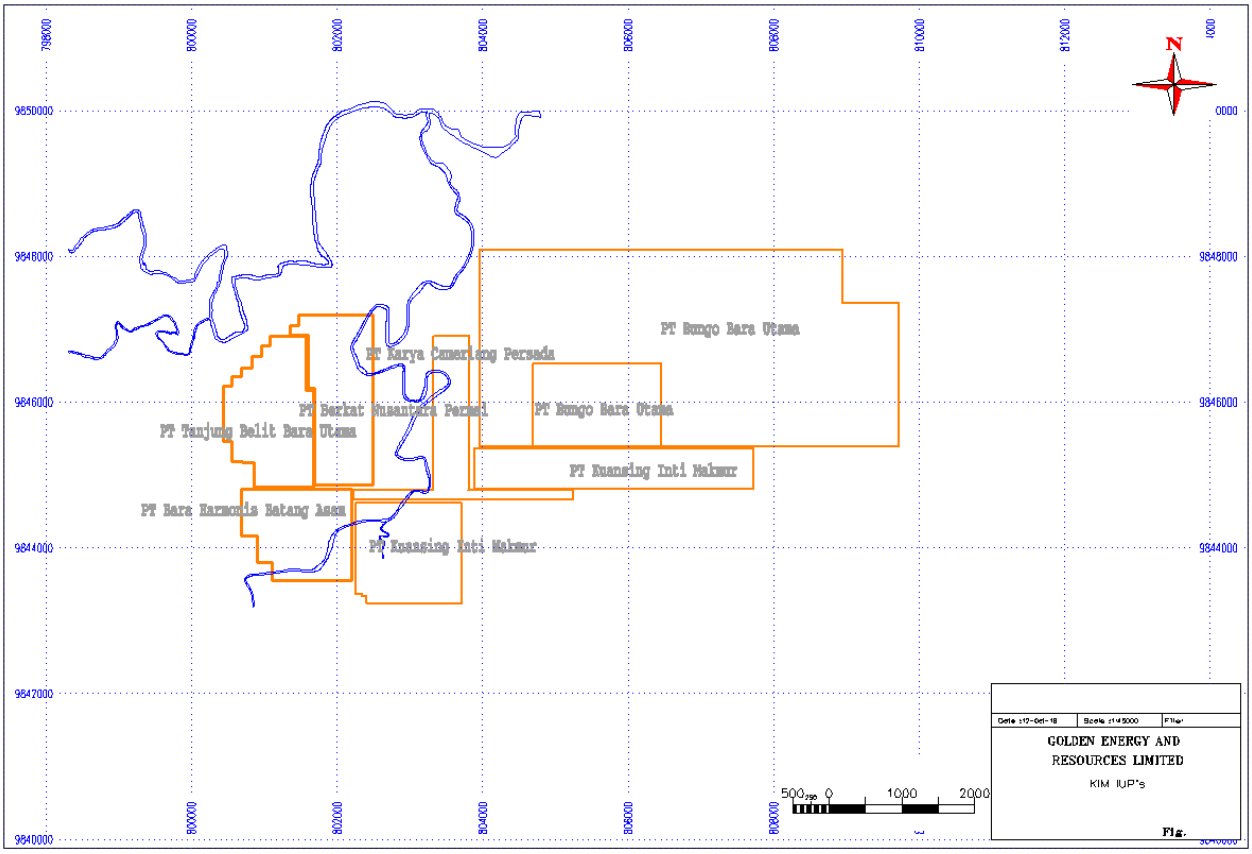
Access to the site is via a 2 hour plane flight from Jakarta to Padang followed by a either an 5 hour car journey or via a 1.5 hour plane flight from Jakarta to Jambi followed by a 6 hour car trip.

The tenure for the KIM Project is covered by 8 Izin Usaha Pertambangan Produksi ("IUP Production") and covers a 2,610 ha area of coal concession. The KIM project consists of following 2 coal blocks:

- KIM East Block ("KIM East Block"); and
- KIM West Block ("KIM West Block").

The IUP boundaries, existing workings and exploration borehole locations are shown in Figure 2:1. Conventional open-pit coal mining operations was commenced in the KIM East pit in 2007, which was followed by opening of the KIM West pit in 2010. Approximately 13 Mt of coal has already been mined from these pits until August 2016.

Figure 2:1 IUP Boundary and Location of Individual Coal Blocks



2.2 Tenure

Clause 67 of the VALMIN Code states that status of tenement is material and requires disclosure. Determination of the status of Tenements is necessary and must be based on a recent independent inquiry, either by the Expert or a Specialist.

LasutLay & Pane ("LLP"), a Jakarta based legal firm, was commissioned to prepare a report in respect of the legal aspects of the mining activities within the KIM concession, solely from the perspective of Indonesian laws. LLP's scope was to confirm that:

- KIM has good title to its mining concessions; and
- KIM has complied with material, applicable provisions of the Mining Law 2009 and its implementing regulations, environmental law, forestry law and other relevant laws (as applicable).

LLP issued its final report on 24 October 2016. The LLP report was made available to Salva Mining for reference in preparing this report.

2.2.1 Tenure Status

Eight (8) of the IUPs with a total area of 2,610 ha are owned directly and in-directly by subsidiaries of GEAR. Tenure at the KIM concession is held under the 'Izin Usaha Pertambangan' which translates to 'Mining Business License' (IUP) system of ownership. The ownership details of these IUPs are given in Table 2:1 below.

Table 2:1 KIM Concession Details

Company	IUP Number	Area (ha)	Granted	Expiry	GEAR Ownership
PT Bungo Bara Utama	341/DESDMTAHUN 2009	1,301	9-Jul-09	20 years	99.998%
PT Bungo Bara Utama	250/DESDM TAHUN 2010	199	23-Apr-10	8 years	99.998%
PT Bara Harmonis Batang Asam	576/DESDM TAHUN 2014	172	18-Dec-14	10 years	99.998%
PT Karya Cemerlang Persada	350/DESDM TAHUN 2009	143	22-Jul-09	10 years	99.998%
PT Tanjung Belit Bara Utama	249/DESDM TAHUN 2010	198	23-Apr-10	8 years	99.998%
PT Kuansing Inti Makmur	252/DESDM TAHUN 2010	199	23-Apr-10	8 years	99.998%
PT Kuansing Inti Makmur	166/DESDM TAHUN 2012	199	5-Apr-12	10 years	99.998%
PT Berkat Nusantara Permai	545/DESDM TAHUN 2010	199	15-Dec-10	9 years	99.998%
Total Area (ha)		2,610	GEAR Ownership		99.998%

All IUP's have a provision for 2 x 10 years extensions. A possible issue with tenure for the project is a number of gaps between the IUPs that cover the project area. The gaps are for a maximum of 150 m in width (Figure 2:2). Salva Mining has been informed by Independent legal firm "Lasutlay and Pane Advocates (LLP)" that no other party holds tenure over the land in these gaps and that application is currently underway to change the coordinates of the current IUPs to ensure that there is no gap between them. This type of issue is not uncommon in Indonesia and there is no known reason why it could not be resolved. Salva Mining is not aware of any disruptions to operations at the KIM project that have occurred due to this issue. All of the land inside the KIM project area is designated 'Area Pengunaan Lain' (Other Purpose) by the Forestry Department, and thus no borrow to use permit (Izin Pinjam Pakai Kawasan Hutan) is required for mining operations in this area.

The current production operation permits held by KIM or its subsidiary has been detailed below.

2.3 KIM Directly Owned Production Operation IUP

KIM is the direct holder of the following Production Operation IUP

- **251/DESDM Tahun 2010** *tentang Izin Usaha Pertambangan Operasi Produksi Batubara dan Revisi Titik Koordinat* / concerning Approval of Mining Production Permit and the Revision of The Coordinate Points. Issued by Bungo Regent, Jambi Province and valid from 23 April 2010 until 23 April 2020, covering an area of 199 hectares, located at Bungo Regency, Jambi Province, **in conjunction with 166/DESDM Tahun 2012** *tentang Perubahan Atas Lampiran Keputusan Bupati Bungo No. 251/DESDM Tahun 2010 tentang Izin Usaha Pertambangan Operasi Produksi dan Revisi Titik Koordinat PT Kuansing Inti Makmur* / concerning the Amendment of Bungo Regent Decision No. 251/DESDM Tahun 2010 concerning Approval of Mining Production Permit and the Revision of The Coordinate Points. Issued by Bungo Regent, jambi Province on 5 April 2012.

- **252/DESDM Tahun 2010** *tentang Izin Usaha Pertambangan Operasi Produksi Batubara* / concerning Approval of Mining Production Permit. Issued by Bungo Regent, Jambi Province and valid from 23 April 2010 unti 23 April 2018, covering an area of 199 hectares, located at Bungo Regency, Jambi Province.

2.4 KIM Indirectly Owned Production Operation IUP

Following Production Operation IUP are owned by KIM's subsidiaries:

PT Berkat Nusantara Permai ("BNP")

- BNP is the holder of Production Operation **IUP 545/DESDM Tahun 2010** tentang Persetujuan Pengalihan Kepemilikan Izin Usaha Pertambangan Operasi Produksi Batubara Kepada PT Berkat Nusantara Permai (Dari PT Lively Duaji Energy Pemegang IUP No. 492/DESDM Tahun 2009) / concerning Approval of the Transfer of Production Operation Minging Permit to PT Berkat Nusantara Permai (From PT Lively Duaji Energy, Holder of IUP No. 492/DESDM year 2009).Issued by Bungo Regent, Jambi Province and valid from 15 December 2010 until 30 December 2019, covering an area of 199 hectares, located at Bungo Regency, Jambi Province.

PT Bungo Bara Utama ("BBU")

- **341/DESDM Tahun 2009** tentang Pemberian Izin Usaha Pertambangan Operasi Produksi Batubara / concerning Approval of Production Operation Mining Permit. Issued by Bungo Regent, Jambi Province and valid from 9 July 2009 until 9 July 2029, covering an area of 1,301 hectares, located at Bungo Regency, Jambi Province.

- **250/DESDM Tahun 2010** tentang Izin Usaha Pertambangan Operasi Produksi Batubara / concerning Approval of Production Operation Mining Permit. Issued by Bungo Regent, Jambi Province and valid from 23 April 2010 until 23 April 2018, covering an area of 199 hectares, located at Bungo Regency, Jambi Province.

PT Bara Harmonis Batang Asam (BHBA)

- BHBA is the holder of Production Operation **IUP 576/DESDM Tahun 2014** tentang Izin Usaha Pertambangan Operasi Produksi PT Bara Harmonis Batang Asam / concerning Approval of Production Operation Mining Permit. Issued by Bungo Regent, Jambi Province and valid from 18 December 2014 until 18 December 2024, covering an area of 172 hectares, located at Bungo Regency, Jambi Province.

PT Karya Cemerlang Persada ("KCP")

- KCP is the holder of Production Operation **IUP 350/DESDM tahun 2009** tentang Persetujuan Peningkatan Izin Usaha Pertambangan Eksplorasi menjadi Izin Usaha Pertambangan Operasi Produksi / concerning Approval of Escalation of Exploration Mining License to Production Operation Mining Permit. Issued by Bungo Regent and valid from 22 July 2009 until 21 July 2019, covering an area of 143 hectares located at Bungo Regent, Jambi Province.

PT Tanjung Belit Bara Utama ("TBBU")

- TBBU is the holder of Production Operation **IUP 249/DESDM Tahun 2010** tentang Izin Usaha Pertambangan Operasi Produksi / concerning Approval of Production Operation Mining Permit. Issued by Bungo Regent, Jambi Province and valid from 23 April 2010 until 23 April 2018, covering an area of 198 hectares located at Bungo Regency, Jambi Province.

LLP reports that Production and Operation IUPs comprising KIM Project granted are in good standing, with permanent rent requirements met. KIM has complied with all applicable environmental regulations, Forestry laws and there are no pending investigations by government agencies on environmental .issues. All IUPs were granted "Clean and Clear"" status by the General Director of Mineral and Coal on 28th February 2012.

Based on the report by LLP, Salva Mining considers the tenement tenure and permits to be in good standing.

3 Geology and Resources

Resources and Reserves Estimates are presented in the format prescribed in “Appendix 7.5 to the SGX listing rules” in Appendix B.

3.1 Coal Resource

An independent estimate of Coal Resources within the KIM Concession was prepared by Salva Mining and is current as of 31 August 2016. The Coal Resource estimates were prepared in accordance to the 2012 Edition of the “Australasian Code for Reporting of Mineral Resources and Ore Reserves” (JORC Code, 2012).

3.1.1 Resource Classification

The coal resources present in the KIM concession have been classified in accordance with the JORC Code, 2012.

For the purpose of coal resource classification , in accordance with JORC Code (2012) guidelines, Salva Mining has considered drill-hole with coal quality sample intersection and core recovery above 90% over the sampled interval as a valid point of observation.

In terms of Coal Resource classification, Salva Mining is also guided by the Australian Guidelines for Estimating and Reporting of Inventory Coal, Coal Resources and Coal Reserves (2014) (The Coal Guidelines) specifically referred to under clause 37 of the JORC Code (2012).

Based on due consideration of the continuity of the coal seams as observed in the geological models for each of the five resource areas, the relative lack of evidence for significant faulting and the population statistics of the coal quality composites per seam, Salva Mining has sub-divided Coal Resources within the KIM concession into resource classification categories based on the following spacing’s (expressed as a radius of influence around points of observation which is half of the spacing between points of observation):

- Measured 250m;
- Indicated 500m; and
- Inferred 2000 m radius of influence.

It is a requirement of the JORC Code (2012) that the likelihood of eventual economic extraction be considered prior to the classification of coal resources. Therefore, given the average coal quality attributes of the coal seams considered, which makes it amenable to be marketed as a thermal coal for power generation purposes, Salva Mining considers that it is reasonable to define all coal seams within the classification distances discussed above, to a depth of 250 m below the topographic surface, as potential open cut coal resources.

3.2 Statement of Coal Resources

Coal Resources which have been estimated, classified and reported according to the guidelines outlined in the JORC Code (2012) and the Australian Guidelines for Estimating and Reporting of Inventory Coal, Coal Resources and Coal Reserves (2014) as at 31 August 2016 are detailed in Table 3:1.

Table 3:1 Coal Resources, KIM Project as at 31 August 2016

Coal Resources (Mt)										
Pit	Measured	Ash% adb	CV adb kcal/kg	Indicated	Ash% adb	CV adb kcal/kg	Inferred	Ash% adb	CV adb kcal/kg	Total
KIM East	56	18.1	5,279	36	18.85	5,183	75	18.73	5,192	167
KIM West	58	16.72	5,445	23	17.51	5,340	10	15.73	5,228	91
Total	**114**			**59**			**85**			**258**

Mineral Resources are reported inclusive of the Mineral Reserves
(*Note: individual totals may differ due to rounding*)

More detailed discussion of the Resource estimate including the following aspects in included in the Resource and Reserve Report (Appendix C):

- Description of regional and local geology;
- Exploration undertaken to date including the number of boreholes, borehole locations and spacing, drilling and sampling techniques;
- The number of core samples taken and core recovery percentages;
- Criteria used to define points of observation;
- Ore body modelling techniques and procedures;
- Coal quality results, relative density of coal, laboratory used and analytical standards;
- Classification of Resources; and
- Ore body geometry and dimensions.

4 Coal Reserves

The Coal Reserves estimates were prepared in accordance to the 2012 Edition of the "Australasian Code for Reporting of Mineral Resources and Ore Reserves" (JORC Code, 2012).

4.1 Estimation Methodology

An independent estimate of the Reserves within the KIM concession was prepared by Salva Mining as of 31 August 2016. Salva Mining prepared the Coal Reserve estimate on the basis for the Coal Reserve estimate as at that date. The Coal reserves estimates presented in this report are based on the outcome of pit optimisation results and the techno-economics study carried out by Salva Mining.

The subject specialist for Reserves considers the proposed mine plan and mining schedule is techno-economically viable and achievable. This has been done by reviewing all the modifying factors, estimating reserves in the pit shell and doing a strategic production schedule and economic model which confirms a positive cash margin using the cost and revenue factors as described below in this report.

4.2 Modifying Factors

The KIM Mine is an operating mine since 2007 (KIM East pit commenced production in 2007 while the KIM West pit started in 2010). The KIM Mine is operated as single mining operation; even though the production from the Kim West pit has been temporarily suspended while the KIM East pit is operating as part of normal operation control. It is planned to resume production from the KIM West pit by end of 2018.

Salva Mining considers the Modifying Factors to be valid for both pits. The Modifying Factors used are based on actual operations at the KIM Mine which were independently verified by the Salva Mining's subject specialist during the site visit.

Therefore it is considered valid to use Modifying Factors from the operating KIM mine to satisfy clause 29 of the JORC Code. While JORC 2012 is not explicit with reference to operating mines, the guidance given in ASX FAQ no. 9 is considered relevant in this regard.

Further, Salva Mining has carried out independent life of Mine (LOM) Study to develop the mining schedule and its economic evaluation of the Mine. The following Table 4:1 outlines the factors used to run the mine optimisation and estimate the Coal Reserve tonnage.

Table 4:1 Modifying & Mine Optimisation Factors

Factor	Chosen Criteria
Seam roof & floor coal loss of 0.05 m each	0.10m
Seam roof & floor dilution 0.02 m each	0.04m
Geological & Mining loss including loss in transportation and handling at port	5%
Minimum mining thickness minable coal seam	0.3m
Dilution default density	2.2bcm/t
Dilution default calorific value	500Kcal/kg
Dilution default ash	75%
Overall Highwall and Endwall slope	25 deg to 40 deg
Maximum Pit depth	Varies from 90-150m max.

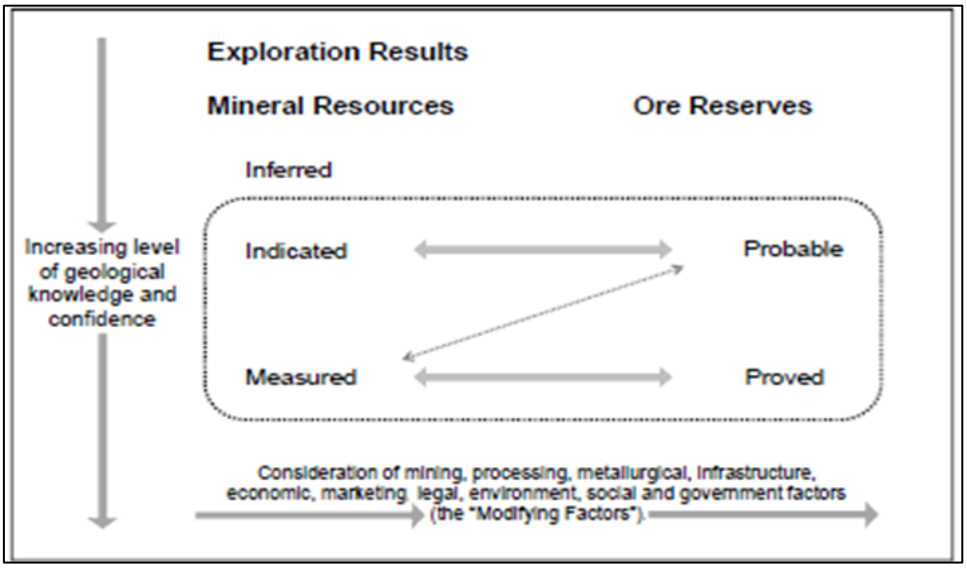
Factor	Chosen Criteria
Minimum Mining width at Pit bottom	50m
Exclusion of Mining lease (IUP) and offset from Pit crest	50m
Mining , Coal handling and Transport Cost – supplied by client and validated by Salva Mining	Available & Used
Long term Coal Selling Price for Break-even Stripping Ratio calculation	US$ 46.2/t
Government Documents / approvals - supplied by client	Available & Used
Environment Report	Available & Used
Geotechnical Report	Available& Used
Hydrogeology Report	Available & Used

4.3 Reserves Classification

Under the JORC Code as shown below only Measured and Indicated Coal Resources can be considered for conversion to Coal Reserves after consideration of the "Modifying Factors" including mining, processing, economic, environmental, and social and government factors.

To convert Resources to Reserves it must be demonstrated that extraction could be justified after applying reasonable economic assumptions. Proved Reserves is derived from the highest level geological confidence of established Measured Resources while Probable Reserves is derived from a moderate level geological confidence of established Indicated Resources. A level of uncertainty in any one or more of the Modifying Factors may result in Measured Resources converting to Probable Reserves depending on materiality. A high level of uncertainty in any one or more of the Modifying Factors may preclude the conversion of the affected Resources to Reserves (Figure 4:1).

Figure 4:1 Relationships between Mineral Resources & Ore Reserves



Source: JORC Code 2012

This classification is also consistent with the level of detail in the mine planning completed for KIM Coal concession deposits. In the opinion of Salva Mining, the uncertainties in most of these are not sufficiently material to prevent the classifications of areas deemed Measured Resources to be

areas of Proved Reserves and areas deemed Indicated Resources to be the areas of Probable Reserves.

4.4 Statement of Coal Reserves

The Statement of Coal Reserves has been prepared in accordance with the 2012 Edition of the JORC Code. The total ROM Coal Reserves are summarised in Table 4:2. Total ROM Coal Reserves are same as total Marketable Coal Reserves.

Table 4:2 Coal Reserves, KIM Project as at 31 August 2016

Pit	Reserve (Mt)			RD adb t/m3	TM arb %	IM adb %	Ash adb %	CV arb Kcal/kg	TS adb %
	Proved	Probable	Total						
KIM West	24.6	7.6	32.2	1.40	22.58	11.85	16.62	4,980	1.14
KIM East	18.6	6.5	25.0	1.41	24.94	12.11	18.43	4,828	1.32
Total	**43.2**	**14.1**	**57.2**						

(*Note: individual totals may differ due to rounding*)

More detailed discussion of the Reserve estimate including the following aspects in included in the Resource and Reserve Report (Appendix C):

- Reserve estimation methodology;
- Discussion on Modifying Factors;
- Current Mining Operations;
- Pit Optimisation;
- Pit design considerations;
- Cut off parameters and pit limits;
- Audits and reviews; and
- Reserve Classification and Reserves statements.

5 Life of Mine Scheduling

A life of mine (LOM) plan was prepared based on the final pit design. This was done to ensure that the proposed mining method would be practical and achievable and that the proposed dumping strategy would be able to contain the waste mined in the final pit design. This provides a check on the reasonableness of the assumed waste mining costs and estimates the average waste haul per production period.

5.1 Other Mineable Coal Inside Pit Design

The optimised pit designs and ultimate pit shells were used to estimate Coal Reserves for the KIM Mine. It contains a significant proportion of Inferred Coal Resources. Under the JORC Code, these Inferred Coal Resources cannot be converted to Reserves because of insufficient confidence in the estimate “is not sufficient to allow the results of the application of technical and economic parameters to be used for detailed planning”. Hence, the results of the technical assessments of this Inferred Coal Resources should be treated with caution.

Generally the Inferred Coal Resources included in the optimised pit shell are from open hole intersections, where geophysical data at sufficiently close spacing reasonably confirms the continuity and thickness of coal seams and partings.

In the process of Reserve Estimation, Salva Mining has followed the process which aimed to minimize the quantity of Inferred Coal Resources included in the final pit designs. However, under certain circumstances, it was considered necessary to include this coal as exclusion of it would result in an impractical pit design. Typical situations where inclusions of Inferred Coal Resources within the pit design were:

- Inferred Coal Resources located at the sub-crop sde but with Measured and Indicated coal located down dip;
- Small areas of Inferred Coal Resources located close to the high-wall where exclusion would result in unrealistic high-wall shapes; and
- Thin seams in the stratigraphy where it is difficult to achieve sufficient core recovery or sufficient core for analysis to classify the coal as Measured or Indicated, but which are underlain or overlain by thicker seams with Measured and Indicated Resources.

A schematic diagram for the KIM East and the KIM West blocks showing other the Inferred Coal Resources within the designed Pit shell is shown in Figure 5:1 and Figure 5:2.

Figure 5:1 Inferred Coal Resources inside Pit Shell- KIM East Seam S300U

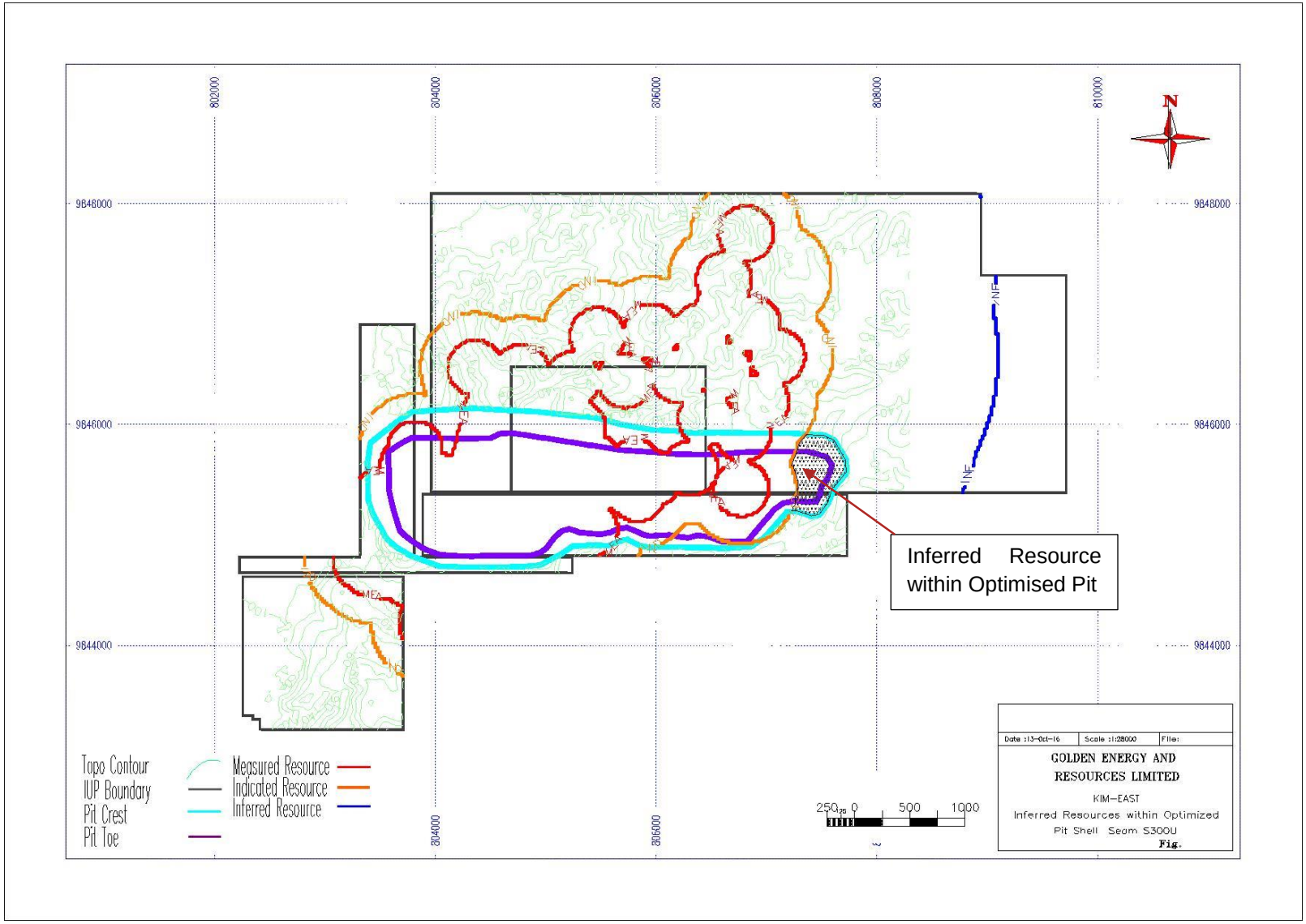
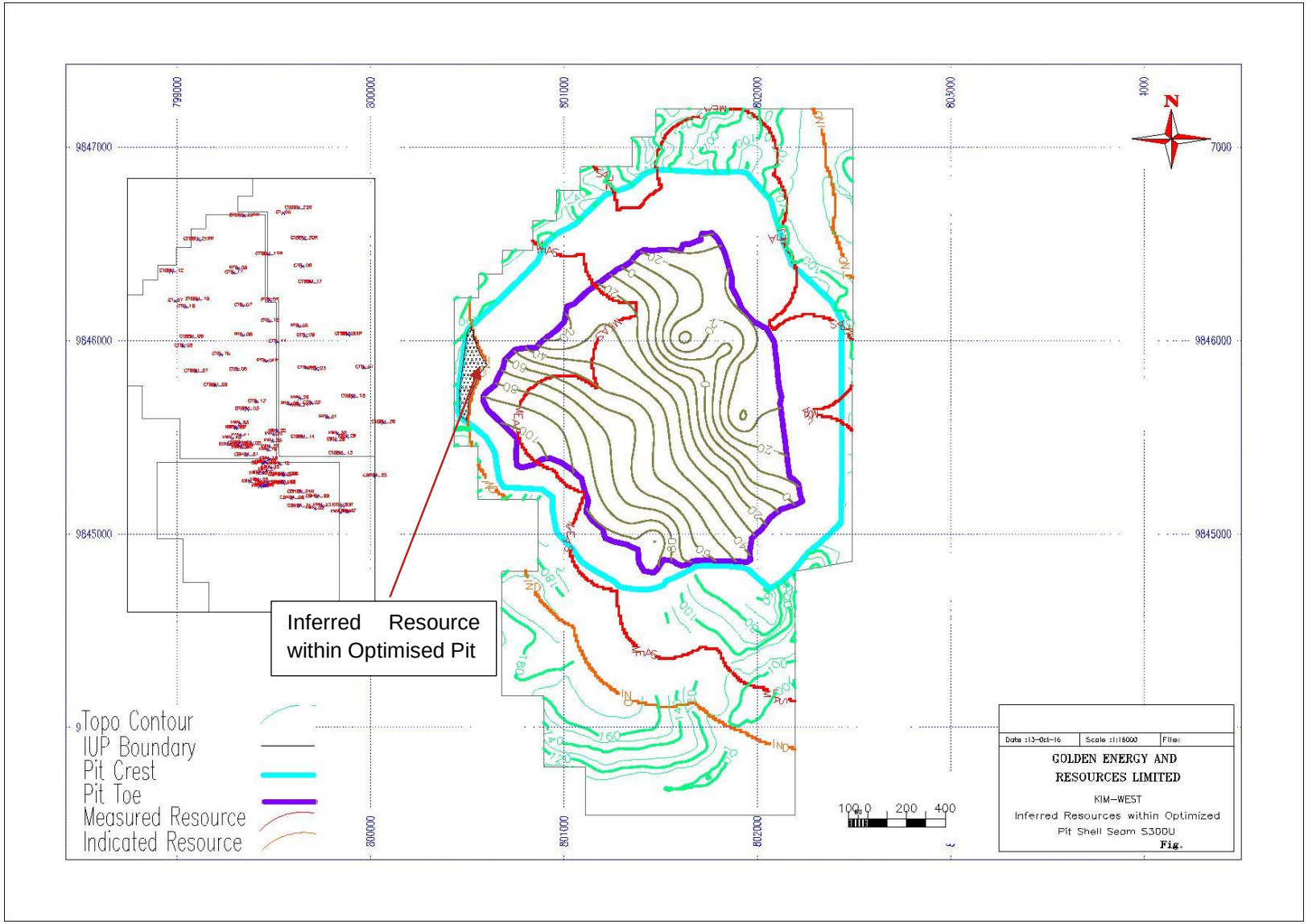


Figure 5:2 Inferred Coal Resources inside Pit Shell- KIM West Seam S300U



Salva Mining notes that care must be taken with the inclusion of Other Mineable Coal in life of mine schedules to avoid cases where confidence in the thickness, continuity and quality of the coal is so low that resulting pit designs and schedules would be unrealistic. During the Reserve estimation process, the subject specialist inspected these seams and determined an appropriate limit for the final pit shell taking these considerations into account. The quantity of Inferred Resources inside the pit designs with Reserves and the scheduled tonnes are shown in Table 5:1.

Table 5:1 Salva Mining LOM Schedule, Inferred Resource Tonnes in Pit Shell

	Coal Reserves (Mt)	Inferred Resource within Optimised Pit Shell (Mt)	Scheduled LOM (Mt)
KIM East	**25.0**	7	**25.0**
KIM West	**32.2**	1	**32.2**
Total, KIM	**57.2**	**8**	**57.2**

While the inferred resource within optimized pit is only 12%, to mitigate the risk associated with the inclusion of Inferred Resources within Optimised Pit Shell and to be on conservative side, Salva Mining has opted to keep total minable tonnes over LOM to be equal to the quantity of proved and probable reserves only for the purpose of this valuation report.

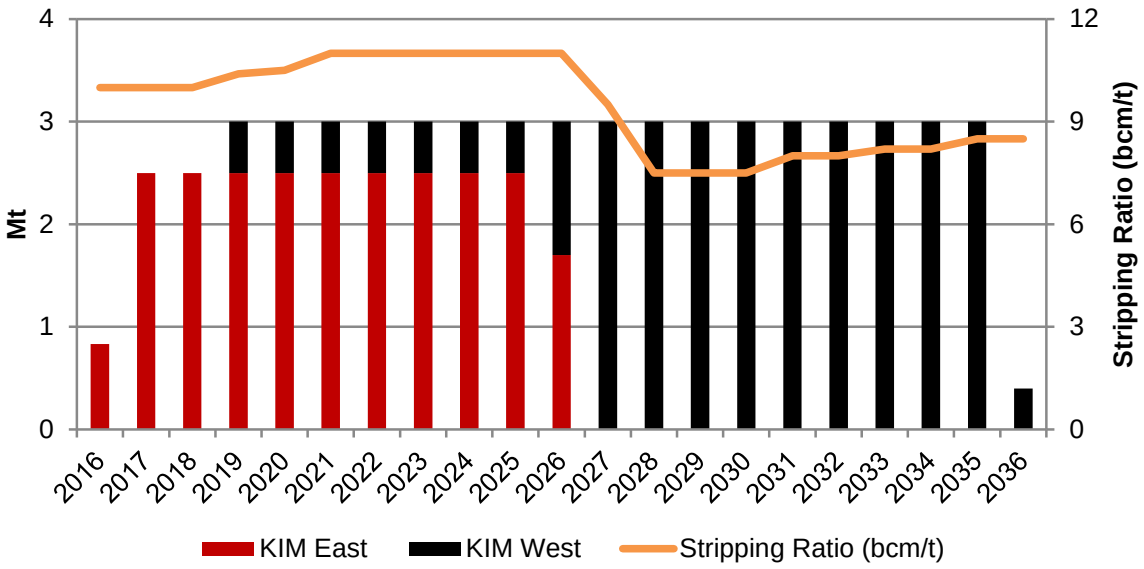
5.2 Mine Schedule

At the time of writing of this report, mining operation was carried out in the KIM East pit, whereas the coal production at the KIM West pit was suspended as the margins are more attractive from the KIM East pit. Currently KIM West pit is under care and maintenance.

The production from KIM West pit is likely to recommence from end of 2018 onwards when the dedicated haul road expected to become operational.

As per Salva Mining's preliminary production schedule, the minable tonnes over life of mine are expected to be 57.2 Mt requiring waste mining of 541 Mbcm. The LOM stripping ratio is expected to be 9.5 bcm/t of coal mined. During initial years of operations, the production from KIM pits will be approximately 2.5 Mtpa, with peak production of 3 Mtpa from year 4 onwards (Figure 5:3) once the dedicated haulage road is completed.

Figure 5:3 LOM Production Schedule



5.3 Mining Operations

Currently, the mining method for the KIM concession can be described as a "multi seam, moderate dip, open cut coal mine using truck and shovel equipment in a combination of strip and haul back operations".

The mining operations in KIM concession is carried out by conventional open pit mining method using truck and excavator combination. Mining of waste is outsourced to third party contractor.

Mining operation at KIM East block was commenced in 2007. This was followed by development and commencement of mining in the KIM West Block in 2010. So far, approximately 13 Mt of coal have been produced from both the pits combined together.

5.3.1 Top Soil Removal

It is necessary to clear land and removes topsoil to advance any open pit mining operations. At KIM concession, land clearing and topsoil removal is undertaken by contractors. Natural Vegetation is cleared by using dozers. The vegetation is pushed into piles and moved to a suitable location. All necessary care is taken to minimize soil profile disturbances and same process will be followed during the life of mine operations. Once land is cleared, a fleet of small trucks and excavators removes topsoil which is either preserved for final reclamation or directly dumped into final landform area (where coal is already mined out) for rehabilitation.

5.3.2 Drilling and Blasting

Most of the coal mining operations in Indonesia do not require drilling and blasting of overburden material to expose coal. The overburden is free digging which is not typical in countries outside Indonesia. It is generally possible to mine waste up to 100 m by either free digging with excavator or ripping with dozers. However, in some large operations it is more efficient to drill and blast waste overburden or inter-burden before handling by excavator as blasting significantly improves excavator productivity.

At the time of writing of report, drill and blast was not required in the KIM East block. However, some drilling and blasting was carried out in the hard layer of overburden in the KIM West Block. In the later year of operation, some drilling and blasting at KIM West is likely to be required. Drilling will likely to be undertaken using standard down hole drill rig with hole diameters up to 165 mm. Drill hole depth is limited to 11m (including 1 m of subgrade drilling) for a bench size of 10 m. Explosives will be stored in magazines on the site and mixed and loaded into blast holes by mobile mixing units.

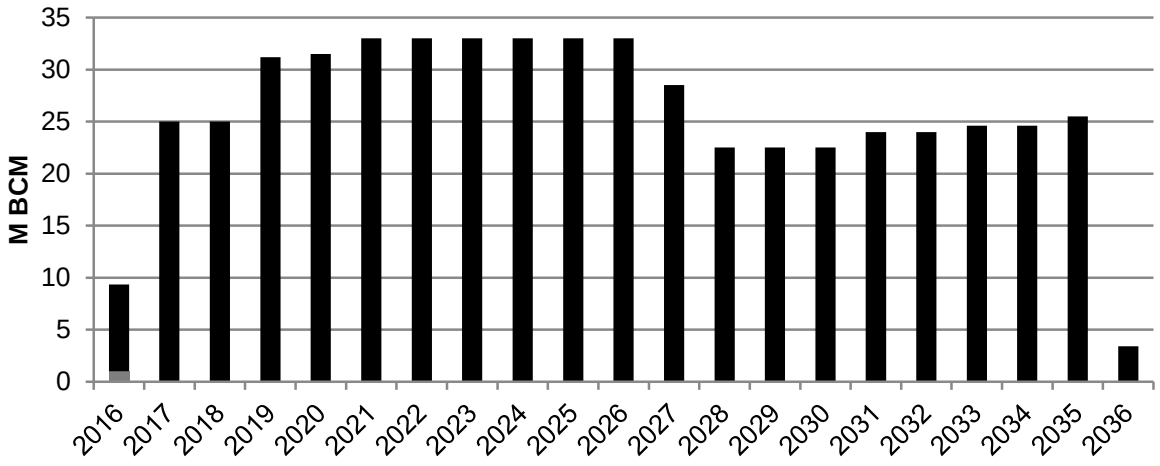
In line with the standard practice in Indonesia, drilling and blasting will be part of the mining contractor's responsibilities.

5.3.3 Waste Excavation

Waste material is mined using hydraulic excavators and loaded into standard rear tipping off-highway trucks for haulage to waste dumps which are either in close proximity to the pits or in pit where possible. Diesel powered hydraulic excavators in backhoe configuration are currently being used at KIM East Block and it is assumed for the purpose of this study that this type of equipment will continue to be used over the life of mine. The new bench will be opened of 5 meter height which will be subsequently converted into a 10 m bench.

Waste will be dumped in lifts with a typical height of 5 m; with dozers pushing waste and ensuring the dump area is clean and that safety berms are maintained. A swell factor of 1.2 was assumed for all waste dumping and handling calculations. The waste to be mined over life of mine has been shown in Figure 5:4 below.

Figure 5:4 Waste Excavations over Life of Mine (M bcm/annum)



5.3.4 Coal Mining

Coal at KIM East Block is mined using 40 to 60 tonne excavators backhoe excavator which typically sits on top of the coal and load trucks directly. Coal is then hauled and dumped to the ROM stockpile using smaller rigid axle coal haulage trucks of up to 30 tonne capacity (Figure 5:5 & Figure 5:6).

Figure 5:5 Coal Mining at KIM East Block



Figure 5:6 Waste Mining at KIM East Pit



5.3.5 Dewatering

For any efficient mining operations, dewatering of pit and pit water management is of critical importance. During the site visit at KIM concession, the subject specialist inspected pit sumps and found that the water management systems were of high standard. The pit drainage system, which is designed to prevent external water from entering into pit was also inspected and found effective and fit for purpose.

6 Coal Handling and Coal Logistics

Salva Mining has carried out a high level review of logistic options to access the KIM Project economics. A number of options were validated and techno-economic assessment of each option was carried out. Based on the assessment of available information, data gathered during the site visit and while visiting GEAR office in Jakarta, the following logistics chain for the coal blocks comprising the KIM project is considered appropriate.

6.1 Coal Logistics

The coal from the KIM Pits are currently being sold to domestic customers. The mine to end user supply chain involves hauling of coal to the ROM stockpile, followed by transportation using public roads to the domestic customers. Until recently, the coal from the KIM project had been sold to export customers as well; however at the time of writing this report, Salva Mining is of the opinion that it is more appropriate to sell coal domestically as the margins are significantly better as compared to exporting the product. Therefore, for the purpose of this valuation report, coal from the KIM Project is assumed to be sold to domestic customers only for the life of the mine. However, an option to export coal to overseas customers still exists if margins improve in the future.

At the KIM pits, the mined coal is hauled to the ROM stockpile, located at an approximate distance of 2 km from the KIM pits, using rigid body coal haulage trucks (Figure 6:1). Although facility for crushing and screening exist at the ROM stockpile area, crushing is not required for sales to most domestic customers which reduce operating cost.

Figure 6:1 Coal Stockpile

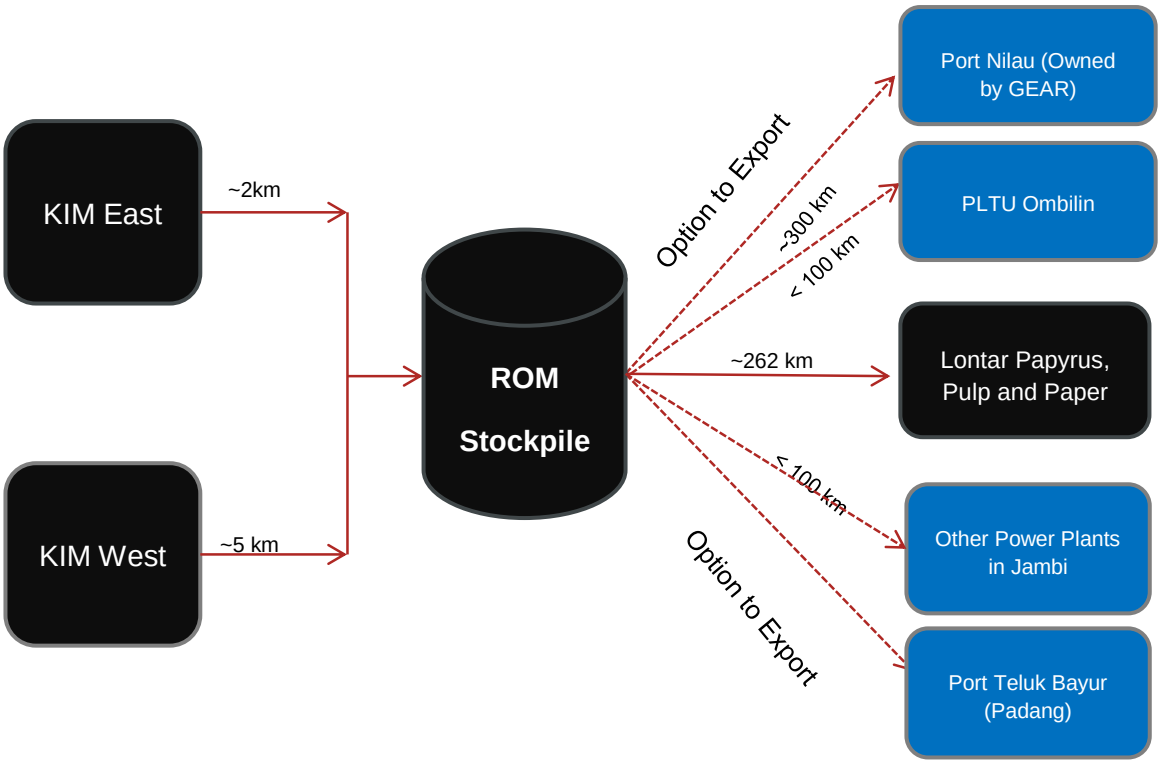


Source: Salva Mining

Coal is loaded from the ROM stockpile into rigid-body coal haul trucks and hauled along public roads to customers. It is anticipated that most of the coal will continue to be sold to the Lontar Papyrus pulp and paper plant in the near term. However, in medium term, some of the coal produced from the KIM Project may go into to nearby power plants which are currently under

construction including one at Jambi and one at Teluk Sirih. The coal flow logistics is outlined in Figure 6:2.

Figure 6:2 Coal Logistics – Current & Additional Options



6.2 Haulage on Public Roads

The Jambi provincial government in conjunction with regency governments from Jambi's major coal producing regions has agreed on a suspension of coal trucks using public roads, starting from 31 December 2012 (*Jambi Province Regulation No 13 Year 2012*). The provincial government is planning to construct an alternative route for coal trucks, in order to avoid resistance from coal producers in the area. The validity of this regulation has been questioned by the Association of the Coal Mines, Asosiasi Pengusaha Batubara Indonesia (APBI), Jambi Region and is under juridical review by the Supreme Court of Indonesia.

Jambi Province Regulation No 13 Year 2012 does however stipulate some conditions on which the hauling of coal through public roads may be permitted. This was further clarified in "Governor Jambi Regulation No 18 Year 2013 (Implementation Rules to the Jambi Province Regulation No 13 Year 2012), where under Article 3, paragraph 1 and 2, laid out conditions on which the Governor may allow limited utilisation of special public roads for coal hauling purposes, regulation. The Article 6, paragraph 1 and 2 of the Jambi Province Regulation number 13, year 2012, stipulates that "*in the event Special Road (dedicated haul road) is yet to develop or still unavailable to be utilised then hauling may be allowed through specific public road*".

Presently, GEAR have developed plans to build a new haul road which will connect the KIM Mine to an existing special road. This new haul road will connect the KIM Mine to Port Nilau via the Lontar Papyras Pulp and Paper Plant. This 65 km dedicated connecting road is expected to be completed

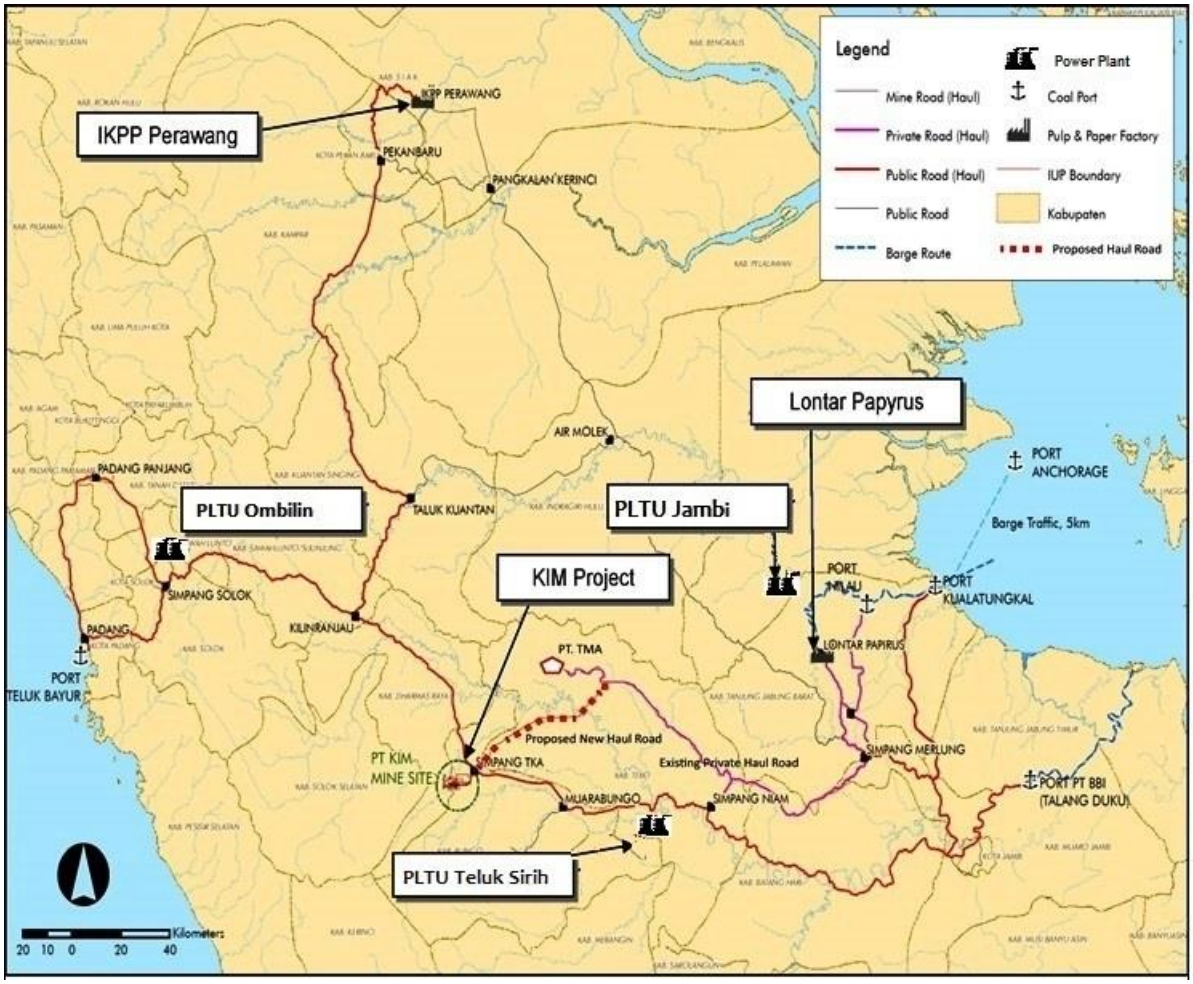
in 36 months. This will enable coal to be hauled on a special road to LPPP, a power plant at Ombilin and potential exports via the Nilau Port.

Although the interpretation of this regulation is a little ambiguous in nature, Salva Mining is in opinion that the government is likely to continue to allow coal haulage by public road where a coal company is developing its own dedicated haul road.

While hauling coal on public roads may be allowed at the current time, in Salva Mining's opinion this is an issue may impact future operations. As per the plans provided to Salva Mining, the dedicated haul road is expected to be completed by mid 2019. Salva Mining has considered the use of the dedicated special road from 2019 onwards for base or preferred case valuation. Salva Mining has opted to assume that no haulage on public roads will be allowed immediately, while developing low case valuation.

The current and proposed logistics map for the KIM project is shown in Figure 6:3 below.

Figure 6:3 Current and Proposed Coal Logistics



7 Environment and Community Relations

A preliminary assessment of potential issues pertaining to environment and community relations that may impact the Project valuation was carried out by Salva Mining. These included following activities:

- Review of environment management procedure at site;
- Visit to GEAR Jakarta office and inspection of environmental management plans;
- Review of the Analisis Mengenai Dampak Lingkungan Hidup (AMDAL) - environment impact assessment and management plans; and
- Review of Corporate Social Responsibility Reports.

Salva Mining's preliminary assessment did not reveal any issues related to environment and community relations that will adversely impact project valuation. However, it should be noted that Salva Mining's assessment was only preliminary in nature and Salva Mining cannot provide any guarantee or warranty that significant environmental or community issues will not affect the operation. Key environmental and community relations issues are discussed below.

7.1 Environmental Aspects

Key issues which can have potential impact on project valuations are: Water Run-off, noise and dust and rehabilitation.

7.1.1 Water Run-off from site

If sediment loads are high or if water is acidic, water run-off from dumps, stockpiles, roads and water pumped from pits has the potential to pollute local rivers, creeks and vegetation. This is managed through the use of bunds, drains and sediment ponds of sufficient size to allow small particles to settle out of the water. Regular monitoring of water discharge points is required under government regulations.

7.1.2 Noise and Dust

Noise and Dust originating from mine operations haulage and coal handling have the potential to impact the local environment, particularly if villages and local communities are located within close proximity to mining and coal handling operations. Dust is generally managed by using water trucks on haul roads, and by spraying water or dust suppressant chemicals to minimise dust being airborne and suppressing it.

7.1.3 Rehabilitation

A large area of land will be cleared as part of the KIM mining operation, although much of this area is not covered by any forest land. The disturbed area is generally rehabilitated by removing the topsoil prior to mining, storing the topsoil onsite during mining and covering the final landform with topsoil at the completion of mining. The area to be rehabilitated is then panted with suitable vegetation.

Management at the KIM Project have established procedures and a nursery in place to prepare for revegetation to take place. To prevent the dust hazard, the company is currently

using dust suppressant and water sprinkling system. Salva Mining notes that the current approved AMDAL for the KIM concessions allows the company to mine in excess of the proposed throughput.

Mine closure plans for the updated mine plan have yet to be completed; however Salva Mining does not foresee any significant issues with this aspect of the operation. A reasonable allowance has been made in for environmental management, rehabilitation and mine closure.

7.2 Social Aspects

Maintaining a good relationship with local communities is a key requirement for the success of the KIM operation. Efforts must be continued in the ongoing community development programs in coordination with the local government. Salva Mining reviewed KIM's Corporate Social Responsibility programs which include the following aspects: Economy and health.

7.2.1 Economy

Economic development of the local community is set to include activities to assist with the economic development of the community by providing employment and business opportunities once mining operations have finished.

Current programs include training in sewing skills and establishing aquaculture infrastructure.

7.2.2 Health

It includes programs to improve health in the local communities and to increase people's knowledge through education in health issues.

8 Valuation

8.1 Valuation Approaches

There are a number of methods used in valuing mineral assets. The applicability of these methods depends on project specific factors including the level of maturity of the mineral assets.

In determining the appropriate method(s) to be used for valuation of these assets, Salva Mining has taken into consideration the classification of these assets as defined in the VALMIN Code and the different methodologies that are generally accepted as industry practice for each classification. Generally there are three broad methods of valuation that are used for valuing mineral assets. These are the cost approach, income approach and market approach. The asset classifications that may be applied to a project are set out in Table 8:1 below.

Table 8:1 Typical Valuation Methods

Classification	General Description	Key Valuation Methods
Exploration Areas	Properties where mineralisation may or may not have been identified, but a Resource has not been identified.	Rule of Thumb, Geo-scientific method, Comparable Transactions.
Advanced Exploration Areas	Properties where considerable exploration has been undertaken and specific targets identified. Resource estimation may or may not have been made. Good understanding of mineralisation present.	Geo-scientific method, Appraised Value Method, Comparable Transactions.
Pre- development Projects	Properties where mineral Reserve has been identified but decision to proceed with development have not been made.	The above methods and DCF/NPV valuation.
Operating Mines	Properties where mining activities are already commenced.	DCF/NPV valuation.

8.2 Valuation Approach for Assessing the KIM Project

The KIM Project is an operating mine where production from bth blocks has already commenced. Coal Resource and Reserve has been determined in all 2 blocks. Since mining activity has commenced, therefore in Salva Mining's opinion, it is appropriate to as DCF method to determine Net Present Value (NPV) of the whole project.

Therefore for the purpose of valuation, Salva Mining has opted to value the Coal Reserves present within the KIM concession on DCF based method. The cash flow model constructed by Salva Mining was based on the production schedules, costs and prices developed for this project. No separate value is ascribed to the exploration potential of the areas outside the blocks contained in the mine study with Coal Reserves. Salva Mining has opted to value the project on the basis of Coal Reserves only using the DCF method.

9 Economic Parameters

9.1 Royalty and Local Government Fees

The royalty is generally levied as percentages of sale proceeds to be applied for the different types of coal depending on its Gross Calorific Value GCV and method of mining. However, different royalty rates have been adopted for different type of ownership structure including: Contract of Work holders (CoWs), Coal Contract of Work holders (CCoW), Izin Usaha Pertambangan holders (IUP), and Izin Usaha Pertambangan Khusus holders (IUPK).

At present, a range of percentage of sales proceeds is applicable for different type of coal mining arrangements as detailed in Table 8:1.

Table 8:1 Indonesian Coal Royalty Rates

Concession Type	Royalty	Current Rates (2014)
CCoW and CoW	13.5%	Royalty on HBA price for the coal type
IUP and IUPK	3% - 7% (Open Pit) 2% - 6% (Underground)	The royalty rate depends on air dried calorific value of the coal produced: • 3% of HBA price for coal <5,100 kcal/kg • 5% of HBA price for coal for <5,100 kcal/kg - 6,100 kcal/kg • 7% of HBA price for coal for >6,100 kcal/kg

The KIM project is held under a number of IUP concessions, amenable to be exploited by open pit mining method. The royalty rate is expected to be 5% as the air dried energy of the coal product is greater than 5,100 kcal/kg and less than 6,100 kcal/kg. The revenue excluding barging and transshipping associated cost is applicable to coal sales from the KIM concession. This Government Regulation requires that all coal sales be made at a minimum (or benchmark) price that is defined by the Indonesian government on a monthly basis. The methodology for calculation of the minimum price is described in Regulation No. 515.K/32/DJB/2011 and Regulation No. 644.K/30/DJB/2013 issued by the Directorate General of Minerals and Coal (DGMC).

Salva Mining assumed that future benchmark prices for Royalty calculations will be equal to or lower than the forecast prices used in this study and thus the forecast coal price has been used for the calculating royalty payments.

9.2 Inflation Outlook

Salva Mining has developed a nominal cash flow model for calculation of NPV and assessment of mineral asset value. Salva Mining has assumed cost in US $ in real terms and converted it into US $ nominal terms based on the long term US inflation factor of 2.4%.

Salva Mining considers this to be an appropriate technique while valuing projects in high inflation, declining foreign exchange rate countries including Indonesia. This is a common approach used in most mineral asset valuation.

9.3 Corporate Income Tax

Corporate income tax is applicable to all Indonesian registered corporations. In 2009, the tax payable was reduced from 30% to 28% of gross income less allowable deductions. From 2010 onwards, the corporate income tax rate was reduced further to 25% of net taxable profit.

The tax rates for different concession types have been shown in Table 9:2. The KIM project is held under a number of IUP concessions. Therefore, in line with the prevailing corporate income tax regulation an income tax rate of 25% is applied to the revenues from the concession.

Table 9:2 Corporate Tax Rates

Concession Type	Corporate Tax	Reversion Rate
CCoW (First Generations)	35%	45%
CCoW (Second Generations)	25%	
CCoW (others)	30-45%	
IUP	25%	

9.4 Depreciation and Amortisation

The different rate of depreciation is applicable for different type of assets for IUP concessions like the KIM concession (Minister of Finance Decree 138/KMK.03/2002 and Amendment 520/KMK.04/2002).

Fixed assets are categorised into four different types, depending on nature of assets and its expected useful life. Assets are generally depreciated over 4, 8, 16 or 20 years and the company may opt to either apply a diminishing balance or straight line approach for each category of asset.

Salva Mining has applied different depreciation rate depending on type of asset and their useful life. Salva Mining has opted to applied straight line method to estimate depreciation.

9.5 Working Capital

Working capital has been included in the financial model has been estimated using the following assumptions:

- Accounts Receivable Days 35;
- Inventory Days 15; and
- Accounts Payable Days 45.

Salva Mining has assessed these assumptions and found them to be inline with the current operating practices.

9.6 Carried Forward Tax Losses

As per existing law, the tax losses can be carried forward up to 5 years. Tax losses cannot be carried back. For the purpose of this mineral asset valuation, Salva Mining hasn't considered any prior carried forward losses as at 31 August 2016.

9.7 Value Added Tax

The prevailing VAT law stipulates that supplies of coal and other natural resources taken directly from the source are not subjected to VAT. This means that there will not be any output VAT applicable to coal produced from the KIM Concession. As per prevailing VAT law, variable component of contractor cost attracts a 10% VAT. Salva Mining notes that there are uncertainties in current regulations and in the conditions of IUP/CCoWs regarding application of VAT to contractor cost.

Erring on the side of conservatism, Salva Mining has opted to be conservative and applied VAT to all variable contractor cost and therefore a VAT rate of 10% is applied on all contractor cost.

9.8 Weightage Average Cost of Capital (WACC)

Weightage Average Cost of Capital (WACC) is generally used as a discount rate for the valuation of advanced mining projects with Reserves. Salva Mining has derived the WACC (after tax basis) on the basis of Capital Asset Pricing Model (CAPM). Following is the assumptions used in calculation of WACC (Table 9:3).

Table 9:3 WACC (After Tax)

S.No.	Items	Value	Source
1	Risk Free Rate of Return	6.87%	10 year Indonesia government bond yield as of 09 Sept 2016
			(Source: AsianBondsonline.adb.org)
2	Equity Risk Premium	7.5%	Indonesia Country Premium
			(Source: Bloomberg)
3	Relevant Beta	1.01	Unlevered beta of comparable companies, re-levered to average capital structure of comparable companies
4	Company & Project Risk	0.5%	Additional company & project risk
5	Cost of Equity	14.94%	Equal to (1) + (2) x (3) + (4)
6	Debt to Enterprise Ratio	40%	Anticipated proportion of debt for the purpose of WACC calculation
7	Cost of debt (after Tax)	3.66%	Indonesian interbank rate (JIBOR) adjusted for corporate tax as of 09 Sept 2016
			(source: Bank Indonesia, www.bi.go.id)
8	WACC (after Tax)	10.43%	

Furthermore, Salva Mining has cross-checked the calculated WACC for the project with WACC of the various comparable listed mining companies of Indonesia. Table 9:4 summarises WACC of the various mining companies in Indonesia.

Table 9:4 WACC for Indonesian Coal Mining Companies

Company	Value
Adaro Energy	8.4%
Bayan Resources	8.1%
Barau Coal	9.4%
Average	8.6%

Source: Bloomberg

Salva Mining concludes that the calculated WACC for the project appears to be reasonable when compared with other listed mining companies in Indonesia. Salva Mining has applied a WACC of 10.5% to be conservative.

10 Market Analysis and Coal Prices

10.1 Global Outlook

The center of gravity for imported thermal coal has shifted to Asia in the past 10 years with China and India growing more rapidly than other traditionally large importers. This has been driven by a number of factors including the rapid industrialisation of China and India, strong economic growth in the general Asian region, a lack of sufficient domestic coal supply in these countries, a strong supply response from seaborne suppliers such as Indonesia and Australia and, until mid 2012, and a buoyant pricing environment.

However, in since 2014 onwards, the emergence of shale gas in USA has forced US coal producers to compete in the export market and creating a supply surplus scenario. The low crude oil and gas prices has also contributed in apparent reduction of coal demand, as natural gas, which is more environmentally friendly than coal, has been trading at a minor disparity with respect to coal for the first time.

Around the same time Chinese economy started to slow down considerably while India started to produce a significant higher domestic coal. As a result of this ,these two largest coal importing nations no longer driving growth, which translated into a fall on thermal coal demand.

Moving forward, in 2017 onwards, Salva Mining expects a firm recovery in seaborne thermal coal market mainly driven by mine closures in China, firm but stable demand from India and small recovery in European imports after lackluster demand in last 2-3 years. This will also be supplemented by strong growth of thermal coal demand from South Asian economics such as Vietnaam, Malaysia and the Philippines.

On the supply side, exporters are expected to finally derive benefits from the growing price environment. Russia is expected to expand into Asian market while the Indonesia is expected to grow in 2017 after two years of negative growth.

In medium term, coal fired electrification and industrialisation will continue in Asian developing countries as coal is by far the cheapest source of energy. On supply front, Indonesia and Australia is expected to grow more than other supply center because of its proximity of key Asian Markets.

10.1.1 Domestic Demand

The domestic demand for thermal coal is largely driven by government energy policy which laid out plans to boost domestic power generation by coal fired power stations by implementing Fast Track Programs for power generations. In line with this, PLN , The government owened largest power producer, has laid out its road map to build 20 GW of power generation capacity by 2016 in two phases, each of 10 GW, with the majority of them being coal based. As per PLN's Annual Report 2015, around 7.5 GW of coal fired plants are in construction phase.

Along with PLN, several Independent Power Producers (IPPs), such as Java Power at Paiton, are currently constructing coal fired power plants. These power producers have signed offtake agreements with PLN to supply electricity at a contracted price. The projects are mainly being developed by consortiums of Chinese, Japanese and South Korean companies with a local operator.

As a result of recent capacity addition, domestic demand for thermal coal in Indonesia has risen at a quickening pace. Consequently, Indonesian domestic demand for thermal coal in Indonesia has grown rapidly since 2010, at a CAGR of 9%.

In addition to the power sector, industries like Cement (PT Semen Gresik (PTSG), PT Indocement Tunggal Prakasa and PT Holcim Indonesia tbk), Pulp and Paper (Asia Pulp and Paper and Asia Pacific Resources International Holdings Limited), Metallurgy (steel-making, foundry cast iron) are the major consumers of domestic coal and their consumption is expected to increase in the future as well.

Very recently the new Indonesian President has announced an additional 35GW of power generation capacity will be developed, over and above the Fast Track -1 and 2 programs, which together have and will add around 25GW. While the composition of the 35GW is still unknown in terms of fuel sources, it is expected that a significant proportion will be based on coal. In Salva Mining's opinion, any of the new 35GW is unlikely to come online before 2022.

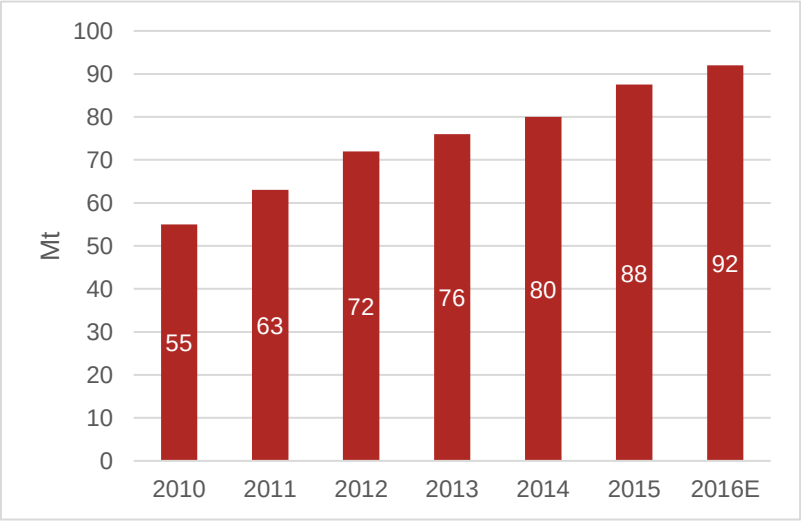
In future, this rapid growth in Indonesian domestic demand for thermal coal will ensure that an increasing proportion of Indonesian coal production is retained for domestic consumption as opposed to being exported. The recent ban on export of unprocessed out will also result in construction of domestic processing plant which will result in increase of coal consumption.

The government has also legislated the priority of domestic demand over export demand through the introduction of a Domestic Market Obligation (DMO) which allocates a certain proportion of coal produced to the domestic market first. This ensures that any increase in domestic demand will slow the ability of exports to ramp up quickly.

10.1.2 Domestic Demand Forecast

Domestic demand for thermal coal in Indonesia has grown rapidly since 2010, at a CAGR of 9.73% (2010-2015 primarily driven by strong demand from the power sector. As per Ministry of Mines and Mineral Resources, Government of Indonesia, domestic consumption of coal in Indonesia has grown by 14.8% y-o-y to reach at 87.5 Mt in 2015, which is considerably higher than the official target of 70Mt. The thermal coal estimated consumption for 2016 is expected as 92 Mt. (Figure 10:1).

Figure 10:1 Indonesian Domestic Coal Demand (Mt)



Going forward,based on our understanding of Indonesian coal production growth, and combined with the domestic demand forecast above, below is our forecast of Indonesian domestic demand. Power sector will remain dominant component of domestic demand comprising of more than 80% of total coal demand while remaining will come from cement, pulp and paper and metallurgical sector. (Table 10:1).

Table 10:1 Project Indonesian Domestic Demand

Indonesia	2015	2016	2017	2018	2019	2020
Domestic Demand	87	92	101	115	135	165

Source: Salva Mining

In addition to the power sector, industries like Cement (PT Semen Gresik (PTSG), PT Indocement Tunggal Prakasa and PT Holcim Indonesia tbk), Pulp and Paper (Asia Pulp and Paper and Asia Pacific Resources International Holdings Limited), Metallurgy (steel-making, foundry cast iron) are the major consumers of domestic coal and their consumption is expected to increase in the future as well.

10.2 Indonesian Coal Supply

Indonesia began exporting thermal coal in 1990, and impressive growth saw it become the world's largest thermal coal exporter by 2006. The coal industry's strong performance is one of the key factors driving economic growth in Indonesia.

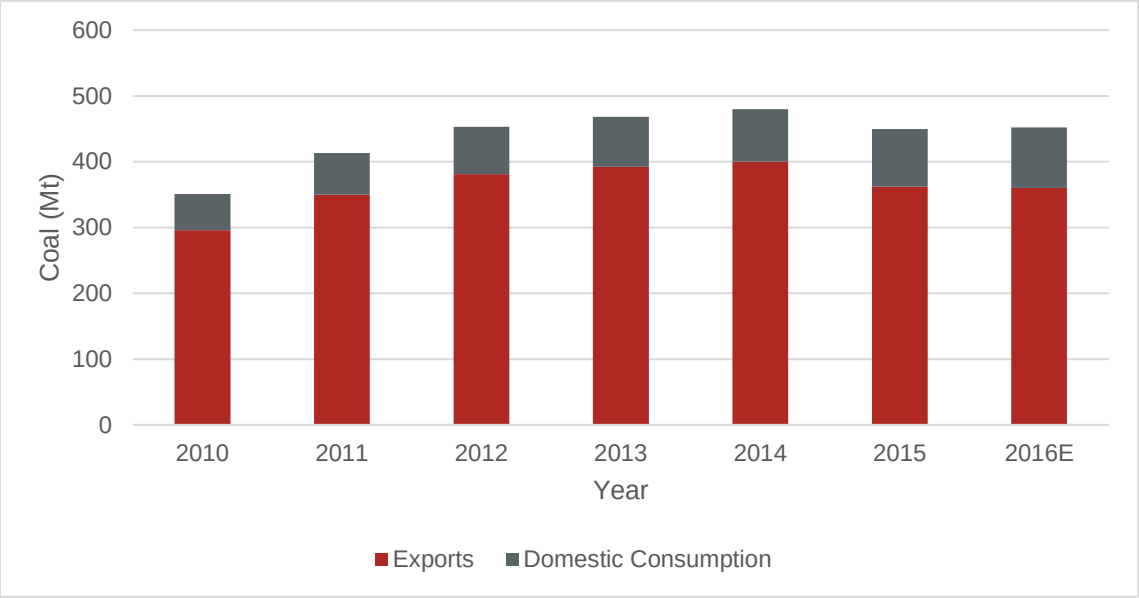
Three major factors have contributed to the strong growth of the Indonesian coal sector:

- Growing domestic and international demand for lower calorific value (CV) coals;
- Proximity to high growth markets of India and China; and
- Low capital and operating cost structure by international standards.

Indonesia is the world's largest exporter of seaborne thermal coal, producing over 466 Mt in 2015, and exporting 362Mt which accounts for more than 50% of the global seaborne thermal coal market, and nearly one and half times the next largest supplier, Australia with 203Mt.

Indonesian exports in 2015 fell for the first time in over a decade, down to 362Mt and expected to be flat in 2016. The decline in exports was led by shipments of thermal coal to India, which fell by 14.7 Mt, to 42.3 Mt. Indonesia plans to reduce its production target further in 2017, by 2.3%, to 409 Mt. The Indonesian government is encouraging miners to cut national production by 11% in 2016, to 419 Mt, down from 466 Mt in 2015.

Figure 10:2 Recent Trend in coal production and Exports from Indonesia



Data source: IHS, MEMR, Salva Mining

10.3 Coal Price Used for Project Assessment

The KIM Project produces coal which is sold in the domestic market. The sales price assumptions used in this study are based on domestic coal prices received for coal sold from the KIM project in the current market.

Salva Mining has reviewed the actual purchase orders and sales contracts for coal sales for the past two years. These sales' documents covered a sales' volume of approximately 1.5 Mt. The sales' contracts and purchase orders specified a coal at a range of prices from 600,000 IDR to 650,000 IDR per tonne at a base CV of 4,900 kcal/kg on a gross as received basis. These sales' contracts are linked with the fuel index in Indonesia (which is a proxy for petrol and diesel prices in Indonesia).

After weighting by contract volumes, adjusting for actual CV produced and adjustment for the prevailing exchange rates, the historical contract rates and volume, the following base rates for sales prices of the KIM coal was determined as per Table 10:2.

Table 10:2 Contracted Price - KIM Coal

Year	Price (IDR)
2012	600,000
2013	610,000
2014	610,000
2015	610,000
2016	600,000

Salva Mining does not see any reason why there will be any difficulties marketing the coal from the KIM project as a domestic thermal coal. At present, the primary markets for this coal

are paper and pulp mills located in Sumatra. The users of the KIM coal in the recent past have been:

- PT Lontar Papyrus Pulp and Paper Industry mill located in Jambi (LPPPI); and
- PT Indah Kiat Pulp and Paper mill located in Perawang, Riau (IKPP).

However, moving forward, some of the coal produced from the KIM Project may also go into nearby power plants which are currently operating or under construction. These include:

- PLTU, Ombilin (100 MW);
- PLTU, Jambi (2 x 400 MW);
- PLTU, Teluk Sirih & Pesisir, West Sumatra (224 MW);
- PLTU, Baturaja (20 MW) and
- PLTU, Muko-Muko (8 MW).

Salva Mining also reviewed the economics for export sales from the concession. It was found that with the assumed mining costs for the operation, the margins for export sales were lower than domestic sales for current and forecast coal prices. Coal exporting is considered to be less attractive at current coal prices, although this situation may change in the future as export prices increases. Moving forward, the exports of coal from the KIM project is expected to commence only if margins for export sales are more than margins for domestic coal. In such circumstances, the price of export coal will be more than domestic coal.

The KIM project is predominately a domestic coal supply project where the price is linked with the Indonesian fuel Index (proxy for diesel prices). Price forecast is based on the actual contracts which are being realized by the company at present.

Although the Indonesian domestic coal price has increased recently, when expressed in Indonesian Rupiah (IDR) but in reality it has fallen in US$ term mainly because of higher depreciation of the IDR compared to the US Dollar (US$). We have actually taken coal price towards the lower end of the recent US$ prices. Below is the recent coal price when converted into US$.

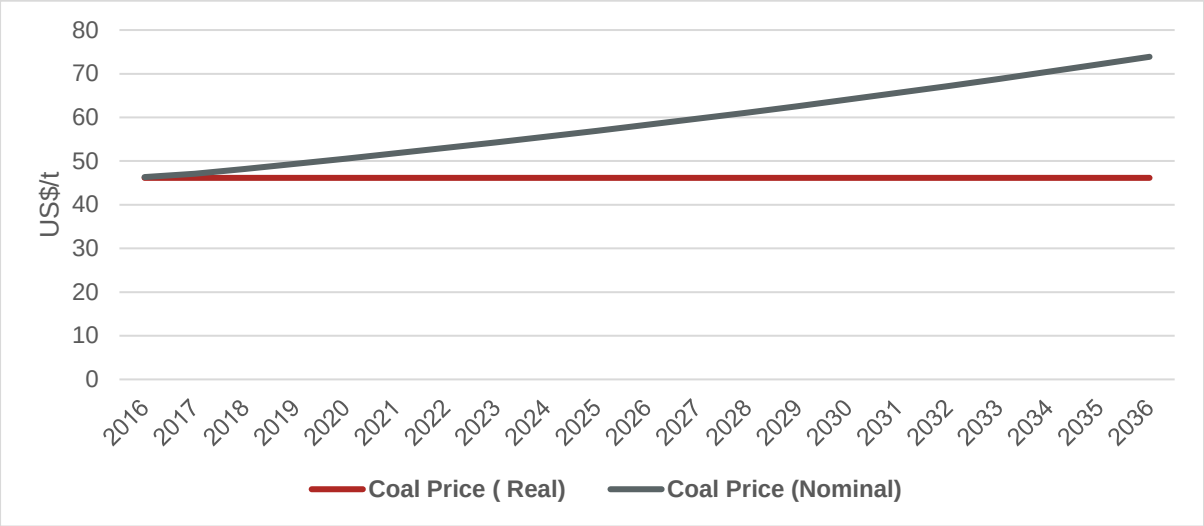
Table 10:3 Contracted Price in US$

Year	Average Exchange Rate (IDR: US$)	Contracted Price (IDR)	Coal Price (US $)
2016E	13,000	600,000	46.2

To determine the long term price forecast for the KIM Mine, Salva Mining has used the most recent contract price which is considered to be the most appropriate estimate of coal price. Therefore, in Salva Mining's opinion, for the purpose of valuation it is appropriate to use current actual contracts as the basis of coal pricing. While the current contracts are linked with the Fuel Index in Indonesia, Salva Mining has adopted a conservative approach for assessing a domestic coal price outlook for this project. The domestic coal price forecast has been assumed to stay flat in real terms (US $46.2/t) or increase at an annual rate of 2.4% over the

life of mine in nominal terms. The projected price for the KIM coal has been shown in Figure 10:3 below.

Figure 10:3 Domestic Coal Sales Prices ($/t)



11 Capital Cost

The KIM project is an operating mine with most of the mine infrastructure already established and in-place. Salva Mining has assumed mining operations to be continued using contractor's mining equipment. The capital cost and charges for these equipment have been factored in the contractor charges as operating cost. This is an industry standard practice in Indonesia and Australia.

The major capital required for the continuation of the project is linked with the land acquisition for the development of the mine over its life and the cost associated with the construction of dedicated road to link the Kim Project with the existing Jalan WKS special road.

The total capital cost estimate for KIM Project including road logistics is estimated to be US $38M which includes a contingency of US $5M. A contingency of 15% has been included in the capital cost estimate. These estimated are considered to have an accuracy of ± 15%.

In addition to the expansion capital of US $38M, Salva Mining has factored 3% of the invested capital apart from land purchase cost as sustaining capital per annum for asset maintenance over the life of mine.

While preparing these estimates, Salva Mining has relied on industry benchmarks, internal database, internal studies and expertise on the KIM concessions. The capital costs for road construction is considered to be relatively well understood, although a conservative approach to estimating these costs has been taken.

In line with the standard industry practice, mine closure costs have been taken as annual expense under operating cost estimates rather than as capital cost.

The Capital Cost estimates and the basis of its estimation are shown in Table 11:1. The cost estimate was prepared in Q3, 2016 in US dollars ($).

Table 11:1 Capital Cost (Real Terms)

Sr. No.	Particulars	Direct Cost ($M)	Contingency ($M)	Total Cost ($M)
1	Land Compensation	13.5	2.0	15.5
2	Haul Road Construction	19.5	2.9	22.4
	Total Project Capital	**33.0**	**5.0**	**38.0**

11.1 Basis of Estimation

Basis of estimation for the major cost elements have been given below.

11.1.1 Project Currency and Foreign Exchange

The project capital costs are expressed in United States dollars ($) with the following provisions:

- Costs are based on current market conditions as in Q3, 2016;
- Costs submitted in other currencies have been converted to US $. Foreign currency exchange rates applied to the capital cost estimate relative to the US $ are set out as US $1.00 = IDR 13,000; and

- No provision has been made for variations in the currency exchange rates.

11.1.2 Duties and Taxes

Duties and taxes including VAT for the capital items are included in the estimate unless otherwise noted.

11.2 Land Acquisition

Salva Mining has been advised that most of the land over the mining area over the KIM concession is already owned by the company. Some additional land will be required to be acquired for the life of mine production.

Land acquisition cost have been estimated on the basis of US $30,000 per ha for the total requirement for the project (calculated from the mine plan). The estimates of US $30,000 per ha can be considered as a conservative estimate for this area and allows a cover for rubber and palm oil plantations. A total of approximately 450 ha of land requirement have been estimated over the life of mine Reserves covering land required for pit and dumps.

11.3 Haul Road Construction

Total Cost associated with the construction of the dedicated special road for connecting the KIM Project with the existing Jalan WKS special road is estimated at US $22.4M, including a contingency of US $2.9M. Design and construction time is estimated at 30 months. The road construction cost was estimated at US $300,000 per km. An additional contingency of 15% has been factored in the estimate of capital expenditure. This is considered appropriate for a road suitable for trucks of up to 30 tonne capacity.

11.4 Mine Reclamation

In line with the standard industry practice, mine closure costs have been taken under operating cost estimates.

11.5 Exclusions

The following items are excluded from the capital cost estimate:

- Refundable taxes and duties;
- Currency fluctuations;
- Lost time due to severe weather conditions;
- Lost time due to force majeure;
- Additional costs for accelerated or decelerated deliveries of equipment, materials and services resultant from a change in project schedule;
- Any project sunk costs including this study;
- Community relations; and
- Owner’s risk and exposure.

11.6 Capital Phasing

Based on the requirement of the project, capital expenditure for the major items has been distributed over the ramp-up period. The capital expenditure over the life of mine is shown in Table 11:2 below.

Table 11:2 Capital Cost Phasing (US $M, Real Terms)

Capital Item	2016	2017	2018	2019	2020	2021	Total
Land Compensation	0.8	2.3	3.1	3.1	3.1	3.1	**15.5**
Haul Road Construction	0.0	6.7	7.8	7.8	0.0	0.0	**22.4**
Site Infrastructure	0.0	0.0	0.0	0.0	0.0	0.0	**0.0**
Total	**0.8**	**9.1**	**11.0**	**11.0**	**3.1**	**3.1**	**38.0**

12 Operating Cost

12.1 Method of Estimation

Overall operating costs are a combination of mining costs, crushing & handling costs, product transportation and general and administrative (G&A) costs.

These costs are based upon information obtained from the following sources:

- Existing contracts;
- Pre-feasibility studies;
- Budgetary quotations;
- Salva Mining projects database; and
- Experience of Salva Mining staff with other similar operations in the region.

Where specific data does not exist, cost allowances have been based upon consumption and operating requirements from other similar properties for which reliable data exists. The operating costs have been estimated and presented with an added contingency allowance of 5%. All costs are presented in real terms (Q3, 2016 dollars). Costs are exclusive of taxes unless otherwise noted. For the purpose of estimation, Fuel price delivered to the site and exchanged rate assumed for the purpose of estimation is as followed:

- Fuel Price US $0.70 / litre; and
- Exchange Rate IDR 13,000 / US $.

In Salva Mining's opinion, all operating cost estimates are reasonable at this stage of project assessment given the size and stage of the project.

12.2 Items included in the Operating Cost Estimates

Coal is mined at the KIM Project by conventional open pit mining method using truck and excavator combination. It is envisaged to continue the use of mining contractors to exploit coal and overburden. Following cost elements were considered by Salva Mining:

- Land Clearing and Top Soil Removal: Clearing of land and removal of top soil in the process of mining, generally taken on the basis of $/ha of the area.
- Mining – Waste / Overburden: Cost per BCM of waste removed;
- Mining – Coal: Cost per tonne of extracting coal;
- Labour cost: Cost per tonne towards salary and wages to the company staffs;
- Trucking (Haul to Stockpile): Cost per tonne km to haul to port stockpile using specialist coal haulage trucks;
- Trucking (Haul to End User): Cost per tonne km to haul to end user using coal haulage trucks;

Additional variable operational costs have also been assumed by Salva Mining which includes:

- Environment and Mine Closure: Cost per tonne for all associated expenditure related to environmental approval and reclamation;

- Royalties: Cost per tonne for royalty (5% of the sales price
- Local Government Tax; and
- Corporate Overheads.

Costs have been categorised into four different cost types

- Contractor Cost;
- Owner Cost;
- VAT; and
- Local Government cost and Royalties.

12.3 Contractor Costs

Salva Mining has assumed all contractor cost to be variable in nature. Variable contractor cost is the type of cost which typically varies with the changes in minable quantities and strip ratio. The variable contractor cost is generally based on unit contract rates where a rate is specified for a number of physical quantities which are physically measured on a periodic basis including area cleared, waste mined etc.

Salva Mining has assumed a contract mining operation in all the pits. Salva Mining's estimates are based on current contracts already in place at the mine, firm quotes, pre-feasibility studies and budget quotes.

Salva Mining notes that, there is a significant downward revision in contract mining quotes and new rates are more competitive. Salva Mining has assumed unit rates that are considered to be sustainable for both contractors and mine owners in the long term. Salva Mining has compared these against the industry benchmarks and estimated these to be reasonable. Table 12:1 below shows the contractor unit rates.

Table 12:1 Contractor Unit Rates (Real Terms)

Cost Item	Unit	Rate
Land Clearing	$/ha	1,400
Topsoil Removal	$/bcm	1.40
Waste Mining	$/bcm	1.40
Waste Overhaul	$/bcm/km	0.30
Coal Mining	$/t	0.70
Haul to ROM Stockpile	$/t km	0.10
Haul to Customer	$/t km	0.06

Note: All quoted cost in local currency is adjusted for fuel price and exchange rate.

12.4 Owner Costs

Salva Mining has assumed all owner cost to be variable in nature. Variable owner costs vary with the changes in physical quantities in the mine plan and are incurred by the company directly.

Salva Mining's estimates are based on current costs at the mine and pre-feasibility studies. The cost was compared with actual costs from other operations and then adjusted for the conditions and processes on the site. Salva Mining has determined these to be comparable against the industry benchmarks and estimated these to be reasonable. Table 12:2 shows the owners unit rates.

Table 12:2 Owner Unit Costs (Real Terms)

Cost Item	Unit	Rate
ROM Coal Handling	$/t	0.30
Mine Closure	$/ha	4,200
Environmental and Rehabilitation	$/t	0.05
Salary and Wages	$/t	0.25
Medical & Community Development	$/t	0.05
Corporate Overheads	$/t	0.25
Contingency	$/t	1.84

12.5 VAT

VAT is attributable on the variable component of contractor cost only. However, Salva Mining has taken a conservative approach and assigned a 10% VAT on all contractor costs rather than variable component only.

12.6 Royalties and Government Costs

The royalty is generally levied as percentages of sale proceeds to be applied for the different types of coal depending on its GCV and method of mining. However, different royalty rates have been adopted for different types of ownership structure which include: Contract of Work holders (CoWs) Coal Contract of Work holders (CCoW) Izin Usaha Pertambangan holders (IUP) and Izin Usaha Pertambangan Khusus holders (IUPK).

Tenure for the KIM project is held under a number of IUPs which have a royalty rate that is dependent on the air dried energy of the coal as sold. In the case of this coal, the Royalty Rate is expected to be 5% of the total revenue for the average coal produced as the air dried energy is greater than 5,100 kcal/kg and less than 6,100 kcal/kg. In addition to this Salva Mining has allowed an amount of US $ 0.25 per tonne to cover local government fees and charges.

Salva Mining assumed that future benchmark prices will be equal to or lower than the forecast prices used in this study and thus the forecast coal price has been used for the calculating royalty payments.

12.7 Overall Operating Cost

Total operating costs per tonne of coal product including royalty for the KIM Project has been estimated as US $40.90 per tonne over the life of the mine. The cost components for the different heads have been given in Table 12:3 below.

Table 12:3 Average Unit Operating Cost (Real Terms) over Life of Mine

Cost Item	$/t
Land Clearing	$0.01
Topsoil Removal	$0.03
Waste Mining	$13.24
Waste Overhaul	$1.55
Coal Mining	$0.70
Haul to ROM Stockpile	$0.37
ROM Coal Handling	$0.30
Haul to Customer	$16.43
Mine Closure	$0.04
Environmental and Rehabilitation	$0.05
Salary and Wages	$0.25
Medical & Community Development	$0.05
Corporate Overheads	$0.25
Local Government Fees	$0.25
VAT	$3.23
Contingency	$1.84
Operating Cost Excl. Royalty	$38.59
Royalty	$2.31
Operating Cost incl. Royalty	$40.90

Salva Mining has compared these against the industry benchmarks and estimated these to be reasonable.

13 Financial Analysis & Project Valuation

The KIM Project as an advance stage mining project and in Salva Mining's opinion, it is appropriate to use the discounted cash flow (DCF) method as the primary method to determine the technical value of the project. In the forming over opinion of valuation, Salva Mining has not applied any premium or discount to the technical value to determine the market value on the basis of strategic, market related or any other special factors.

13.1 Modelling Methodology & Considerations

The valuation model for the KIM Project was developed in Microsoft Excel. Valuation has been derived from analysis of cash flows calculated for the project over the life of mine. The valuation was designed so that input parameters could be varied to investigate different scenarios to determine an estimated valuation range. Salva Mining has adopted the following considerations in its financial model:

- The model is developed in nominal terms. All cost and prices were considered in real terms and then converted to nominal terms;
- The model assumes continuous cash in and outflows, which are reflected in mid-point discounting during a period;
- Cash flows was developed on stand-alone project basis;
- Sunk cost (including acquisition costs) is excluded; and
- All future cash flows were discounted using WACC.

13.2 Base or Preferred Case

A base case valuation was developed using the assumptions discussed in various section of this report. Key inputs are summarised in Table 13:1 while the summery of the financial model for the base case has been presented in Table 13:2 below.

Table 13:1 Base Case – Key Input Parameters

Key Parameters	Description	Unit	Value
Peak Production capacity	Maximum annual production capacity	Mtpa	3.0
Life of Mine Considered	Years of coal production	years	21
Discount Rate	Discount rate (nominal terms)	%	10.5%
Corporate Tax Rate	Indonesian corporate tax rates	%	25.0%
Project Coal Price	Aver. price for LRC Coal (real terms)	$/t	$46.2
Capital - Project	Total project capital expenditure (real terms)	$M	$38.0
Capital - Sustaining	Total ongoing replacement capital (real terms)	$M	$10.6
Coal Mined	Coal mined over life of mine	Mt	57.2
Stripping Ratio	Aver. ratio of waste: coal	bcm:t	9.5x
Waste Mined	Waste mined over life of mine	Mbcm	541
Operating Cost Excl. Royalty	Aver. operating cost (real terms)	$/t	$38.59
Royalty	Aver. royalty (real terms)	$/t	$2.31
Operating Cost incl. Royalty	Aver. operating cost including royalty (real terms)	$/t	$40.90

Table 13:2 Base Case – Financial Model

Item	Units	LOM	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036
Coal Mined	Mt	57.2	1	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	0
Waste Mined	Mbcm	541.1	8	25	25	31	32	33	33	33	33	33	33	29	23	23	23	24	24	25	25	26	3
Stripping Ratio	bcm:t	9.5	10	10	10	10	11	11	11	11	11	11	11	10	8	8	8	8	8	8	8	9	9
Product	Mt	57.2	1	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	0
Revenue	$M	3,370.5	39	118	121	148	152	155	159	163	167	171	175	179	183	188	192	197	202	206	211	216	30
Operating Cost	$M	2,803.2	33	100	102	128	132	138	141	145	148	152	157	151	140	144	147	155	158	164	168	174	24
Royalty	$M	168.5	2	6	6	7	8	8	8	8	8	9	9	9	9	9	10	10	10	10	11	11	1
Total Cost	$M	2,243.3	35	106	108	136	140	146	149	153	157	160	166	160	150	153	157	164	168	174	178	185	26
EBITDA	$M	398.8	4	12	12	12	12	9	10	10	10	10	9	19	34	35	35	32	33	32	33	31	4
Cash Margin	$/t	7.0	4	5	5	4	4	3	3	3	3	3	3	6	11	12	12	11	11	11	11	10	10
Depreciation	$M	37.3	-	0	0	1	1	1	1	1	1	2	2	2	2	2	2	2	2	3	3	4	4
Taxable Income	$M	361.4	4	12	12	12	11	8	8	8	9	9	7	17	32	33	33	30	31	30	30	27	- 1
Corporate Tax	$M	90.4	1	3	3	3	3	2	2	2	2	2	2	4	8	8	8	8	8	7	7	7	- 0
EARNING AFTER TAX	$M	271.1	3	9	9	9	8	6	6	6	6	7	5	13	24	24	25	23	23	22	22	20	- 0
Depreciation	$M	37.3	-	0	0	1	1	1	1	1	1	2	2	2	2	2	2	2	2	3	3	4	4
Working Capital Adj.	$M	-	- 1	- 2	- 0	- 1	- 0	0	- 0	- 0	- 0	- 0	0	- 1	- 1	- 0	- 0	0	- 0	- 0	- 0	0	7
Capital Expenditure	$M	53.9	1	9	12	12	4	4	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Unlevered Cash Flow	$M	254.5	1	- 3	- 3	- 3	5	3	7	7	7	7	6	13	24	25	26	24	24	24	25	24	10
Discounted Cash Flow	$M	64.7	1	- 3	- 2	- 3	4	2	4	4	3	3	2	4	7	7	7	5	5	4	4	4	1
Cumulative DCF	$M		1	- 2	- 4	- 6	- 3	- 1	3	7	10	13	15	20	27	34	41	46	51	56	60	63	65
NPV	$M	64.7																					
IRR	%	56%																					

13.2.1 Preferred Case Results

The results of the base case valuation scenario are shown in Table 13:3 below.

Table 13:3 Base Case – Financial Outputs & Valuation

Financial Summary (Nominal Terms)	$ M
Revenue	$3,371
Operating Cost	$2,803
Royalties Payment	$169
Corporate Tax Expenses	$90.4
Total Capital (including Sustaining Capital)	$53.9
Cumulative Free Cash Flows	$254.5
Net Present Value (NPV)	$64.7
Internal Rate of Return	56%

Under preferred case, using a nominal discount rate after tax of 10.5%, the Project NPV is determined as US $64.7M. The Internal Rate of Return (IRR) for the project has been determined as 56%.

The Project cash streams are shown in Figure 13:1 while discounted and cumulated discounted cash flows is indicated in Figure 13:2.

Figure 13:1 Cash Streams – Base Case

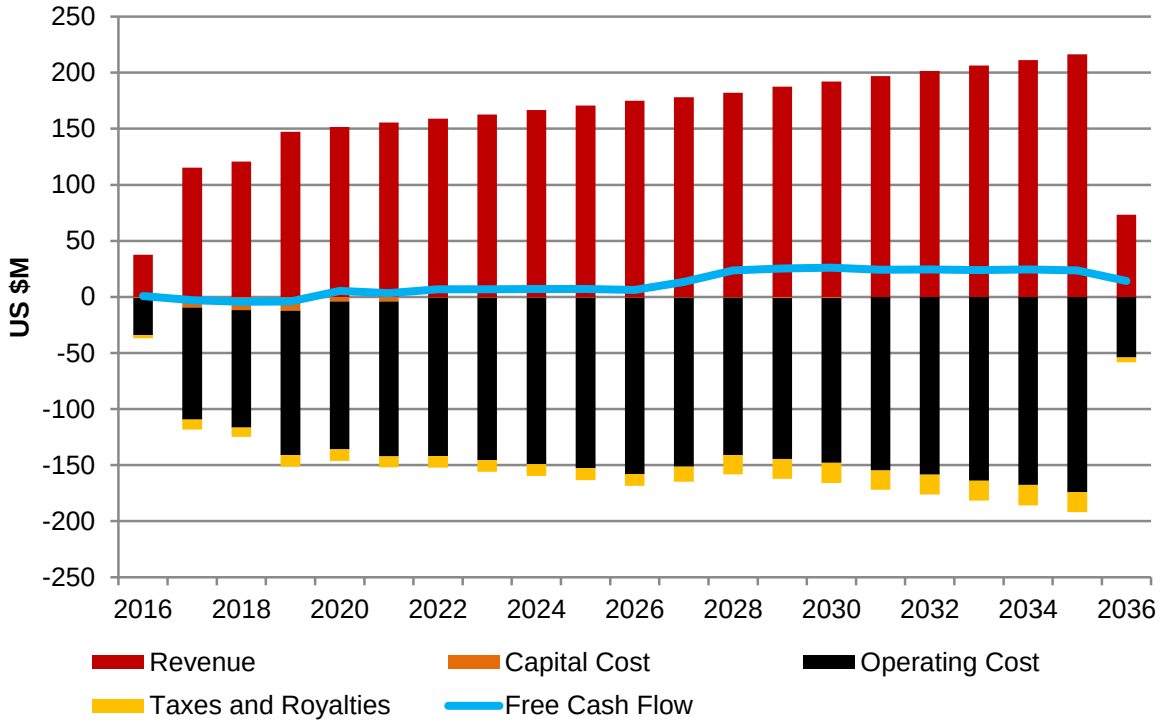
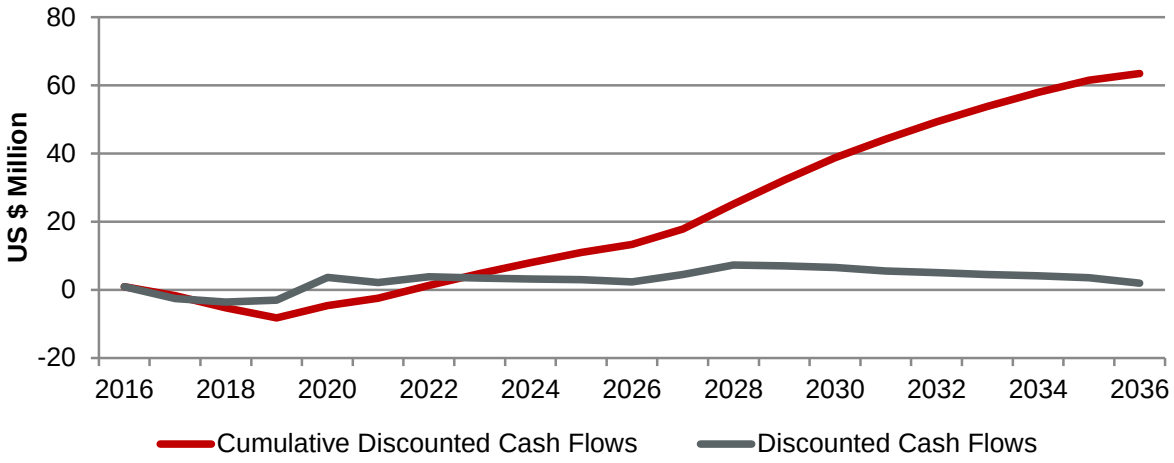


Figure 13:2 Discounted Cash Flow Profile – Base Case



13.2.2 Sensitivity Analysis

Sensitivity of the project was assessed for key parameters like sales price, discount rate, operating cost and capital cost. Figure 13:3 exhibits the project sensitivity under base case.

Figure 13:3 Key Project Sensitivities

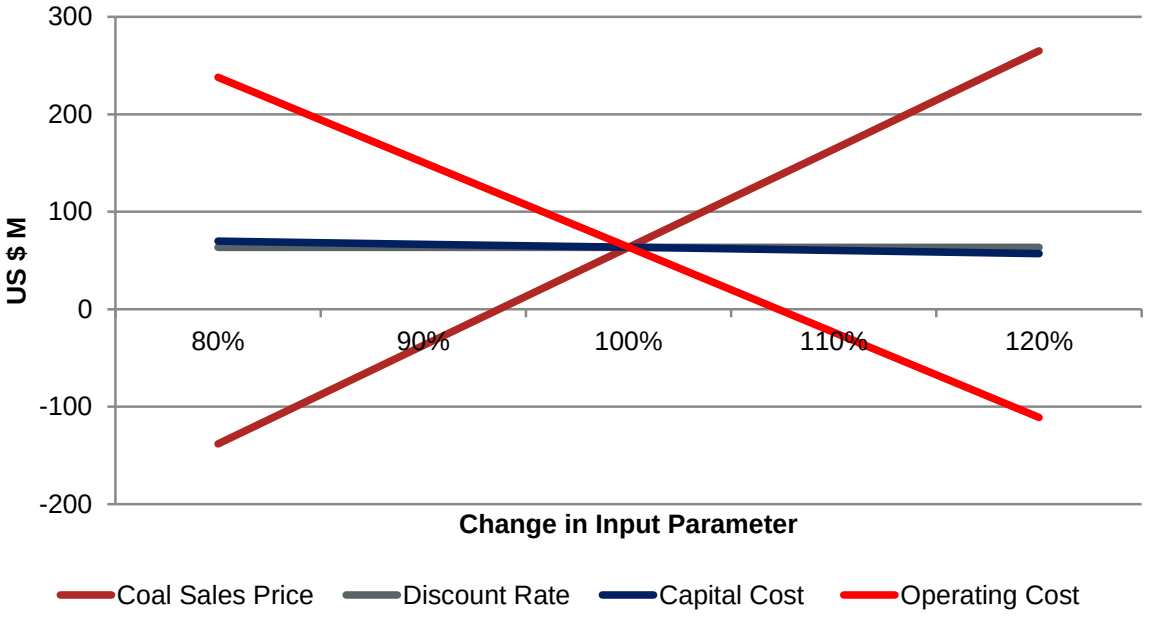


Table 13:4 outlines the impact of project NPV for change in the input parameters.

Table 13:4 Project NPV Sensitivity

Key Input Variables	Change in Input Parameter (%)				
	80%	90%	100%	110%	120%
Coal Sales Price	- 136.2	- 35.7	64.7	165.1	265.6
Discount Rate	64.7	64.7	64.7	64.7	64.7
Operating Cost	238.2	151.5	64.7	- 22.0	- 108.8
Project Capital Cost	71.1	67.9	64.7	61.5	58.3

As seen in the Table above, the KIM project is most sensitive to coal sales price, followed by any change in operating cost and then capital cost and discount rate.

13.3 Valuation Range

In order to determine the range of valuation estimates (low and high scenarios), a range of key inputs to the financial model were selected to reflect upper and lower values that are considered reasonable by Salva Mining for key input assumptions. Following assumptions were applied for development of low and high scenario:

- Low Case: While the KIM Mine complies with the logistics regulations, the mine can be shut if permission to haul coal on public road is not allowed along with management decision not to constructs special dedicated road.
- High Case: Price increases by 5% while operating cost decreases by 3%.

The results of the analysis for the low and high cases are shown in Table 13.5 below.

Table 13:5 Valuation Range

Key Outcomes	Unit	Valuation Range (US $M)	
		Low	High
Net Present Value (after Tax)	$M	0.0	141

13.4 Second Valuation Approach – Market Comparable Transaction Method

Salva Mining has considered market comparable transaction method as the secondary valuation method to assess value of the KIM Project.

Salva Mining identified seven (7) transactions involving operating mines in Indonesia (Table 12:6). The valuation range for these project ranged from $0.46/t to $36.36/t of ROM Coal Reserve.

While these projects are similar to KIM in coal quality but KIM is an existing mine with supply agreement with local customer and long production history. Sale of Binamitra Sumberata project by Altura Mining was the closest comparable Transaction.

In Salva Mining opinion, the valuation range derived from the Income Based NPV approach is appropriate as the implied valuation based on Income approach converts to the valuation range of $0.00/t to $2.47/t of Reserves with preferred value of $1.13/t of Reserves (Table 12:7).

Table 13:6 Valuation Range - $/t Reserve

Item	Market Value (US $M)		
	Lower	Preferred	Upper
Implied Valuation, $/t ROM Reserve	0.00	**1.13**	2.47
Net Present Value, 100% of Project Basis	0.0	**64.7**	141

Therefore, in Salva Mining's opinion, the valuation range and preferred value derived from the Income based approach is within the acceptable range of the comparable market transactions range as such, Salva Mining has used valuation derived from income based approach as the value of the project.

Table 13:7 Market Comparable Tarnsaction, Indonesian Coal Mines

Date	Seller	Buyer	Asset	Location	Trans. Value US$ M	Equity %	Prod. Mtpa	Reserves ROM Mt	Resource Mt	CV kcal/kg	Impl. Value		
											100% Proj US$ M	$/t Resource	$/t ROM Reserve
Oct-16	United Tractors	Suprabari Mapindo Mineral	Suprabari Mapindo Mineral	Central Kalimantan	46	80%	0.06	123	414	4600-6400	57	0.14	0.46
Jul-16	Geo Energy	International Resources Limited	Tanah Bumbu Resources	South Kalimantan	89	99%		44		4200	90		2.03
Jun-16	Adaro Energy	BHP	Indomet	Central Kalimantan	120	75%		4	1270	>6500	160	0.13	36.36
Feb-16	Geo Energy	Borneo Bara Resources	Parisma Jaya Abadi and Cahaya Lembusuana	East Kalimnatan	31	90%		3		6700	35		10.16
Feb-13	Altura Mining	PT Delta Ultima	Binamitra Sumberata	East Kalimantan	25	33%	1.5	0	57	4800	75	1.31	
Nov-12	Tata Power	PT Baramulti Sukses Sarana (BSS)	Baramulti Sukses Sarana (BSS)	East and South Kalimantan	123	23%	4	114	1068	5200-6500	527	0.49	4.62
Apr-12	PTT Mining	Sakari Resourcees	Subuku & Jembayan	South Kalimantan	960	55%		175	1586	5000-6300	1,758	1.11	10.06
												0.63	**10.62**

14 Valuation Summary

Salva Mining has estimated the valuation of the KIM concession using the assumptions and inputs detailed in this report. Salva Mining's opinion of the project value as at 31 August 2016 is shown in Table 13:6 below, which takes into account the high and low cases and the sensitivity of the project.

Table 14:1 Valuation Summary

Key Outcomes	Unit	Valuation Range (US $M)		
		Low	Preferred	High
Net Present Value (after Tax)	$M	0.0	64.7	141.0

14.1 Previous Valuation

The KIM project was previously valued in August 2014.

The current KIM valuation incorporates significantly higher Coal Reserve (62.2 Mt vs. 27.6 Mt) and higher cash operating margin ($5.3/t vs $4.4/t) along with reduction in WACC (10.5% vs. 11.5%) as the debt interest rates have declined significantly in the past 2 years. Table 13:7 below shows a breakdown of the difference in key input parameters and resultant valuation.

Table 14:2 Valuation - Comparison with Previous Estimate

Parameter	Valuation	Unit	Salva Mining Aug 2016 US$M	HDR Salva Aug 2014 US$M
Input Parameters	Coal Reserves	Mt	62.2	27.6
	Long Term Coal Price	US$/t	46.2	56.5
	Average Operating Cost	US$/t	40.9	52.1
	Average Cash Margin	US$/t	5.3	4.4
	Discount Rate	%	10.5	11.5
Valuation – BIB Project		US$M	64.7	26.0

15 Risk Factors & Opportunities

Salva Mining has identified a range of risk elements or risk factor which may affect the future operations and financial performance of the KIM Project. Some of the risk factors are completely external, which is beyond the control of management. However the project specific risk can be mitigated by taking proper measure in advance. Key Project risks that have been identified are discussed below.

15.1 Risk Factors

15.1.1 Resources And Reserves

Although the majority of coal included in the Life of Mine Plan contains Proved and Probable Reserves which was modelled from Measured and Indicated Resources respectively, a total of 12% of the coal in the pit shell is classified as Inferred Resources due to the lack of core samples and quality analysis.

Therefore, to mitigate the risk associated with the inclusion of the Inferred Resources and to be on conservative side, Salva Mining has scheduled total minable tonnes to be equal to the quantity of Proved and Probable Reserves only. In Salva Mining's schedule, the cumulative tonnes to be mined over the life of mine do not exceed the total Coal Reserves.

However, it is still considered possible that further exploration and technical studies may result in a reduction or an increase of Reserves which would have some impact on the value of the concession.

15.1.2 Geotechnical Risk

Although the design of pit slop angles have been based on Geotechnical studies that undertaken for the blocks in the KIM concession, but these studies are considered to be preliminary in nature. These studies were used to assess the general relationship between pit depth and overall slope angles for pit high walls.

Although Salva Mining has taken an appropriate factor of safety by maintaining large offset in the pit design, but further detailed geotechnical analysis is recommended for the final pit designs to ensure that there is an adequate factor of safety for the actual pit designs.

15.1.3 Coal Price Risk

Coal prices and the demand for coal are cyclical in nature and subject to significant fluctuations, and any significant decline in the prices of coal or demand for coal could materially and adversely affect the Company's business and financial condition results of operations and prospects. Coal markets are highly competitive and are affected by factors beyond the Company's control which include but not limited to:

- Economic conditions in Indonesia and globally;
- Government actions; and
- Fluctuations in industries with high coal demand such as Power Sector and other industries using thermal coal.

Although sufficient analysis and studies have conducted to ascertain future long term forecast, however, if there is a fall in long term prices, there would be a substantial reduction in the value of the project.

15.1.4 Impact on Weather on Production

Jambi has tropical climate with a high rainfall. During rain season, weather is expected to impact on the mining production due to the project being an open pit mining operation. The Company has mitigated this by allowing sufficient weather related non production days in mine schedule and by having sufficiently large coal stockpiles.

15.1.5 Mining Approvals, Tenure and Permits

A number of government permits and approvals are required to facilitate expansions of the KIM Mines and the associated infrastructure facilities. Any delays in obtaining the required approvals may affect the production expansion and the mine plan. This may likely to cause the project to overrun which may significantly affect project capital and operating costs.

The risk associated with the tenure of concession is considered to be significantly lower than many other nearby mines, as the tenure is held under a 2nd generation PKP2B that is valid for close to the entire planned mine life. The company must be studious in complying with all conditions of the contract to ensure that they maintain tenure and a good relationship with regulatory organisations.

15.1.6 Land Acquisition

Most mining operations in Indonesia are facing issues in acquiring land for their projects. Acquiring land and compensating land owners is considered to be a significant issue, especially in areas which are densely populated.

In order to achieve the value estimated in this study, KIM will need to identify key land owners in advance so that an appropriate settlement can be reached and no interruptions to the development of the project will occur. Land compensation will be required for mining areas, dumping areas and infrastructure construction. Salva Mining is not aware of any specific land compensation issues with the KIM concession at the current time that may affect this valuation. However, it is considered possible that delays to land compensation and associated interruptions to the project may occur in the future and that this may have a material impact on the value of the concession.

15.1.7 Environmental and Social Risks

While environmental and social risks have been identified and management plans are in place, it is possible that failure to comply with the environment criteria or failure to maintain good relationships with the local community will have an impact on project value. These risks are not considered to be greater for the KIM Project than for other operating coal mines operating in Indonesia.

15.1.8 Operational and Mine Safety

The Company reportedly operates in accordance with applicable laws and currently acceptable industrial practices. In addition, it conducts its operations in a responsible manner with regard to occupational and mine safety.

The project is subject to Indonesian laws and regulations regarding occupational and mine safety, which means that there are potential liability risks. Coal producers who fail to comply with safety regulations will be subject to penalties, including fines and suspension of the mining permit for the mine.

The proposed coal mining operations will be subject to several operational risks such as contractor performance, poor mining practice which may increase strip ratio, equipment failure, accidents etc. These unforeseen events have the potential to result in being unable to meet production targets and it can potentially increase cost of production.

15.1.9 Operating and Capital Costs Estimates

Some of the operating cost items considered for economic assessment is not based on the quotes from the actual contractor and these may change. However, in Salva Mining's opinion the upward escalation of these rates are unlikely in current circumstances. Since 2012, many contracts have been renegotiated at much lower rates and new contracts are more competitive. While Salva Mining has assumed unit rates that are considered to be sustainable for both contractors and mine owners in the long term, any occurrence of operating costs higher than the forecast costs would have a significant impact on the value of the KIM Project. To mitigate the risk associated with future price escalation, Salva Mining has allowed a suitable contingency in preparing the estimates.

Capital expenditure estimates are considered to be preliminary estimates based and is not based on detailed engineering design. These estimates depend on many factors and can be affected by a wide range of changing circumstances. These can vary from the worldwide demand for specific materials and components like steel, rubber, parts manufactured predominantly in certain parts of the world.

While the estimates are considered to be conservative, Salva Mining has factored a contingency of 15% to its capital estimate. Any increase in actual capital costs will have a significant impact on project value.

15.1.10 Political and Regulatory Risk

Since 2009, Indonesian mining has been governed by the Central Government's "New Mining Law", enacted to provide greater opportunity for the industry to expand to meet growing Asian demand. The Mining Law aimed to reflect the Government of Indonesia's (GoI) desire to recognise the financial benefits of its own natural resources, by ensuring that the GoI had greater input into resource extraction. The major developments from the 2009 Mining Law have been the Domestic Market Obligation (DMO) and Export Benchmark Pricing (HBA).

Some future regulations may include a coal export tax or ban on certain qualities, stricter coal road transportation rules and alignment of IUP and CCOW royalty rates. The actual implementation of these new aspects of the law is still unclear and many holders of these contracts are currently in negotiation with the Indonesian government regarding this issue.

Issues likes DMO, Coal upgrading requirements, Export taxes, Minimum Pricing Regulations and Foreign Ownership Restriction of the new law may affect the valuation of the KIM concession.

In our view, the likelihood of these being implemented is minimal. The value-adding requirement for mineral exports in Indonesia, enacted on 1 January 2014, which has had broad implications for the metals sector, is not applicable to the coal sector and so has had no apparent effect on coal industry.

15.1.11 Coal Haulage on Public Road

The Jambi provincial government in conjunction with regency governments from Jambi's major coal producing regions has agreed on a suspension of coal trucks using public roads, starting from 31 December 2012 (*Jambi Province Regulation No 13 Year 2012*). The provincial government is planning to construct an alternative route for coal trucks, in order to avoid resistance from coal producers in the area.

The Article 6, paragraph 1 and 2 of the Jambi Province Regulation number 13, year 2012, stipulates that "*in the event Special Road (dedicated haul road) is yet to develop or still unavailable to be utilised then hauling may be allowed through specific public road*".

Although the interpretation of this regulation is little ambiguous in nature, the government is likely to continue allowing hauling by public road where a coal company is developing an own dedicated haul road. If haulage is not allowed while the dedicated road is being developed, then this will have significant impact on the project and the project may have to be put on care & maintenance (Valuation – low case).

15.2 Opportunities

There are a number of options that the KIM Project may consider to reduce expenses and improve overall cost economics. These have not been incorporated into this study as there is insufficient engineering design and confidence in the suitability, operational and capital costs for such options. Further investigation and technical work on these options is currently underway and may allow for their inclusion in future valuations. Potential opportunities for improvement include:

- Additional uses of dozer push to dispose waste within the mined area itself. This could reduce excavation and haulage cost significantly;
- Deployment of large sized excavators and trucks with matching size to improve productivity;
- Dedicated trucks when dedicated haul road is commissioned;
- Investigation for the construction of mine mouth power plants;
- Detail Study to use Port Nilau to cater for export market; and
- Use of selective mining techniques.

16 References

Bloomberg Bond Yield, June 2016, [viewed 15 September 2016], <http://www.bloomberg.com/news/2014-01-07/indonesia-markets-dollar-bonds-at-yields-above-existing-notes.html>.

Indonesia Interbank Call Rate, June 2016, [viewed 15 September 2016], <http://www.tradingeconomics.com/indonesia/interbank-rate>.

PT SMG Consultants, "JORC Resource Statement, KIM Project, Prepared for Pt. Golden Energy and Mines", 21October 2013

PT SMG Consultants, "JORC Reserve Statement, KIM Project, Prepared for Pt. Golden Energy and Mines", 21October 2013

HDR Salva, "Independent Qualified Persons Report, KIM Project, Prepared for United Fibre Limited", 26 August 2014

VALMIN, 2015. Code for the Technical Assessment and Valuation of Mineral and Petroleum Assets and Securities for Independent Expert Reports (VALMIN Code) Available from: https://www.ausimm.com.au/content/docs/valmin_2005.pdf [Accessed: 15 May 2016].

JORC, 2012. Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves – The JORC Code – 2012 Edition [online], The Australian Institute of Mining and Metallurgy, Australian Institute of Geoscientists and Mineral Council of Australia. Available from: http://www.jorc.org/docs/jorc_code2012.pdf [Accessed: 15 May 2016].

LasutLay & Pane Advocates, Report On GEMS Mining Rights For KIM Coal Concessions dated 24 October 2016.

Appendix A – CVs

Person	Role
Manish Garg (Director - Consulting) / Partner	
Qualification	B. Eng. (Hons), MAppFin
Prof. Membership	MAusIMM; MAICD
Contribution	Overall Supervision, Valuation (VALMIN 2005)
Experience	Manish has more than 25 years' experience in mining Industry. Manish have worked for mining majors including Vedanta, Pasminco, WMC Resources, Oceanagold, BHP Billiton - Illawarra Coal and Rio Tinto Coal. Manish has been in consulting roles for past 5 years predominately focusing on due diligence, valuations and M&A area. A trusted advisor, Manish has qualifications and wide experience in delivering due diligences, feasibility studies and project valuations for banks, financial investors and mining companies on global projects, some of these deals are valued at over US$5 billion.
Grenville Davies (Principal Consultant - Geology)	
Qualification	B. Sc. (Hons), M.Sc. (Geology)
Prof. Membership	MAusIMM
Contribution	Resource (JORC 2012)
Experience	Grenville has more than 35 years of experience in most aspects of coal geology; including exploration, geological modelling, resource estimation, open cut and underground mine geology. He has worked for two of the major Australian software houses responsible for developing both Minex and Minescape as well as working for mining majors like BHP Billiton and consulting to major mining companies for both geological modelling. As a consultant he has worked on audits and due diligence for companies within Australia and overseas. He has strong expertise in data management, QA/QC and interpretation; reviews/audits of data sets, models and resource estimates.
Sunil Kumar (Principal Consultant - Mining)	
Qualification	B. Eng. (Mining)
Prof. Membership	MAusIMM
Contribution	Reserve (JORC 2012)
Experience	Sunil is a mining engineer with 25 years' experience in the mining industry across operations and consulting. His career spans 4 years in working in mining operations and about 21 years as a mining consultant primarily in the mine planning & design role which included estimation of coal reserves, DFS/FS, due diligence studies, techno-commercial evaluations and technical inputs for mining contracts. Prior to joining Salva Mining, Sunil was working as Principal Mining Engineer at Xstrata Coal. To date Sunil has worked on over 25 coal projects around the world, inclusive of thermal and coking coal projects in Australia, as well as in major coalfields in India, Indonesia, Mongolia and Mozambique.

Appendix B: SGX Mainboard Appendix 7.5

Cross-referenced from Rules 705(7), 1207(21) and Practice Note 6.3

Summary of Mineral Reserves and Resources

Name of Asset / Country: Kuansing Inti Makmur / Indonesia

Category	Mineral Type	Gross (100% Project)		Net Attributable to GEMS		Remarks
		Tonnes (millions)	Grade	Tonnes (millions)	Grade	
Reserves						
Proved	Coal	43	Subbituminous B	43	Subbituminous B	
Probable	Coal	14	Subbituminous B	14	Subbituminous B	
Total	Coal	57	Subbituminous B	57	Subbituminous B	
Resources*						
Measured	Coal	114	Subbituminous B	114	Subbituminous B	
Indicated	Coal	59	Subbituminous B	59	Subbituminous B	
Inferred	Coal	85	Subbituminous B	85	Subbituminous B	
Total	Coal	258	Subbituminous B	258	Subbituminous B	

** Mineral Resources are reported inclusive of the Mineral Reserves.*

Appendix C: Resource & Reserve Report