ASX ANNOUNCEMENT

18 January 2011

Results of Pilbara Iron Ore Prefeasibility Study

Prefeasibility Study (PFS) outcomes

- Mine life of 20 years
- Life-of-mine revenue ~A$25 billion
- Average life-of-mine cash operating cost estimated at A$35.32 / tonne
- Estimated Net Present Value ("NPV") of A$2.2 billion
- Large-scale, high quality Pilbara iron ore mine economically robust and technically viable
- Estimated capital cost of A$488m for 5 Mtpa Stage 1 development with an option to invest additional capital of A$641m to increase production up to 15 Mtpa
- Potential design and construction start during Q1 2012 with first production Q1 2014

PROJECT BACKGROUND

The Pilbara Iron Ore Project ("PIOP") is located 175 kilometres south of Dampier in Western Australia's Pilbara region and is wholly-owned by iron ore exploration and development company, Flinders Mines Limited (ASX: FMS "Flinders Mines" or "the Company").

The project contains a current Indicated and Inferred resource of 748 million tonnes ("Mt") at an average grade of 55.4% Fe, including two specific mineralised styles identified in the PFS that contribute to the economic viability of the project's Stage 1. These are a Direct Shipping Ore ("DSO") product comprising Brockman Iron Deposit ("BID") mineralisation, and a Detrital Iron Deposit ("DID") style requiring minor beneficiation prior to export.

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COMMENT BY FLINDERS MINES CEO, MR GARY SUTHERLAND:

"The PFS confirms that the Pilbara Iron Ore Project is economically viable and reinforces Flinders Mines' potential to become a substantial producer of iron ore in the Pilbara."

"The Project is ideally located within an active iron ore mining region of Western Australia and in close proximity to existing and planned infrastructure that provides options for product transport and export."

"It is self evident that increasing the production rate of the project to 15 Mtpa significantly enhances the financial outcome of the project."

"We will now forge ahead with optimisation studies, undertake drilling to further define the resource and progress infrastructure solutions for product export – all with the intention of proceeding to a Definitive Feasibility Study ('DFS') in the first half of this year in line with our objective for first production by early 2014."

KEY OUTCOMES OF THE PILBARA IRON ORE PROJECT PREFEASIBILITY STUDY

- The ore resource supports the production of more than 229 Mt of final fines product at an average grade of 60.7% Fe and 57.0% Fe for DID and BID products respectively.
- The BID product will be a DSO product with the DID product needing minor beneficiation prior to shipping.
- Mine planning studies have developed a 2.5:1 strip ratio for the 5 Mtpa start-up case that will produce a competitive product mix.
- Mine production is planned to commence at 5 Mtpa and be expanded after 5 years to 15 Mtpa and allows flexibility to commence at the higher production rate or increase production rate earlier in the mine life.
- Capital investment expenditure of A$488 million is estimated to be required to develop the Base Case, Stage 1, 5 Mtpa operation. The estimate includes owner's costs, EPCM ("Engineering, Procurement, Construction Management") and contingency costs.
- This expenditure includes provision for capital such that the future expansion to 15 Mtpa can be easily integrated into the facilities established under the 5 Mtpa case.

FINANCIAL MODELLING RESULTS

- Life-of-mine revenue over 20 years of greater than A$24.9 billion.
- A NPV after tax estimate of A$2,244 million calculated on a post-tax real basis at a Discount Cash Flow ("DCF") rate of 10%.
- Cash operating costs of A$35.32 / tonne for product delivered Free on Board to port.
- An ungeared Internal Rate of Return ("IRR") estimated at 40.8%.
- Forecast capital payback from completion of DFS of approximately 5.5 years.

MINE PRODUCTION

Integrated mine planning shows feasibility for the production of 229 Mt of saleable fines product. A traditional truck and excavator mining operation is planned. This presents a proven and flexible approach to operations and allows for optimal ore blending from operating pits. Site geology and hydrogeological studies show mining will be shallow and predominantly above the water table, both being reflected in a competitive mining cost base.

Scheduled average product grades are shown in Table 1.

Table 1

FINAL PRODUCT TONNES AND GRADES						
	Material Mt	Fe %	SiO2 %	Al2O3 %	P %	LOI %
DID product	97	60.70	5.85	3.47	0.066	2.98
BID product	132	57.05	5.17	2.97	0.117	9.52
Total product	229	58.59	5.46	3.18	0.095	6.76

The Pilbara project's 2010 October resource update included 110 Mt of Channel Iron Deposit (CID) material which was not previously included in resource estimates. Preliminary metallurgical investigations indicate there is a high likelihood this material is readily beneficiated and will further add to final product quantities. The testwork on this material is in progress.

CAPITAL COST ESTIMATE

Capital costs for the project's 5 Mtpa Stage 1 have been estimated by WorleyParsons with a peer review completed by Sinclair Knight Merz (SKM). The estimates summarised in Table 2 are based on supplier quotations and recent Pilbara industry data.

Table 2

Description	A$m
Direct Costs	
Mine buildings and ROM wall	17
Process plant	152
Rail and signalling	61
Infrastructure	114
Sub-Total Direct Costs	**344**
Construction Indirects	
Construction support and facility operation (Indirects)	24
Sub-Total Construction Indirects	**24**
Project Management and Other Costs	
EPCM	40
Owners costs	18
Contingency	62
Sub-Total Project Management and Other Costs	**120**
TOTAL	**488**

OPERATING COSTS

Operating costs have been estimated on the basis that all operating activities (mining, processing & transportation) will be contracted to suitably qualified suppliers. A competitive life-of-mine operating cost excluding royalties is estimated to be A$35.32 per tonne which is supported through a shallow deposit requiring minimal processing to produce saleable products. A summary of operating cost elements is shown in Table 3.

Table 3

	A$m/a	A$/t Ore
Mining	107.9	9.42
Processing	56.0	4.89
General and administrative	51.3	4.48
Product transport (FOB)	189.2	16.53
Total Costs	**404.4**	**35.32**

At this stage, the impact of the Federal Government's proposed Mineral Resource Rent Tax (MRRT) is unknown and has not been included in any financial analysis of the project. The impact of the MRRT will be considered once further details of the proposed but yet to be legislated tax, are understood.

ECONOMIC EVALUATION

The financial evaluation was completed using a discounted cash flow analysis on a real basis, using an after tax discount factor of 10%, with a range of sensitivities applied. The financial evaluation projected the outcomes as shown in Table 4.

Table 4

		NPV	IRR
Project Value – 20 yrs	AU$M	2,244	41%
Project Value – 10 yrs	AU$M	1,124	38%
Discount rate	10%		

Revenue forecasts were based on iron ore pricing developed by Ferrum Consultants Pty Ltd and a base foreign exchange rate of 0.963 USD/AUD. Iron ore market analysis predicts the current strong demand for iron ore to continue into the future. The pricing assumptions applied in the model are presented in Table 5.

Table 5

Year	DID Price (USD/dmtu) FOB	BID Price (USD/dmtu) FOB
2010	0.902	0.854
2011	1.714	1.622
2012	2.057	1.946
2013	2.160	2.044
2014	2.160	2.044
2015	1.836	1.737
2016	Ongoing same as 2015	Ongoing same as 2015

MARKETING

Market analysis undertaken by Ferrum Consultants Pty Ltd provided advice on product specifications and future value forecasts. More detailed marketing analysis will be carried out in the DFS and will include sintering testing and a full Value in Use analysis in order to more fully evaluate the suite of products.

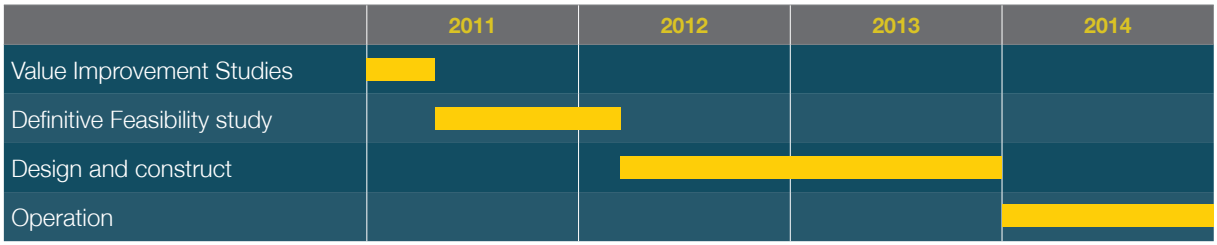
LOGISTICS

Financial analysis has included estimates of operating costs for access to existing and proposed third party Pilbara rail and port infrastructure. Whilst the infrastructure solution has not been finalised, Flinders Mines is confident it will achieve rail and port access solutions that will enable development of the resource with a path to market.

APPROVALS

A detailed approvals schedule has been completed and is supported through independent peer review. This confirms the path forward and a process linked to key engineering, construction and operational milestones.

ANTICIPATED PROJECT SCHEDULE



FUTURE WORK AND DEVELOPMENT OBJECTIVES

The Pilbara project's future work program is focussed on three key activites;

- Reaching agreement with potential providers of port and rail access that provides Flinders Mines with a path to market.
- Value improvement studies that have potential to further enhance project value.
- The upcoming drilling program in order to further define the PIOP resource.

GARY SUTHERLAND
CHIEF EXECUTIVE OFFICER

18 January 2011

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JORC Statement

The information relating to the terms "iron ore" and "direct shipping ore" should not be misunderstood or misconstrued as an estimate of an Ore Reserve as defined by the JORC Code (2004) and therefore the terms have not been used in this context. It is uncertain if further exploration or feasibility study will result in the determination of an Ore Reserve.

The information that relates to the drilling data and geological interpretations is based on information compiled by Nick Corlis who is a Member of The Australian Institute of Geoscientists and Exploration Manager of the Company. The information that relates to the Mineral Resource Estimate has been compiled by Mr Stephen Godfrey of Golder Associates Pty Ltd. who is a Member of the Australasian Institute of Mining and Metallurgy and the Australian Institute of Geoscientists. Both Mr Godfrey and Mr Corlis have sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity that they are undertaking to qualify as a Competent Persons as defined in the 2004 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Mr Godfrey and Mr Corlis consent to the inclusion in their names in the matters based on their information in the form and context in which it appears.

This release may include forward looking statements. These forward looking statements are based on Flinders Mines Limited's expectations concerning future events. Forward looking statements are subject to risks, uncertainties and other factors, many of which are outside the control of Flinders Mines Limited and the Company makes no undertaking to subsequently update or revise the forward looking statements made in this release to reflect events or circumstances after the date of this release.