

AustCoal Consulting Alliance Client Briefing

1 Australian Coal Export Forecast to 2015 - Responding to Strong Demand from China and India

**A business intelligence report by
Bede Boyle
December 2010**

Report 1 - Australian Coal Export Forecast to 2015		Page
1	Methodology for Australia Export Coal Forecast to 2015	3
2	ABARE Forecast to 2015	3
3	Metallurgical and Thermal Coal Prices Strengthened in 2010	3
4	Commonwealth Bank – Mining & Energy Commodities Coal Price Forecast USD\$/tonne	4
5	Spot Market and Coking Coal Index Reports	4
6	Investment by China and India will accelerate growth	4
7	Australian Coal Export Forecast to 2015	5
	About the Author	6

Accompanying Reports:

Report 2 Queensland Coal Export Forecast to 2015
- Dependant on development of Critical Coal Export Infrastructure

Report 3 New South Wales Coal Export forecast to 2015
- Forging alignment of mines, rail and port infrastructure

Report 1 - Australian Coal Export Forecast to 2015

1 Methodology for Australia Export Coal Forecast to 2015

Australian Coal Export Forecast to 2015 is based on committed and planned expansion of coal mines, export terminals and rail system capacity in Queensland and NSW.

Producer forecasts of export tonnage, driven by strong metallurgical and thermal coal demand, significantly exceed terminal and rail system capacity and two accompanying reports provide details of coal export infrastructure developments in Queensland and NSW:

Report 2 Queensland Coal Export Forecast to 2015

- Dependant on development of Critical Coal Export Infrastructure

Report 3 New South Wales Coal Export forecast to 2015

- Forging alignment of mines, rail and port infrastructure

2 ABARE Forecast to 2015

Australia exported 274Mt of coal in CY2009, comprising 135Mt metallurgical and 139Mt thermal coal, accounting for approximately one third of global coal exports. Australia with 64% dominates metallurgical coal exports. In 2009 China imported a record 19Mt (15%) of Australian metallurgical coal.

In March 2010 ABARE forecast growth in Australia's exports from 274Mt in 2009 to over 390Mt in 2015 driven by the increasing coal demand from the emerging economies, particularly China and India. ABARE forecasts a 22% growth in metallurgical coal and 42% growth in thermal coal in that period.

The ABARE forecast of March 2010 is used as the basis for the following analysis and AustCoal Consulting Alliance upgraded forecast to 2015.

3 Metallurgical and Thermal Coal Prices Strengthened in 2010

In June 2010 ABARE reported that in April 2010, Australian coal suppliers and Japanese power utilities settled thermal coal contract prices at US\$98 a tonne for Japanese Fiscal Year 2010, an increase of around 40% from a year earlier. This increase mainly reflects the combined effect of improving economic activity in major importing countries in north ASIA such as Japan and Chinese Taipei, and continuing strong import demand from China and India.

Beginning in April 2010, prices for the majority of metallurgical coal from major producers were set on a quarterly basis which is a significant departure from the traditional annual price-setting system. Prices for the April to June quarter to Japanese Steel Mills was about US\$200 a tonne for high quality coking coal. This represented a 56% increase from the JFY2009 annual contract price. For the September quarter 2010, hard coking coal prices increased to around US\$220 a tonne.

4 Commonwealth Bank – Mining & Energy Commodities Coal Price Forecast USD\$/tonne

	FY10	FY11	FY12	FY13	FY14	FY15
Hard coking	147	238	255	226	204	189
Semi-hard coking	134	215	226	190	167	150
Semi-soft coking	104	175	187	154	136	118
LV PCI	110	181	191	158	139	122
Thermal	77	115	107	95	93	91

Source: - CBA Global Market Research 23 November 2010

5 Spot Market and Coking Coal Index Reports

Thermal coal prices have been indexed for the last 10 years reflecting the spot market for thermal coal. Prior to 2009 there was little spot market trade in Metallurgical Coal which was subject to annual price-setting negotiations between Japanese Steel Mills and Australian producers. However, the massive China demand in 2009 structurally changed the market and sellers led by BHP Billiton pushed for quarterly pricing.

Energy Publishing produces a weekly Coking Coal Index Report (CCQ Index) on FOB prices at Queensland ports that is based on the specifications of the top 20 Queensland coking coal brands. It represents the prompt physical spot market price FOB port in Queensland for premium hard coking coals. Prices of prompt physical transactions of non-premium hard coking coal products are included in the CCQ Index compilation with appropriate market-based price adjustments for quality.

6 Investment by China and India will accelerate growth.

A new driver of growth is the investment by China and India in Australian coal mines and export infrastructure. This investment will accelerate Australian export growth in metallurgical and thermal exports in Queensland and NSW.

Chinese Miner Yanzhou Coal acquired Felix Resources for A\$3.5billion and China Shenhua Energy Company is committed to pay up to \$675million to explore and obtain a mining lease for the Watermark Coal area in NSW

India's Gujarat NRE acquired and redeveloped two Hard Coking Coal Mines in the Southern coalfield of NSW and has already invested \$450million with further investment of \$350million in two longwalls to achieve production capacity of 6Mtpa. Gujarat NRE exports ROM coking coal for coal washing in India for coke making and has 16% equity in Port Kembla Coal Terminal.

In August 2010 Adani Enterprises acquired Linc Energy's Galilee Basin Carmichael tenement which contains about 8billion tonnes of low rank thermal coal for US\$3billion. Adani strategic intent is to secure thermal coal supply for India. Adani is proposing to invest US\$6.9billion in a 60Mtpa mine, rail and port project with first production targeted for 2014 and with a mine life of 80 to 100 years. This is the largest ever Indian investment in Australia.

7 Australian Coal Export Forecast to 2015

Coal Supply Demand Balance (1)	Calendar Year Export Forecast Mt						
	2009	2010	2011	2012	2013	2014	2015
Metallurgical Coal							
ABARE March 2010	135a	150	158	167	173	178	183
+5 to 10% to China				8	17	18	18
Total Metallurgical Coal	135a	150	158	175	190	196	201
Thermal Coal							
ABARE March 2010	139	146	150	160	176	185	207
+ high ash coal available to India		14	42	40	24	44	42
Total Thermal Coal	139a	160	192	200	200	229	249
Total Australia Exports	274a	310	350	375	390	425	450 (2)

(1) The coal supply demand balance is based on the following assumptions

- Strong China demand growth for metallurgical coal above ABARE forecast.
- Strong India demand growth for thermal coal above ABARE forecast.
- The price differential for metallurgical coal against thermal will drive coal preparation to achieve metallurgical coal specifications which will also produce higher ash thermal secondary products.
- The higher ash thermal coal will be acceptable to Indian customers.

(2) The forecast exports of 450Mtpa in 2015 is based on infrastructure capacity of 200Mtpa in NSW and 250Mtpa in Queensland.

	Calendar Year Export Forecast Mt						
	2009	2010	2011	2012	2013	2014	2015
Coal Exports from NSW & QLD							
NSW	107a	126	148	158	160	180	200
QLD	167a	184	202	217	230	245	250
Total Australia	274a	310	350	375	390	425	450
NSW by Coal Type							
Metallurgical Coal	25	30	33	35	35	36	40
Thermal Coal	82	96	115	123	125	144	160
Total NSW	107a	126	148	158	160	180	200
QLD by Coal Type							
Metallurgical Coal	110	120	125	140	155	160	161
Thermal Coal	57	64	77	77	75	85	89
Total QLD	167a	184	202	217	230	245	250

Corporate Strategies and Business Analysis for the Coal Industry

Bede Boyle

Corporate Strategies and Business Analysis (1994 -)

Bede employs a powerful blend of Business Analysis and Strategic Thinking to provide business intelligence for his clients including AGL, AMC Consultants – Coal & Energy, BHP Billiton, BlueScope Steel, Coffey Projects, Exxaro Australia, Fluor Australia, Laing O'Rourke, NSW FreightCorp, Genesee Wyoming Inc., Leighton Constructions, NSW Industry & Investment, Powercoal, Port Waratah Coal Services, Newcastle Port Corporation, NSW RailCorp, SMEC, WDS and Xstrata Coal.

Together with Dr Don Barnett, Managing Director of MINEC, who is internationally recognised as the leading independent analyst of the Australian Coal Industry, Bede provides Business Intelligence briefings and in house seminars on export and domestic Coal Market Supply / Demand Dynamics and Industry Cost Trends.

Chairman, AustCoal Consulting Alliance (2006 -)

www.austcoalconsulting.com

Bede formed a Strategic Alliance of 15 leading independent specialists and consulting firms who provide expert analysis and advice to the Australian coal and energy industry, international and domestic customers and equity investors. Key services include:

- Asset Divestment
- Asset Acquisitions
- Business Intelligence
- Due Diligence and Valuations
- Mine Planning and Development
- Coal Resource Acquisition Strategies
- Feasibility Studies and Project Funding
- Formation of International Joint Ventures
- Coal Supply and Demand Studies for Metallurgical & Thermal Coal

Manager Technical Services, Coal & Allied (1978 – 1994)

Bede was chairman and member of Coal & Allied Major Projects Committee which led planning and development of all major projects. He held leadership roles as project leader for Liddell Longwall Project and project coordinator for Hunter Valley No1 Mine development to 5Mtpa.

He provided technical support for Coal & Allied marketing to Japanese Steel Mills and Power Utilities and undertook annual coal production strategy studies aligned with market demand for metallurgical and thermal coal specifications.

Contact details:

Bede Boyle
Chairman
AustCoal Consulting Alliance
PO Box 500
Charlestown NSW 2290

ABN 12 648 515 865

Phone +61 (0) 419 213 010
Fax +61 (0) 24946 2332
boyle.bede@bigpond.com
www.austcoalconsulting.com