



DEVELOPING STRATEGIC HIGH PURITY ALUMINA (HPA)
CADOUX KAOLIN PROJECT IN WESTERN AUSTRALIA

MAY 2019 | WWW.FYIRESOURCES.COM.AU | ASX:FYI

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The PFS referred to in this presentation is a study of the potential viability of the Cadoux Project. It has been undertaken to understand the technical and economic viability of the Project. The PFS is based on the material assumptions outlined in the PFS announcement released to ASX on 25 September 2018 and summarised in the Summary of Material Assumptions and Modifying Factors description and tables (appendix 2 and 3) attached to the PFS document. These include assumptions about the availability of funding. While the Company considers all of the material assumptions to be based on reasonable grounds, there is no certainty that they will prove to be correct or that the range of outcomes indicated by this PFS will be achieved. To achieve the range of outcomes indicated in the PFS funding in the order of US\$197 million will likely be required. Investors should note that there is no certainty that the Company will be able to raise the amount of funding when needed. It is also possible that such funding may only be available on terms that may be dilutive to or otherwise affect the value of the Company's existing shares. It is also possible that the Company could pursue other "value realisation" strategies such as a sale, partial sale or joint venture of the Project. If it does, this could materially reduce the Company's proportionate ownership of the Project. Given the uncertainties involved, investors should not make any investment decisions based solely on the results of the PFS. The contents of this presentation reflect various technical and economic conditions, assumptions and contingencies which are based on interpretations of current market conditions at the time of writing. Given the nature of the resources industry, these conditions can change significantly and without notice over relatively short periods of time. Consequently, actual results may vary from those detailed in this presentation. Some statements in this presentation regarding estimates or future events are forward-looking statements. They include indications of, and guidance on, future earnings, cash flow, costs and financial performance.

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"estimated", "expect", "intend", "may", "potential", "should", "projected", "scheduled", "anticipates", "believes", "predict", "foresee", "proposed", "aim", "target", "opportunity", "nominal", "conceptual" and similar expressions are forward-looking statements. Although the Company believes that the expectations reflected in these forward-looking statements are reasonable, such statements involve risks and uncertainties, and no assurance can be given that actual results will be consistent with these forward-looking statements. The contents of this release are also subject to significant risks and uncertainties that include but are not limited to those inherent in mine development and production, geological, mining, metallurgical and processing technical problems, the inability to obtain and maintain mine licences, permits and other regulatory approvals required in connection with mining and processing operations, competition for among other things, capital, acquisitions of reserves, undeveloped lands and skilled personnel, incorrect assessments of the value of projects and acquisitions, changes in commodity prices and exchange rates, currency and interest rate fluctuations and other adverse economic conditions, the potential inability to market and sell products, various events which could disrupt operations and/or the transportation of mineral products, including labour stoppages and severe weather conditions, the demand for and availability of transportation services, environmental, native title, heritage, taxation and other legal problems, the potential inability to secure adequate financing and management's potential inability to anticipate and manage the foregoing factors and risks. All persons should consider seeking appropriate professional legal, financial and taxation advice in reviewing this announcement and all other information with respect to the Company and evaluating the business, financial performance and operations of the Company. Neither the provision of this presentation nor any information contained in this release or subsequently communicated to any person in connection with this presentation is, or should be taken as, constituting the giving of investment or financial advice to any person. This presentation does not take into account the individual investment objective, financial or tax situation or particular needs of any person.

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COMPETENT PERSONS' STATEMENTS

The information in this report that relates to Ore Reserves is based on information compiled by Mr. Steve Craig, who is a Fellow of the Australasian Institute of Mining and Metallurgy. Steve Craig is a full-time employee of Orelogy Consulting Pty Ltd and has sufficient experience relevant to the style of mineralisation and type of deposit under consideration and to the activity which they are undertaking to qualify as a Competent Person as defined in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves". The information is extracted from the Ore Reserve announcement released 29 October 2018 and is available to view on the Company's website at www.fyiresources.com.au

The information in this report that relates to Mineral Resources is based on information compiled by Mr Grant Louw, under the direction and supervision of Dr Andrew Scogings, who are both full-time employees of CSA Global. Dr Scogings is a Member of the Australasian Institute of Mining and Metallurgy and a Member of the Australian Institute of Geoscientists. He is a Registered Professional Geologist in Industrial Minerals. Dr Scogings has sufficient experience relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as Competent Person as defined in the 2012 Edition of the "Australasian Code for the Reporting of Exploration Results, Mineral Resources, and Ore Reserves". The information is extracted from the PFS announcement dated 25 September 2018 and is available to view on the Company's website at www.fyiresources.com.au

The information in this report that relates to metallurgy and metallurgical test work is based on information reviewed and compiled by Mr Daryl Evans, a Competent Person who is a Fellow of the Australian Institute of Mining and Metallurgy (AusIMM). Mr Evans is an employee of Independent Metallurgical Operations Pty Ltd, and is a contractor to FYI. Mr Evans has sufficient experience that is relevant to this style of processing and type of deposit under consideration, and to the activity that he has undertaken to qualify as a Competent Person as defined in the 2012 Edition of the "Australasian Code for the Reporting of Exploration Results, Mineral Resources and Ore Reserves". Announcements in respect to metallurgical results are available to view on the Company's website at www.fyiresources.com.au.

The Company confirms that it is not aware of any new information or data that materially affects the information included in the original market announcements and that all material assumptions and technical parameters underpinning the findings in the relevant market announcements continue to apply and have not materially changed and that all material assumptions and technical parameters underpinning the estimate in the relevant market announcement continue to apply and have not materially changed. The Company confirms that the form and context in which the Competent Person's findings are presented have not been materially modified from the original announcement.

INTRODUCING FYI RESOURCES

FYI is aiming to become a dominant participant in the global HPA market



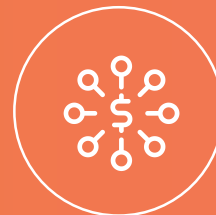
Developing the world-class Cadoux project with the goal of becoming a leading producer



Simplified, innovative and efficient flowsheet deriving HPA from kaolin



Located in a tier 1 mining jurisdiction in close proximity to infrastructure



The global HPA market is experiencing rapid demand growth that is forecast to continue



Outstanding PFS results: low opex and capex operation

Achievements



Metallurgical results exceeded 99.99% HPA targets



Process flowsheet optimised to reduce OPEX and CAPEX



Positive environmental study completed



Positive reception received from Asian HPA marketing trips



Delivered outstanding PFS for Cadoux



Commenced fully funded BFS for Cadoux

HIGH PURITY ALUMINA (HPA)



HPA is a processed premium non-metallurgical alumina product characterised by its purity level – i.e. 99.99% (4N), 99.999% (5N).



HPA is mainly used for its superior properties, such as corrosion and scratch resistance, high brightness, and its ability to withstand extreme temperatures.



Currently HPA is sourced from expensive feedstock, such as refined aluminium metal, using old processes, FYI plans to produce low-cost HPA from kaolin using optimised processing methods.



Applications include: light emitting diodes (LEDs), in the manufacture of artificial sapphire glass and in certain battery and power storage components, aeronautical and medical applications

HPA MARKET OVERVIEW

HPA FORMS A SIGNIFICANT PART IN HIGH-PERFORMANCE ELECTRONICS



Historically a small market – no justification for innovation



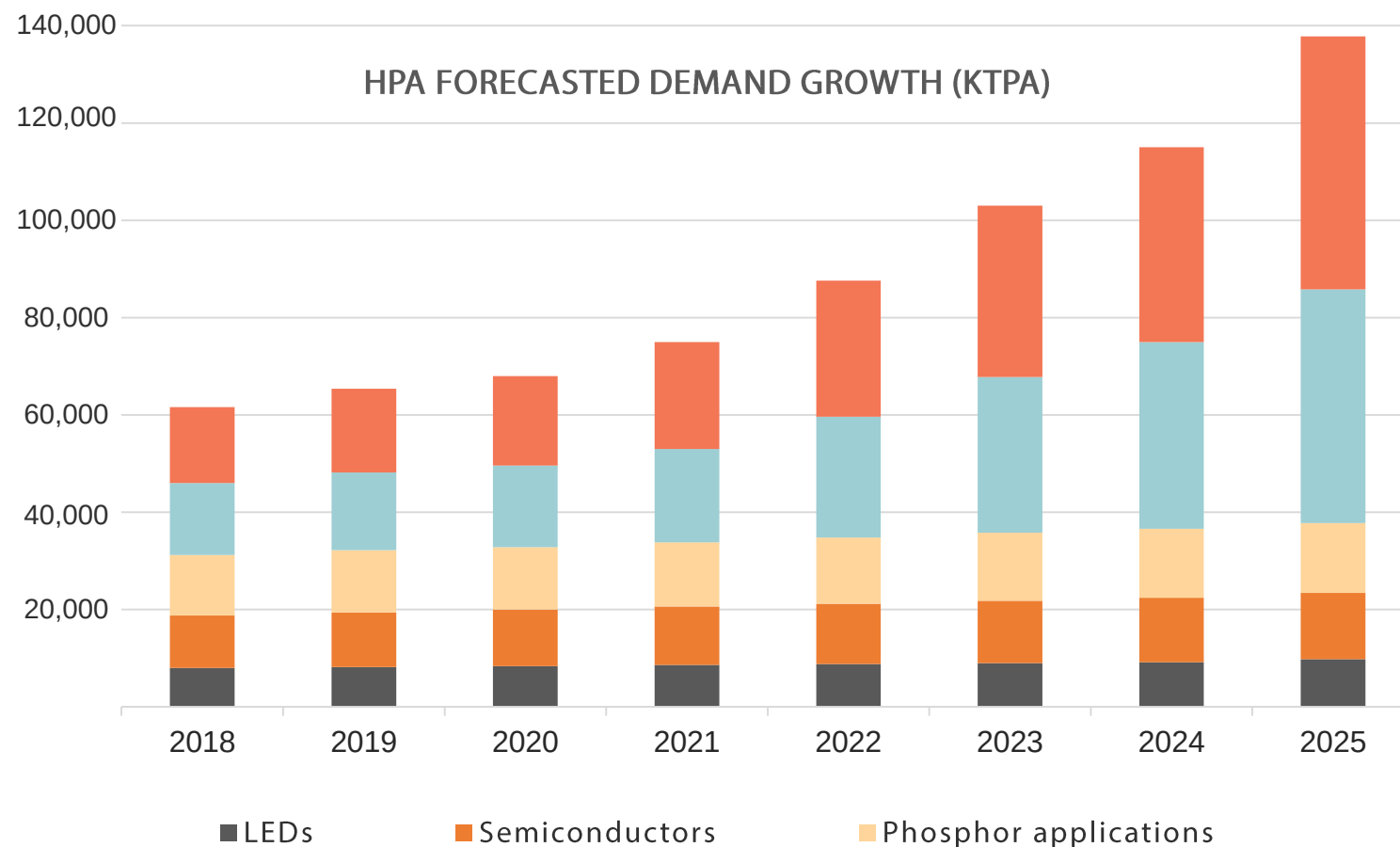
New applications have created demand and market opportunities



The current global 4N HPA market demand is ~38-40ktpa; this is expected to increase to ~60ktpa by 2020 and >120ktpa by 2025*



The market for HPA is witnessing dramatic consumer driven growth, with the HPA market forecasted to be US\$4.49Bn by 2022**



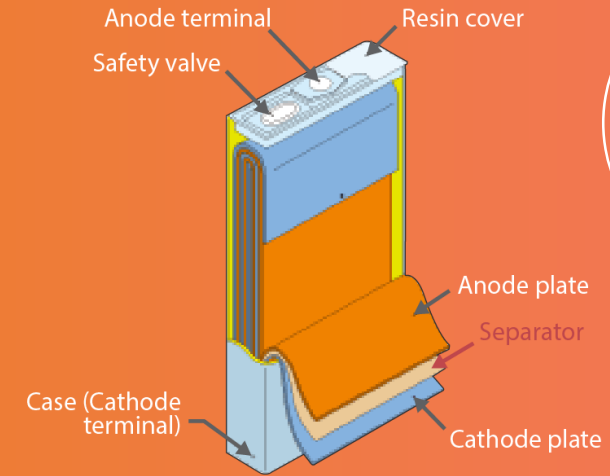
KEY HPA INDUSTRY CATALYSTS

EV/ Battery Revolution

- HPA is a major input into ceramic coated separators (CCS) in batteries
- Battery performance (energy density) is increasing dramatically
- Providing greater protection, battery integrity at much higher temperatures
- EV battery market forecast to grow from US\$450Mn (2016) to US\$35Bn (2025)*

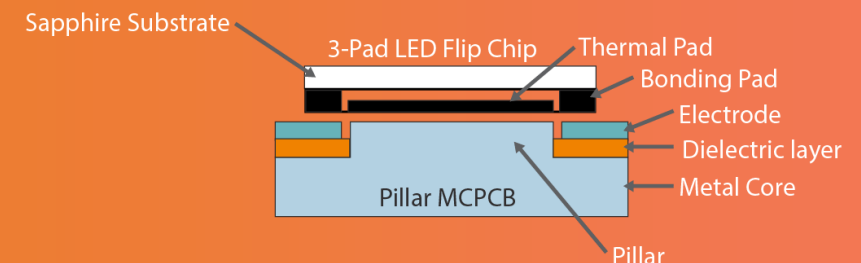
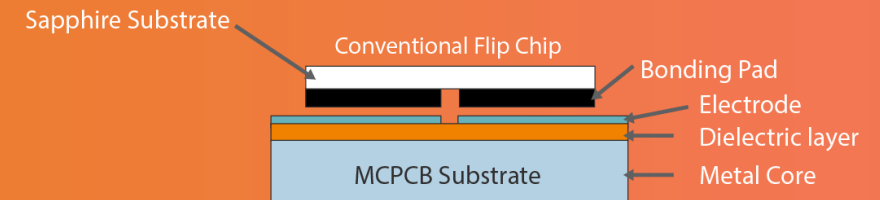
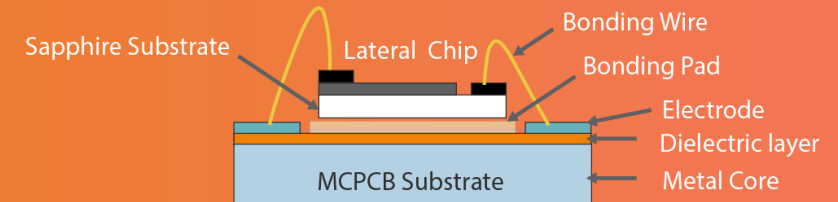
Light emitting diodes (LED)

- Increasing environmental awareness and strict Government power and emission policies
- Phasing out of old and inefficient technologies (eg incandescent, neon, halogen)
- Providing assurance of a reliable and consistent supply of HPA to manufacturers
- LED market is forecast to grow from US\$26Bn (2016) to US\$54Bn by 2022 and progressively take the major share of the global market of US\$110Bn**



Cross-Sectional view of lithium-ion battery

Key market areas driving long-term growth for HPA



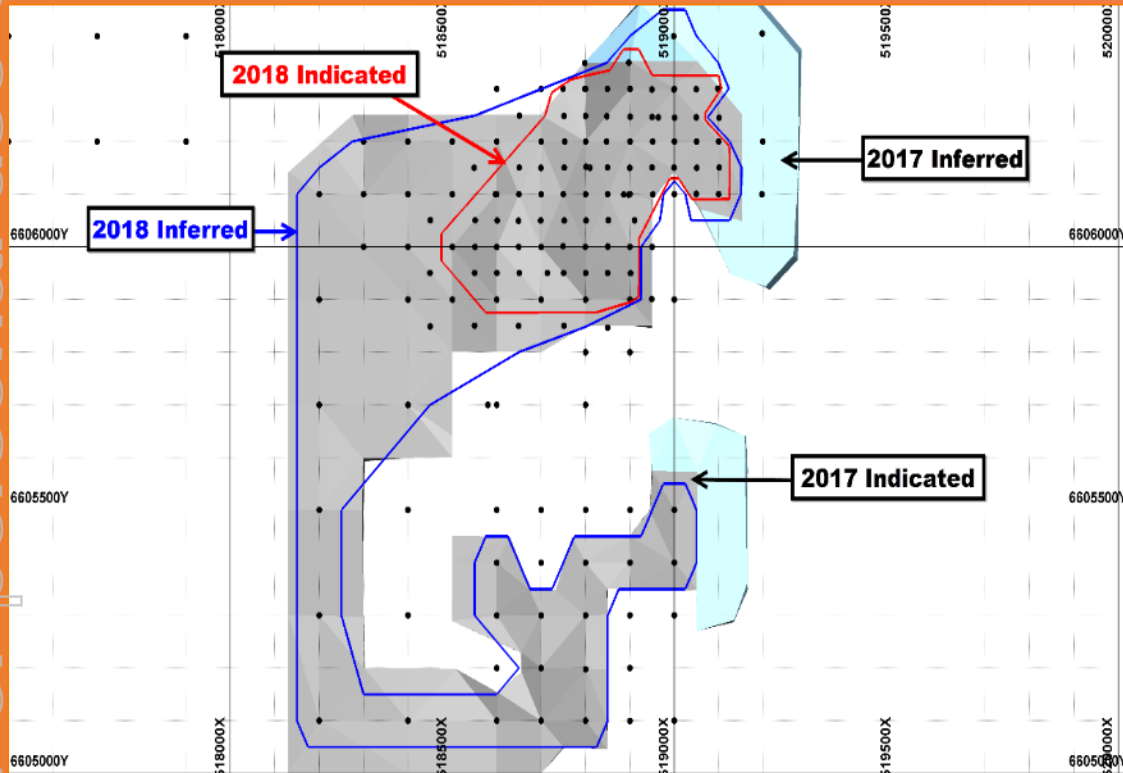
FYI HAS A RESOURCE IDEAL FOR HPA

- ⇒ The Cadoux Kaolin Project area boasts **excellent infrastructure**
- ⇒ **Deposit geology is ideal** – shallow, flat lying, low strip, free digging, homogenous excellent quality & easily accessible
- ⇒ Extensive drilling, **well understood geology and chemistry**
- ⇒ Completed detailed Mine Study
- ⇒ Ideal characteristics quality, grade and low deleterious elements – **very amenable to HPA processing**
- ⇒ 100% owned project area private land, no native title, minimal EPA. **Permitting straightforward.**
- ⇒ Maiden Reserve of 2.89 million tonnes grading 24.4% Al_2O_3 **supports PFS mine life of 25+ years**



QUALITY RESOURCE

CADOUX RESOURCE – QUALITY BASE



Cadoux resource outline

- Revised MRE specific to optimised HPA feedstock production
- First class study managers (qualifications & experience)
- Extensive representative and variability testwork
- Very well understood resource applied to flowsheet
 - Geology
 - metallurgy
- Resulting in excellent metallurgical response
 - Grade – 99.999% (*independently verified*)
 - Recovery – 97.2%
- Over 50 years mine life (PFS modelled on 25 years)
- Assuming 100% high confidence mining material

OUTSTANDING PFS DELIVERED (SEPT 2018)

ITEM	UNIT	AMOUNT
HPA production	tpa	8,000 (with capacity to expand)
Production grade	Al ₂ O ₃	> 99.99%
Capital cost	US\$m	178.8
Capital cost / t	US\$/t	22,344
Forecast average cost of production (C1)	US\$/t	6,467
Assumed HPA selling price / t	US\$/t	24,000
Operating margin	US\$/t	17,533
Operating margin	%	~270
Exchange rate	A\$:US\$	0.75
Average annual EBITDA	US\$m	128
First phase of operations - total revenue (> 50 years)	US\$m	11,376
First phase of operation - annual revenue	US\$m	190
Project NPV (@10%)	US\$m	506
Project IRR	%	46
Project payback	yrs	3.6

Market-leading project economics:

- Lowest sector quartile:
 - Opex - US\$6467/t
 - Capex - US\$178m
- Lowest capital intensity of US\$22,344/t
- All-in NPV_{10%} - US\$506m
- IRR of 46%
- High margin >US\$17,000/t
- Project payback of 3.6 years

Modelled using:

- Most conservative discount (10%)
- Conservative selling price (\$24,000)

STRONG FOCUS ON MARKET ENGAGEMENT



TOTAL HPA DEMAND FORECAST FOR 2025		
FORECASTER	DEMAND (TPA)	MULTIPLE (OF FYI PRODUCTION)
PERSISTENCE	62,000	7.8X
ALLIED	86,000	10.7X
CRU	125,000	15X
AVERAGE	91,000	11.3X

FYI IS HEAVILY ENGAGED IN PRODUCT MARKETING AND OFF-TAKE

- FYI heavily focused on market engagement
- Structured approach to achieving off-take and financing
- Multiple rounds of meetings conducted (China/Korea/Japan)
- HPA trial product to be shipped by request from market participants (HPA manufacturers, traders)

FUNDING OPTIONS

- FYI is examining a number of funding options to finance its future activities and development costs. These include:
- Off-take
 - Joint venture
 - Cornerstone investor
 - Project debt
 - Equity

FYI'S SIMPLE FLOWSHEET DESIGN



Low industry capex and low opex



Developed for Cadoux's exceptional quality and characteristics



Optimised designed for efficiency, heavy duty and long life



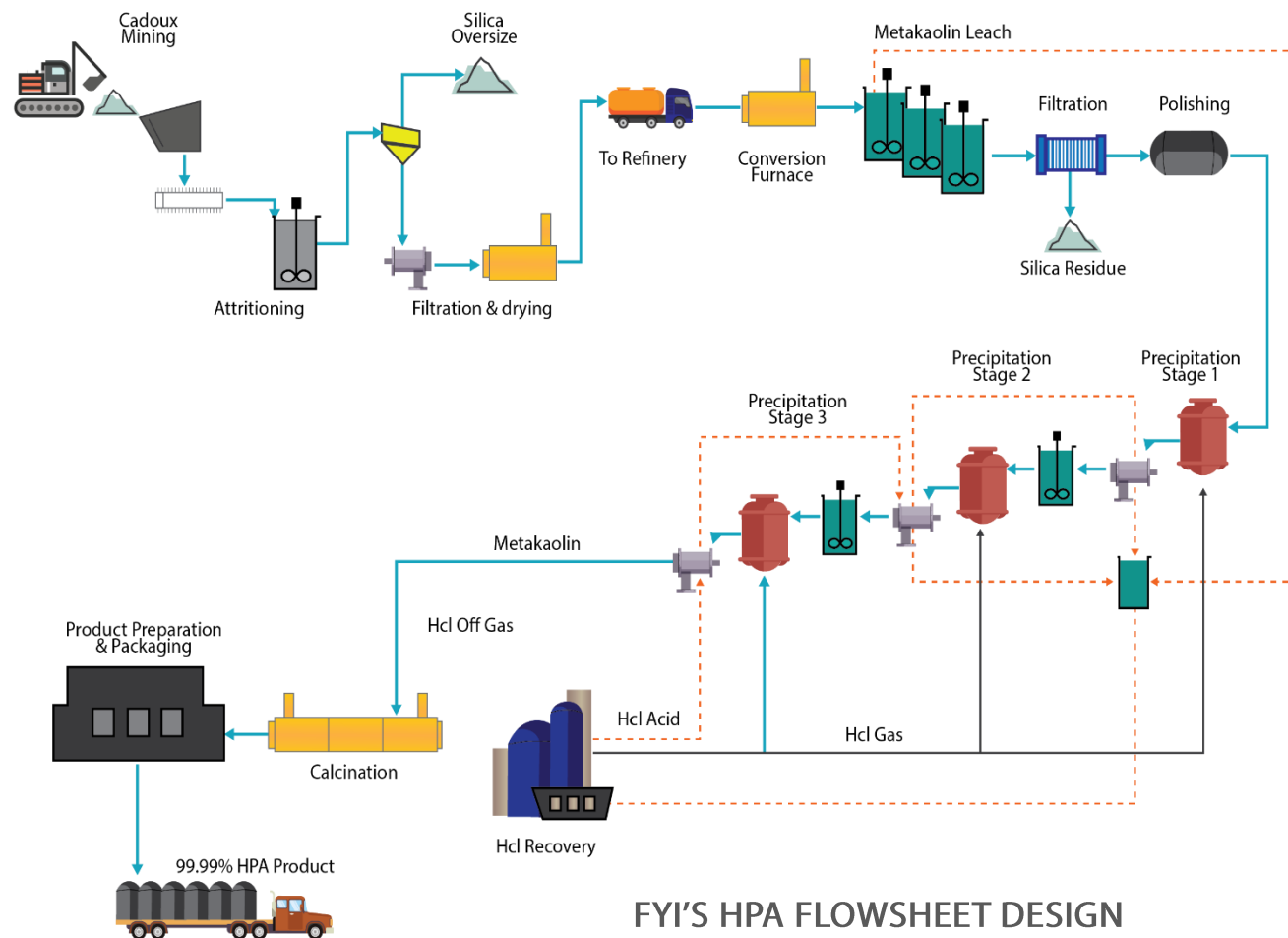
Successfully demonstrated high grade and excellent recoveries



Low environmental impact (non-toxic waste) / low energy requirements



Processing plant planned for Kwinana's 'Battery Alley'



FYI'S HPA FLOWSHEET DESIGN

PILOT PLANT

DEMONSTRATING QUALITY END PRODUCT FOR REAL END USERS



Critical pathway
to successful
commercialisation of new
process flowsheet



Continuous
and up-scaled production



Important data discovery and
development learning process
for project de-risking

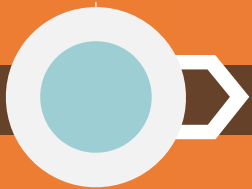


Essential step for project
metrics / funding,
fully funded from R&D

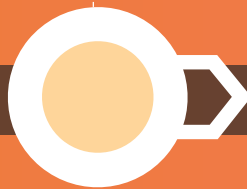
KEY MILESTONES

Progressing towards mine construction at the Cadoux project following an excellent PFS and commencement of a BFS.

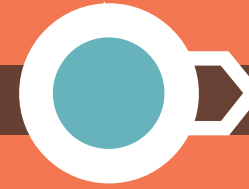
Pilot plant
scoping



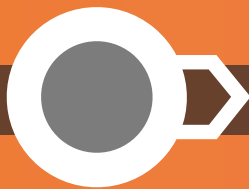
Project cost
refining



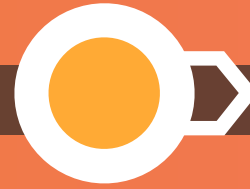
Complete BFS



Final flowsheet
design



Ongoing product
marketing & offtake
discussions

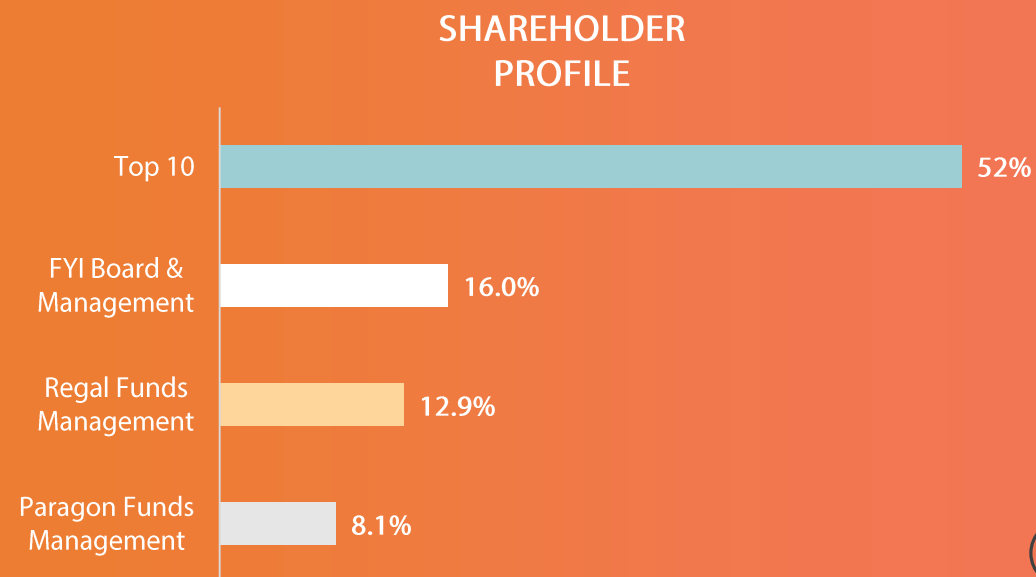
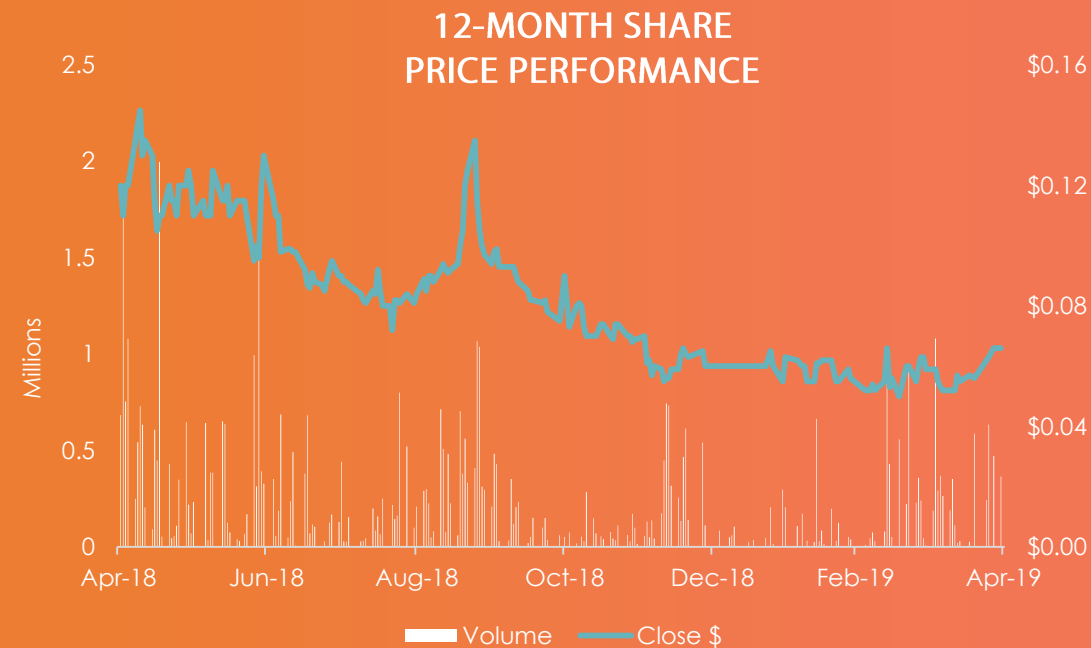


Development
planned to
commence
Dec 2019



CORPORATE OVERVIEW

CAPITAL STRUCTURE	
	AMOUNT
Total issued shares	196.5m
Options (unlisted)	4.25m
Share price	\$0.061
Market cap (fully diluted)	\$12.1m
Cash as at 30 th April 2019	\$1.33m



FYI SUMMARY



ASX-listed company,
fully funded to BFS



High purity alumina (HPA)
Cadoux Kaolin Project in
Western Australia



Positive long-term market
fundamentals



Ground floor entry to an
emerging growth sector



Compelling technical &
geographical advantages



Modern processing
methods using cheaper
feedstock



Demonstrable record of
successful project development



Excellent exploration,
development, operations,
marketing and corporate
capabilities

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