

17 May 2022



American Rare Earths to Participate in Global Metals & Mining Conference

American Rare Earths Limited (**ASX: ARR, OTCQB: ARRNF, FSE: 1BHA**) (**ARR** or 'the Company') a rare earth exploration and development company with assets in the growing rare earths metals sector of the United States of America, is attending the Canaccord Genuity's Global Metals & Mining Conference in Palm Desert, California, May 15-17, 2022. Chris Gibbs, CEO and Managing Director will also be conducting various 1:1 investor meetings at the conference. An updated investor presentation to accompany these meetings is attached.

Following the conference Chris will use the opportunity to meet with company's US business leaders to advance the flagship La Paz Project in Arizona and the exciting Halleck Creek project in Wyoming.

This market announcement has been authorised for release by the Board of American Rare Earths Limited.

Mr Chris Gibbs
CEO & Managing Director

About American Rare Earths:

American Rare Earths Limited (**ASX: ARR, OTCQB: ARRNF, FSE: 1BHA**) is an Australian company listed on the ASX with assets in the growing rare earth metals sector of the United States of America, emerging as an alternative international supply chain to China's market dominance of a global rare earth market expected to expand to US\$20 billion by the mid-2020s. The Company's mission is to supply Critical Materials for Renewable Energy, Green Tech, Electric Vehicles, National Security, and a Carbon-Reduced Future.

Western Rare Earths (WRE) is the wholly owned US subsidiary of the Company. ARR owns 100% of the world-class La Paz rare-earth Project, located 170km northwest of Phoenix, Arizona. As a large tonnage, bulk deposit, La Paz is potentially the largest, rare-earth deposit in the USA and benefits from containing exceptionally low penalty elements such as radioactive thorium and uranium. ARR plans to deliver its first Preliminary Economic Assessment for La Paz by 2022 and is working with leading USA research institutions. La Paz's mineral profile is incorporated into emerging US advanced rare earth processing technologies. In early February 2022, the Company commenced further drilling at the La Paz project to explore lateral and vertical extent in the new southwest area. Approximately 742 - 928 million tonnes of Rare Earths mineralised rocks are identified as an exploration target in the La Paz Rare Earths Project's Southwest area with an average TREO Grade of 350 - 400ppm and Scandium Oxide grade of 20 - 24.5ppm. The new exploration Target is additive to the La Paz Rare Earth project recently upgraded 170MT Resource. (ASX Announcement, 29 September 2021).

In the first half of 2021, ARR acquired the USA REE asset, the Halleck Creek Project in Wyoming. With permits in hand, the maiden exploration drilling program commenced in March 2022 and will provide initial mineralisation, lithology and fresh rock core material for metallurgical and process testing. Approximately 308 to 385 million tonnes of rare earths mineralised rocks were identified as an exploration target for the Halleck Creek project area with an average Total Rare Earth Oxide (TREO) grade of 2,330 - 2,912 ppm. Initial surface sampling of the Overton Mountain area conducted in 2018 revealed average TREO values of 3,297 ppm, average Heavy Rare Earth Oxide (HREO) values of 244 ppm, and average Magnetic Rare Earth Oxide (MREO) values of 816 ppm. (ASX Announcement, 26 April 2022).



American Rare Earths

(ASX: ARR; OTC: ARRF; FSE: 1BH)

Investor Presentation
May 2022



Disclaimers and Forward Looking Statements



Disclaimers

This presentation contains forward-looking statements that involve subjective judgement and analysis and accordingly, are subject to significant uncertainties and risks, many of which are outside the control of, and are unknown to, American Rare Earths (“ARR”). In such circumstances, the forward-looking statements can be identified by the use of forward looking words such as “may”, “will”, “expect”, “intend”, “seek”, “estimate”, “believe”, “continue” or other similar words.

No representation, warranty or assurance is given or made in relation to any forward-looking statement by ARR or it’s representatives, In addition, no representation, warranty or assurance is given in relation to any underlying assumption or that any forward-looking statements will be achieved. Actual future events may vary materially from the forward looking statements and the assumptions on which the forward-looking statements are based. Accordingly, presentation readers are cautioned not to place undue reliance on such forward looking statements as a result of the uncertainties.

ARR wishes to caution readers that these forward-looking statements are based on economic predictions and assumptions on reserves, mining method, production rates, metal prices and costs (both capital and operating) developed by ARR management in conjunction with consultants.

This presentation and the forward-looking statements made in this presentation, speak only as of the date of the presentation.

Accordingly, subject to any continuing obligations under the Corporations Act and the Australian Securities Exchange Listing Rules, ARR disclaims any obligation or undertaking to publicly update or revise any of the forward-looking statements in this presentation, whether as a result of new information, or any change in events, conditions or circumstances on which any such statements is based.

Competent Person Statement

The information in this report that relates to Exploration Results is based on information compiled by Mr. Jim Guiling. Mr. Guiling is a Member of a Recognised Overseas Professional Organisation included in a list promulgated by the ASX (SME Registered Member of the Society of Mining, Metallurgy and Exploration Inc). Mr. Guiling is Principal of independent consultants World Industrial Minerals LLC. Mr. Guiling has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which they are undertaking as a Competent Person as defined in the 2012 Edition of the ‘Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves’. Mr. Guiling consents to the inclusion in the report of the matters based on their information in the form and context in which it appears.

The information in this document that relates to Mineral Resource Estimate is based on information provided by Mr Alfred Gillman. Mr. Gillman is Principal of the independent consultant firm Odessa Resources Pty Ltd. Mr. Gillman is a Fellow and Chartered Professional of the Australian Institute of Mining and Metallurgy (AUSIMM) and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2012 JORC Code. Mr. Gillman consents to the inclusion in the report of the matters based upon the information in the form and context in which it appears.

The mineral resources disclosed in this presentation are compliant with NI 43-101 standards which are close to the JORC Code in their key definitions. La Paz mineral resources can therefore be quoted as “qualifying foreign estimates” according to ASX listing rules.

ARR confirms it is not aware of any new information or data that materially affects the information included in the original market announcement, and, in the case of estimates of Mineral Resources, that all material assumptions and technical parameters underpinning the estimates in the relevant market announcements continue to apply and have not materially changed. ARR confirms that the form and context in which the Competent Person’s findings presented have not been materially modified from the original market announcement.

American Rare Earths (ASX: ARR; OTC: ARRNF; FSE: 1BH)

Developing critical minerals resources for a sustainable future



Expanding high value rare earths resources



Collaborating with leading US Government funded R&D projects



Growing investor base



Enhancing Board, leadership and technical team



American Rare Earths Geologist Brianna Crenshaw at the La Paz Project.

Our pathway to becoming a leading supplier of critical minerals for a sustainable future



Exploration

Define resources and reserves



Development

Advance mining assets



Production

Purify and separate rare earths after extraction



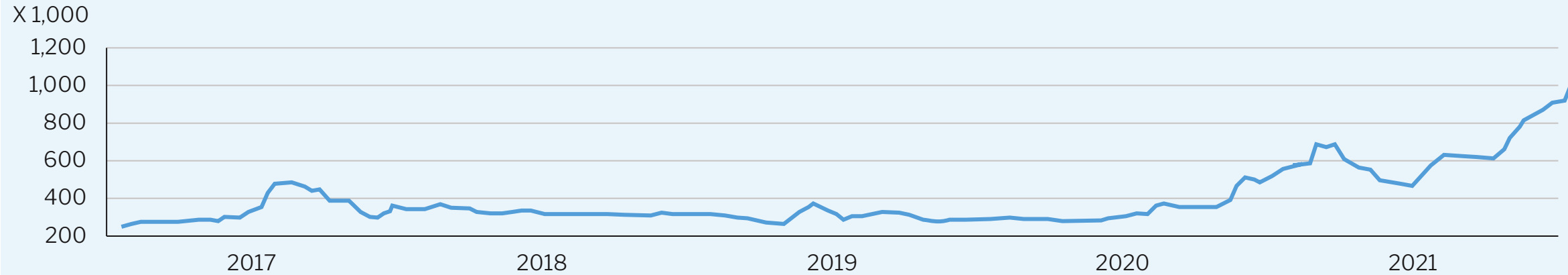
Finished Products

Be a leading supplier of rare earths for a range of technologically advanced products vital to the economy of the future

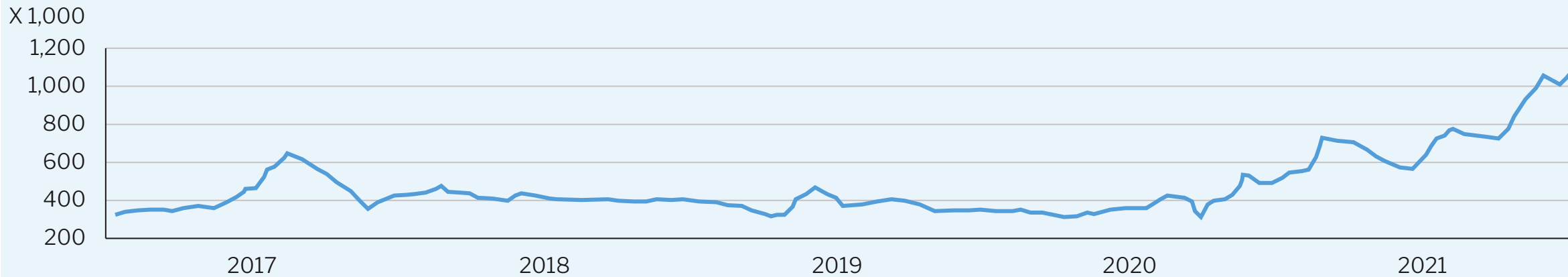
Rare earths demand and prices soar



Neodymium Oxide (yuan/tonne)



Praseodymium Neodymium Alloy (yuan/tonne)



Note: 1,000,000 yuan is approximately USD \$158,316 as at 12.39pm on Tuesday 8 March 2022

Source: Refinitiv Datastream (Shanghai Metals Market).

US Government focus on supply chain security



Bipartisan support to build secure and sustainable rare earths supply for North America

With its strong US presence American Rare Earths is well poised to be at forefront of transformation in the critical minerals sector.



Partnerships

A white icon of two hands shaking, symbolizing partnerships.

Team

A white icon representing a network or team structure with nodes and connecting lines.

Projects

A white icon of a lightbulb with gears inside, symbolizing projects or innovation.

Key projects

1 La Paz, AZ

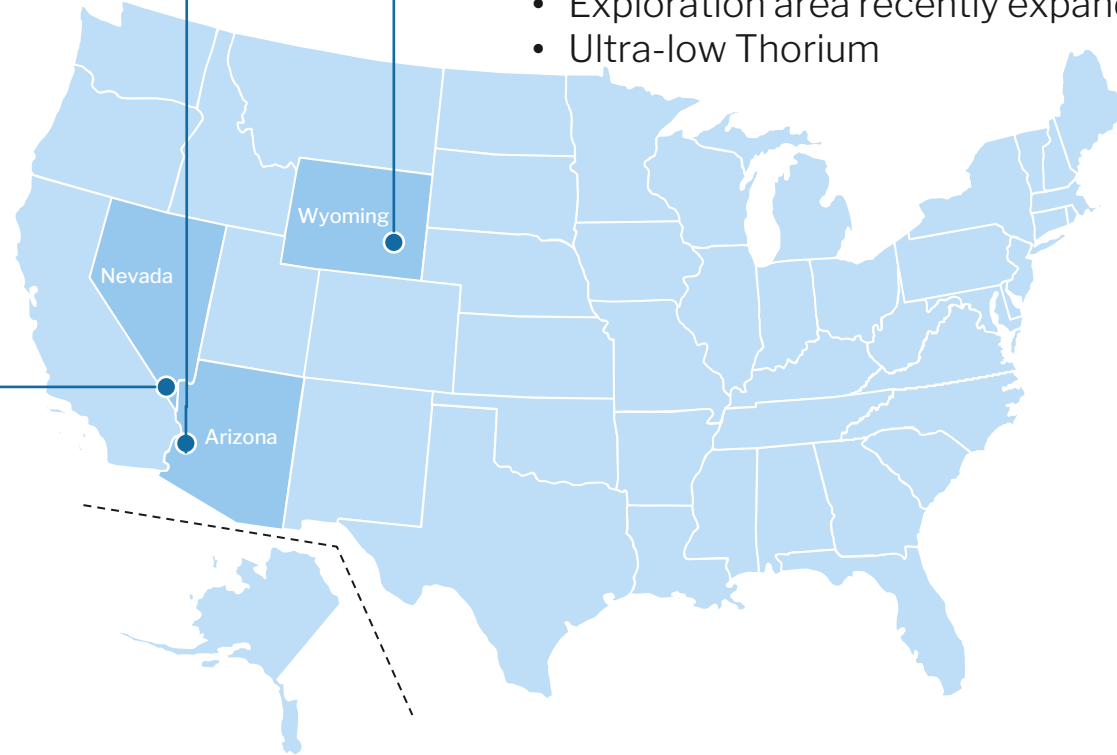
- Largest US exploration target in development
- Priority project
- High volume magnet metals (Nd,Pr) & Scandium
- Negligible Thorium

2 Halleck Creek, WY

- Surface sampling shows high grade Total Rare Earths Oxide (TREO) >3000ppm average
- Maiden drill program complete
- Exploration area recently expanded
- Ultra-low Thorium

3 Searchlight, NV

- <30km from only producing REE mine in US
- Initial sampling encountered substantial grades of heavy and magnet REE



High value magnet REEs

60 Nd Neodymium	59 Pr Praseodymium
66 Dy Dysprosium	65 Tb Terbium
21 Sc Scandium	62 Sm Samarium

La Paz REE and Scandium Project



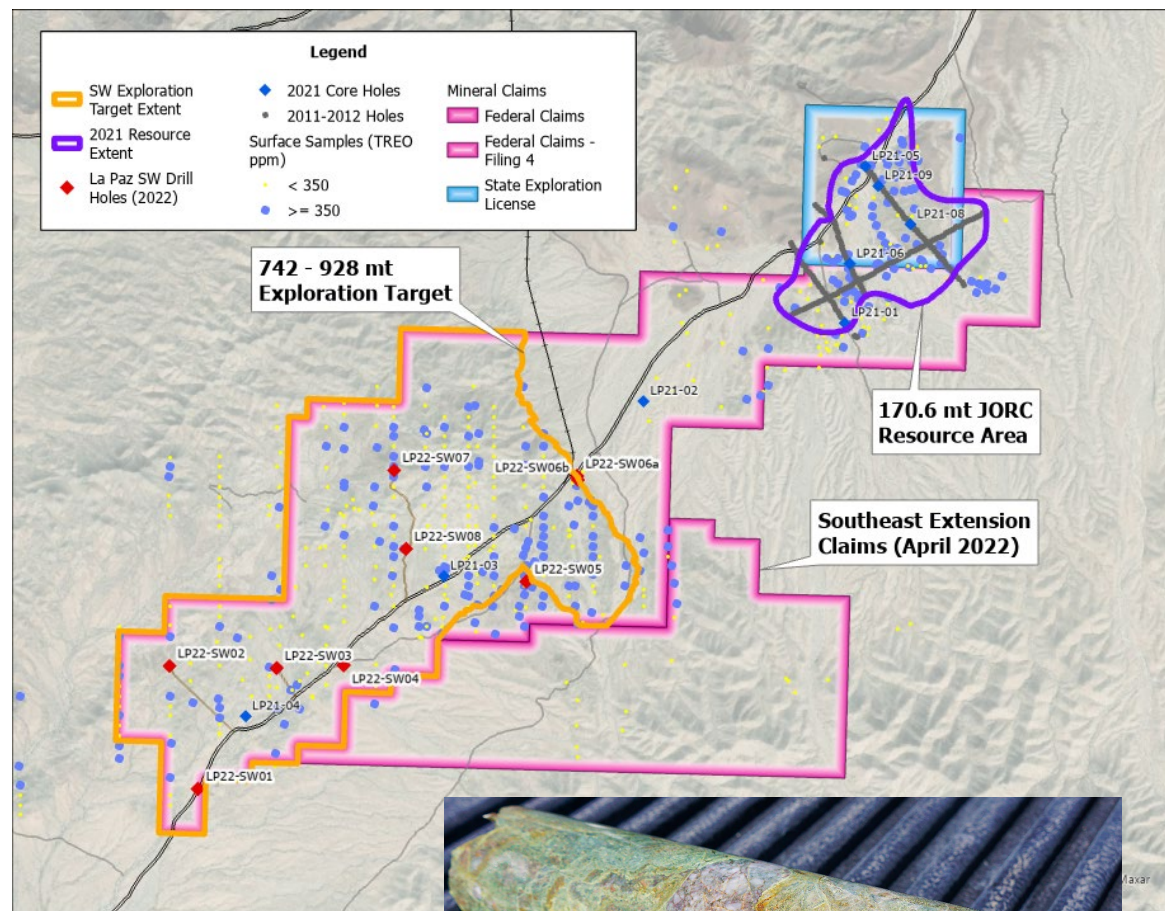
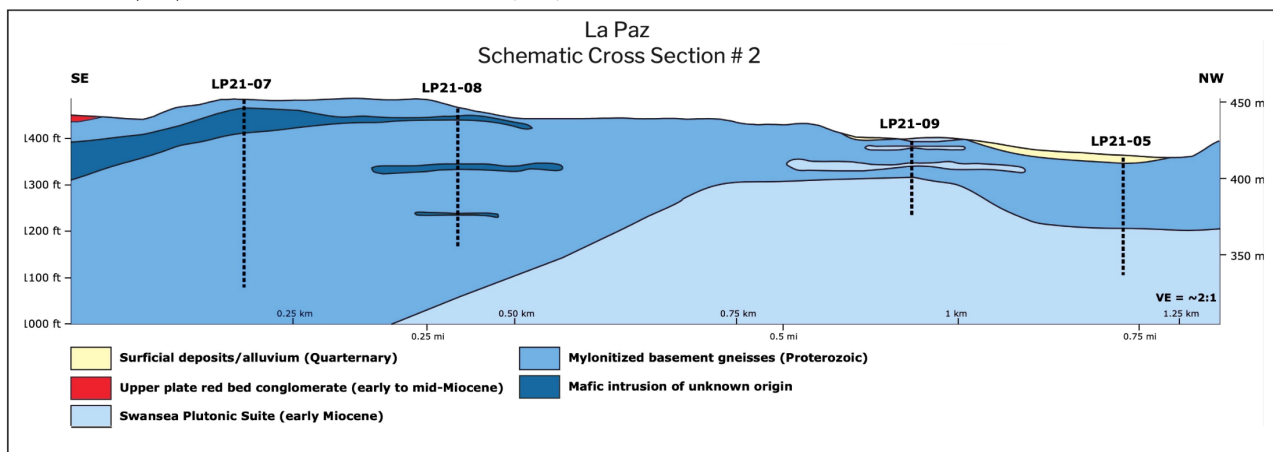
- 170.6 million tonnes JORC compliant resource
- 2022 Exploration Drilling in the new La Paz SW complete
- 333 Claims and Exploration License 7,506 acres / 3,037 hectares
- Near-surface resource.
- Close to key infrastructure in mining friendly Arizona.

JORC 2021: Select Rare Earth Element Oxides

Element	Oxide, ppm	Total Oxide (Kg)
Scandium (Sc)	26	4,406,306
Neodymium (Nd)	79.76	13,606,689
Praseodymium (Pr)	20.97	3,577,386
Dysprosium (Dy)	10.35	1,765,662
Terbium (Tb)	4.59	783,033
Samarium (Sm)	15.31	2,611,816

JORC 2021: Estimated (TREO) Resources at La Paz

Class	Tonnage	TREO (ppm)	TREO (kg)
Indicated	35,161,600	459	16,144,347
Inferred	135,433,800	472	63,865,163
Total	170,595,400	469	80,009,510



Resource Upside

Multiple opportunities to substantially increase the JORC Resources at La Paz:

Scope

Current Resource estimate encompass only 10.2% of project area hosting 170 million tonnes of mineralized ore with an average grade of 469 ppm TREO

Maiden Resource area open laterally and at depth

Additional mineralization discovery <4km to the Southwest resulting in an estimated Exploration Target ranging 742 to 928 million tonnes with 350 to 400 ppm TREO.

Quality

Plan to increase Indicated portion of existing JORC Resource with tighter spaced drilling to convert from Inferred status

Growth

Opportunities to increase drilling locations inside the boundary >55% of the 206 drill holes ended in mineralisation thus opportunity to extend at depth



Metallurgy



- With high tonnage, metallurgy and processing is key to project economics
- Preliminary test work demonstrates that La Paz ore can be effectively concentrated using conventional magnetic separation, selective grinding and direct flotation
- Benefits to ARR include lower processing costs, and less chemical use while maximizing capture of finely ground mineralized material
- Under the guidance of Wood Australia, advanced metallurgy and mineral processing test work is near completion with Nagrom Laboratories.



Hand specimen of pervasive epidote (rare earth-rich allanite) mineralisation

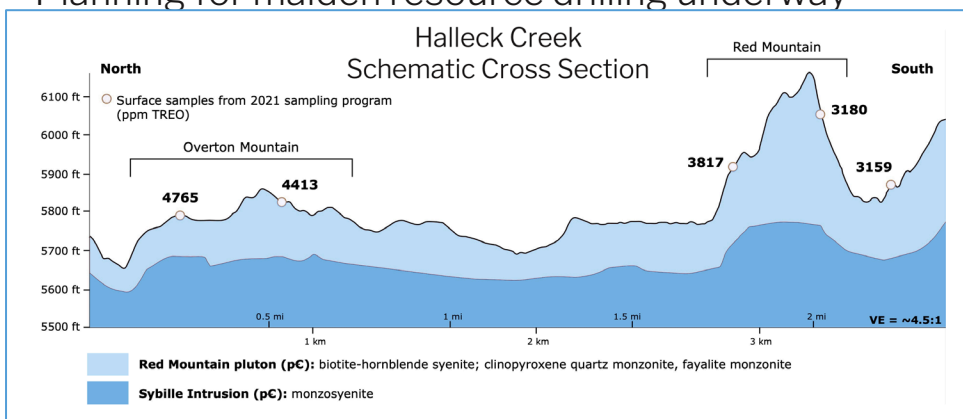
Results of simple magnetic concentration



Halleck Creek Project



- ARR has claims and leases totaling 6,000+ acres at Halleck Creek, close to infrastructure.
- Exploration Targets 308 – 385 million tonnes (asx, 26 April 2022)
- 406 surface geochemistry samples collected with average grade 3,187ppm TREO
- High-grade XRF observations ranged from >3000ppm to values exceeding 20,000ppm.
- Maiden drill program completed in April 2022
- 9 HQ Core Holes (3,008 feet/ 917 metres)
- Consistent REE enrichment to at least 350 feet.
- 822 core samples pending assay results
- Planning for maiden resource drilling underway



Halleck Creek Exploration Target

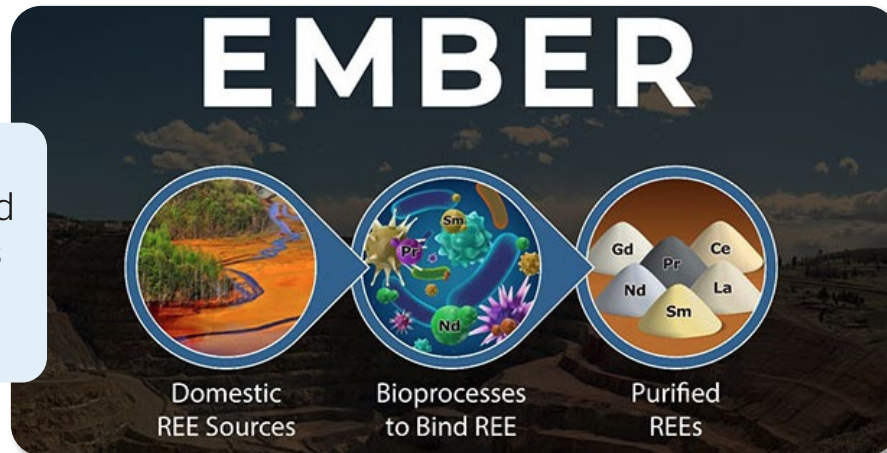
Study Area	In-Place Tonnage (million tonnes)	Average TREO Grade (ppm)
Overton Mountain	75.9 - 94.9	2,551 - 3,189
Red Mountain	231.9 - 289.9	2,258 - 2,822
Total	307.8 - 384.7	2,330 - 2,912

Collaborating with US Government-funded R&D projects

We are proud to partner with leading researchers at:



US Department of Defense Advanced Research Projects Agency's EMBER program



US Department of Energy Critical Materials Institute (CMI)



Building investor base for transformation

Capital placement from
leading multinational
fund Fidelity taking
9.9% stake



Currently trading on:
Australian Securities Exchange (ASX)
American Exchange OTC Markets
Frankfurt Stock Exchange



Corporate information

(ASX: ARR; OTCQB: ARRNF)

Offices

Sydney Suite 706, 89 York Street, Sydney, NSW, AU

USA HQ 2410 W Royal Palm Rd
Phoenix AZ, USA

Capital Structure (AUD)

Price	\$0.36
12 Month Hi-Low	\$0.06 - \$0.54
Shares Outstanding	395.56m
Market Cap	\$142.4m
Cash (as at Mar 2022)	\$8.29m



Ownership Structure

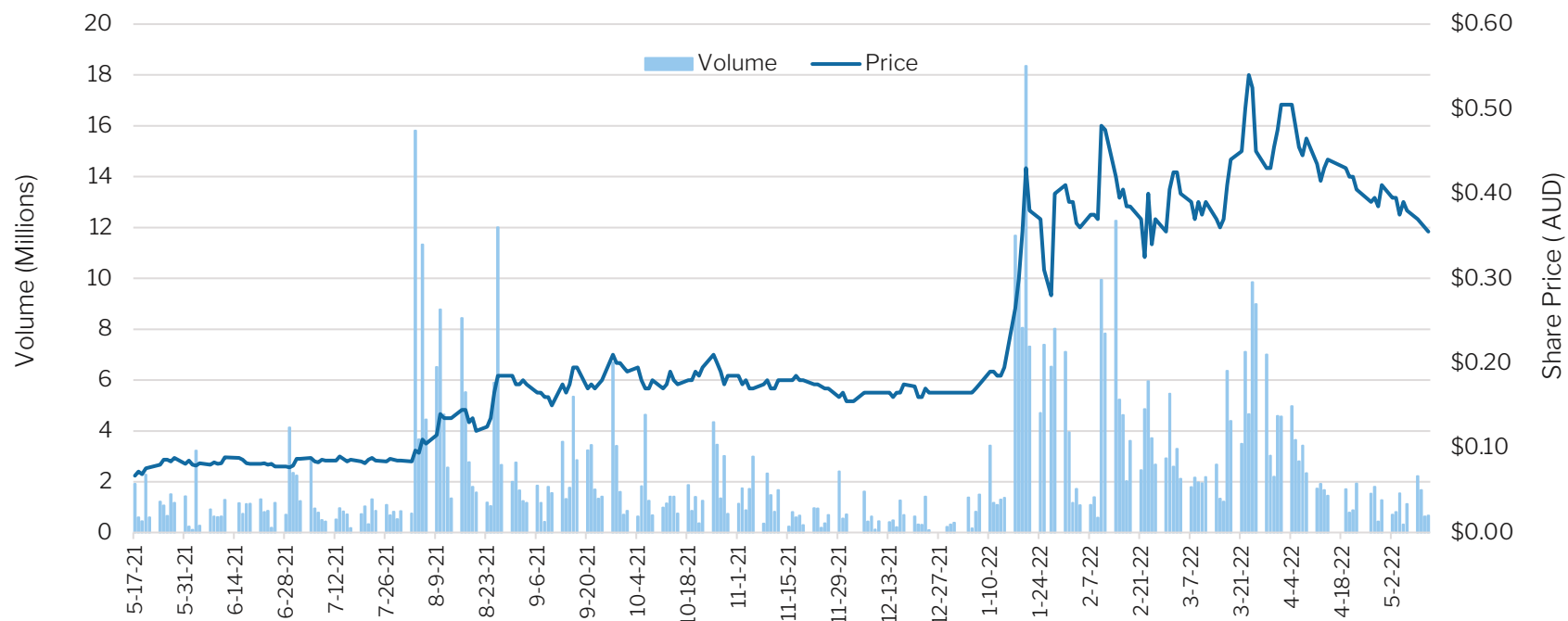
American Rare Earths Limited (Australia)

Western Rare Earths Inc USA
(Project Searchlight)

Wyoming Rare (USA) Inc
(Project Halleck Creek)

La Paz Rare Earth LLC, USA
(Project La Paz)

Share Price and Volume History



Welcoming four new board members, three US-based



We've recently appointed three US-based Non-executive Directors with rich and diverse experience. They support Chairman Creagh O'Connor and CEO and CEO/Managing Director Chris Gibbs, plus long-term Directors. Australian-based Richard Hudson is the most recent addition to the Board.



Clarence
McAllister



Melissa (Mel)
Sanderson



Sten
Gustafson



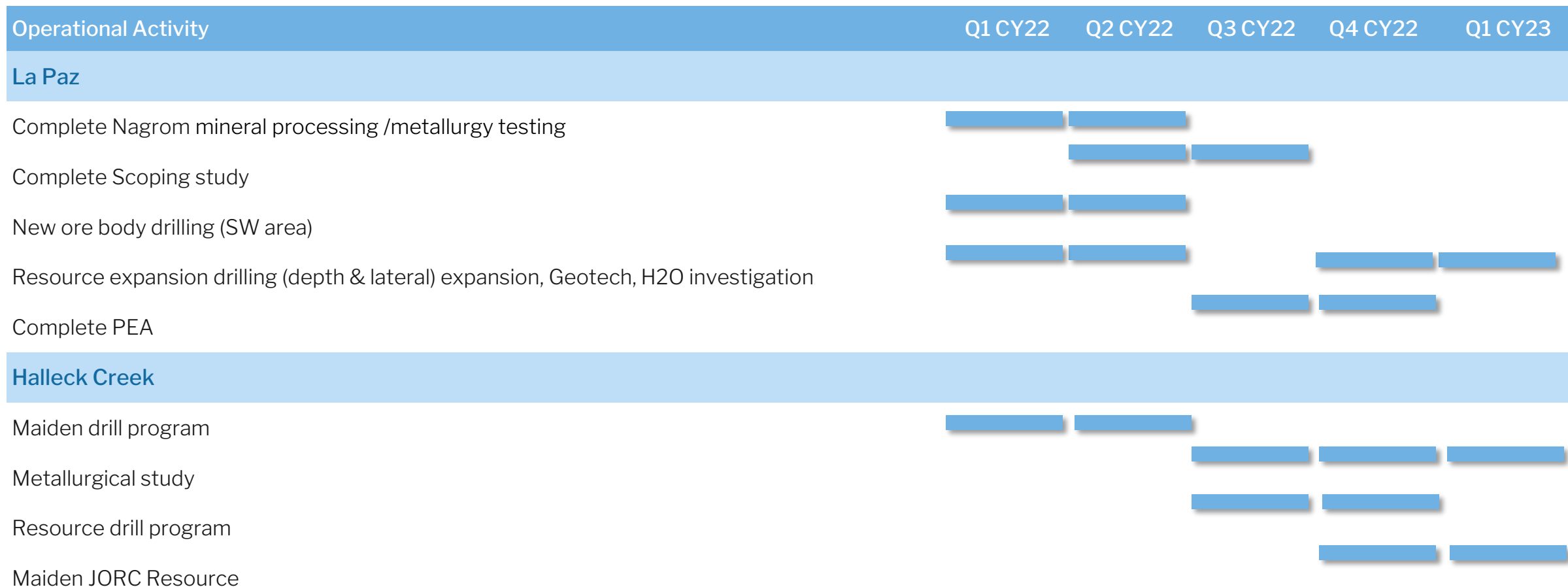
Richard
Hudson

Upcoming activity



With a portfolio of rare earths assets ARR is executing a high tempo of activity for the coming year and beyond.

Key focus is completing preliminary economic assessment (PEA) for La Paz while completing initial drill program at Halleck Creek to identify Maiden JORC Resource



Contact us



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